GEOLOGICAL INVESTIGATIONS

Aggregate Investigation
Greenwood Aggregates Company Limited
Part Lots 30 to 32, Concession 4, E.H.S.
Town of Mono
County of Dufferin

Box #122, 38 Alpine Drive, Moonstone, Ontario, L0K 1N0 Bus/Fax (705) 835-5636
E-mail: geologicalinvestigations@sympatico.ca

GEOLOGICAL INVESTIGATIONS

INTRODUCTION

Geological Investigations was retained by Sam Greenwood (Greenwood Aggregates Company Limited) to evaluate the aggregate resource on the subject property (see Figure 1).

The site is not licensed under the Aggregate Resources Act (ARA.). The intent is to complete the require studies to make an application for a pit license under the Aggregate Resources Act. Application under the Planning Act is also required to amend the Zoning Bylaw and the Official Plan to permit the operation of a pit.

ASSUMPTIONS

Geological Investigations has made the following assumptions during this investigation:

1/ Requirements of the Ontario Aggregate Resources Act (ARA), and Regulations will be met.

2/ Aggregate Resources Act extraction set back requirements will be used to determine the area available for future extraction of aggregate products

3 The following tonnage formula will be used when determining the volume of aggregate on site.

Area (hectares) x depth of materials (metres) x 17,700 (tonnes per hectare per metre depth) = tonnage (tonnes).

4/ Complete extraction of materials contained with the site (127 hectares) to a depth 1.5 metres above the local water table.

FIELD WORK

Under the supervision of Geological Investigations 13 observation wells (see Appendix 1) were constructed on site, by drilling, to a maximum depth below ground surface of 100 feet (30metres).

The intent of the drilling was to determine the types of materials at depth and install wells to permit the monitoring of the groundwater elevation. Samples were taken at various depths for grain size analysis, (see Appendix I &II).

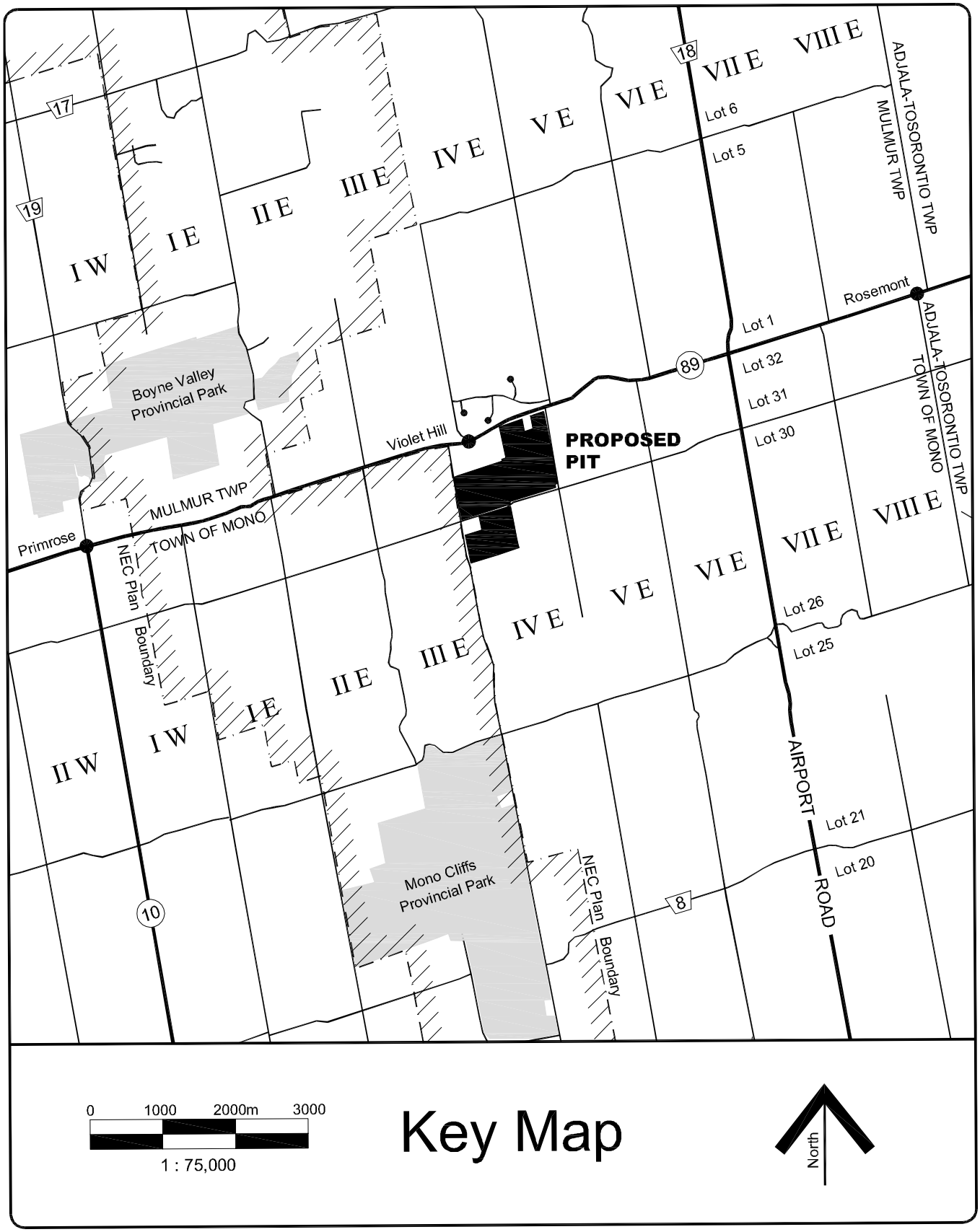

FIGURE 1

SITE LOCATION

GEOLOGICAL INVESTIGATIONS

In addition to the 13 observation wells Greenwood Aggregates Company Limited conducted a power equipment test pit survey, 52 test pits (see Appendix I & II) of the subject property.

Samples were taken at various depths for grain size analysis, (see appendix II). Geological Investigations was not on site during the construction of these test pits.

Geological Investigations is familiar with several aggregate operations in this area and is satisfied that information obtained during our field investigation is sufficient to determine the aggregate resource on site.

METHODOLOGY

The volume of aggregate was calculated by multiplying the area available for extraction (hectares) by the depth (metres) of resource 1.5 metres above the estimated water table.

The tonnage of unconsolidated material was calculated by multiplying the volume by 17,700.

Area (hectares) x (depth) metres x 17,700 = tonnes

Excavation setbacks of 15 metres from property boundaries and 30 metres from road allowances or boundaries with residential use or zoning were considered as required by the Aggregate Resources Act.

GEOLOGICAL INVESTIGATIONS

DISCUSSION

The Subject property, see Figure 2, consists of approximately 149.4 hectares. When required Aggregate Resources Act setbacks to extraction are applied approximately 127 hectares are available for potential aggregate extraction.

Tonnage calculations have been completed on a individual property basis.

Harrison Property (Figure 3)

Resource Calculation of aggregate reserves on Area A (30.23 ha), see Figure 2

Unconsolidated material 30.23 hectares x 18.59 metres x 17,700 = **9,946,969 tonnes**

Wake Property (Figure 4)

Resource Calculation of aggregate reserves on Area B (37.74 hectares), see Figure 2

Unconsolidated material

East 2/3 of property: 23 hectares x 25 metres x 17,700 = **10,177,500** tonnes
West 1/3 of property : 14.74 hectares x 15 metres x 17,700 = **3,913,470** tonnes

D'Orofino Property (Figure 5)

Resource Calculation of aggregate reserves on Area C (36.30 hectares), see Figure 2

Unconsolidated material 36.30 hectares x 17.72 metres x 17,700 = **11,385,277** tonnes

FIGURE 2

VIOLET HILL PROPERTIES

SCALE 1 : 8,860

VIOLET HILL PROPERTY BOUNDARY

N
W
E
S

FIGURE 3

HARRISON PROPERTY

SCALE 1 : 4,300

N
W
E
S

PROPERTY BOUNDARY

OBSERVATION WELL (OW 5)

TEST PIT (1)

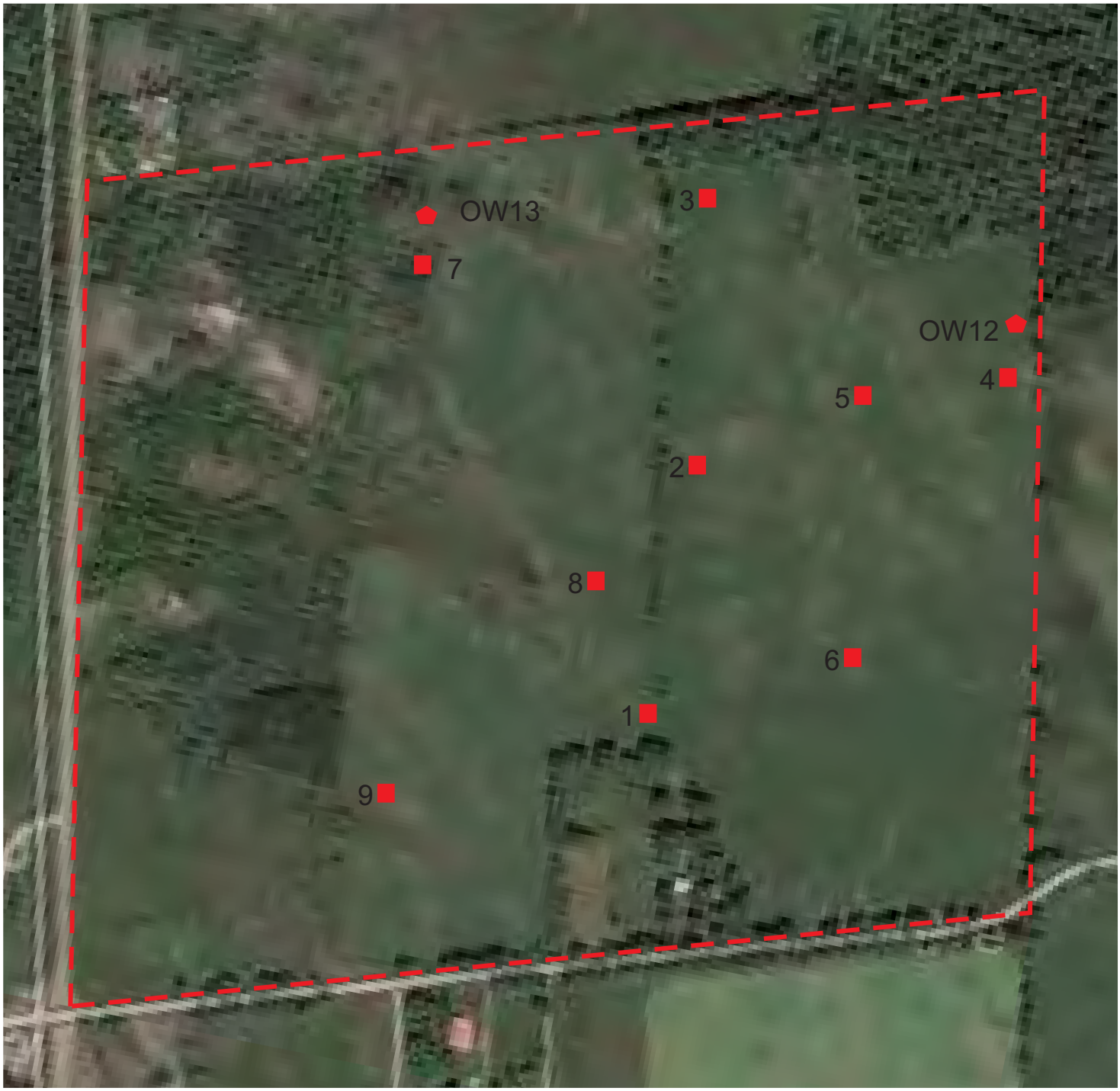

FIGURE 4

SCALE 1 : 4,300

WAKE PROPERTY

N
W
E
S

PROPERTY BOUNDARY

OBSERVATION WELL (OW 5)

TEST PIT (1)

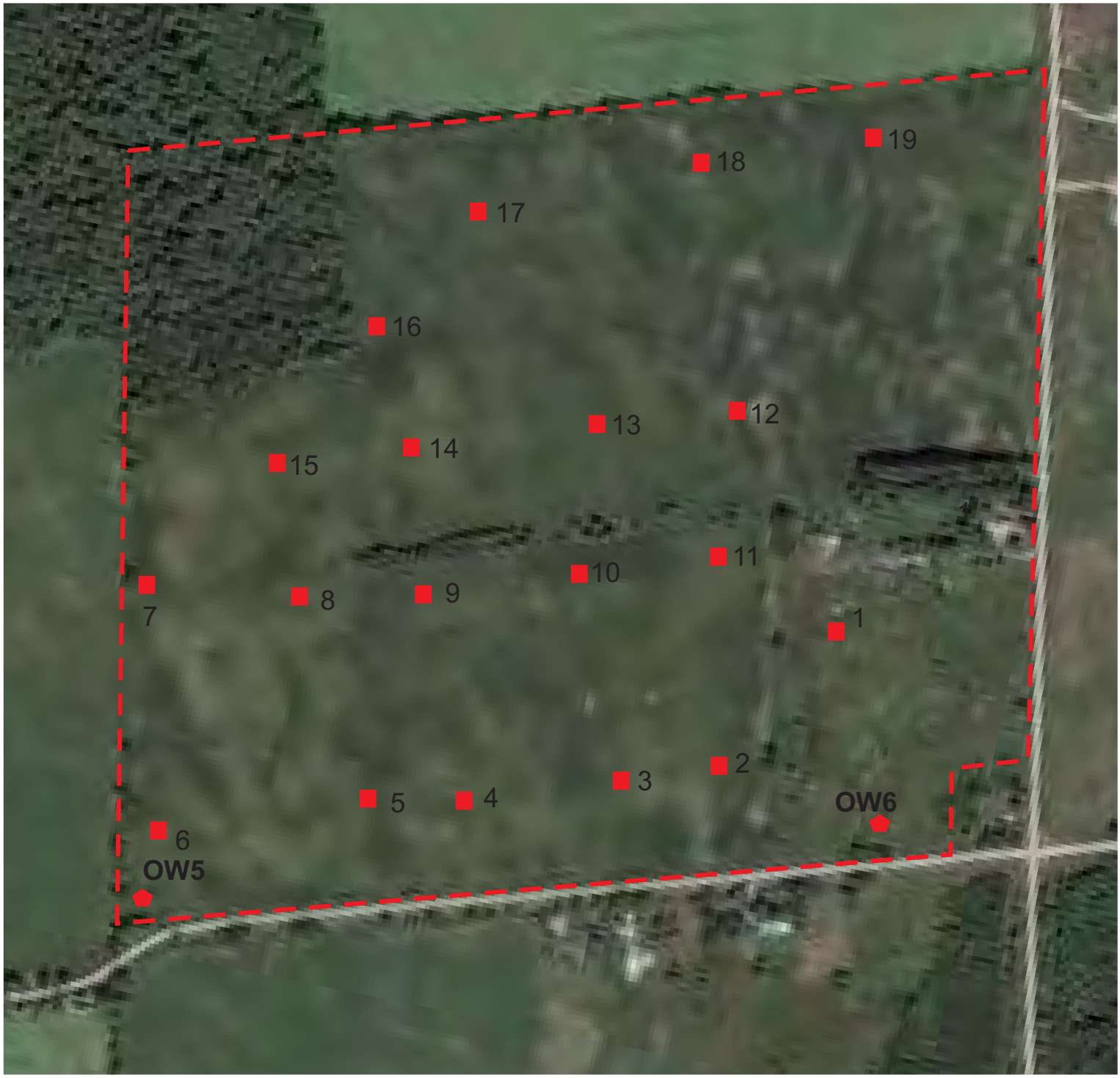

FIGURE 5

SCALE 1 : 4,300

D'OROFINO PROPERTY

N
W
E
S

PROPERTY BOUNDARY

OBSERVATION WELL (OW 5)

TEST PIT (1)

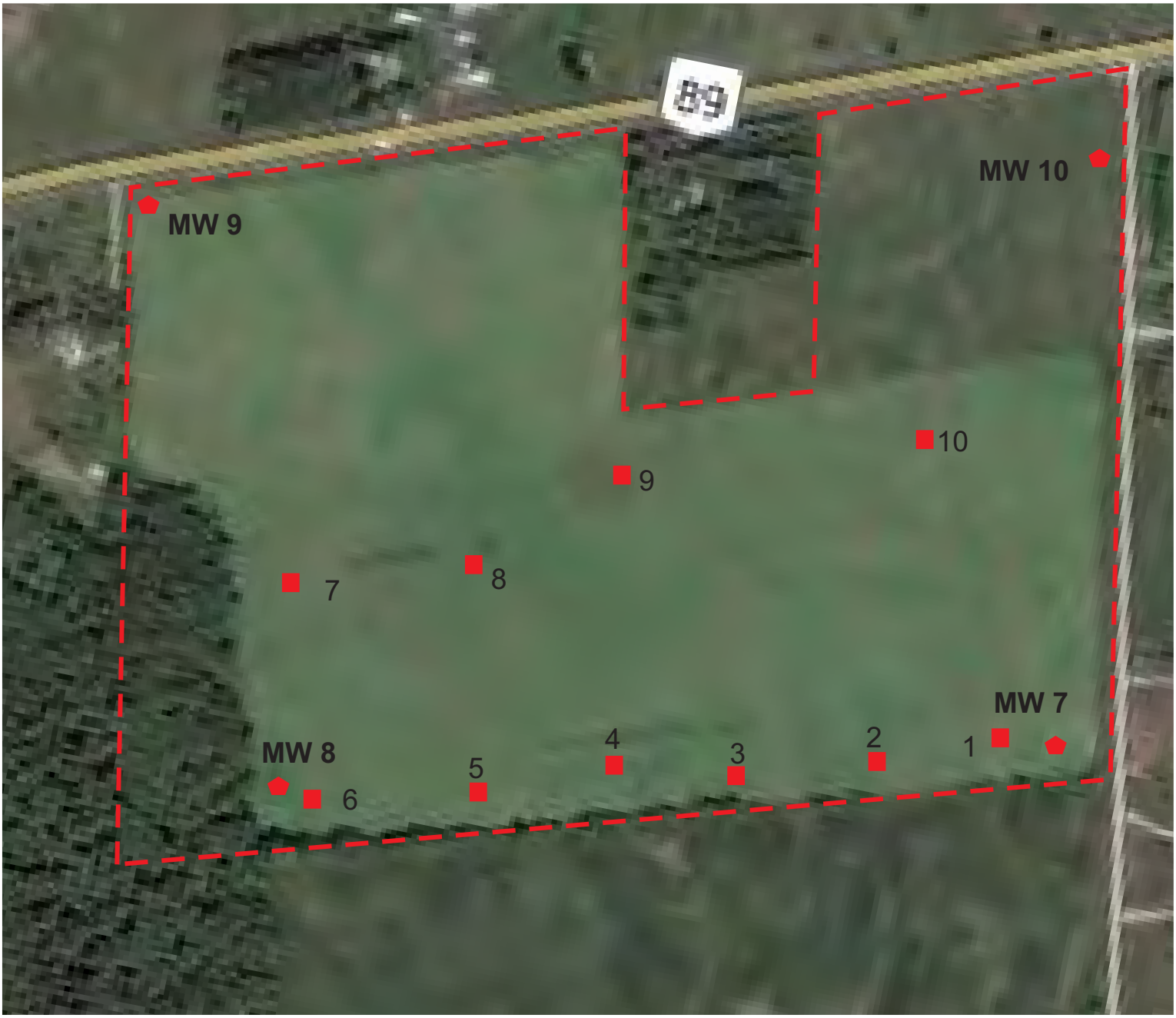

FIGURE 6

PENDLETON PROPERTY

SCALE 1 : 4,300

N
W
E
S

PROPERTY BOUNDARY

OBSERVATION WELL (OW7)

TEST PIT (1)

GEOLOGICAL INVESTIGATIONS

Pentleton Property (Figure 6)

Resource Calculation of aggregate reserves on Area C (23.26 hectares), see Figure 2

Unconsolidated material 23.26 hectares x 23.55 metres x 17,700 = **9,695,582** tonnes

Total Extractable Resources

The total extractable resources on site is the sum of the four properties = **45,118,798** tonnes

Grain size analysis was conducted on samples taken from various levels of the drill holes and from the test pits. Comparison was made to the Provincial Standards for Granular "B" and Concrete sand.

The samples, when plotted against the provincial standards were favourable.

Production of quality Aggregate products requires blending and processing to obtain the correct gradation. Geological investigations is confident that aggregate products meeting the required provinical standards can be produced from the materials found at this property without difficulty.

The type of products which can be produced from the materials encountered at this site include, but are not limited to, Granular "B", concrete sand, general most sand product, clear stone and Granular "A" with additional of stone to increase the stone content.

CONCLUSIONS

This investigation has determined that **45,118,798 tonnes** of aggregate resource exists on this property.

Processing and blending of materials found on this site will be required to product quality aggregate products. This is normal practise in aggregate operations.

All requirements of the Aggregate Resources Act have been taken into consideration while making this determination.

During development of an aggregate operation on this site physical and environmental factors will reduce the total available aggregate, i.e. greater setbacks from nearby residential uses to reduce the impact of noise, possible elimination of areas due to wildlife species. Geological Investigations does not expect any reduction in available tonnage of aggregate to be great and will not affect the economic viability of the proposal

The results and conclusions of this investigation are based on the available information at the time. Should additional information become available, i.e. additional testing, the results and conclusions may change

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Geological Investigations Reference #GI-14-30

William D. Fitzgerald MSc., P.Geo.
September 30, 2015

GEOLOGICAL INVESTIGATIONS

APPENDIX I

Boreholes & Grain Size Analysis

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 12, 2014 BORE HOLE #1

0 TO 1 FOOT	TOPSOIL
1 TO 5 FEET	M-F SAND, FINE STONE, MAX 2 INCHES, DRY DIRTY
5 TO 10 FEET	M-F SAND, TRACE FINE STONE, MAX 2 INCHES, DRY, DIRTY
10 TO 15 FEET	M-F SAND, FINE STONE, MAX 3 INCHES, DRY
15 TO 20 FEET	M-C SAND, FINE STONE, MAX 3 INCHES, DRY, CLEANER
20 TO 22 FEET	M TO F SAND, TRACE STONE, MAX 2 INCHES, DRY
22 TO 25 FEET	SILTY CLAY TO SILT, DAMP
25 TO 30 FEET	SILT TO CLAYEY SILT, DAMP TO WET, NO STONE
30 TO 35 FEET	SILT TO CLAYEY SILT, WET, NO STONE

WELL CONSTRUCTION

0 TO 15 FEET HOLE PLUG

15 TO 20 FEET SAND

20 TO 30 FEET SCREEN AND SAND

30 TO 35 SAND

STICK UP 0.61 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 15, 2014	7:25 AM	DRY
MAY 16, 2014	7:26 AM	DRY
MAY 20, 2014	8:45 AM	DRY
MAY 21, 2014	6:25 PM	DRY
MAY 22, 2014	8:38 AM	DRY
MAY 23, 2014	1:15 PM	DRY

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 12, 2014 BORE HOLE #2

0 TO 4 FOOT	TOPSOIL AND FILL
4 TO 5 FEET	M-F SAND, TRACE FINE STONE
5 TO 7.5 FEET	M-F SAND, TRACE FINE STONE
7.5 TO 8.5 FEET	SILTY CLAY TO SILT, STONEY, TILL?
8.5 TO 10 FEET	M TO FINE SAND, TRACE FINE STONE, DAMP
10 TO 13 FEET	M-F SAND, FINE STONE
13 TO 14 FEET	M-C SAND, DIRTY
14 TO 15 FEET	M TO F SAND, TRACE STONE, MAX 2 INCHES, DRY
15 TO 17 FEET	M TO C SAND, TRACE OF STONE, MAX 3 INCHES, CLEAN
17 TO 20 FEET	M TO F SAND, TRACE FINE STONE, CLEAN
20 TO 25 FEET	M TO F SAND, TRACE FINE STONE, CLEAN
25 TO 30 FEET	M TO F SAND, TRACE FINE STONE, CLEAN
30 TO 35 FEET	F SAND, TRACE FINE STONE, COARSER NEAR 34 TO 35 FEET, CLEAN
35 TO 40 FEET	M TO F SAND, 10% M TO F STONE, MAX 3 INCHES
40 TO 45 FEET	M TO F SAND, TRACE FINE STONE, MAX 3 INCHES
45 TO 50 FEET	M TO FINE SAND, 10% FINE STONE, MAX 3 INCHES
50 TO 55 FEET	M TO F SAND, TRACE FINE STONE
55 TO 59 FEET	M TO F SAND, TRACE FINE STONE
59 TO 60 FEET	M TO F SAND, 10% FINE STONE, MAX 2 INCHES
60 TO 62 FEET	M TO F SAND, 10% FINE STONE, MAX 2 INCHES
62 TO 65 FEET	M TO F SAND, 10% FINE STONE, MAX 4 INCHES
65 TO 70 FEET	M TO F SAND, 5% FINE STONE, MAX 3 INCHES
70 TO 75 FEET	M TO F SAND, 5% FINE STONE, MAX 2 INCHES
75 TO 80 FEET	M TO F SAND, SOME SILT, DIRTY, DAMP

80 TO 85 FEET M TO FINE SAND, SOME SILT & CLAY, DIRTY, DAMP

85 TO 90 FEET M TO FINE SAND, SILT AND CLAY, DIRTY, DAMP, TRACE OF FINE STONE

90 TO 95 FEET CLAYEY SILT TO FINE SAND, WET

95 TO 100 FEET CLAYEY SILT TO FINE SAND, TRACE FINE STONE, WET

WELL CONSTRUCTION

0 TO 70 FEET HOLE PLUG

70 TO 75 FEET SAND

75 TO 95 FEET SCREEN AND SAND

95 TO 100 SAND

STICK UP 0.58 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 15, 2014	7:20 AM	25.83 M
MAY 16, 2014	7:22 AM	25.81 M
MAY 20, 2014	8:40 AM	25.65 M
MAY 21, 2014	6:25 PM	25.55 M
MAY 22, 2014	8:28 AM	25.56 M
MAY 23, 2014	2:02 PM	25.59 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 13, 2014 BORE HOLE #3

0 TO 1 FOOT TOPSOIL

1 TO 2 FEET SANDY SILT FILL

2 TO 5 FEET M-F SAND, 10 TO 15% FINE STONE, MAX 3 INCHES, DIRTY

5 TO 10 FEET M TO FINE SAND, 5 % FINE STONE, CLEAN, MAX 3 INCHES

10 TO 15 FEET M TO F SAND, 15 % FINE STONE, MAX 4 INCHES, DRY

15 TO 19 FEET M TO C SAND, 15 % FINE STONE, MAX 3 INCHES

19 TO 20 FEET M TO C SAND, TRACE FINE STONE, CLEAN

20 TO 25 FEET M TO C SAND, TRACE FINE STONE, CLEAN

25 TO 30 FEET M TO F SAND, 10 % FINE STONE, CLEAN, SAMPLED

30 TO 35 FEET M TO F SAND, TRACE FINE STONE, CLEAN

35 TO 40 FEET M TO F SAND, TRACE FINE STONE, SAMPLED

40 TO 42 FEET M TO F SAND, TRACE FINE STONE,

42 TO 45 FEET M TO FINE SAND, 10% FINE STONE, MAX 2 INCHES

45 TO 47 FEET M TO F SAND, LAYERED MEDIUM STONE

47 TO 50 FEET M TO F SAND, TRACE FINE STONE, CLEAN, SAMPLED

50 TO 55 FEET M TO F SAND, 10 5 FINE STONE, CLEAN

55 TO 60 FEET F SAND, CLEAN

60 TO 65 FEET F SAND, CLEAN

65 TO 70 FEET F SAND, CLEAN

70 TO 75 FEET F SAND, CLEAN

75 TO 80 FEET F SAND, TRACE FINE STONE, CLEAN

80 TO 82 FEET F SAND, TRACE FINE STONE, CLEAN

82 TO 85 FEET F SAND, TRACE FINE STONE, MAX 4 INCHES, CLEAN

85 TO 90 FEET F SAND, TRACE FINE STONE, DIRTY

90 TO 95 FEET F SAND, TRACE FINE STONE, DIRTY

95 TO 100 FEET F SAND, TRACE FINE STONE, DIRTY

WELL CONSTRUCTION

0 TO 80 FEET HOLE PLUG

80 TO 85 FEET SAND

85 TO 95 FEET SCREEN AND SAND

95 TO 100 SAND

STICK UP 0.68 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 14, 2014	9:40 AM	25.86 M
MAY 15, 2014	7:15 AM	25.12 M
MAY 16, 2014	7:23 AM	25.56 M
MAY 20, 2014	8:30 AM	25.95 M
MAY 21, 2014	6:17 PM	25.92 M
MAY 22, 2014	8:22 AM	25.93 M
MAY 23, 2014	1:52 PM	25.94 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 14, 2014 BORE HOLE #4

0 TO 2 FOOT TOPSOIL

2 TO 5 FEET SANDY SILT TO CLAYEY SILT,, STONES, DIRTY, OVERBURDEN

5 TO 10 FEET SANDY SILT TO SILT

10 TO 15 FEET SANDY SILT TO CLAYEY SILT, TRACE OF STONE, SOFT, WET

15 TO 20 FEET SILT TO CLAYEY SILT, SOFT, STONEY

20 TO 25 FEET SANDY SILT TO SILT, 20% FINE STONE,

25 TO 30 FEET M TO C SAND, 20 % FINE STONE. DIRTY

30 TO 35 FEET M TO F SAND, 20 % FINE STONE, DIRTY, SAMPLED

35 TO 38 FEET M TO F SAND, 20 % FINE STONE, MAX 3 INCHES

38 TO 40 FEET SANDY SILT, NO STONE, SOFT, WET

40 TO 45 FEET SANDY SILT,TRACE FINE STONE, WET

45 TO 50 FEET SANDY SILT TO FINE SAND, 5 % FINE STONE, WET

50 TO 55 FEET SANDY SILT TO FINE SAND, 5 % FINE STONE, WET

55 TO 60 FEET SANDY SILT TO FINE SAND, 5 % FINE STONE, WET

WELL CONSTRUCTION

0 TO 40FEET HOLE PLUG

40 TO 45 FEET SAND

45 TO 55 FEET SCREEN AND SAND

55 TO 60 SAND

STICK UP 0.59 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 15, 2014	7:30 AM	12.03 M
MAY 16, 2014	7:40 AM	12.04 M
MAY 20, 2014	8:50 AM	12.04 M
MAY 21, 2014	6:31PM	12.03 M
MAY 22, 2014	8:34 AM	12.03 M
MAY 23, 2014	1:43 PM	12.04 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 14, 2014 BORE HOLE #5

0 TO 2 FOOT	TOPSOIL
2 TO 5 FEET	SANDY SILT TO CLAYEY SILT,, STONES, DIRTY, OVERBURDEN
5 TO 10 FEET	CLAYEY SILT TO SANDY SILT, FILL
10 TO 15 FEET	SILTY FINE SAND, FINE STONE, DIRTY
15 TO 20 FEET	FINE SAND TO SILT,10% FINE STONE, QUEENSTONE SHALE, MAX 3 INCHES
20 TO 22 FEET	MTO F SAND, 10% FINE STONE, MAX 3 INCHES, DIRTY
22 TO 25 FEET	FINE SAND, TRACE FINE STONE, MAX 2 INCHES, CLEAN
25 TO 30 FEET	F SAND, TRACE FINE STONE. CLEAN
30 TO 35 FEET	F SAND, TRACE FINE STONE, CLEAN, SAMPLED
35 TO 40 FEET	M TO F SAND, TRACE FINE STONE, CLEAN
40 TO 45 FEET	M TO F SAND, TRACE FINE STONE, CLEAN
45 TO 50 FEET	M TO FINE SAND, 5 % FINE STONE, CLEAN
50 TO 55 FEET	FINE SAND, TRACE FINE STONE, CLEAN
55 TO 60 FEET	FINE SAND, TRACE FINE STONE, CLEAN
60 TO 65 FEET	F SAND, TRACE FINE STONE, CLEAN, SAMPLED
65 TO 70 FEET	F SAND, TRACE FINE STONE, CLEAN
70 TO 75 FEET	F SAND, TRACE FINE STONE, CLEAN
75 TO 80 FEET	F SAND, TRACE FINE STONE, CLEAN, DAMP
80 TO 85 FEET	F SAND, TRACE FINE STONE, CLEAN, DAMP
85 TO 90 FEET	F SAND, TRACE FINE STONE, CLEAN, WET

WELL CONSTRUCTION

0 TO 70FEET HOLE PLUG

70 TO 75 FEET SAND

75 TO 85 FEET SCREEN AND SAND

85 TO 90 SAND

STICK UP 0.59 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 15, 2014	2:20 PM	23.77 M
MAY 16, 2014	7:45 AM	23.78 M
MAY 20, 2014	8:55 AM	23.74 M
MAY 21, 2014	6:12PM	23.72 M
MAY 22, 2014	8:17 AM	23.72 M
MAY 23, 2014	2:12 PM	23.72 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 15, 2014 BORE HOLE #6

0 TO 2 FOOT TOPSOIL

2 TO 5 FEET SILTY SAND, STONES, DIRTY, FILL

5 TO 7 FEET SANDY SILT, STONES

7 TO 10 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 4 INCHES, QUEENSTON SHALE STONES

10 TO 12 FEET MEDIUM TO FINE SAND, 30% FINE STONE, DIRTY

12 TO 15 FEET MEDIUM TO FINE SAND, 10% FINE STONE, DIRTY, WATER

15 TO 20 FEET MEDIUM TO FINE SAND, 30% FINE STONE, 3 INCHES, WATER

20 TO 22 FEET MEDIUM TO FINE SAND, 30% FINE STONE, DIRTY

22 TO 25 FEET MEDIUM TO FINE SAND, 30% FINE STONE, MAX 5 INCHES

25 TO 27 FEET MEDIUM TO FINE SAND, 30% FINE STONE, MAX 5 INCHES

27TO 30 FEET CLAYEY SILT TO SILT, WET

30 TO 35 FEET CLAYEY SILT TO SILT, WET

35 TO 36 FEET SPLIT SPOON, HARD SILT

36 T0 40 FEET FINE SAND TO SILT, SOUPY RECOVERY

40 TO 45 FEET FINE SAND TO SILT, SOUPY RECOVERY

45 TO 50 FEET FINE SAND TO SILT, SOUPY RECOVERY

WELL CONSTRUCTION

0 TO 38 FEET HOLE PLUG

38 TO 43 FEET SAND

43 TO 48 FEET SCREEN AND SAND

48 TO 50 SAND

STICK UP 0.67 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 15, 2014	7:00 PM	15.47 M	
MAY 16, 2014	7:56 AM	15.90 M	DRY
MAY 20, 2014	9:00 AM	15.90 M	DRY
MAY 21, 2014	6:07PM	15.90 M	DRY
MAY 22, 2014	8:12 AM	15.90 M	DRY
MAY 23, 2014	2:20 PM	15.90 M	DRY

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 16, 2014 BORE HOLE #7

0 TO 1 FOOT TOPSOIL

1 TO 5 FEET SILTY FINE SAND

5 TO 10 FEET SILTY FINE SAND, DAMP TO WET

10 TO 15 FEET SILTY FINE SAND, WET, SOFT

15 TO 20 FEET SILTY FINE SAND, WET, SOFT

20 TO 25 FEET SILTY FINE SAND, WET, SOFT

25 TO 27 FEET SILTY FINE SAND, DAMP TO WET

27TO 30 FEET SILTY FINE SAND, DAMP TO WET, TRACE OF FINE STONE

30 TO 35 FEET SILTY FINE SAND, DAMP TO WET, TRACE OF FINE STONE, SAMPLE AT 30 FEET

35 T0 40 FEET FINE SAND, TRACE FINE STONE, DAMP TO WET

40 TO 45 FEET FINE SAND, TRACE FINE STONE, DAMP TO WET

45 TO 50 FEET FINE SAND, TRACE FINE STONE, DAMP TO WET

50 TO 55 FEET MEDIUM FINE SAND, TRACE FINE STONE, DAMP TO WET, SPLIT SPOON AT 55 TO 56 FEET, MEDIUM TO COARSE SAND, 10% FINE STONE

55 TO 60 FEET MEDIUM TO FINE SAND, TRACE FINE STONE, DAMP TO WET, SAMPLE AT 60 FEET

65 TO 70 FEET FINE SAND, TRACE FINE STONE, WET, SPLI SPOON AT 70 TO 71.5 FEET, FINE SAND, DRY

WELL CONSTRUCTION

0 TO 55 FEET HOLE PLUG

55 TO 60 FEET SAND

60 TO 70 FEET SCREEN AND SAND

70 TO 72 SAND

STICK UP 0.62 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 20, 2014	9:05 PM	21.79 M	DRY
MAY 21, 2014	8:40 AM	21.79 M	DRY
MAY 21, 2014	6:01 PM	21.79 M	DRY
MAY 22, 2014	8:05 AM	21.79 M	DRY
MAY 23, 2014	2:25 PM	21.79 M	DRY

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 20, 2014 BORE HOLE #8

0 TO 3 FOOT TOPSOIL

3 TO 5 FEET SANDY SILT TO CLAYEY SILT, WET TO DAMP. ALLUVIUM

5 TO 7 FEET SANDY SILT TO CLAYEY SILT, WET TO DAMP. ALLUVIUM

7 TO 10 FEET SILTY TO CLAYEY FINE SAND, WET

10 TO 15 FEET SILTY TO CLAYEY FINE SAND, WET

15 TO 20 FEET MEDIUN TO FINE SAND, TRACE MEDIUM TO FINE STONE, HIGH CALY CONTENT, DAMP

20 TO 25 FEET MEDIUN TO FINE SAND, TRACE FINE STONE, DAMP, CLEANER WITH DEPTH

25 TO 30 FEET FINE SAND, TRACE FINE STONE, CLEANER

30 TO 35 FEET MEDIUM TO FINE SAND, 5% FINE STONE, DIRTY, SAMPLE TAKEN

35 T0 40 FEET FINE SAND, 10% FINE STONE, MAX 5 INCHES

40 TO 45 FEET MEDIUM TO FINE SAND, 20% FINE STONE, DIRTY CLAYEY AT 42 FEET, MAX 4 INCHES

45 TO 50 FEET MEDIUM TO FINE SAND, 20% FINE STONE, MAX 4 INCHES,DIRTY

50 TO 55 FEET MEDIUM TO FINE SAND, 20% FINE STONE, MAX 5 INCHES,DIRTY

55 TO 60 FEET COARSE TO MEDIUM SAND, TRACE FINE STONE, DIRTY

60 TO 65 FEET COARSE TO MEDIUM SAND, TRACE FINE STONE, SATURATED, SOUPY

65 TO 70 FEET COARSE TO MEDIUM SAND, TRACE FINE STONE, SATURATED

WELL CONSTRUCTION

0 TO 53 FEET HOLE PLUG

53 TO 58 FEET SAND

58 TO 68 FEET SCREEN AND SAND

68 TO 70 SAND

STICK UP 0.75 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 20, 2014	2:30 PM	21.50 M
MAY 21, 2014	8:45 AM	21.56 M
MAY 21, 2014	5:56 PM	21.58 M
MAY 22, 2014	8:00 AM	21.59 M
MAY 23, 2014	2:30 PM	21.62 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 20, 2014 BORE HOLE #9

0 TO 2 FOOT	TOPSOIL
2 TO 5 FEET	FINE SAND, TRACE FINE STONE, OXIDIZED
5 TO 7 FEET	FINE SAND, TRACE FINE STONE, OXIDIZED
7 TO 10 FEET	FINE SAND, TRACE FINE STONE, MAX 4 INCHES, DIRTY
10 TO 15 FEET	FINE SAND, 10% FINE STONE, DIRTY, CLEANER WITH DEPTH
15 TO 17 FEET	FINE SAND, 10% FINE STONE, DIRTY, CLEANER WITH DEPTH
17 TO 20 FEET	"RED" MEDIUN TO COARSE SAND, TRACE FINE STONE, MAX 2 INCHES
20 TO 25 FEET	"RED" MEDIUN TO COARSE SAND, TRACE FINE STONE, MAX 2 INCHES
25 TO 27 FEET	"RED" MEDIUN TO FINE SAND, TRACE FINE STONE, MAX 2 INCHES
27 TO 30 FEET	SILT TO SILTY FINE SAND, DAMP
30 TO 32 FEET	SILT TO SILTY FINE SAND, TRACE OF STONE, WET, SAMPLE
32 TO 35 FEET	FINE TO SILTY FINE SAND, TRACE FINE STONE, HARD
35 TO 36 FEET	MEDIUM TO COARSE SAND, TRACE FINE STONE, SPLIT SPOON
36 T0 40 FEET	FINE SAND TO SILTY FINE SAND, TRACE FINE STONE, WET
40 TO 45 FEET	FINE SAND, TRACE FINE STONE, WET, SAND COARSER WITH DEPTH
45 TO 50 FEET	MEDIUM TO FINE SAND, 5% FINE STONE, MAX 2 INCHES,DAMP
50 TO 55 FEET	MEDIUM TO FINE SAND, 5% FINE STONE, MAX 1 INCHES,DAMP
55 TO 60 FEET	MEDIUM TO FINE SAND, 5% FINE STONE, MAX 1 INCHES,DAMP
60 TO 65 FEET	FINE SAND, TRACE FINE STONE, DAMP
65 TO 70 FEET	FINE SAND
70 TO 75 FEET	FINE SAND
75 TO 80 FEET	FINE SAND, TRACE FINE STONE
80 TO 85 FEET	FINE SAND, TRACE FINE STONE
85 TO 90 FEET	FINE SAND, TRACE FINE STONE

WELL CONSTRUCTION

0 TO 73 FEET HOLE PLUG

73 TO 78 FEET SAND

78 TO 88 FEET SCREEN AND SAND

88 TO 90 SAND

STICK UP 0.64 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 22, 2014	10:35 AM	25.87 M
MAY 22, 2014	3:40 PM	25.82 M
MAY 23, 2014	7.26 AM	25.82 M
MAY 23, 2014	2.35 PM	25.83 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 20, 2014 BORE HOLE #10

0 TO 1 FOOT TOPSOIL

1 TO 5 FEET SILTY, CLAYEY SAND, TRACE FINE STONE, DIRTY

5 TO 10 FEET FINE TO MEDIUM, 10% FINE STONE, SAND BECOMING CLEANER WITH DEPTH,

10 TO 10 FEET REFUSAL, LARGE ROCK, MOVED OVER AND STATED AGAIN

0 TO 1 FOOT TOPSOIL

1 TO 5 FEET FINE SAND TRACE FINE STONE, DIRTY BECOMING CLEANER WITH DEPTH

5 TO 10 FEET CLAYEY FINE SAND, TRACE FINE STONE

10 TO 15 FEET FINE SAND, 10% FINE STONE, MAX 5 INCHES, DIRTY

15 TO 20 FEET CLAYEY, SILTY SAND, TRACE FINE STONE

20 TO 25 FEET SILTY FINE SAND, CLEAN

25 TO 30 FEET FINE SAND, CLEAN

30 TO 35 FEET MEDIUM TO FINE SAND, 10% FINE STONE, SAMPLE

35 T0 40 FEET MEDIUM TO FINE SAND, 10% FINE STONE

40 TO 45 FEET MEDIUM TO FINE SAND, 10% FINE STONE

45 TO 50 FEET FINE SAND, TRACE FINE STONE

50 TO 55 FEET FINE SAND, TRACE FINE STONE

55 TO 60 FEET FINE SAND, TRACE FINE STONE

60 TO 65 FEET MEDIUM TO FINE SAND, TRACE FINE STONE, DAMP

65 TO 70 FEET MEDIUM TO FINE SAND, TRACE FINE STONE

70 TO 75 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 3 INCHES, CLEAN

75 TO 80 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 3 INCHES, CLEAN

80 TO 85 FEET MEDIUM TO FINE SAND, 20% FINE STONE, MAX 3 INCHES, CLEAN

85 TO 90 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 3 INCHES, CLEAN

90 TO 95 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 3 INCHES, CLEAN

95 TO 100 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 3 INCHES, CLEAN

WELL CONSTRUCTION

0 TO 83 FEET HOLE PLUG

83 TO 98 FEET SAND

88 TO 98 FEET SCREEN AND SAND

98 TO 100 SAND

STICK UP 0.75 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 22, 2014	5:35 PM	31.04 M	DRY
MAY 23, 2014	7.20 AM	31.04 M	PROBE WAS WET BUT DID NOT BEEP
MAY 23, 2014	2.45 PM	31.04 M	PROBE WAS WET BUT DID NOT BEEP
MAY 23, 2014	3:20 PM	31.00 M	PUT SOME BOTTLED WATER DOWN HOLE AND PROBE BEEPED

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, MAY 20, 2014 BORE HOLE #11

0 TO 1 FOOT	TOPSOIL
1 TO 5 FEET	MEDIUM TO FINE SAND, 20% FINE STONE, MAX 4 INCHES, DIRTY
5 TO 10 FEET	MEDIUM TO FINE SAND, 20% FINE STONE, MAX 4 INCHES, DIRTY
10 TO 15 FEET	MEDIUM TO COARSE SAND, 30% FINE STONE, MAX 6 INCHES, DIRTY
15 TO 20 FEET	MEDIUM TO COARSE SAND, 30% FINE STONE, MAX 6 INCHES, DIRTY
20 TO 23 FEET	MEDIUM TO COARSE SAND, 30% FINE STONE, MAX 6 INCHES, DIRTY
23 TO 25 FEET	CLAYEY SILT TO MEDIUM SAND, 10% FINE STONE, DIRTY
25 TO 30 FEET	SILTY FINE SAND, TRACE FINE STONE, CLEAN
30 TO 35 FEET	SILTY FINE SAND, TRACE FINE STONE, CLEAN, SAMPLE
35 T0 40 FEET	SILT TO SILTY FINE SAND
40 TO 45 FEET	SILT TO SILTY FINE SAND
45 TO 50 FEET	SILT TO SILTY FINE SAND
50 T0 53 FEET	SILT TO SILTY FINE SAND
53 TO 55 FEET	SILT TO SILTY FINE SAND, WET
55 TO 60 FEET	SILT TO SILTY CLAY, VERY SOFT, PLASTIC, WET
60 TO 65 FEET	SILT TO SILTY CLAY, VERY SOFT, PLASTIC, WET
65 TO 70 FEET	SILT TO SILTY CLAY, VERY SOFT, PLASTIC, WET, TRACE FINE STONE
70 TO 75 FEET	SILT TO SILTY CLAY, VERY SOFT, PLASTIC, WET TRACE FINE STONE
75 TO 80 FEET	SILT TO SILTY CLAY, VERY SOFT, PLASTIC, VERY WET

WELL CONSTRUCTION

0 TO 33 FEET HOLE PLUG

63 TO 68 FEET SAND

68 TO 78 FEET SCREEN AND SAND

78 TO 80 SAND

STICK UP ? METRES

WATER MEASUREMENTS FROM TOP OF PIPE

MAY 23, 2014 1:20 PM 19.73 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, OCTOBER 23, 2014 BORE HOLE #12

0 TO 1 FOOT TOPSOIL

1 TO 5 FEET MEDIUM TO FINE SAND, 25% FINE STONE, MAX 2 INCHES

5 TO 10 FEET MEDIUM TO FINE SAND, 25% FINE STONE, MAX2 INCHES

10 TO 15 FEET MEDIUM TO FINE SAND, TRACE FINE STONE

15 TO 20 FEET MEDIUM TO FINE SAND, TRACE FINE STONE, SAMPLE TAKEN BETWEEN 15 TO 20 FEET

20 TO 25 FEET MEDIUM TO FINE SAND, 5% FINE STONE, MAX 2 INCHES

25 TO 30 FEET MEDIUM TO FINE SAND, 2% FINE STONE

30 TO 35 FEET MEDIUM TO FINE SAND, 5% FINE STONE, MAX 2 INCHES, SAMPLE TAKEN BETWEEN 30 TO 35 FEET

35 T0 40 FEET MEDIUM TO FINE SAND, 2% FINE STONE

40 TO 45 FEET MEDIUM TO FINE SAND, 2% FINE STONE

45 TO 50 FEET MEDIUM TO FINE SAND, TRACE FINE STONE, SHARP SAND

50 T0 55 FEET FINE SAND, TRACE FINE STONE

55 TO 60 FEET FINE TO MEDIUM SAND, LAYERED 5% FINE STONE, MAX 2 INCHES

60 TO 65 FEET FINE SAND TO SILT, SAMPLE TAKEN BETWEEN 60 TO 65 FEET

65 TO 70 FEET FINE SAND TO SILT, DAMP

70 TO 75 FEET FINE SAND TO SILT, DAMP

75 TO 80 FEET FINE SAND TO SILT, DRY

80 TO 85 FEET FINE SAND TO SILT, DRY

85 TO 90 FEET FINE SAND TO SILT, DRY

90 TO 95 FEET FINE SAND TO SILT, DRY

WELL CONSTRUCTION

0 TO 84 FEET HOLE PLUG

80 TO 84 FEET SAND

84 TO 94 FEET SCREEN AND SAND

94 TO 95 SAND

STICK UP 0.67 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

OCTOBER 24, 2014 12:00 PM 28.74 M

GREENWOOD CONSTRUCTION (VIOLET HILL) PROJECT, OCTOBER 23 & 24, 2014 BORE HOLE #13

0 TO 1 FOOT TOPSOIL

1 TO 5 FEET MEDIUM TO FINE SAND, 20% FINE STONE, DIRTY

5 TO 8 FEET MEDIUM TO FINE SAND, 30% FINE STONE, MAX3 INCHES

8 TO 10 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX2 INCHES

10 TO 15 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 2 INCHES

15 TO 20 FEET MEDIUM TO COARSE SAND, 30% FINE STONE, MAX 3 INCHES

20 TO 25 FEET MEDIUM TO FINE SAND, 30% FINE STONE, MAX 3 INCHES, SAMPLE TAKEN BETWEEN 20 TO 25 FEET

25 TO 28 FEET MEDIUM TO FINE SAND, 30% FINE STONE, MAX 3 INCHES, SAMPLE TAKEN BETWEEN 25 TO 28 FEET

28 TO 30 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 1 INCH

30 TO 35 FEET MEDIUM TO FINE SAND, 5% FINE STONE, MAX 2 INCHES

35 T0 40 FEET MEDIUM TO FINE SAND, 5% FINE STONE, MAX 2 INCHES

40 TO 45 FEET FINE SAND

45 TO 50 FEET MEDIUM TO FINE SAND, 10% FINE STONE, MAX 1 INCH

50 T0 55 FEET FINE SAND

55 TO 60 FEET FINE SAND

60 TO 65 FEET FINE SAND, SAMPLE TAKEN BETWEEN 60 TO 65 FEET

65 TO 70 FEET FINE SAND

70 TO 75 FEET FINE SAND TO SILT

75 TO 80 FEET FINE SAND TO SILT

80 TO 85 FEET FINE SAND TO SILT

85 TO 90 FEET FINE SAND TO SILT

90 TO 95 FEET FINE SAND TO SILT

WELL CONSTRUCTION

0 TO 84 FEET HOLE PLUG

80 TO 84 FEET SAND

84 TO 94 FEET SCREEN AND SAND

94 TO 95 SAND

STICK UP 0.55 METRES

WATER MEASUREMENTS FROM TOP OF PIPE

OCTOBER 24, 2014 12:20 PM 25.56 M

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205467 County Road 109
Amaranth, ON, L9W 0V1
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AGGREGATE GRADATION REPORT

A000863

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 12/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

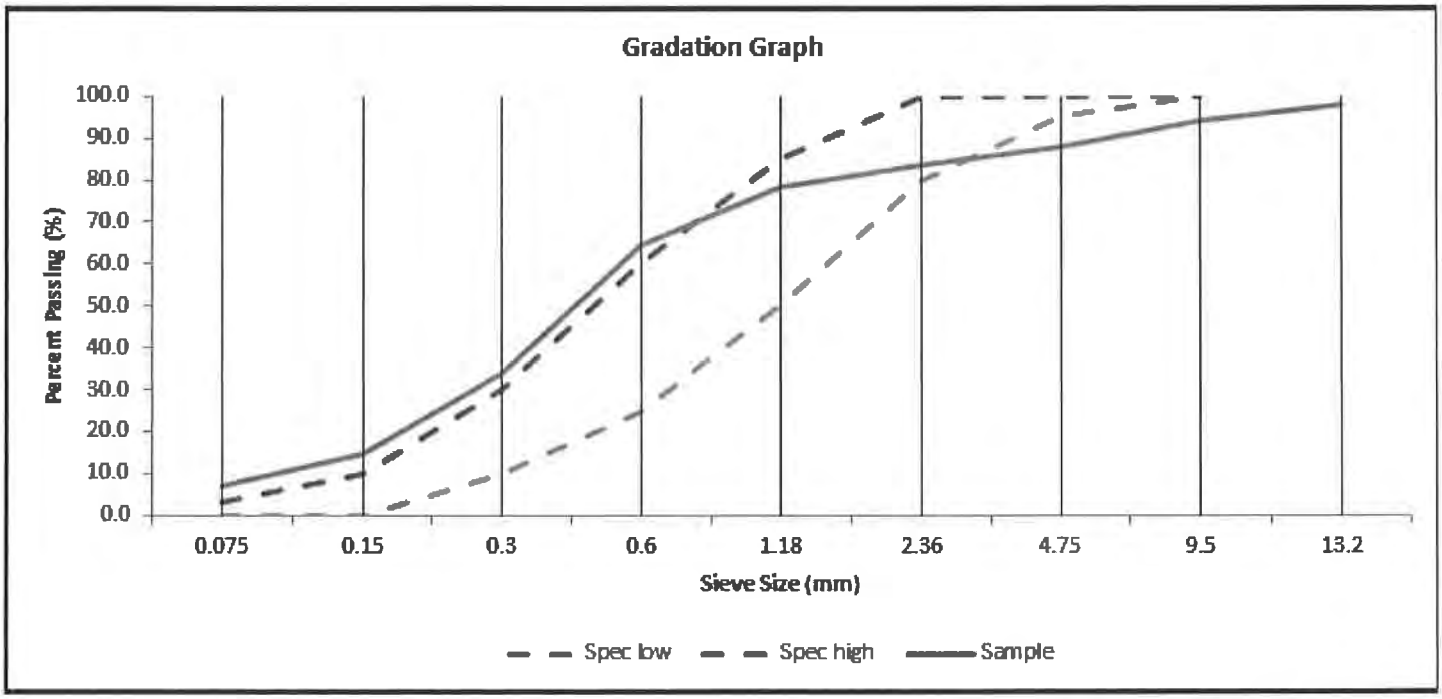
Loss by Washing 5.1

Fineness Modulus 2.45

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	100%
13.2 mm	-	97.9%
9.5 mm	100.0-100.0%	93.9%
6.7 mm	-	-
4.75 mm	95.0-100.0%	88.1%
2.36 mm	80.0-100.0%	83.6%
1.18 mm	50.0-85.0%	78.2%
0.600 mm	25.0-60.0%	64.6%
0.300 mm	10.0-30.0%	33.9%
0.150 mm	0.0-10.0%	14.7%
0.075 mm	0.0-3.0%	7.1%

NOTES: MW2 Harrison farm 60 feet



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AGGREGATE GRADATION REPORT

A000864

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 12/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

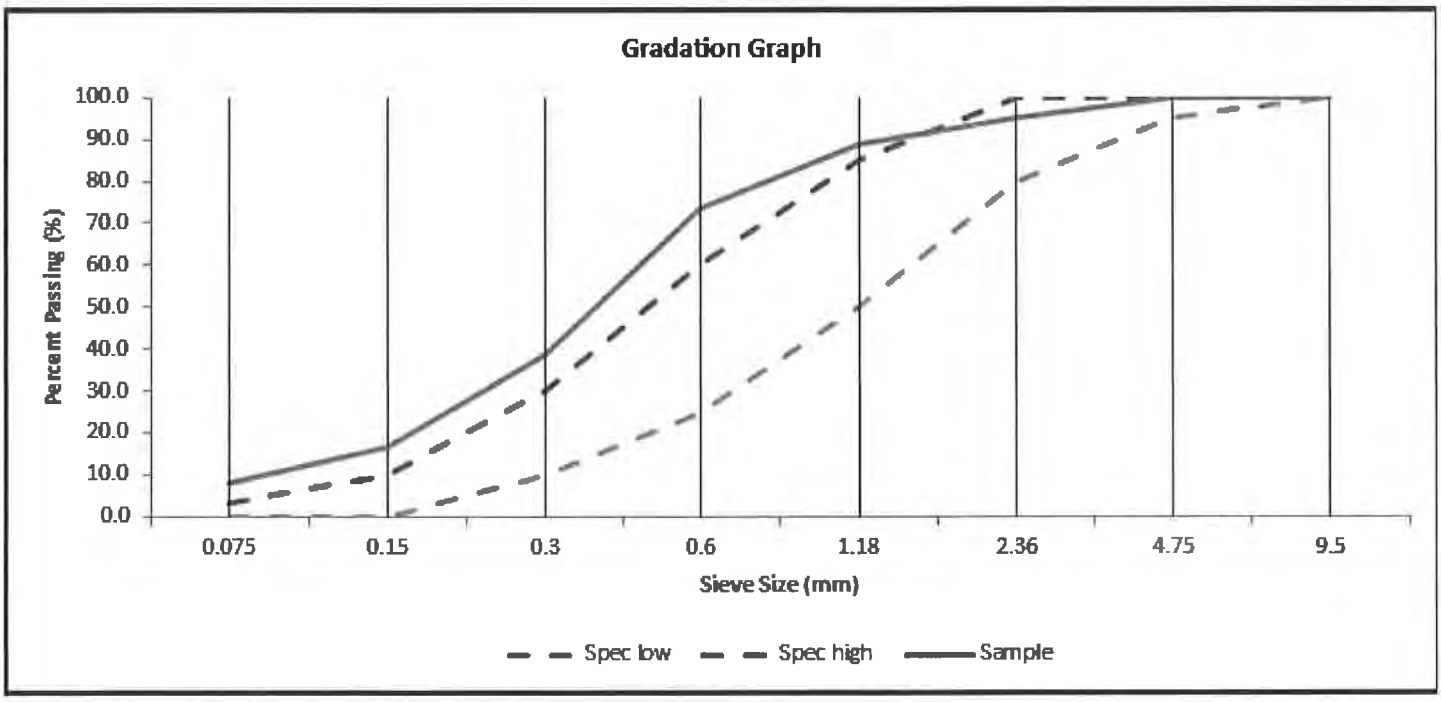
Loss by Washing 5.7

Fineness Modulus 1.88

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	94.9%
1.18 mm	50.0-85.0%	88.7%
0.600 mm	25.0-60.0%	73.4%
0.300 mm	10.0-30.0%	38.4%
0.150 mm	0.0-10.0%	16.7%
0.075 mm	0.0-3.0%	8%

NOTES: MW2 Harrison farm 60 feet, stone taken out



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AGGREGATE GRADATION REPORT

A000871

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

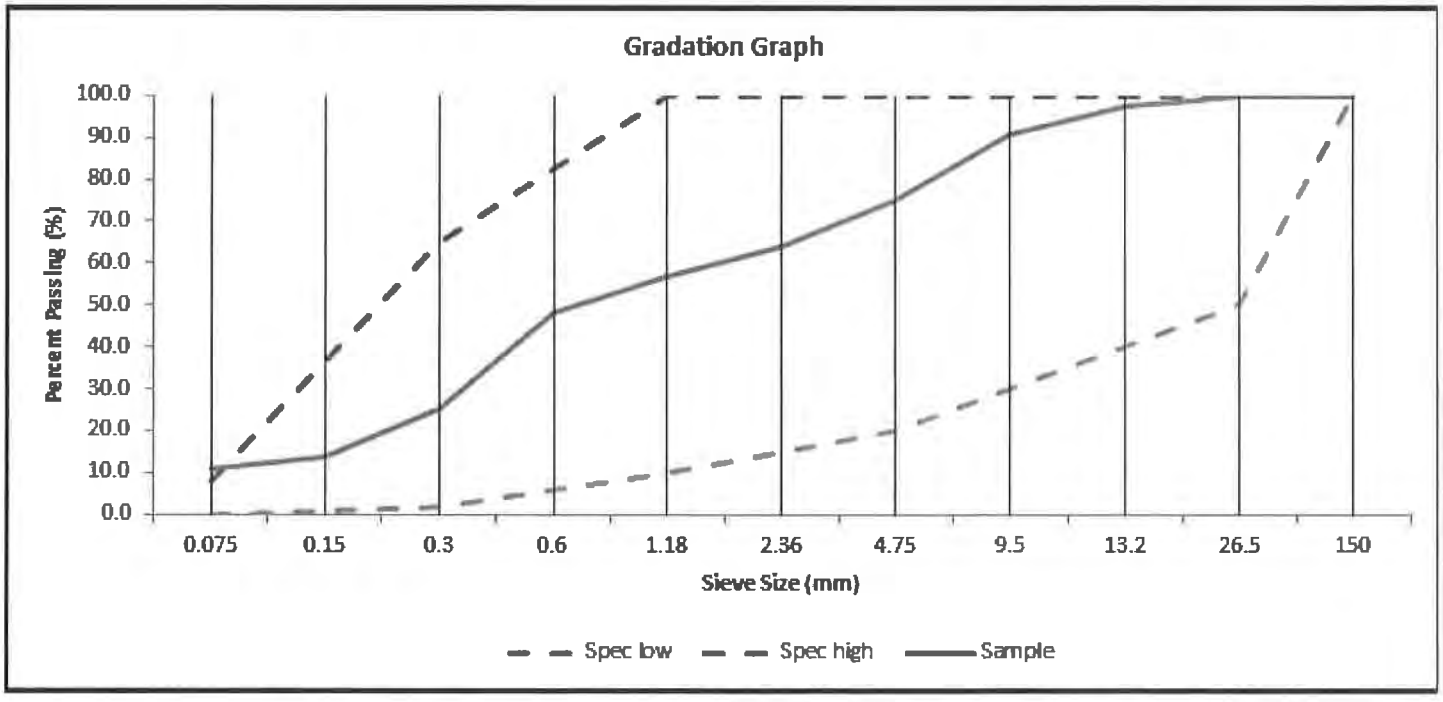
Loss by Washing 9.3

Fineness Modulus 3.28

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	50.0-100.0%	100%
19.0 mm	-	-
16.0 mm	-	100%
13.2 mm	-	97.7%
9.5 mm	-	90.9%
6.7 mm	-	-
4.75 mm	20.0-100.0%	74.9%
2.36 mm	-	64%
1.18 mm	10.0-100.0%	57%
0.600 mm	-	48.1%
0.300 mm	2.0-65.0%	25.3%
0.150 mm	-	13.9%
0.075 mm	0.0-8.0%	10.7%

NOTES: BH3 25-30 feet - Silty gravel



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AGGREGATE GRADATION REPORT

A000872

Project Details

Project Name: 2014 Misc. Testing

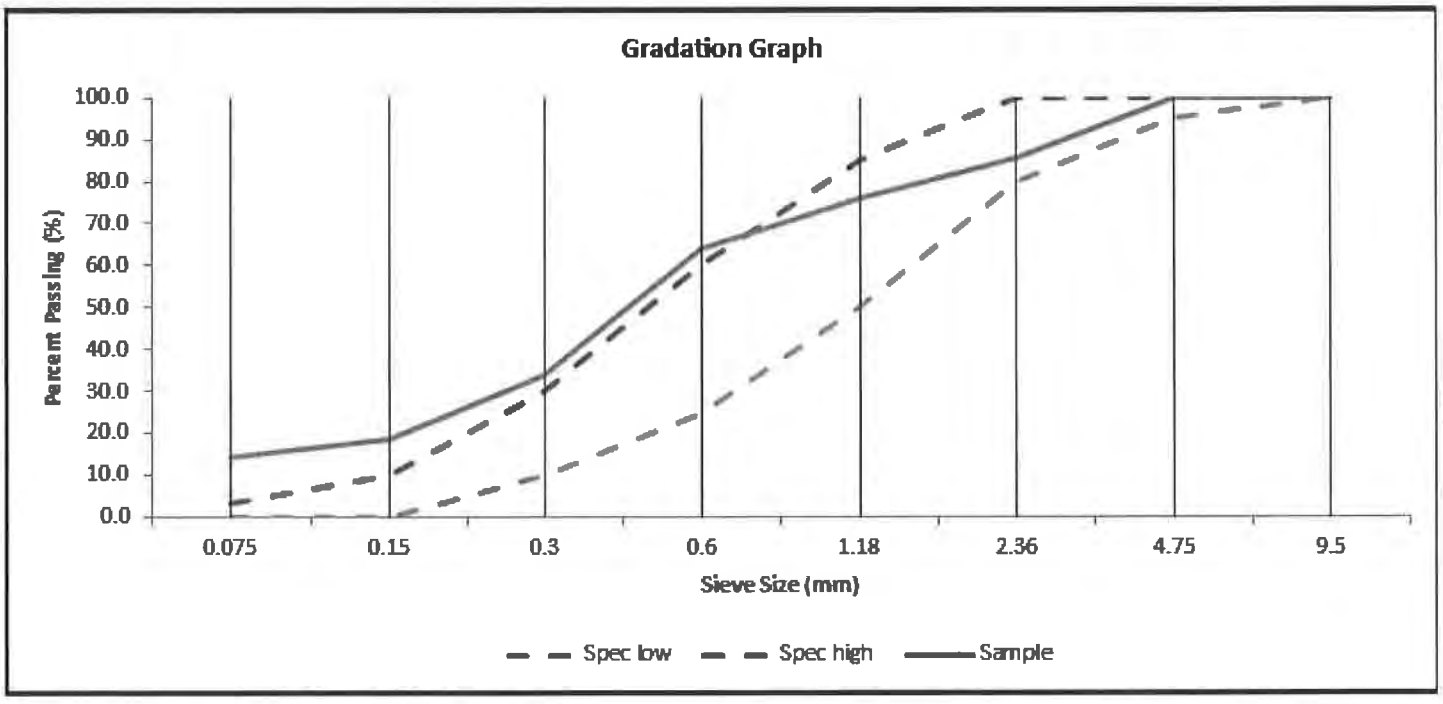
Sample Details

Date Sampled: 15/05/14 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Concrete Sand OPSS 1002
Loss by Washing 12.4
Fineness Modulus 2.22

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	85.4%
1.18 mm	50.0-85.0%	76.1%
0.600 mm	25.0-60.0%	64.1%
0.300 mm	10.0-30.0%	33.7%
0.150 mm	0.0-10.0%	18.6%
0.075 mm	0.0-3.0%	14.2%

NOTES: BH3 25-30 feet - Silty gravel - stone taken out



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AGGREGATE GRADATION REPORT

A000873

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

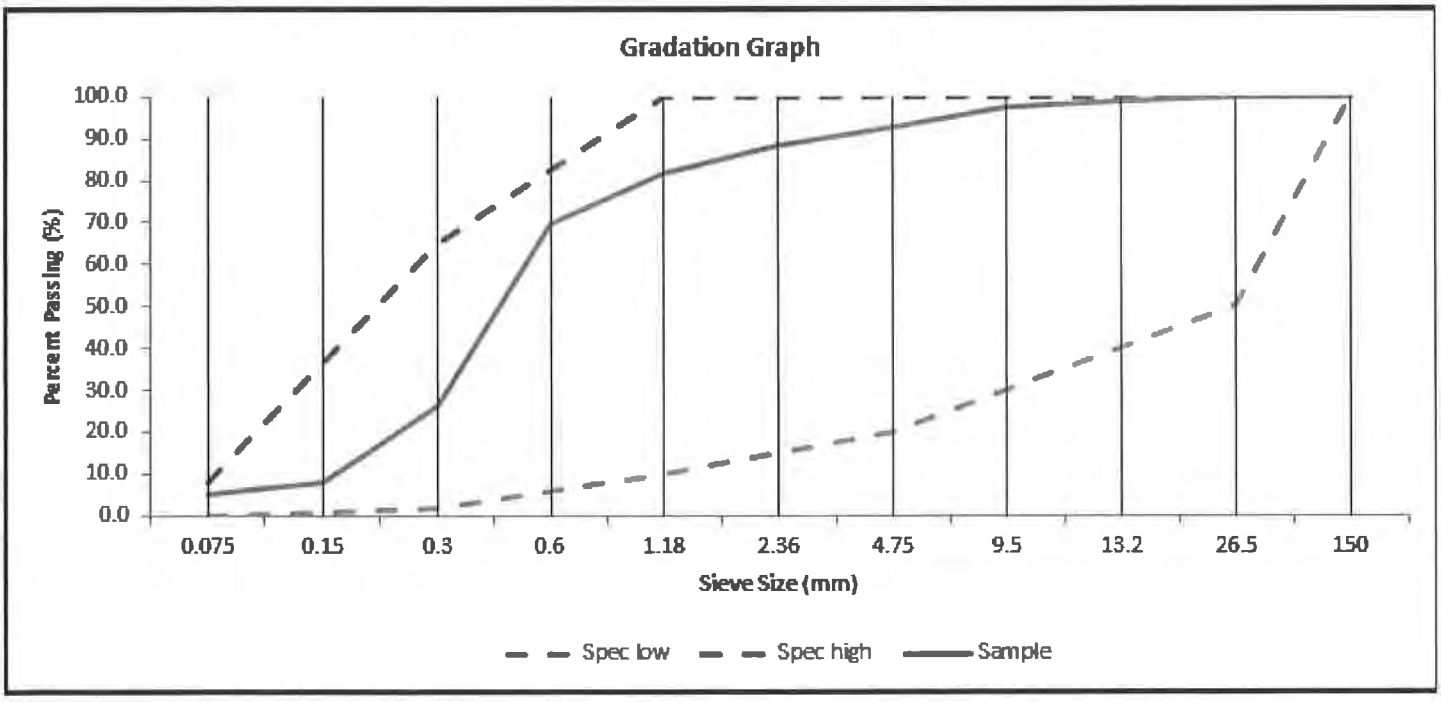
Loss by Washing 4.7

Fineness Modulus 2.37

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	50.0-100.0%	100%
19.0 mm	-	-
16.0 mm	-	100%
13.2 mm	-	98.9%
9.5 mm	-	97.3%
6.7 mm	-	-
4.75 mm	20.0-100.0%	92.9%
2.36 mm	-	88.4%
1.18 mm	10.0-100.0%	81.6%
0.600 mm	-	69.5%
0.300 mm	2.0-65.0%	26.2%
0.150 mm	-	8%
0.075 mm	0.0-8.0%	5.3%

NOTES: BH3 35-40 feet - medium coarse sand some stone



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AGGREGATE GRADATION REPORT

A000874

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

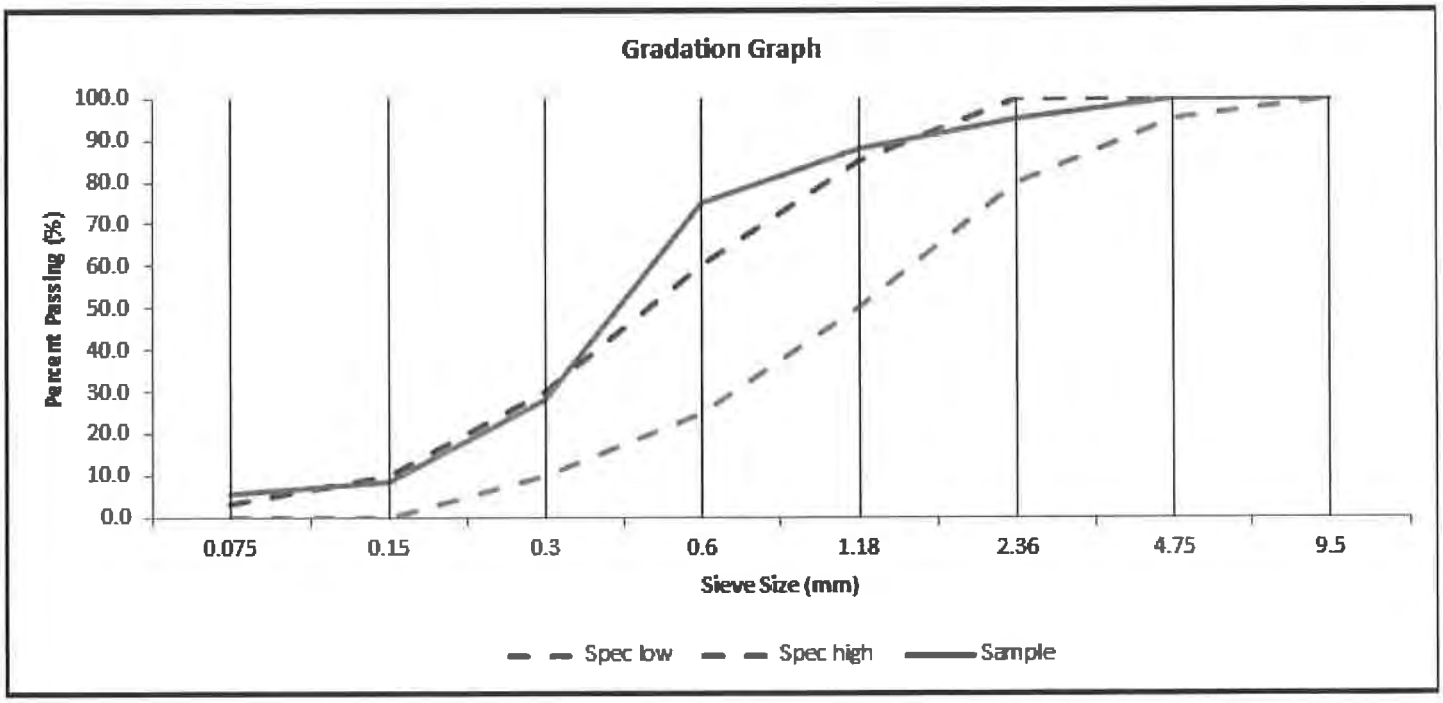
Loss by Washing 5.1

Fineness Modulus 2.05

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	95.2%
1.18 mm	50.0-85.0%	87.8%
0.600 mm	25.0-60.0%	74.9%
0.300 mm	10.0-30.0%	28.2%
0.150 mm	0.0-10.0%	8.6%
0.075 mm	0.0-3.0%	5.7%

NOTES: BH3 35-40 feet - medium coarse sand some stone - stone taken out



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AGGREGATE GRADATION REPORT

A000875

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

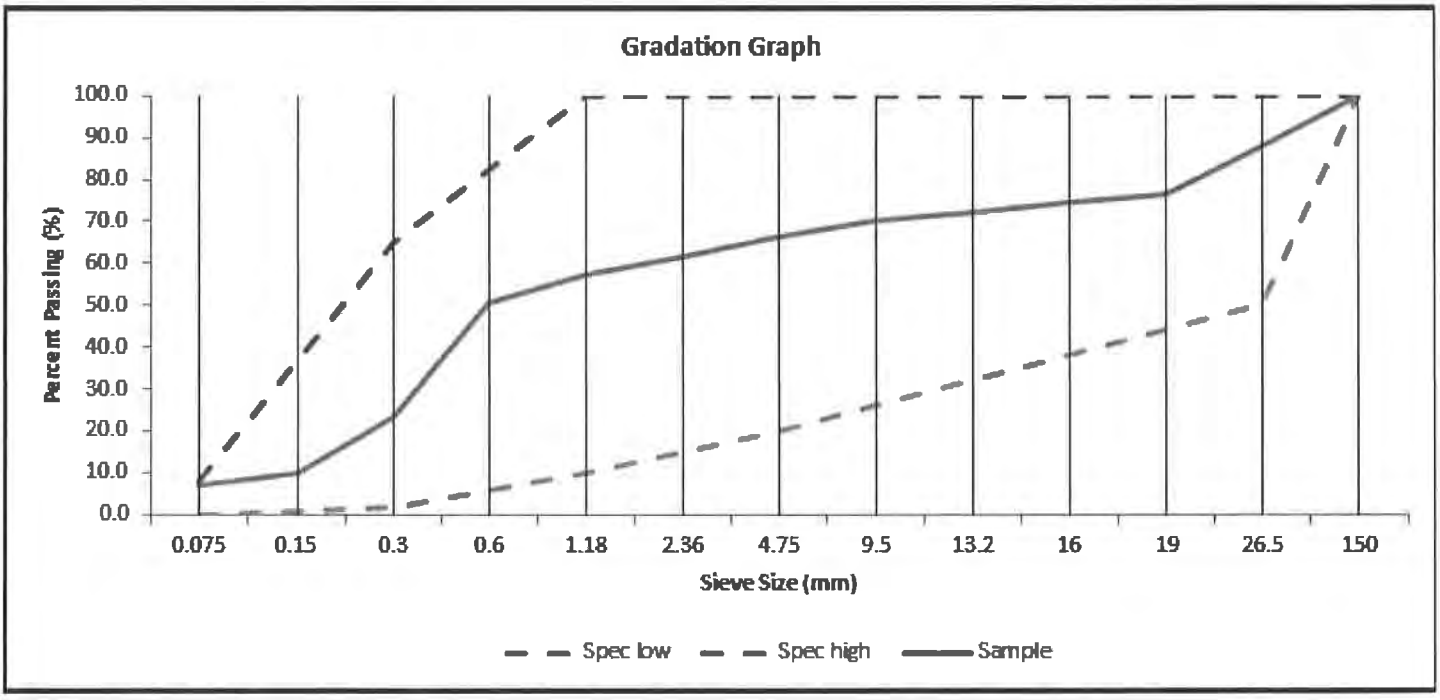
Loss by Washing 6.8

Fineness Modulus 4.5

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	100%
26.5 mm	50.0-100.0%	88%
19.0 mm	-	76.6%
16.0 mm	-	74.3%
13.2 mm	-	72.1%
9.5 mm	-	70.1%
6.7 mm	-	-
4.75 mm	20.0-100.0%	66.3%
2.36 mm	-	61.7%
1.18 mm	10.0-100.0%	57.3%
0.600 mm	-	50.7%
0.300 mm	2.0-65.0%	23.3%
0.150 mm	-	10.1%
0.075 mm	0.0-8.0%	7.2%

NOTES: BH3 47-50feet - fine sand with stone



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AGGREGATE GRADATION REPORT

A000876

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

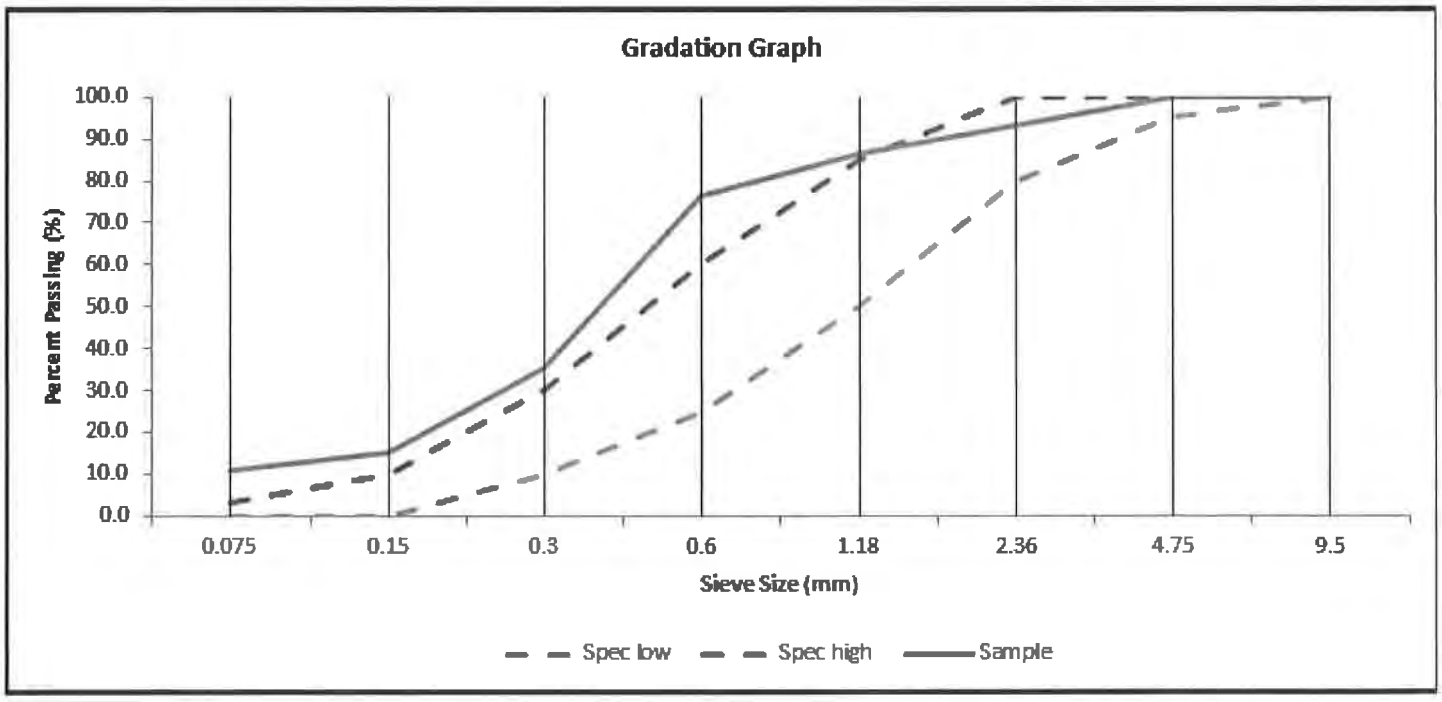
Loss by Washing 10.3

Fineness Modulus 1.93

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	93.1%
1.18 mm	50.0-85.0%	86.5%
0.600 mm	25.0-60.0%	76.5%
0.300 mm	10.0-30.0%	35.2%
0.150 mm	0.0-10.0%	15.3%
0.075 mm	0.0-3.0%	10.9%

NOTES: BH3 47-50feet - fine sand with stone - stone taken out



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AGGREGATE GRADATION REPORT

A000877

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

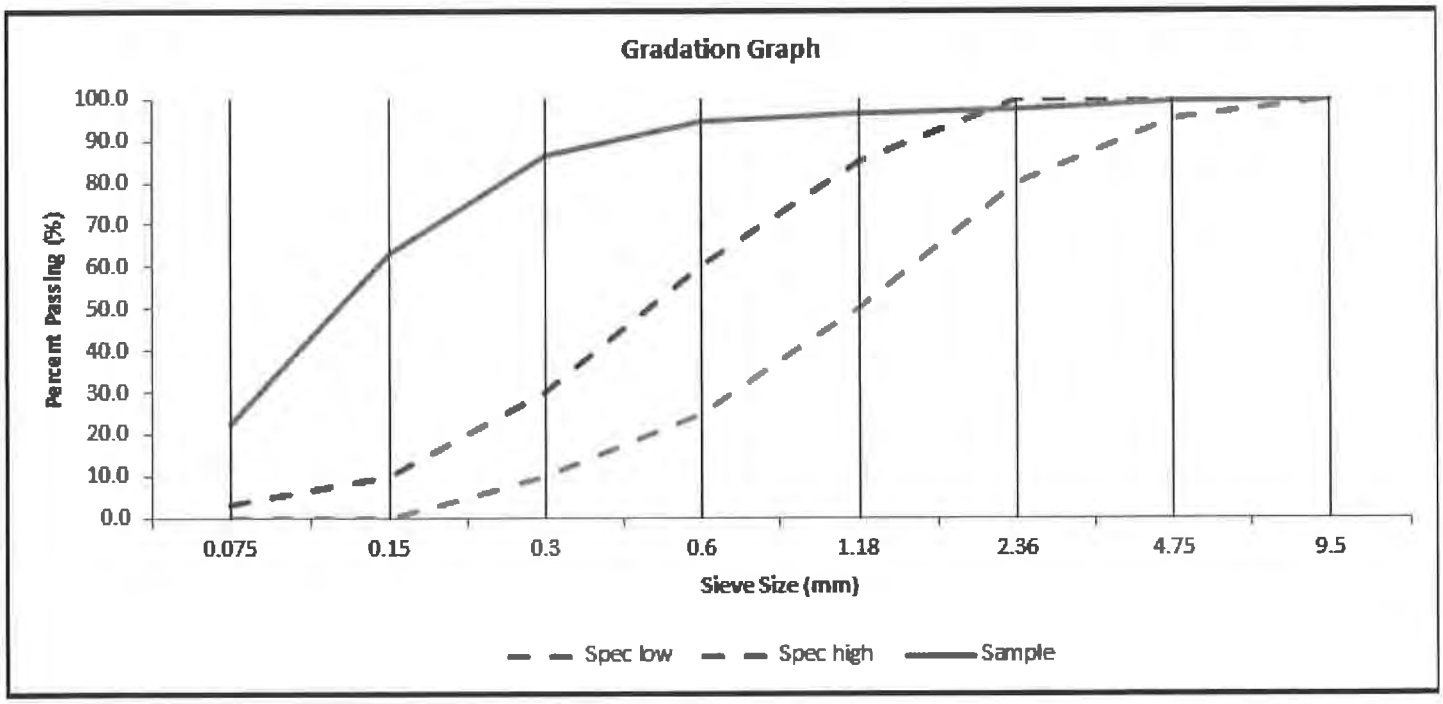
Loss by Washing 14.3

Fineness Modulus 0.63

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	99.3%
2.36 mm	80.0-100.0%	97.7%
1.18 mm	50.0-85.0%	96.3%
0.600 mm	25.0-60.0%	94.4%
0.300 mm	10.0-30.0%	86.7%
0.150 mm	0.0-10.0%	62.9%
0.075 mm	0.0-3.0%	22.3%

NOTES: BH3 65-75 feet - silt



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AGGREGATE GRADATION REPORT

A000878

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

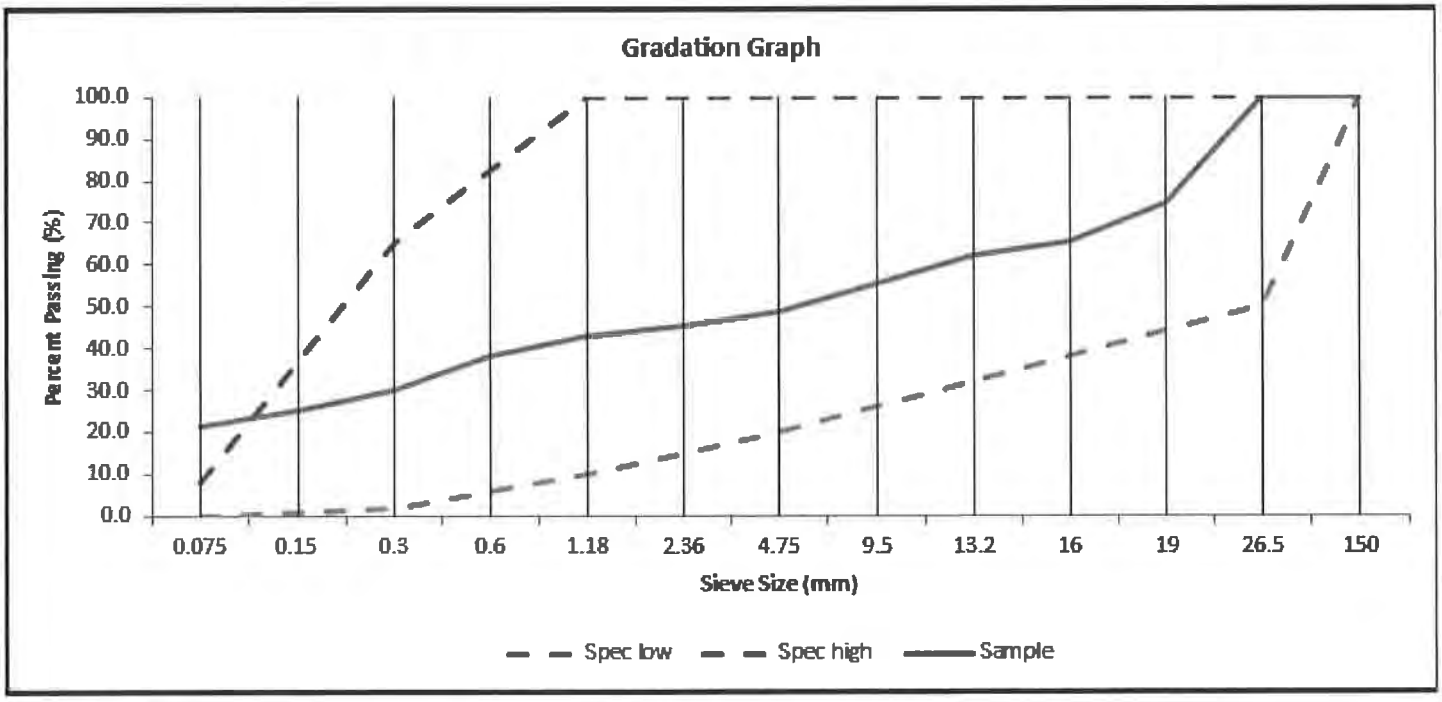
Loss by Washing 20.3

Fineness Modulus 5.12

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	50.0-100.0%	100%
19.0 mm	-	74.3%
16.0 mm	-	65.6%
13.2 mm	-	61.9%
9.5 mm	-	55.6%
6.7 mm	-	-
4.75 mm	20.0-100.0%	48.8%
2.36 mm	-	45.3%
1.18 mm	10.0-100.0%	42.8%
0.600 mm	-	38.2%
0.300 mm	2.0-65.0%	30.1%
0.150 mm	-	25.4%
0.075 mm	0.0-8.0%	21.6%

NOTES: BH4 30-32 feet - Stony Earth



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AGGREGATE GRADATION REPORT

A000879

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

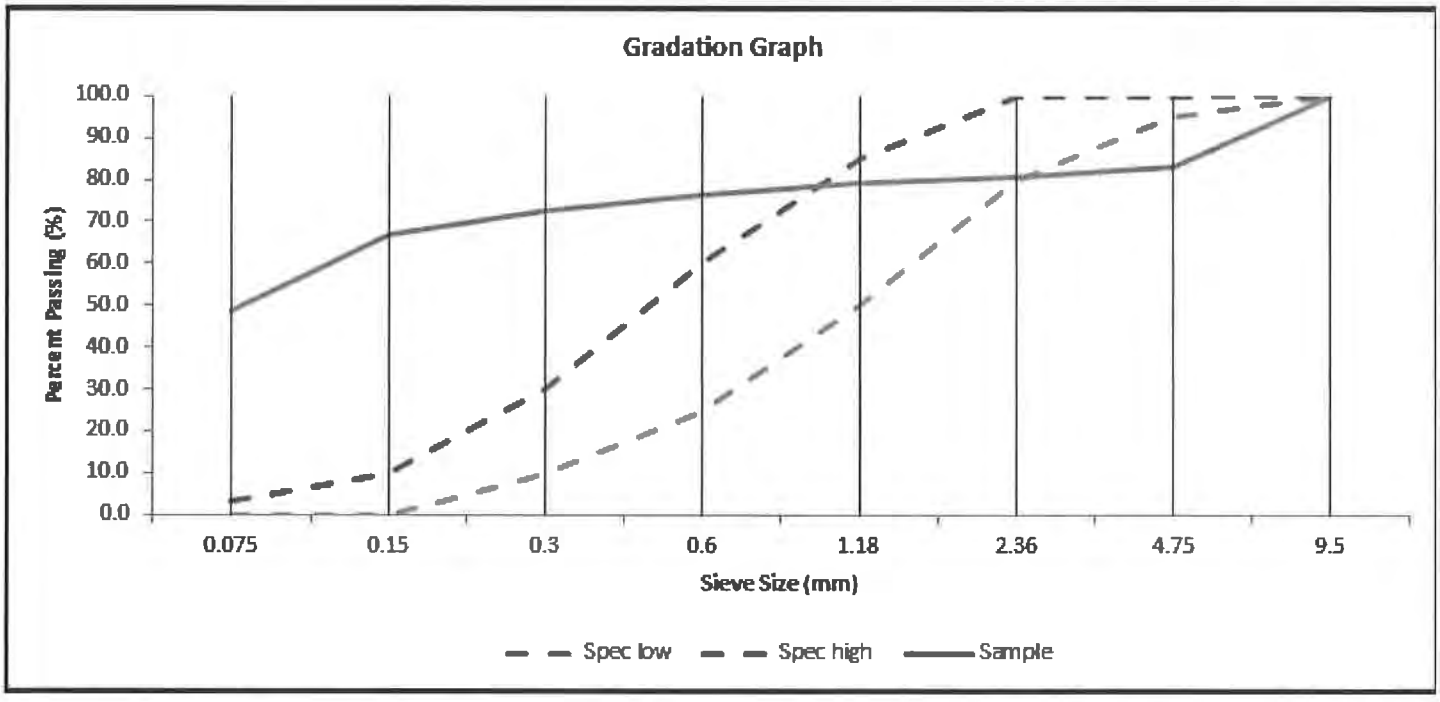
Loss by Washing 45.7

Fineness Modulus 1.41

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	83.1%
2.36 mm	80.0-100.0%	80.8%
1.18 mm	50.0-85.0%	79.3%
0.600 mm	25.0-60.0%	76.6%
0.300 mm	10.0-30.0%	72.8%
0.150 mm	0.0-10.0%	66.9%
0.075 mm	0.0-3.0%	48.7%

NOTES: BH4 50-60 feet - very wet clay/silt



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AGGREGATE GRADATION REPORT

A000880

Project Details

Project Name: 2014 Misc. Testing

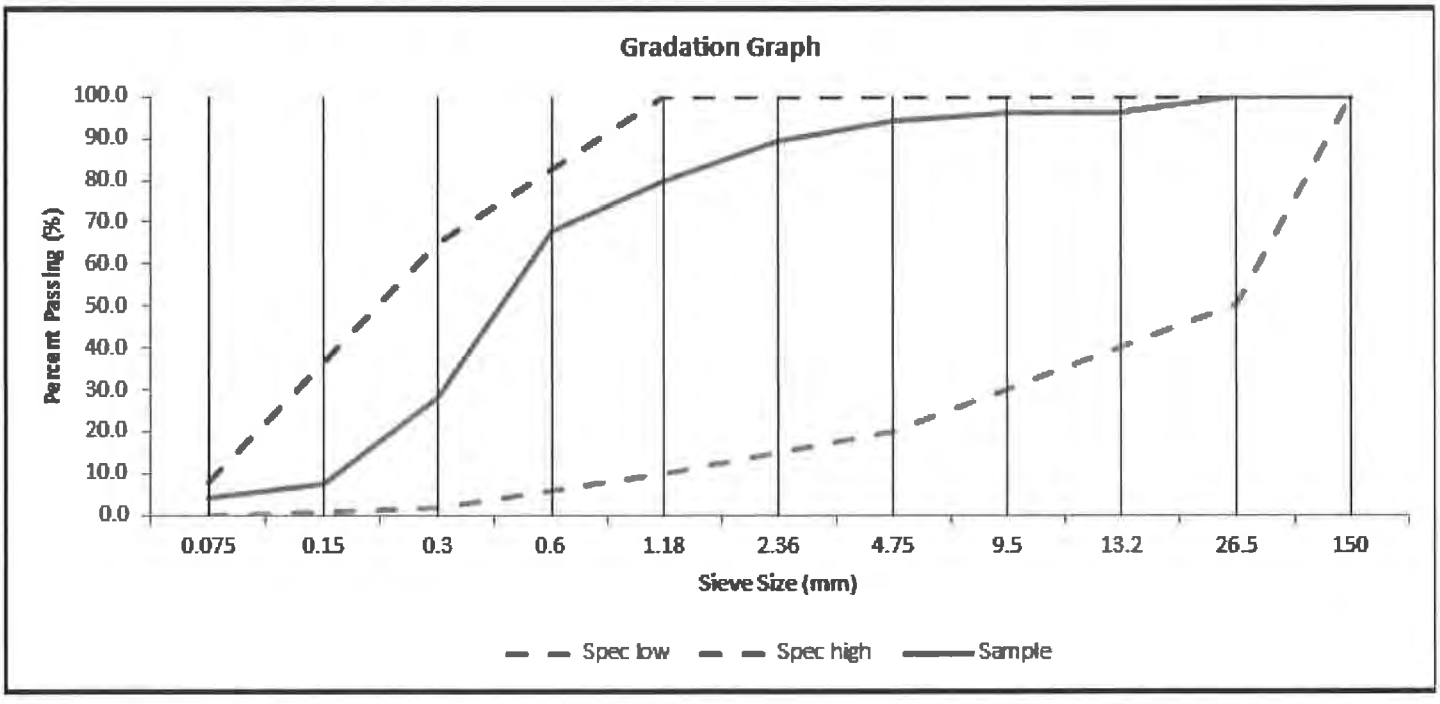
Sample Details

Date Sampled: 15/05/14 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Granular "B" Type I OPSS 1010
Loss by Washing 3
Fineness Modulus 2.41

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	50.0-100.0%	100%
19.0 mm	-	-
16.0 mm	-	100%
13.2 mm	-	96%
9.5 mm	-	96%
6.7 mm	-	-
4.75 mm	20.0-100.0%	94.2%
2.36 mm	-	89.2%
1.18 mm	10.0-100.0%	79.9%
0.600 mm	-	67.8%
0.300 mm	2.0-65.0%	28.1%
0.150 mm	-	7.6%
0.075 mm	0.0-8.0%	4.2%

NOTES: BH5 30-35 feet -gravel with trace topsoil balls mixed in



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AGGREGATE GRADATION REPORT

A000881

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 15/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

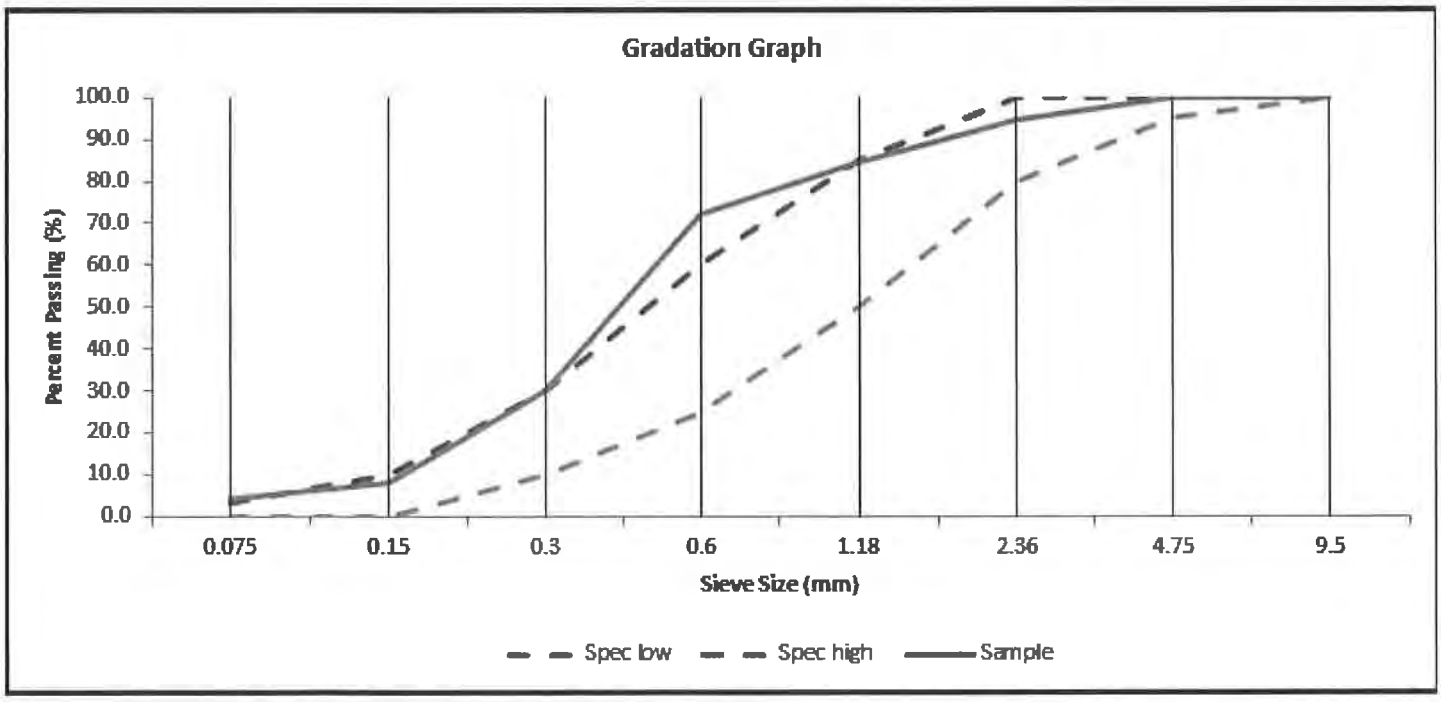
Loss by Washing 3.1

Fineness Modulus 2.11

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	94.7%
1.18 mm	50.0-85.0%	84.8%
0.600 mm	25.0-60.0%	72%
0.300 mm	10.0-30.0%	29.8%
0.150 mm	0.0-10.0%	8%
0.075 mm	0.0-3.0%	4.4%

NOTES: BH5 30-35 feet -gravel with trace topsoil balls mixed in - stone taken out



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AGGREGATE GRADATION REPORT

A000911

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 23/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

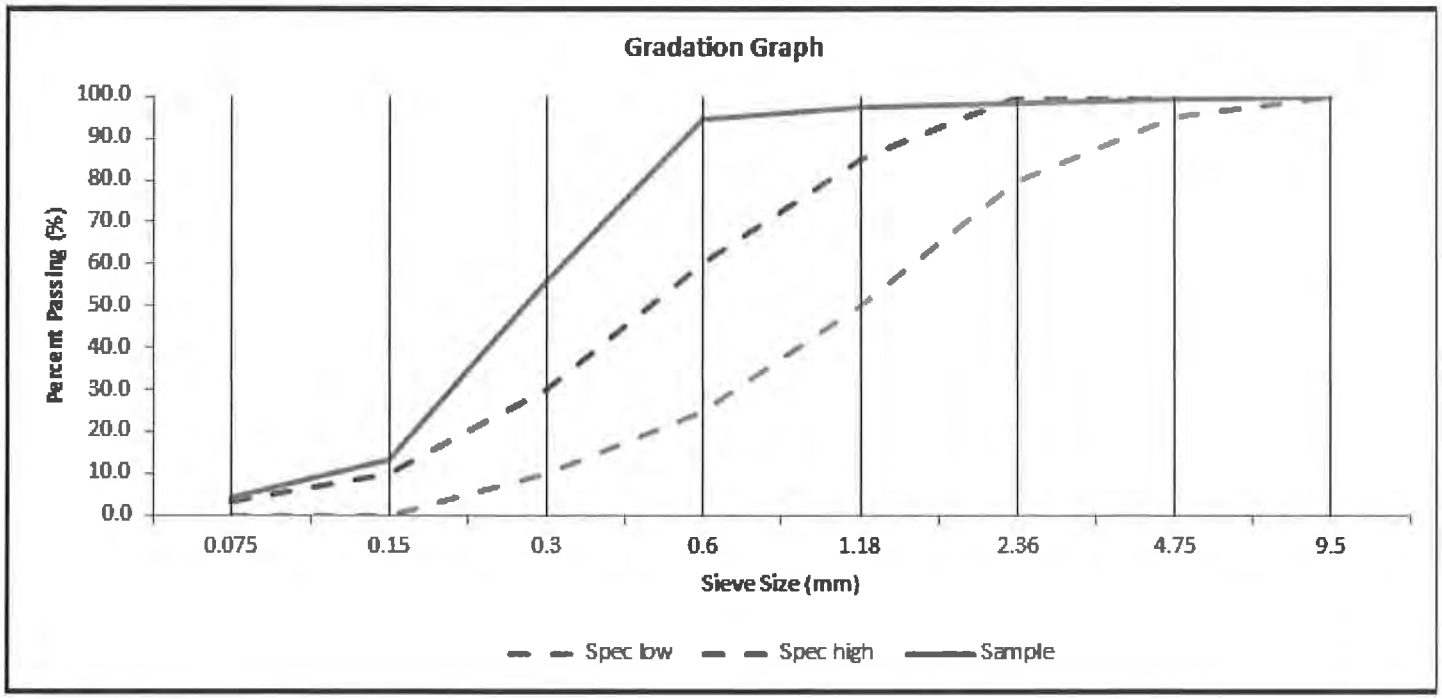
Loss by Washing 3.5

Fineness Modulus 1.4

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	99.6%
2.36 mm	80.0-100.0%	98.6%
1.18 mm	50.0-85.0%	97.6%
0.600 mm	25.0-60.0%	94.8%
0.300 mm	10.0-30.0%	55.7%
0.150 mm	0.0-10.0%	13.5%
0.075 mm	0.0-3.0%	4.3%

NOTES: BH5 60-65feet



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AGGREGATE GRADATION REPORT

A000912

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 23/05/14 12:00:00 PM

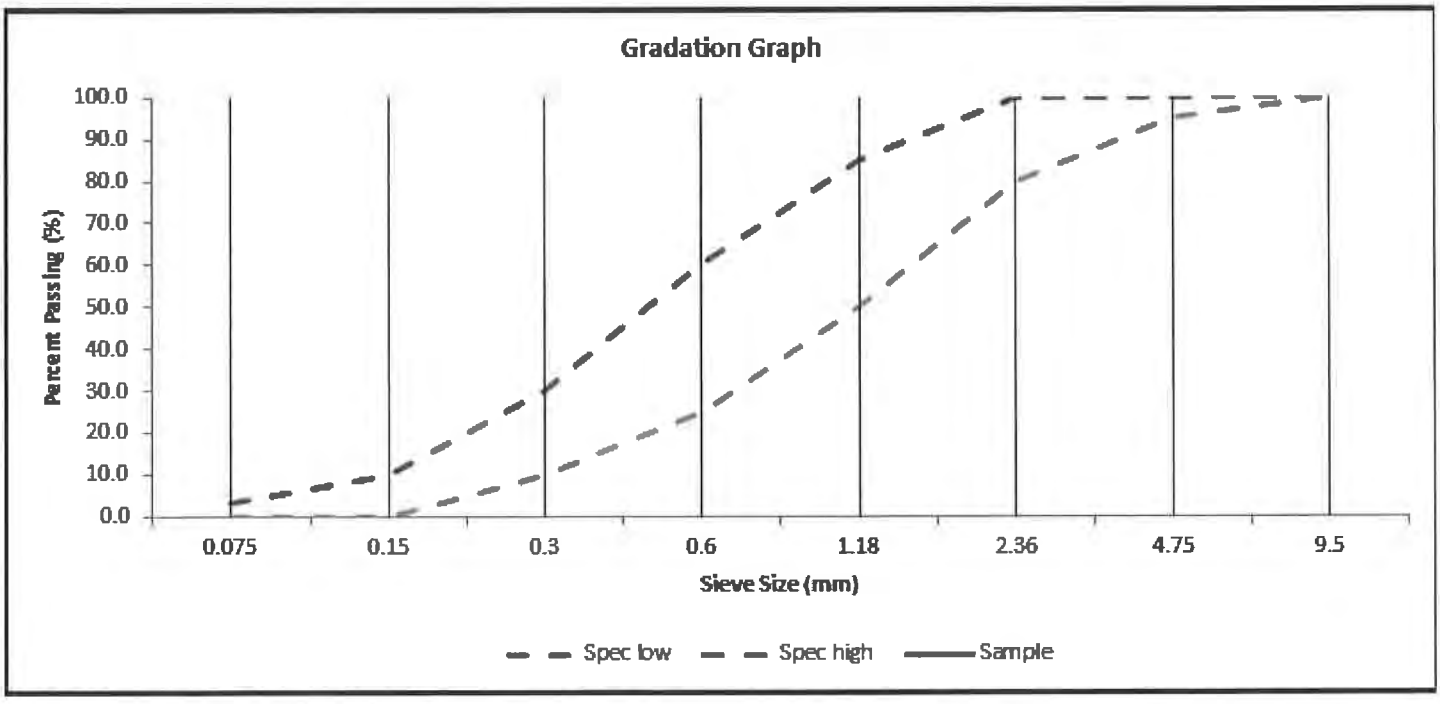
Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	-
6.7 mm	-	-
4.75 mm	95.0-100.0%	-
2.36 mm	80.0-100.0%	-
1.18 mm	50.0-85.0%	-
0.600 mm	25.0-60.0%	-
0.300 mm	10.0-30.0%	-
0.150 mm	0.0-10.0%	-
0.075 mm	0.0-3.0%	-

NOTES: BH7 30feet - silty sandy crap



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AGGREGATE GRADATION REPORT

A000913

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 23/05/14 12:00:00 PM

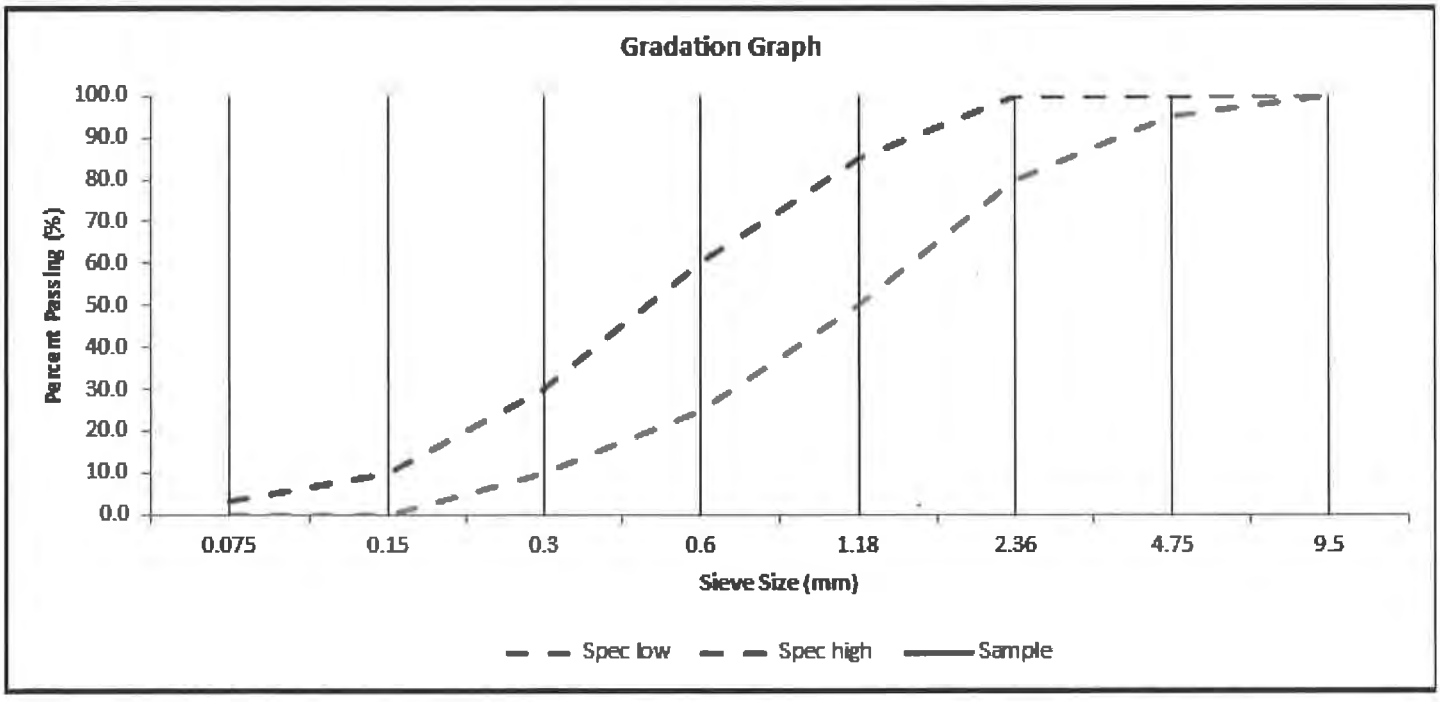
Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	-
6.7 mm	-	-
4.75 mm	95.0-100.0%	-
2.36 mm	80.0-100.0%	-
1.18 mm	50.0-85.0%	-
0.600 mm	25.0-60.0%	-
0.300 mm	10.0-30.0%	-
0.150 mm	0.0-10.0%	-
0.075 mm	0.0-3.0%	-

NOTES: BH7 60feet - sandy silty clayey crap



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AGGREGATE GRADATION REPORT

A000914

Project Details

Project Name: 2014 Misc. Testing

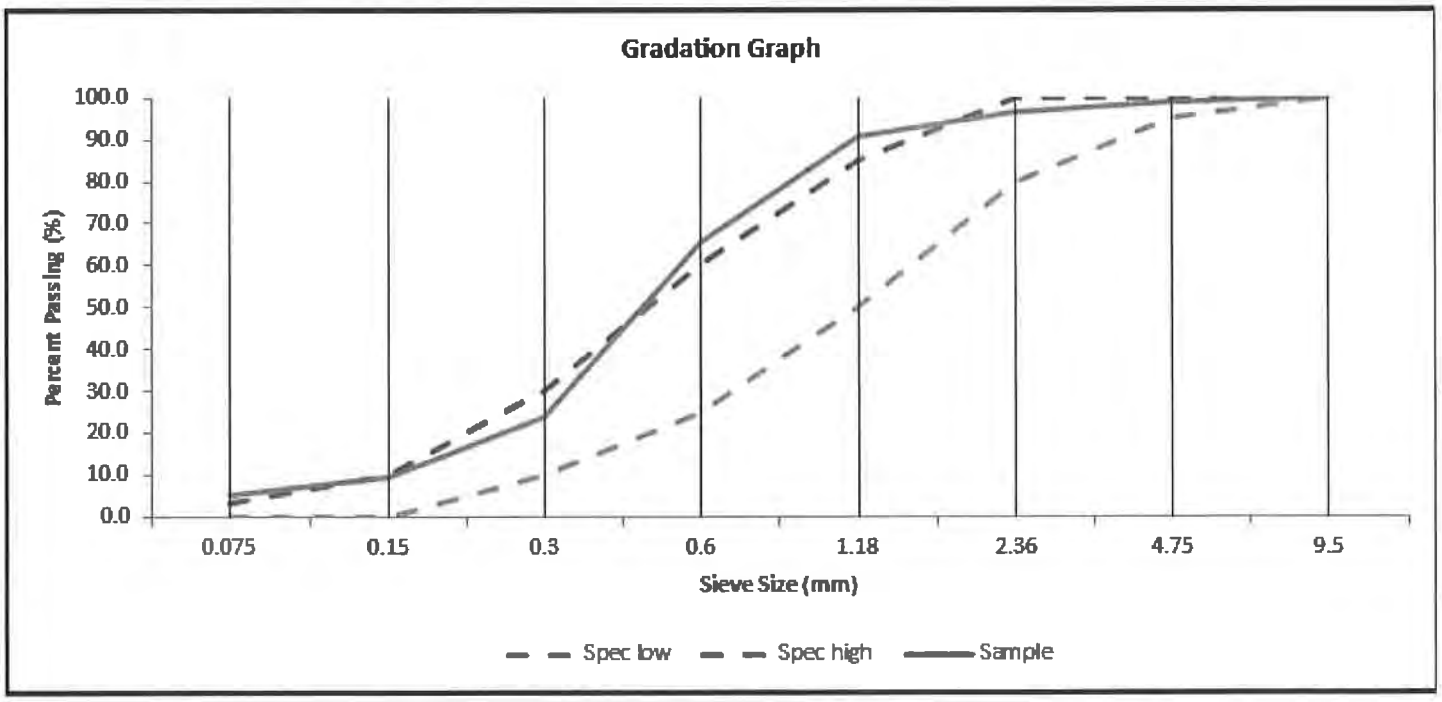
Sample Details

Date Sampled: 23/05/14 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Concrete Sand OPSS 1002
Loss by Washing 3.7
Fineness Modulus 2.16

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	98.7%
2.36 mm	80.0-100.0%	96.4%
1.18 mm	50.0-85.0%	90.6%
0.600 mm	25.0-60.0%	65.2%
0.300 mm	10.0-30.0%	24%
0.150 mm	0.0-10.0%	9.5%
0.075 mm	0.0-3.0%	5.3%

NOTES: BH8 30-35feet



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AGGREGATE GRADATION REPORT

A000915

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 23/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

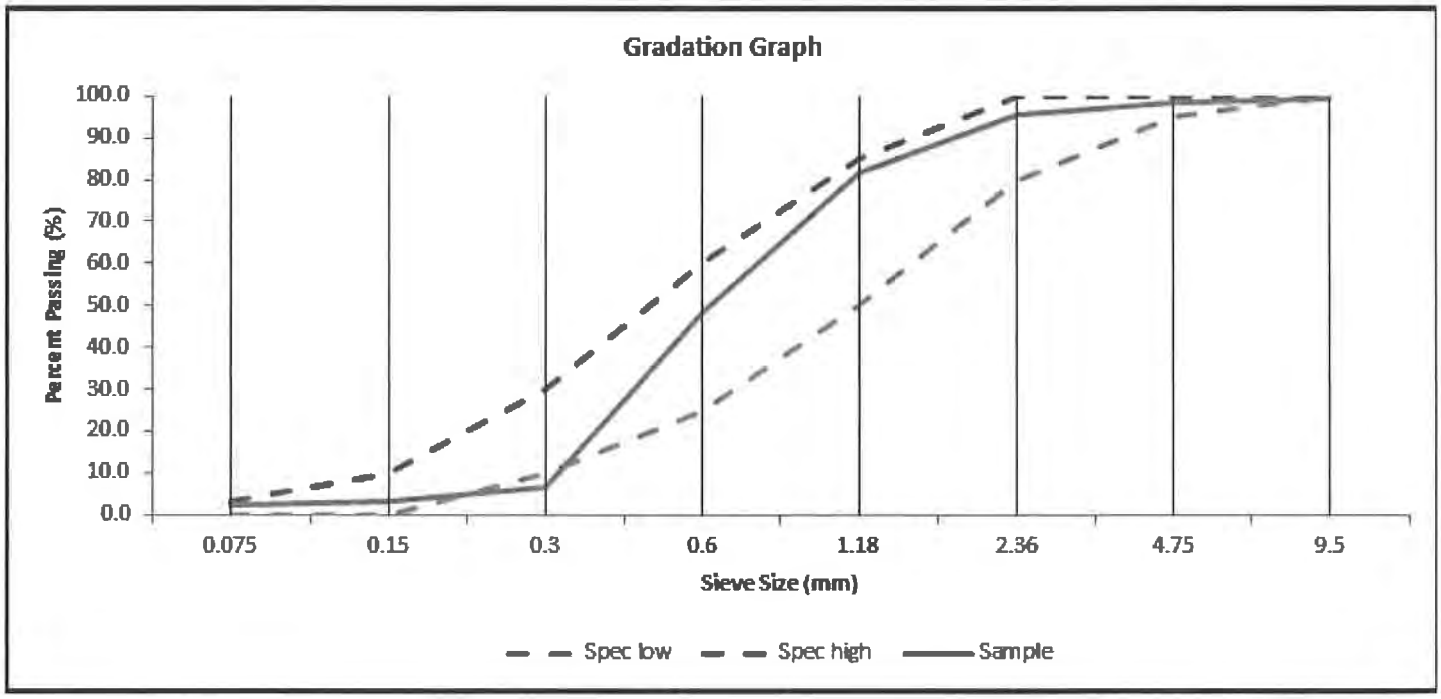
Loss by Washing 1.5

Fineness Modulus 2.67

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	99.4%
6.7 mm	-	-
4.75 mm	95.0-100.0%	98.6%
2.36 mm	80.0-100.0%	95.4%
1.18 mm	50.0-85.0%	81.6%
0.600 mm	25.0-60.0%	48%
0.300 mm	10.0-30.0%	6.7%
0.150 mm	0.0-10.0%	3.4%
0.075 mm	0.0-3.0%	2.4%

NOTES: BH8 55-60



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AGGREGATE GRADATION REPORT

A000916

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 23/05/14 12:00:00 PM

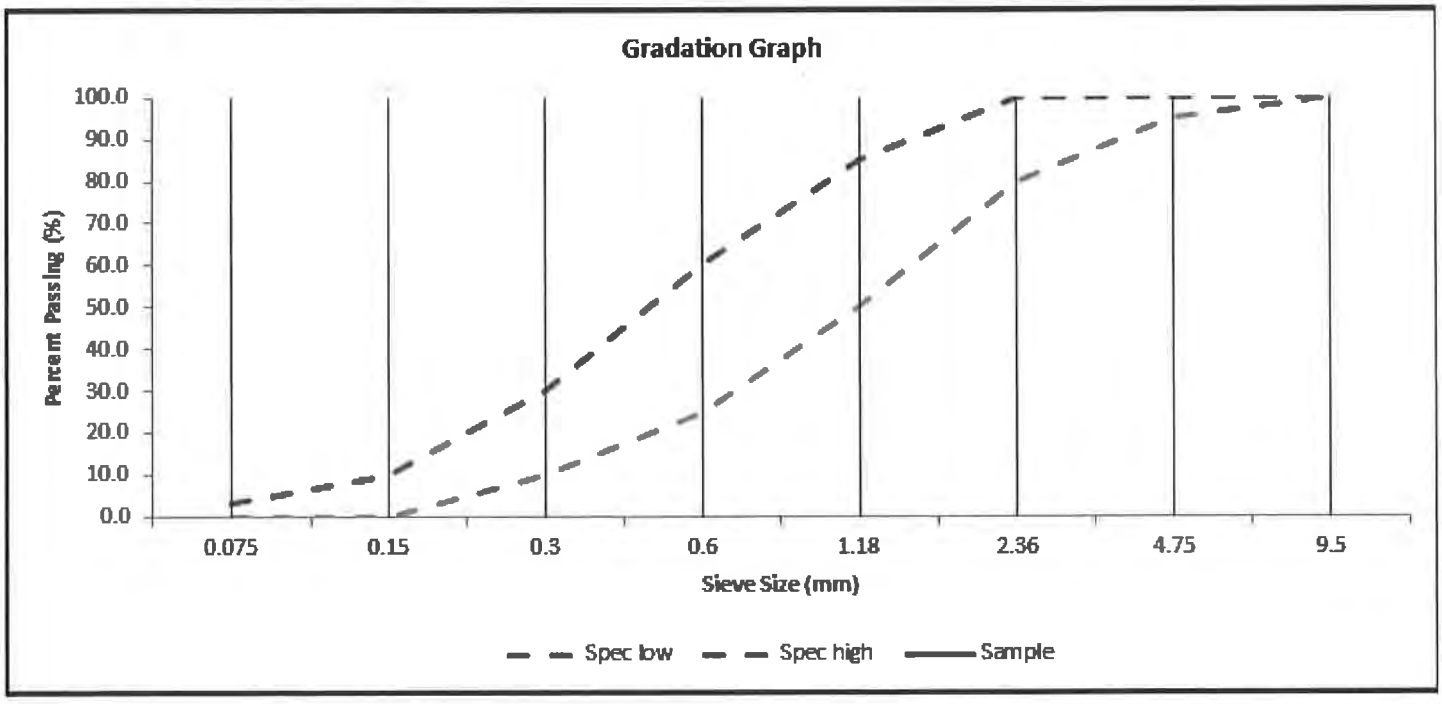
Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	-
6.7 mm	-	-
4.75 mm	95.0-100.0%	-
2.36 mm	80.0-100.0%	-
1.18 mm	50.0-85.0%	-
0.600 mm	25.0-60.0%	-
0.300 mm	10.0-30.0%	-
0.150 mm	0.0-10.0%	-
0.075 mm	0.0-3.0%	-

NOTES: BH9 30-32feet Silty clayey crap



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AGGREGATE GRADATION REPORT

A000917

Project Details

Project Name: 2014 Misc. Testing

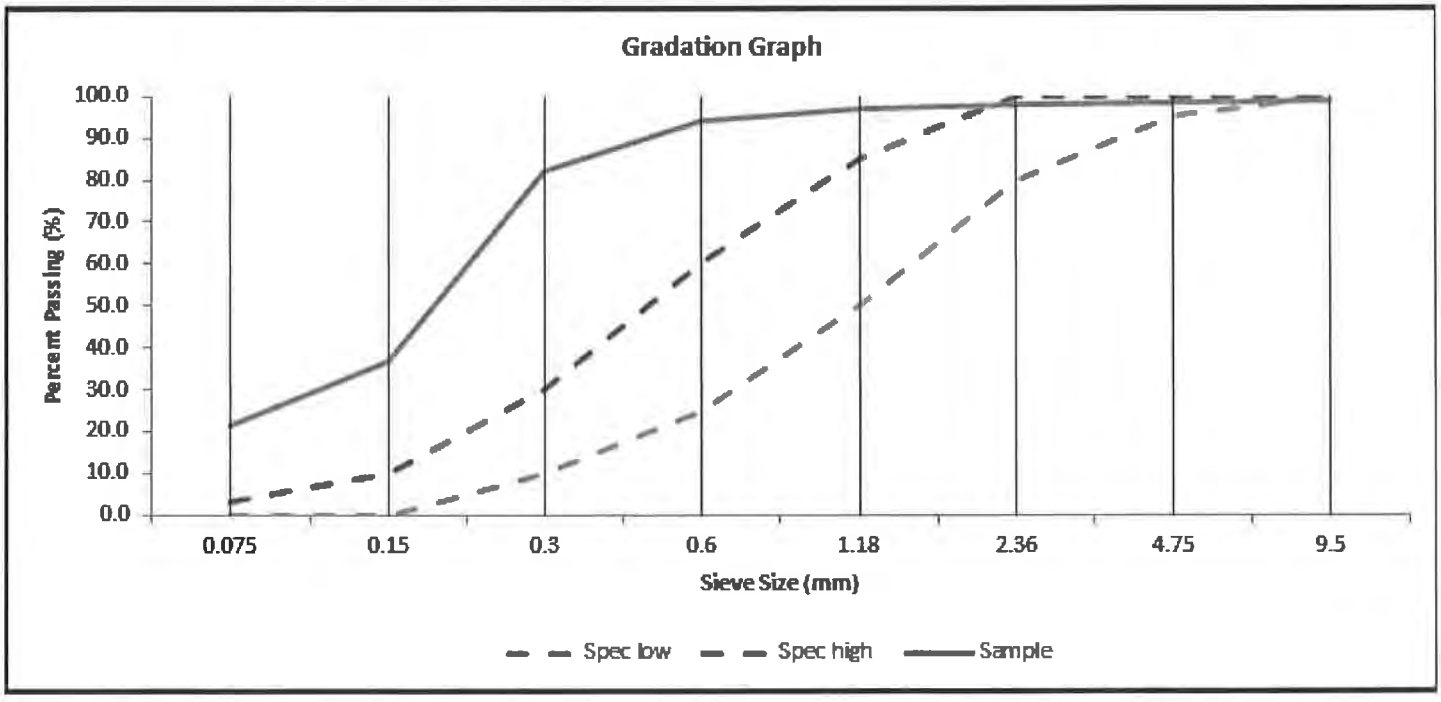
Sample Details

Date Sampled: 23/05/14 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Concrete Sand OPSS 1002
Loss by Washing 13.3
Fineness Modulus 0.95

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	99.1%
6.7 mm	-	-
4.75 mm	95.0-100.0%	98.6%
2.36 mm	80.0-100.0%	97.8%
1.18 mm	50.0-85.0%	96.8%
0.600 mm	25.0-60.0%	94%
0.300 mm	10.0-30.0%	82.1%
0.150 mm	0.0-10.0%	36.9%
0.075 mm	0.0-3.0%	21.6%

NOTES: BH9 60-65 feet



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AGGREGATE GRADATION REPORT

A000918

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 23/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

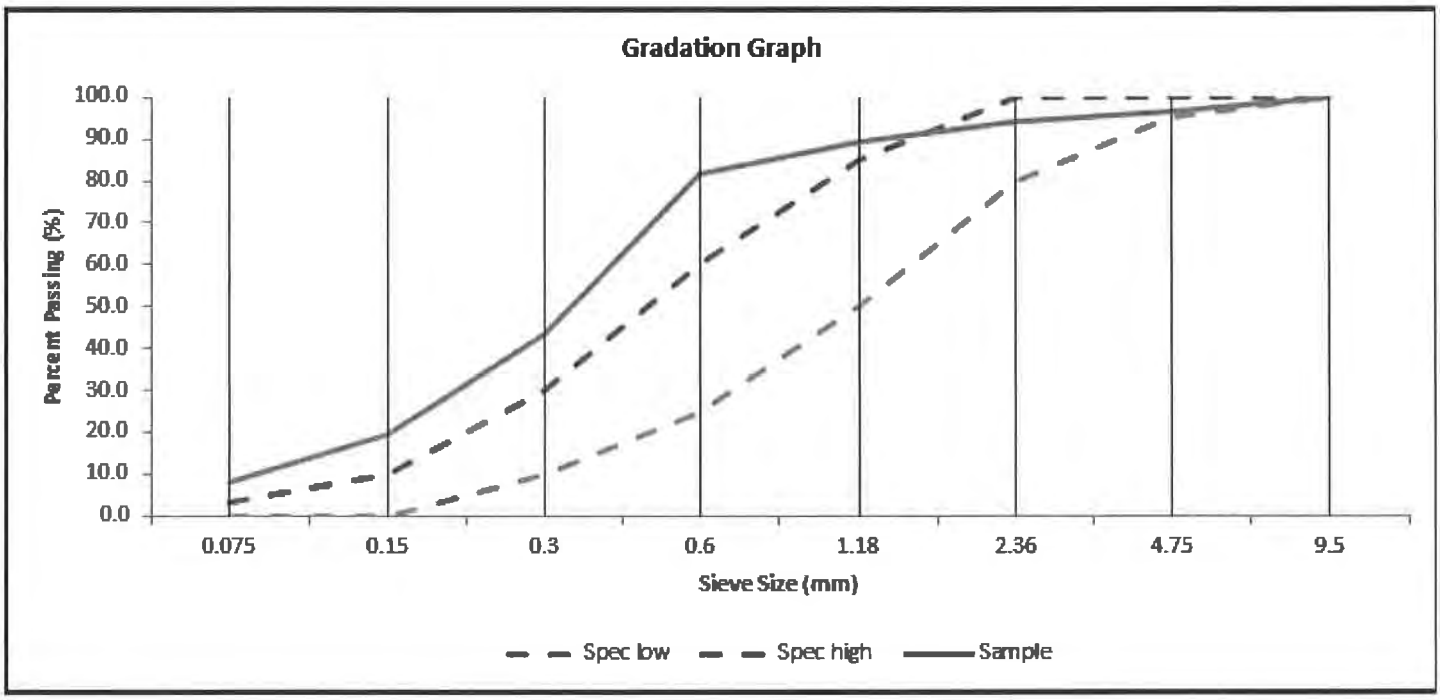
Loss by Washing 4.2

Fineness Modulus 1.76

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	96.5%
2.36 mm	80.0-100.0%	94.2%
1.18 mm	50.0-85.0%	89.4%
0.600 mm	25.0-60.0%	81.5%
0.300 mm	10.0-30.0%	43.3%
0.150 mm	0.0-10.0%	19.4%
0.075 mm	0.0-3.0%	7.9%

NOTES: BH10 30-35feet



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AGGREGATE GRADATION REPORT

A000919

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 23/05/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

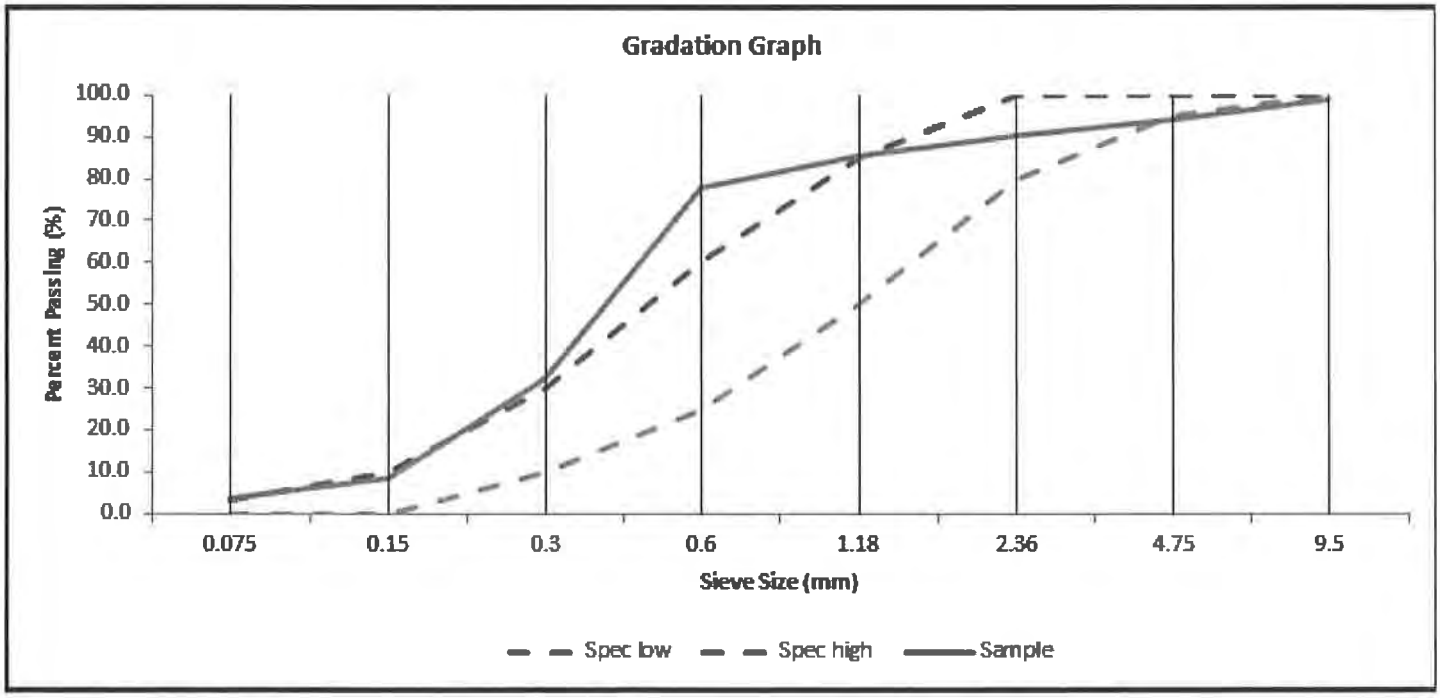
Loss by Washing 2.7

Fineness Modulus 2.13

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	98.8%
6.7 mm	-	-
4.75 mm	95.0-100.0%	94.3%
2.36 mm	80.0-100.0%	90.5%
1.18 mm	50.0-85.0%	85.6%
0.600 mm	25.0-60.0%	77.8%
0.300 mm	10.0-30.0%	32.2%
0.150 mm	0.0-10.0%	8.3%
0.075 mm	0.0-3.0%	3.9%

NOTES: BH10 65feet



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AGGREGATE GRADATION REPORT

A000921

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 26/05/14 12:00:00 PM

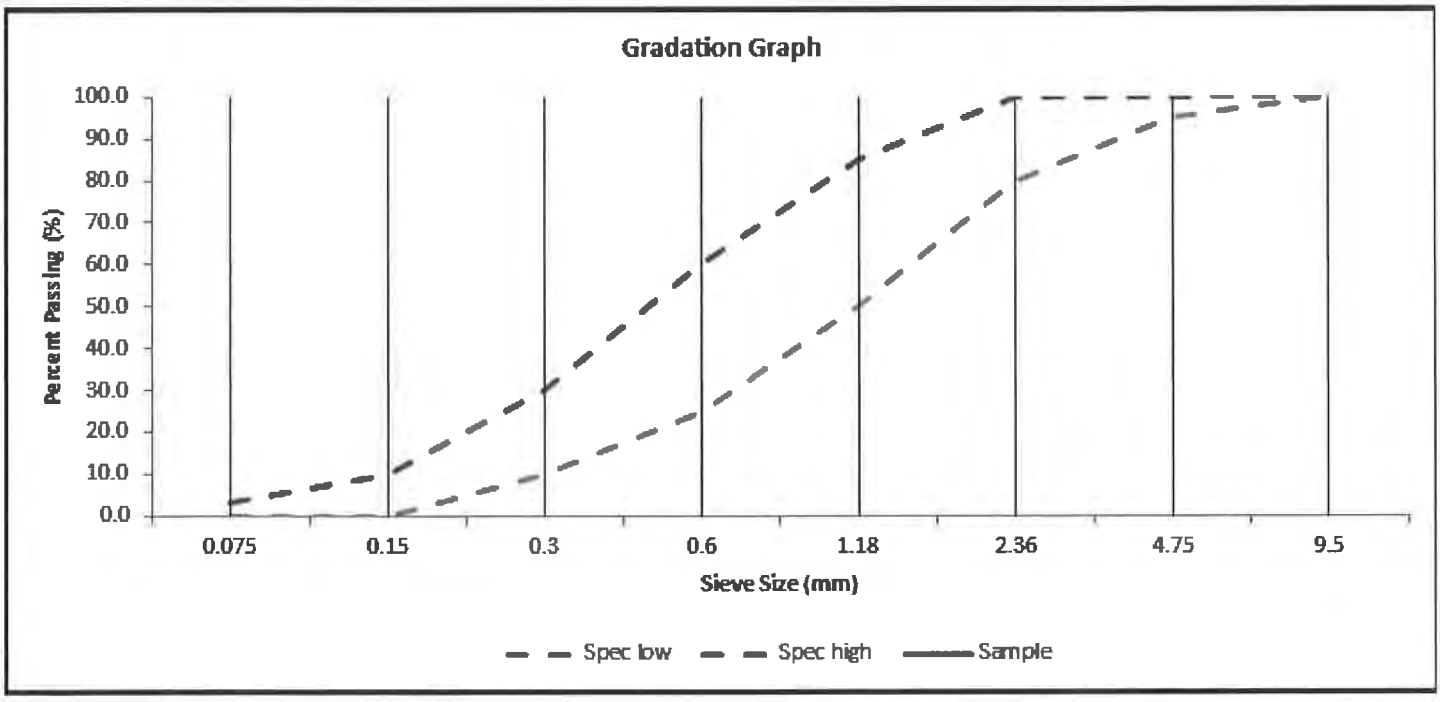
Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	-
6.7 mm	-	-
4.75 mm	95.0-100.0%	-
2.36 mm	80.0-100.0%	-
1.18 mm	50.0-85.0%	-
0.600 mm	25.0-60.0%	-
0.300 mm	10.0-30.0%	-
0.150 mm	0.0-10.0%	-
0.075 mm	0.0-3.0%	-

NOTES: BH11 30-35 feet - silty clayey crap



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AGGREGATE GRADATION REPORT

A001481

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

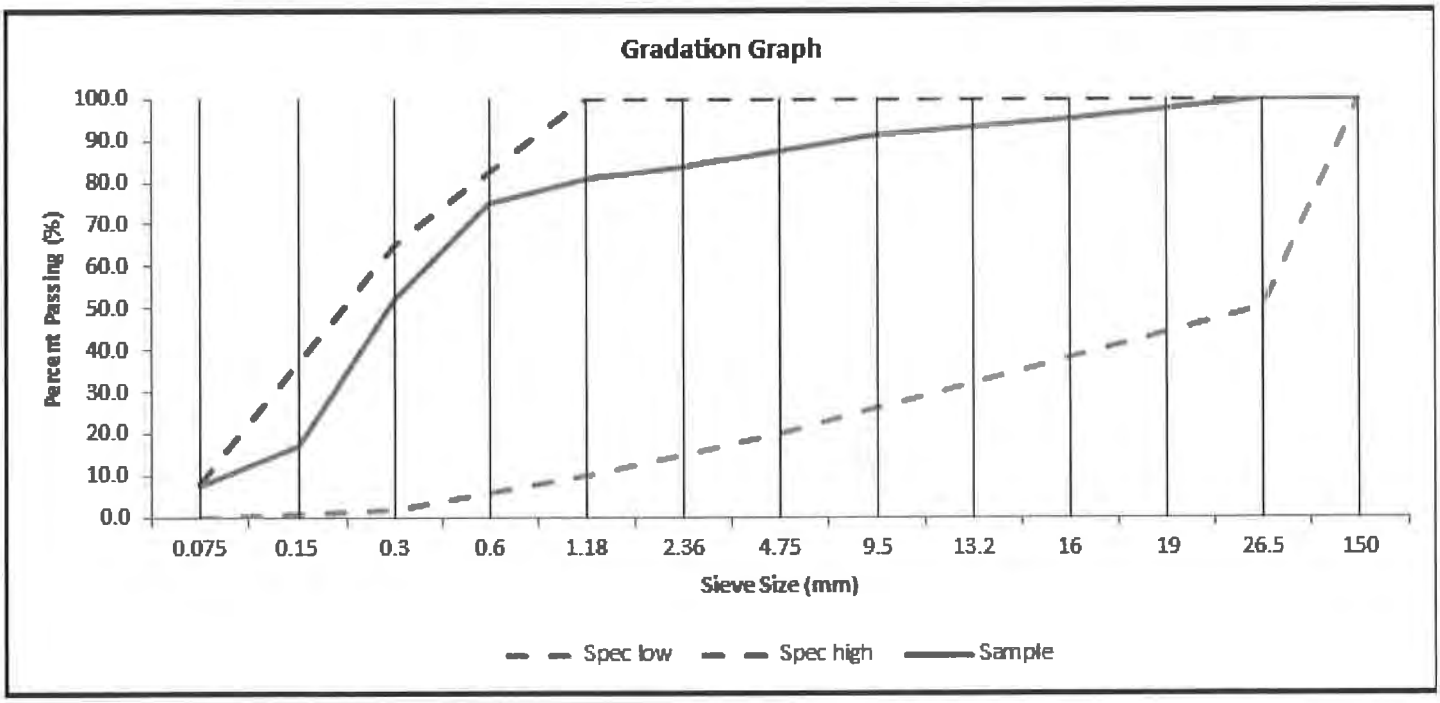
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	50.0-100.0%	100%
19.0 mm	-	97.5%
16.0 mm	-	95%
13.2 mm	-	93.4%
9.5 mm	-	91.2%
6.7 mm	-	-
4.75 mm	20.0-100.0%	87.6%
2.36 mm	-	83.7%
1.18 mm	10.0-100.0%	80.7%
0.600 mm	-	75%
0.300 mm	2.0-65.0%	52.2%
0.150 mm	-	17.3%
0.075 mm	0.0-8.0%	7.3%

NOTES: MW12 15-20'



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AGGREGATE GRADATION REPORT

A001482

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

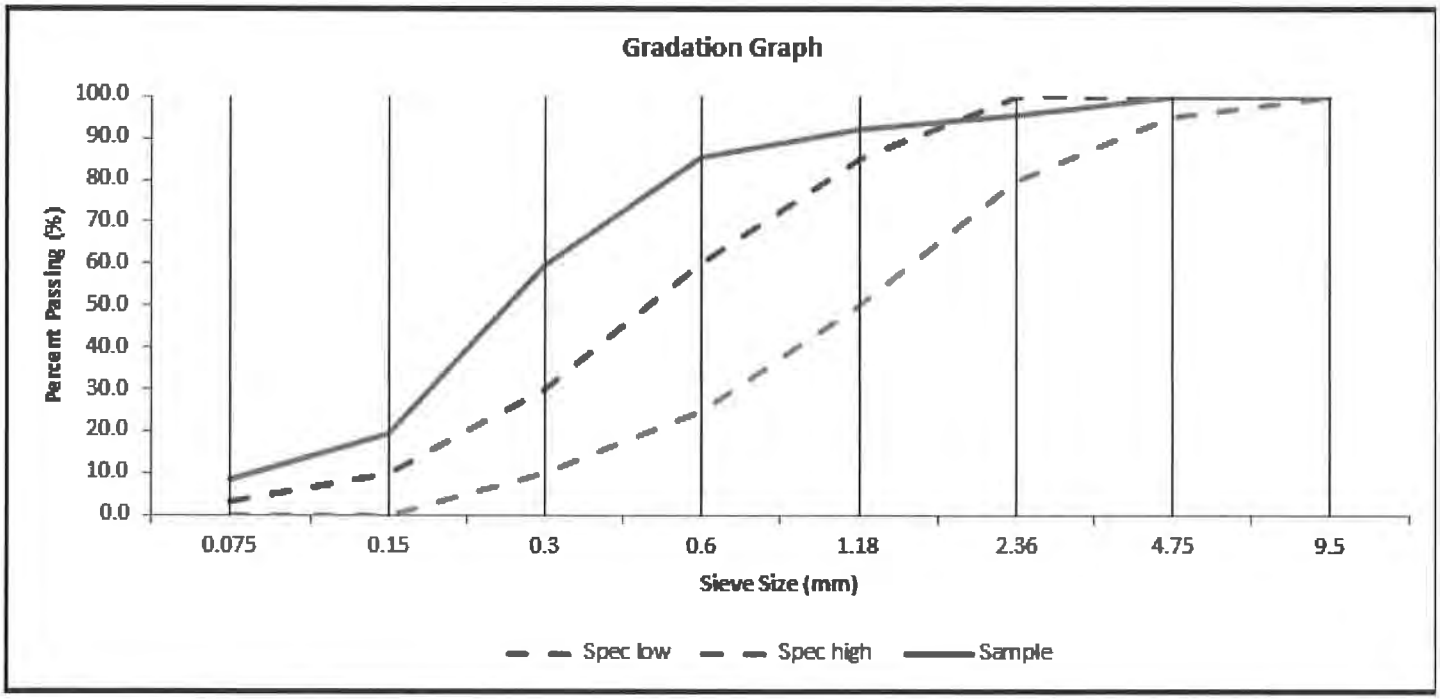
Loss by Washing 7.6

Fineness Modulus 1.47

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	95.6%
1.18 mm	50.0-85.0%	92.1%
0.600 mm	25.0-60.0%	85.7%
0.300 mm	10.0-30.0%	59.6%
0.150 mm	0.0-10.0%	19.7%
0.075 mm	0.0-3.0%	8.3%

NOTES: MW12 15-20' just sand



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AGGREGATE GRADATION REPORT

A001483

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

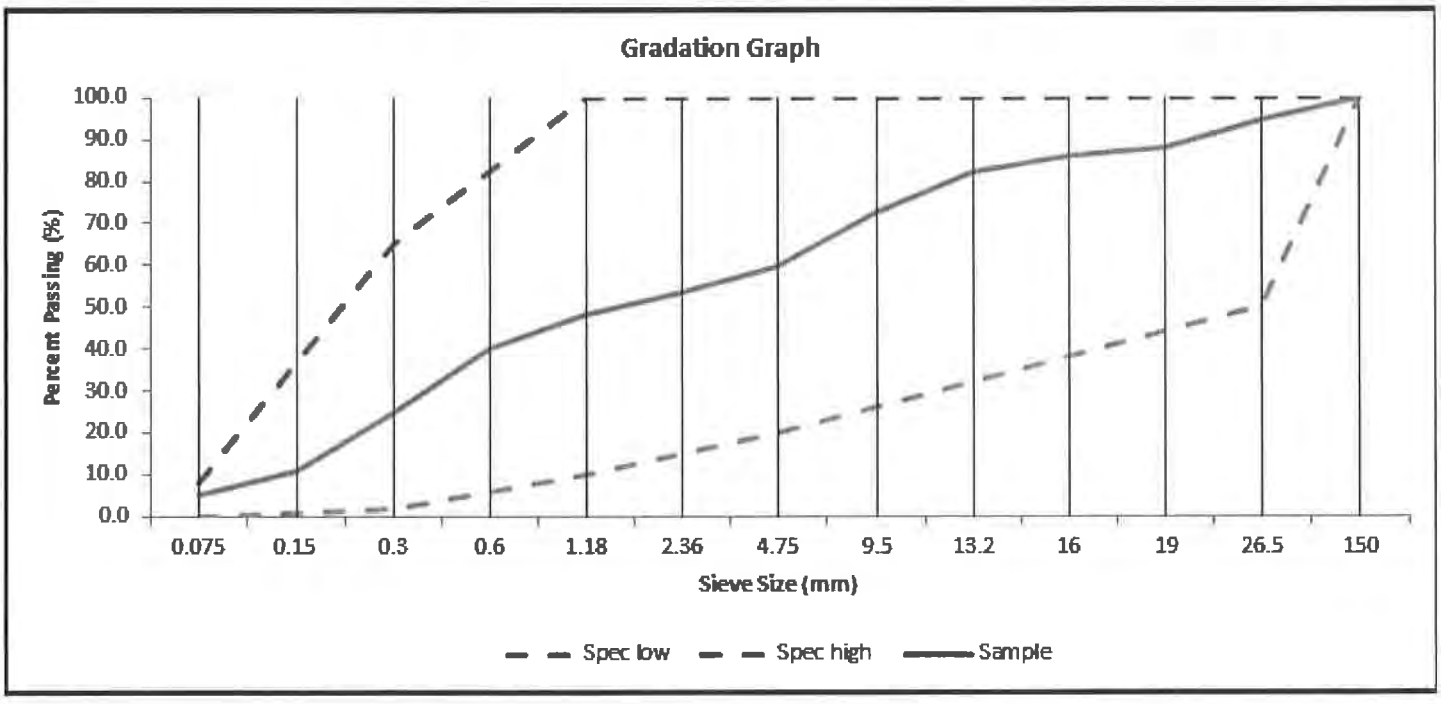
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	100%
26.5 mm	50.0-100.0%	94.7%
19.0 mm	-	88.1%
16.0 mm	-	86.2%
13.2 mm	-	82%
9.5 mm	-	72.5%
6.7 mm	-	-
4.75 mm	20.0-100.0%	59.5%
2.36 mm	-	53.6%
1.18 mm	10.0-100.0%	48.1%
0.600 mm	-	40.2%
0.300 mm	2.0-65.0%	24.7%
0.150 mm	-	10.8%
0.075 mm	0.0-8.0%	5.2%

NOTES: MW12 30-35'



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AGGREGATE GRADATION REPORT

A001484

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

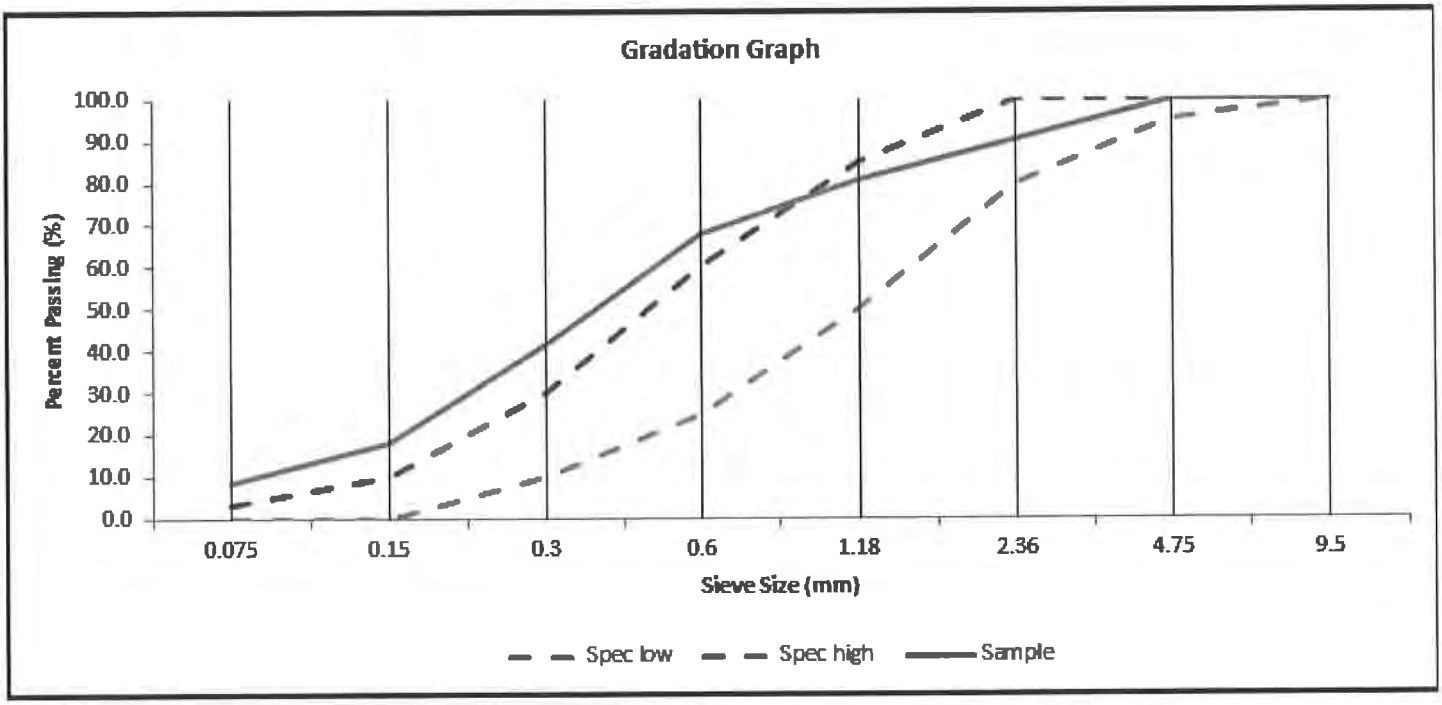
Loss by Washing 7.2

Fineness Modulus 2.02

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	90.1%
1.18 mm	50.0-85.0%	80.8%
0.600 mm	25.0-60.0%	67.6%
0.300 mm	10.0-30.0%	41.5%
0.150 mm	0.0-10.0%	18.1%
0.075 mm	0.0-3.0%	8.7%

NOTES: MW12 30-35' just sand



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AGGREGATE GRADATION REPORT

A001485

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

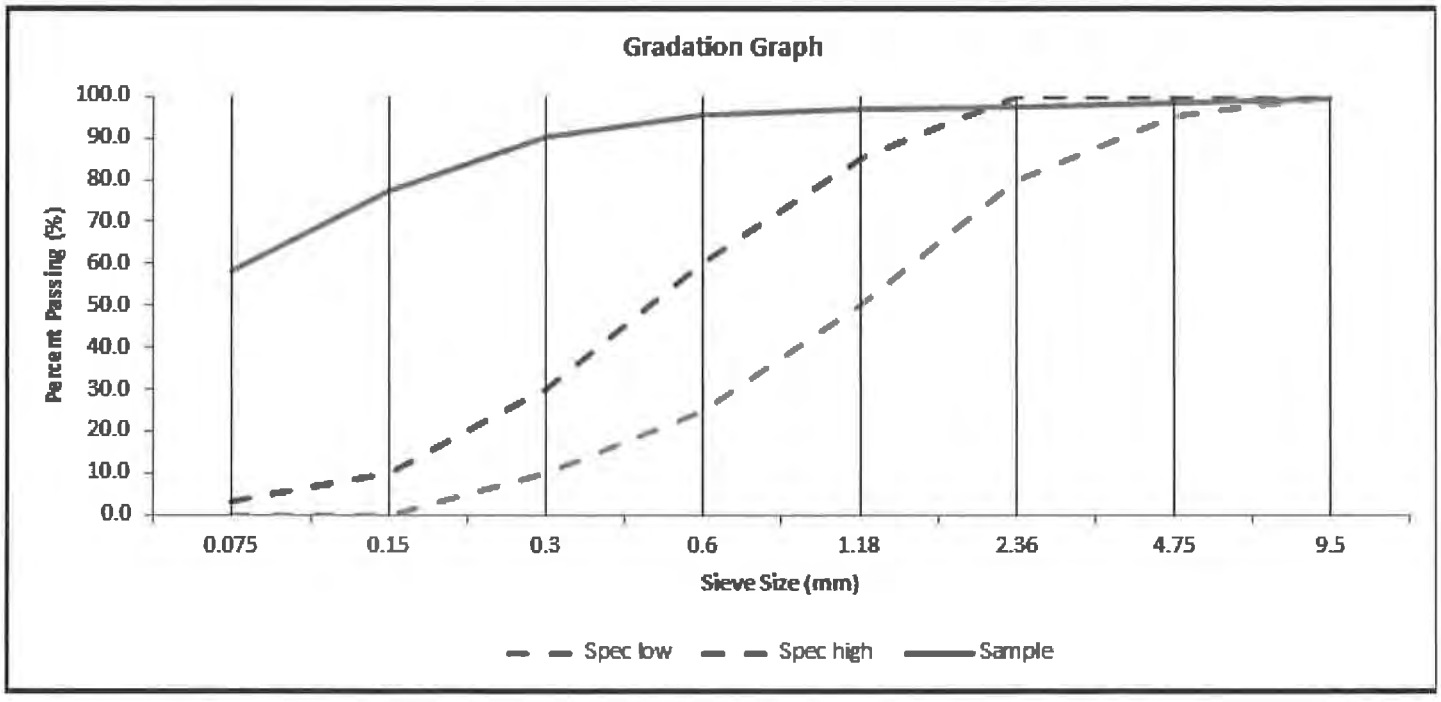
Loss by Washing 56.2

Fineness Modulus 0.44

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	100%
9.5 mm	100.0-100.0%	99.2%
6.7 mm	-	-
4.75 mm	95.0-100.0%	98.6%
2.36 mm	80.0-100.0%	97.7%
1.18 mm	50.0-85.0%	97%
0.600 mm	25.0-60.0%	95.6%
0.300 mm	10.0-30.0%	90.1%
0.150 mm	0.0-10.0%	77.4%
0.075 mm	0.0-3.0%	58.1%

NOTES: MW12 60-65' just sand (little stone in this sample)



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AGGREGATE GRADATION REPORT

A001486

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

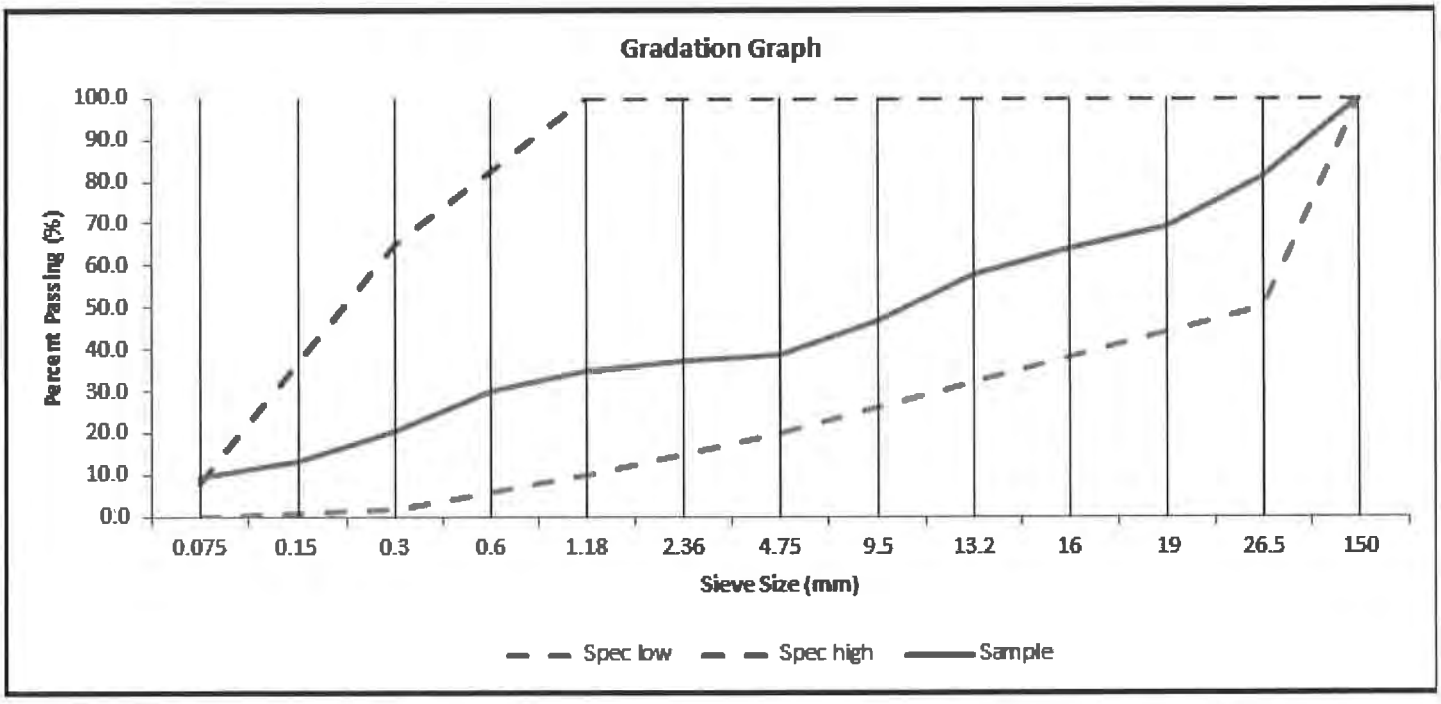
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	100%
26.5 mm	50.0-100.0%	81.2%
19.0 mm	-	69.4%
16.0 mm	-	63.8%
13.2 mm	-	57.7%
9.5 mm	-	46.8%
6.7 mm	-	-
4.75 mm	20.0-100.0%	38.7%
2.36 mm	-	37.2%
1.18 mm	10.0-100.0%	34.6%
0.600 mm	-	30%
0.300 mm	2.0-65.0%	20.4%
0.150 mm	-	13.1%
0.075 mm	0.0-8.0%	9.3%

NOTES: MW13 20-25'



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AGGREGATE GRADATION REPORT

A001487

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

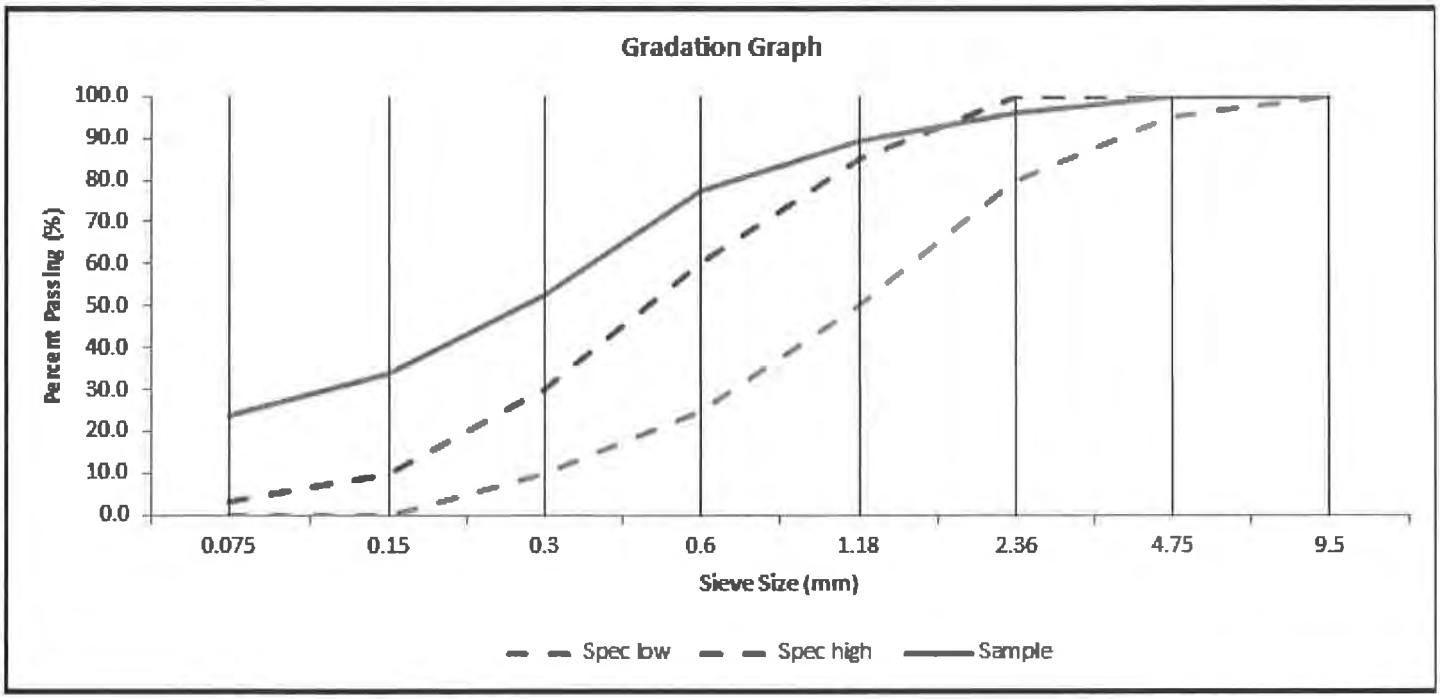
Loss by Washing 21.3

Fineness Modulus 1.5

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	96.2%
1.18 mm	50.0-85.0%	89.5%
0.600 mm	25.0-60.0%	77.4%
0.300 mm	10.0-30.0%	52.7%
0.150 mm	0.0-10.0%	33.8%
0.075 mm	0.0-3.0%	23.9%

NOTES: MW13 20-25' just sand



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AGGREGATE GRADATION REPORT

A001488

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

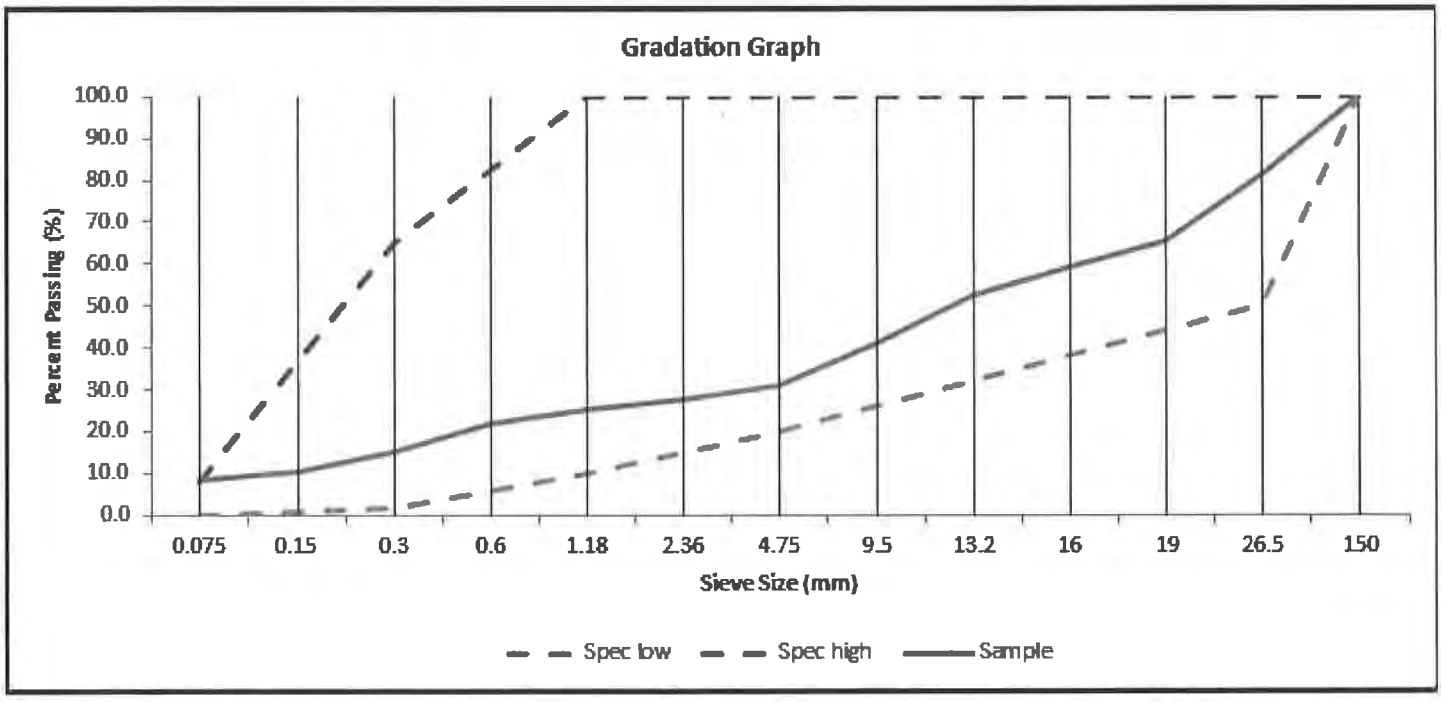
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	100%
26.5 mm	50.0-100.0%	81%
19.0 mm	-	65.4%
16.0 mm	-	59.1%
13.2 mm	-	52.4%
9.5 mm	-	41.1%
6.7 mm	-	-
4.75 mm	20.0-100.0%	31%
2.36 mm	-	27.8%
1.18 mm	10.0-100.0%	25.2%
0.600 mm	-	21.7%
0.300 mm	2.0-65.0%	15.3%
0.150 mm	-	10.6%
0.075 mm	0.0-8.0%	8.5%

NOTES: MW13 25-30'



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AGGREGATE GRADATION REPORT

A001489

Project Details

Project Name: 2014 Misc. Testing

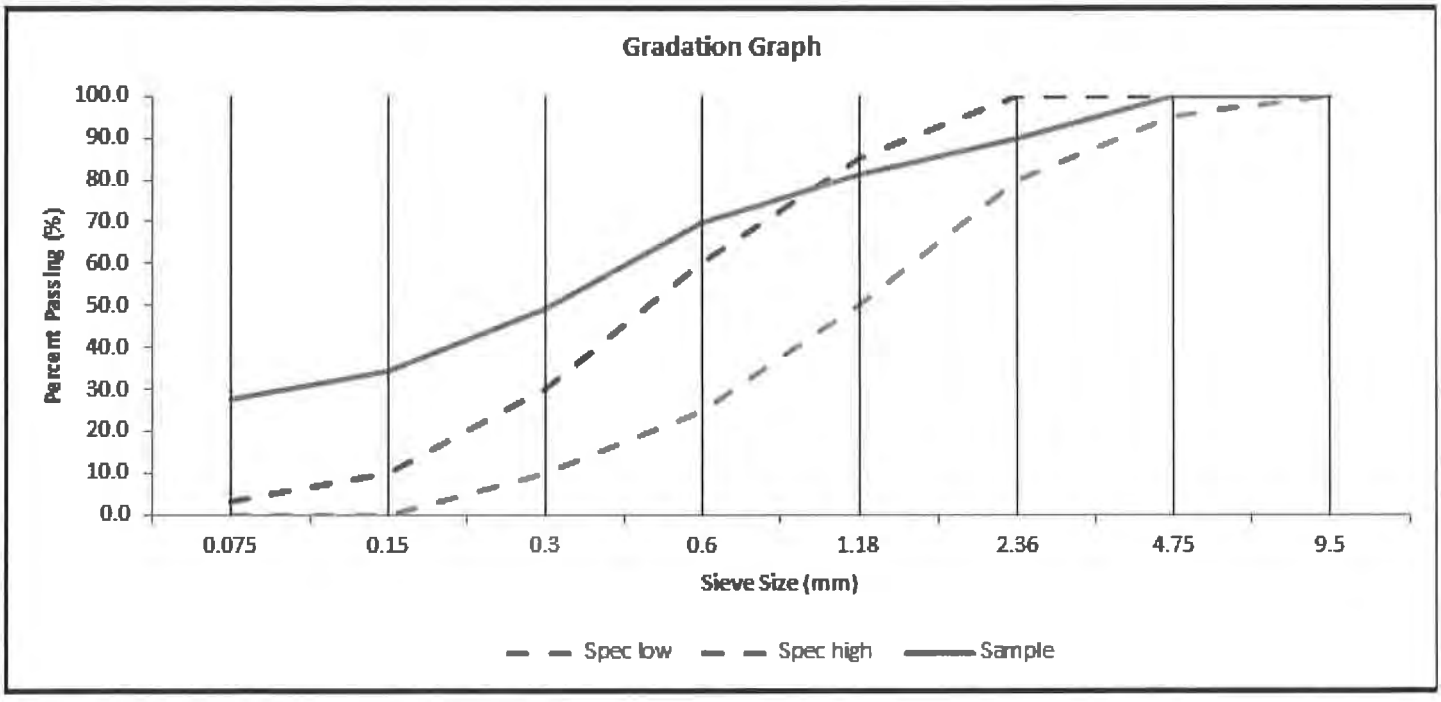
Sample Details

Date Sampled: 24/10/14 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Concrete Sand OPSS 1002
Loss by Washing 26.8
Fineness Modulus 1.76

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	89.6%
1.18 mm	50.0-85.0%	81.2%
0.600 mm	25.0-60.0%	69.8%
0.300 mm	10.0-30.0%	49.3%
0.150 mm	0.0-10.0%	34.1%
0.075 mm	0.0-3.0%	27.4%

NOTES: MW13 25-30' just sand



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AGGREGATE GRADATION REPORT

A001490

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

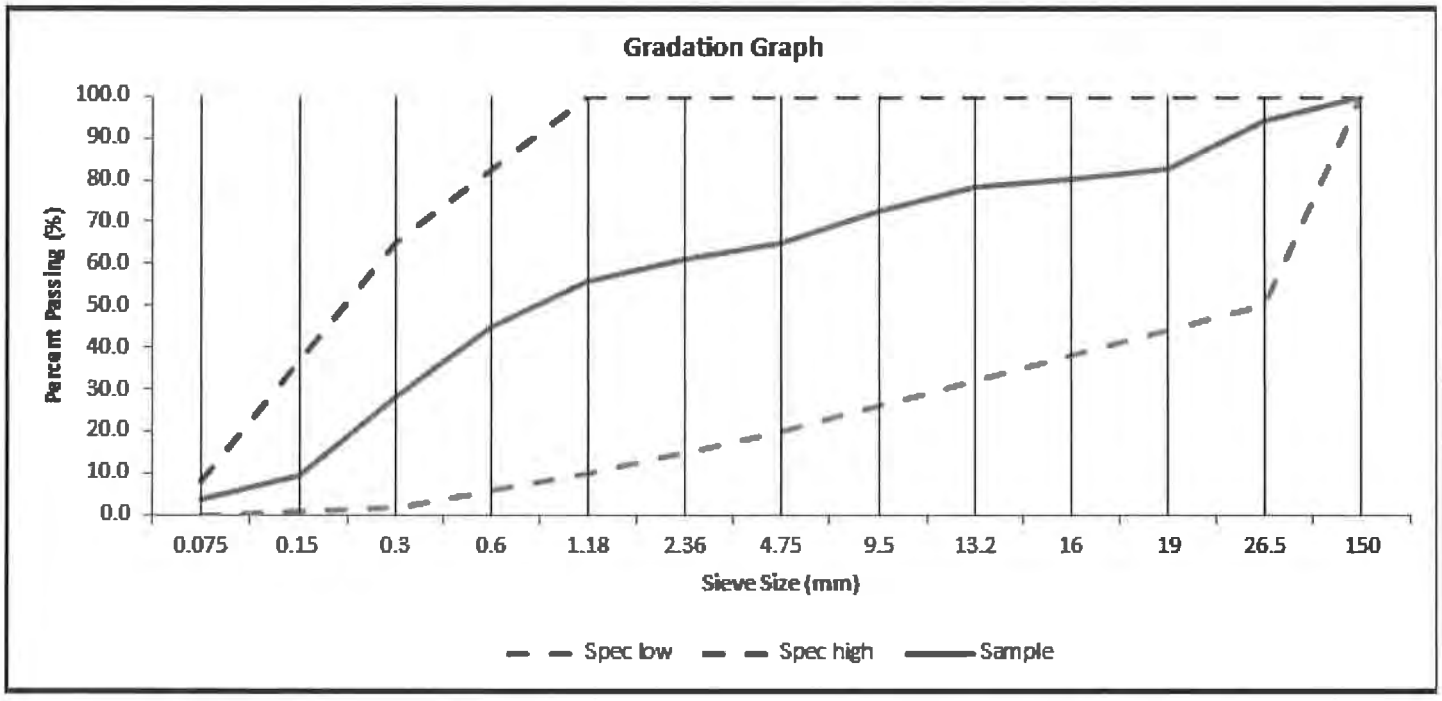
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	-
37.5 mm	-	100%
26.5 mm	50.0-100.0%	93.9%
19.0 mm	-	82.7%
16.0 mm	-	80.5%
13.2 mm	-	78.2%
9.5 mm	-	72.5%
6.7 mm	-	100%
4.75 mm	20.0-100.0%	64.8%
2.36 mm	-	61.1%
1.18 mm	10.0-100.0%	56%
0.600 mm	-	44.9%
0.300 mm	2.0-65.0%	27.9%
0.150 mm	-	9.6%
0.075 mm	0.0-8.0%	3.7%

NOTES: MW13 30-35'



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AGGREGATE GRADATION REPORT

A001491

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

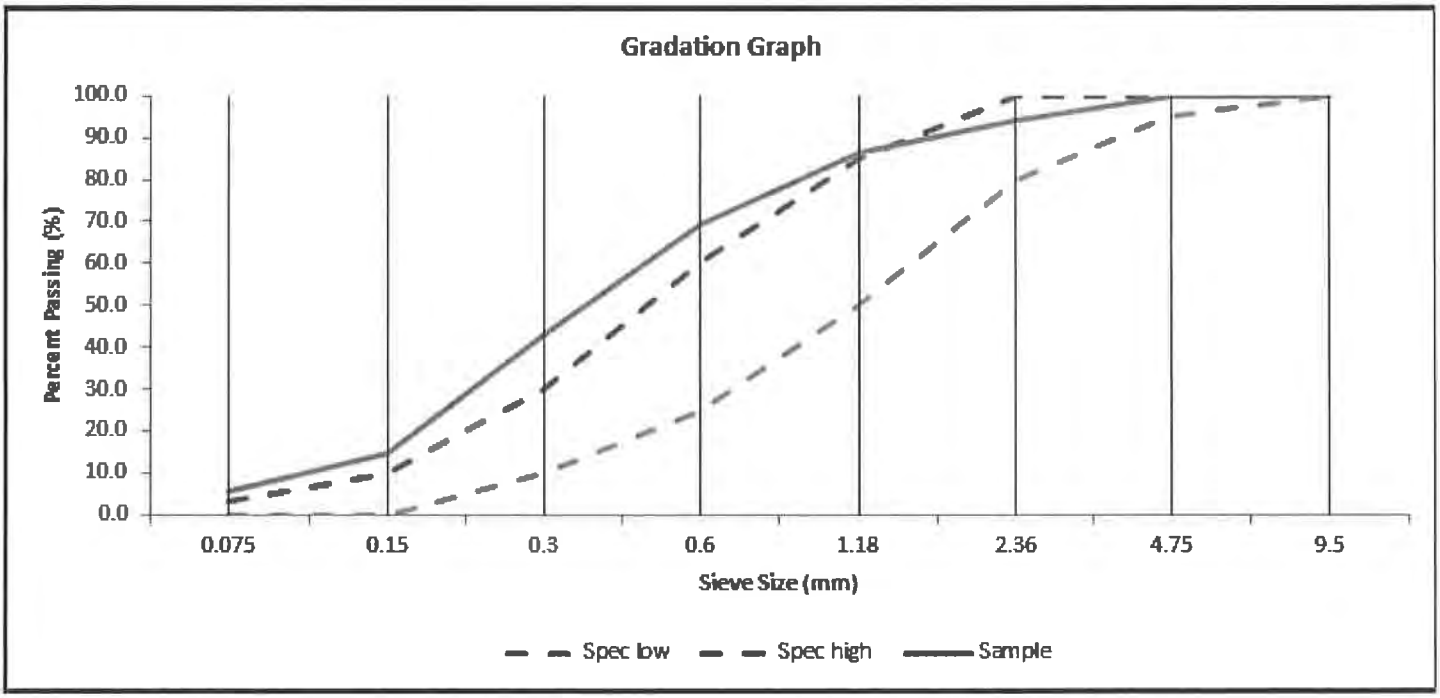
Loss by Washing 5.4

Fineness Modulus 1.92

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	94.3%
1.18 mm	50.0-85.0%	86.4%
0.600 mm	25.0-60.0%	69.3%
0.300 mm	10.0-30.0%	43%
0.150 mm	0.0-10.0%	14.9%
0.075 mm	0.0-3.0%	5.8%

NOTES: MW13 30-35' just sand



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AGGREGATE GRADATION REPORT

A001492

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 24/10/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

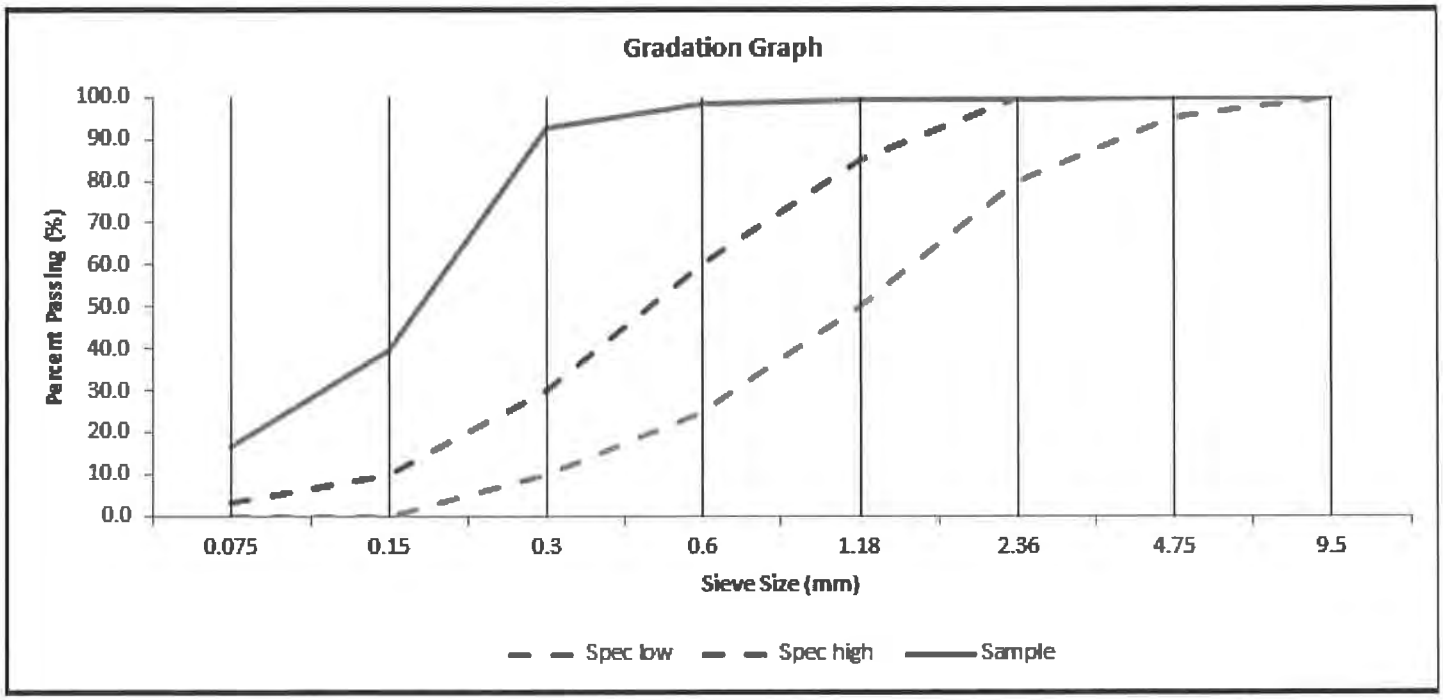
Loss by Washing 13.8

Fineness Modulus 0.71

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	99.8%
2.36 mm	80.0-100.0%	99.6%
1.18 mm	50.0-85.0%	99.2%
0.600 mm	25.0-60.0%	98.4%
0.300 mm	10.0-30.0%	92.7%
0.150 mm	0.0-10.0%	39.7%
0.075 mm	0.0-3.0%	16.5%

NOTES: MW13 60-65' just sand (little stone in this sample)



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GEOLOGICAL INVESTIGATIONS

APPENDIX II
Test Pits & Grain Size Analysis

GEOLOGICAL INVESTIGATIONS

Harrison Property

Test Holes September 17, 2013

Harrison Farm
W1/2 Lot 30 Conc. 4 EHS
Town of Mono

TH#1	0 – 1′	top soil		
	1 - 18′	gravel	30% stone well graded sand	Sample 1 @ 15′
TH#2	0 – 1′	top soil		
	1 – 2′	overburden		
	2 – 6′	gravel	40% stone Well graded sand sand	
	6 – 9′	silty sand		
	9 – 12′	fine sand		
	12′ – 18′+	gravel	10% stone Well graded sand	
TH#3	0 – 1′	top soil		
	1 – 8′	gravel	40% stone Well graded sand	
	8 – 20′+	gravel	10% stone Well graded sand	Sample 2 @16′
TH#4	(low flats)			
	0 – 1′	top soil		
	1 – 2′	overburden		
	2 – 8′	gravel	40% stone Well graded sand	
	8 – 18′+	gravel	20% stone Well graded sand	
TH#5	0 – 1′	top soil		
	1 – 2′	overburden		
	2 - 6′	gravel	10% stone Well graded sand	
	6 – 16′	gravel	30% stone Well graded sand	Sample 3 @ 10′
	16′+	fine sand		Sample 4 @ 20′
TH#6	(top of ridge)			
	0 – 1′	top soil		
	1 – 20′	gravel	50% stone to 3″ Well graded sand	

TH#7	(top of corner ridge)			
	0 – 1′	top soil		
	1 - 15′	gravel	40% stone	
			Well graded sand	
	15 – 20′+		gravel 20% stone	
			Well graded sand	
TH#8	0 – 1′	top soil		
	1 – 15′	gravel	50% stone	Sample 5
			Well graded sand	
	15 – 20′+	gravel	10% stone	
			well graded sand	
TH#9	0 – 1′	top soil		
	1 – 18′	gravel	50% stone	
			Well graded sand	
	18 - 20′+	gravel	10% stone	
			well graded sand	
TH#10	0 – 1′	top soil		
	1 – 20′+	gravel	40% stone	
			Well graded sand	
TH#11	0 – 1′	top soil		
	2 – 10′	gravel	50% stone	
			Well graded sand	
	10 – 20′+	silty sand		
TH#12	0 – 1′	top soil		
	1 – 18′+	gravel	50% stone to 4″	
			well graded sand	
	18 – 20′+	gravel	20% stone	
			Well graded sand	
TH#13	same as TH#12			

HARRISON

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Amaranth, ON, L9W 0V1
T: 519-941-0732 F: 519-941-8992

AGGREGATE GRADATION REPORT

A000589

Project Details

Project Name: 2013 Misc. Testing

Sample Details

Date Sampled: 09/18/13 12:00:00 PM

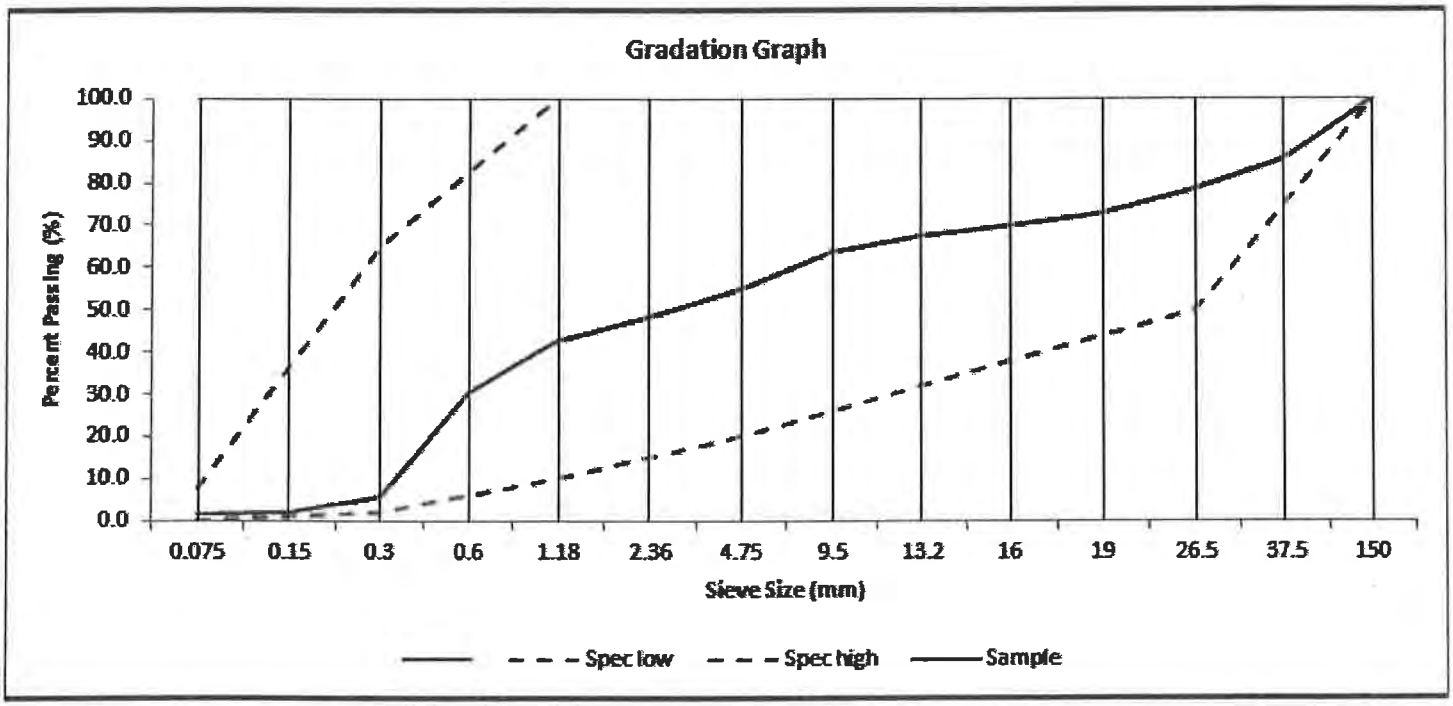
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	100%
37.5 mm	-	85.7%
26.5 mm	50.0-100.0%	78.6%
19.0 mm	-	72.8%
16.0 mm	-	70.2%
13.2 mm	-	67.7%
9.5 mm	-	63.7%
6.7 mm	-	-
4.75 mm	20.0-100.0%	55.1%
2.36 mm	-	48.3%
1.18 mm	10.0-100.0%	42.7%
0.600 mm	-	30.1%
0.300 mm	2.0-65.0%	5.8%
0.150 mm	-	2.1%
0.075 mm	0.0-8.0%	1.4%

NOTES: sam's sample #1



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AGGREGATE GRADATION REPORT

A000589

Project Details

Project Name: 2013 Misc. Testing

Sample Details

Date Sampled: 09/18/13 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

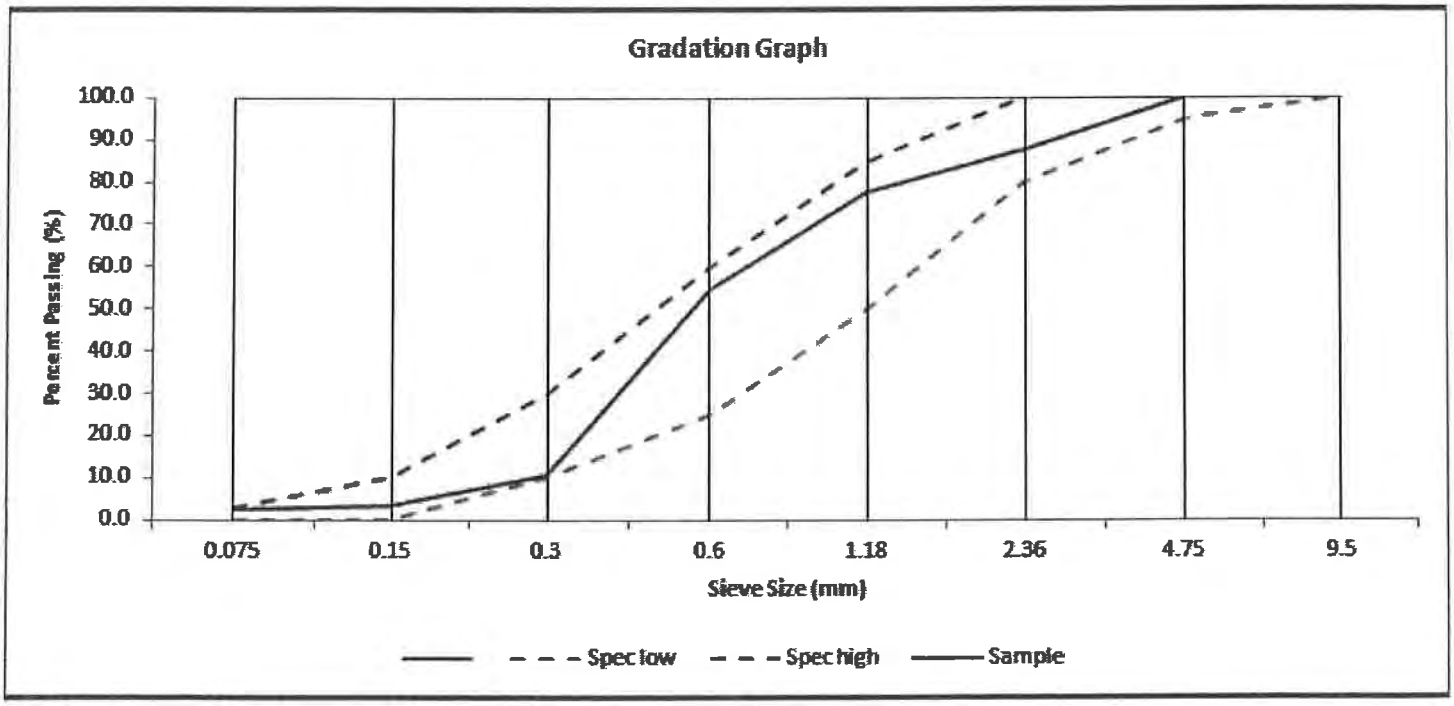
Loss by Washing 2.1

Fineness Modulus 2.66

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	87.6%
1.18 mm	50.0-85.0%	77.4%
0.600 mm	25.0-60.0%	54.7%
0.300 mm	10.0-30.0%	10.5%
0.150 mm	0.0-10.0%	3.7%
0.075 mm	0.0-3.0%	2.5%

NOTES: sam's sample #1, just the sand



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AGGREGATE GRADATION REPORT

A000590

Project Details

Project Name: 2013 Misc. Testing

Sample Details

Date Sampled: 09/18/13 12:00:00 PM

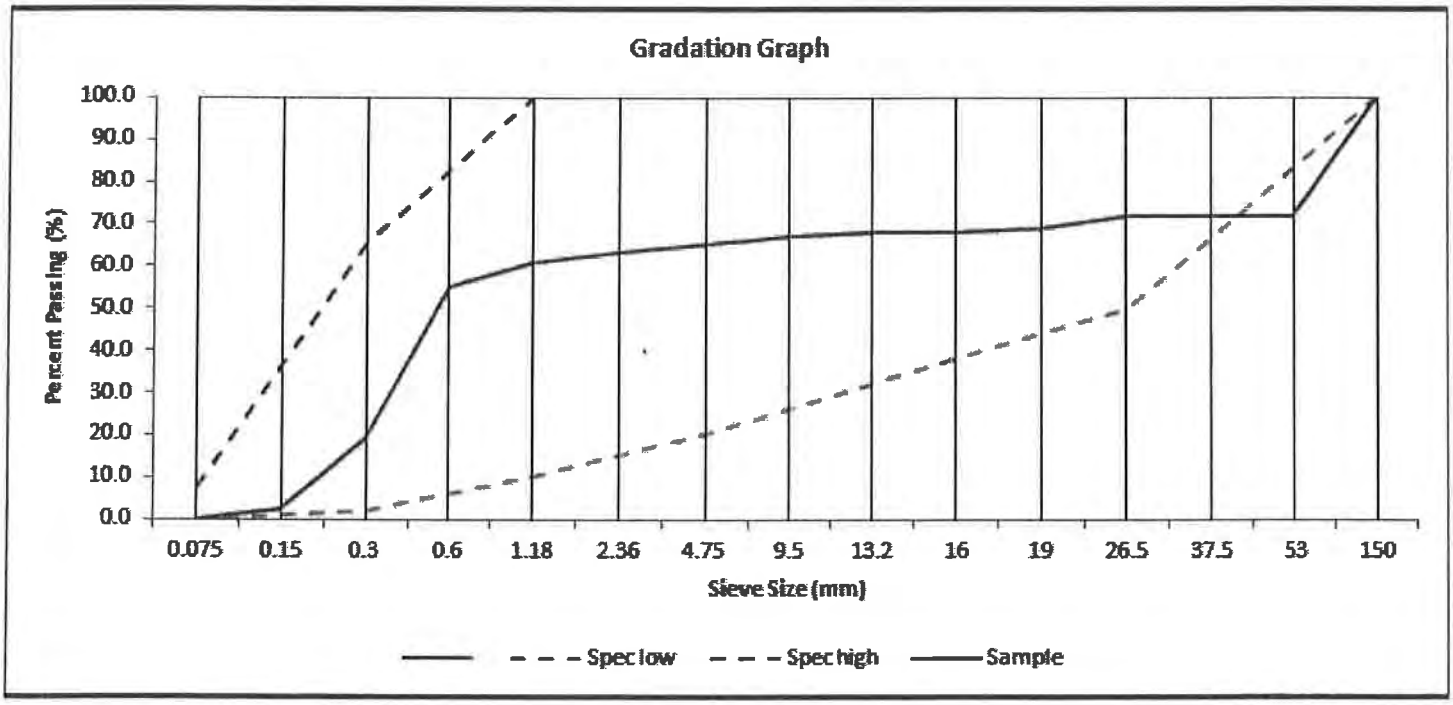
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	71.9%
37.5 mm	-	71.9%
26.5 mm	50.0-100.0%	71.9%
19.0 mm	-	69.2%
16.0 mm	-	68.3%
13.2 mm	-	68%
9.5 mm	-	66.9%
6.7 mm	-	-
4.75 mm	20.0-100.0%	65.4%
2.36 mm	-	63.5%
1.18 mm	10.0-100.0%	61.1%
0.600 mm	-	55.1%
0.300 mm	2.0-65.0%	19.3%
0.150 mm	-	2.3%
0.075 mm	0.0-8.0%	0.3%

NOTES: sam's sample #2



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AGGREGATE GRADATION REPORT

A000590

Project Details

Project Name: 2013 Misc. Testing

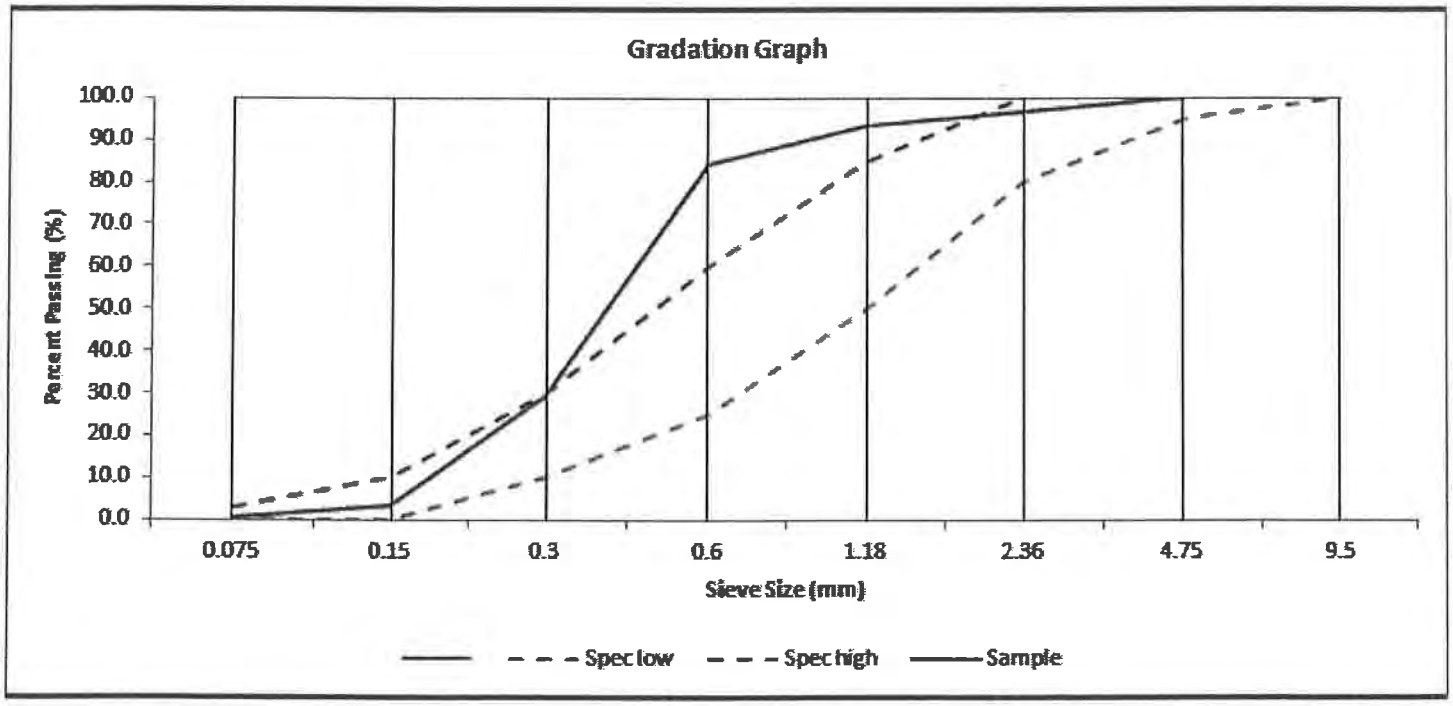
Sample Details

Date Sampled: 09/18/13 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Concrete Sand OPSS 1002
Loss by Washing 0.6
Fineness Modulus 1.92

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	97%
1.18 mm	50.0-85.0%	93.5%
0.600 mm	25.0-60.0%	84.3%
0.300 mm	10.0-30.0%	29.5%
0.150 mm	0.0-10.0%	3.6%
0.075 mm	0.0-3.0%	0.4%

NOTES: sam's sample #2, just the sand



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AGGREGATE GRADATION REPORT

A000591

Project Details

Project Name: 2013 Misc. Testing

Sample Details

Date Sampled: 09/18/13 12:00:00 PM

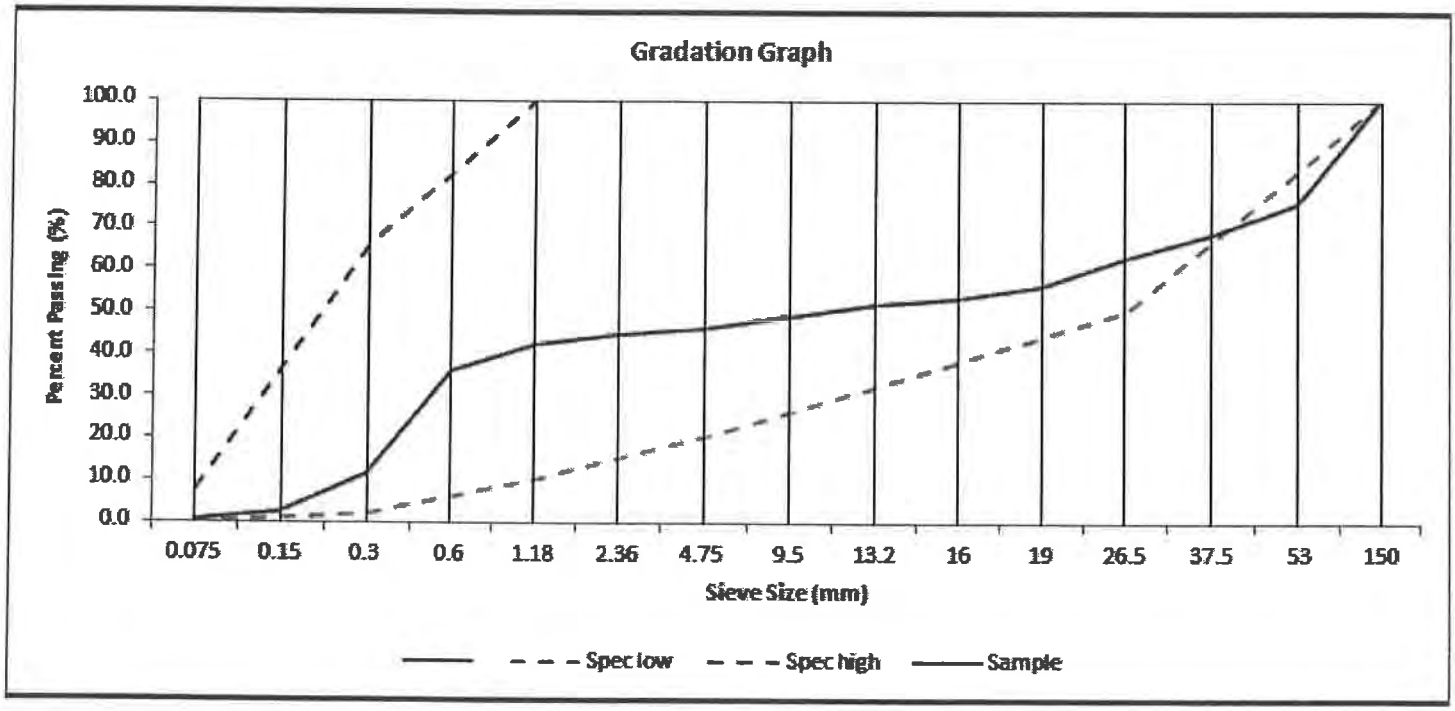
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	75.7%
37.5 mm	-	68.7%
26.5 mm	50.0-100.0%	62.8%
19.0 mm	-	55.9%
16.0 mm	-	53%
13.2 mm	-	51.6%
9.5 mm	-	48.8%
6.7 mm	-	-
4.75 mm	20.0-100.0%	46.1%
2.36 mm	-	44.4%
1.18 mm	10.0-100.0%	42.2%
0.600 mm	-	36.2%
0.300 mm	2.0-65.0%	11.4%
0.150 mm	-	2.4%
0.075 mm	0.0-8.0%	0.8%

NOTES: sam's sample #3



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AGGREGATE GRADATION REPORT

A000591

Project Details

Project Name: 2013 Misc. Testing

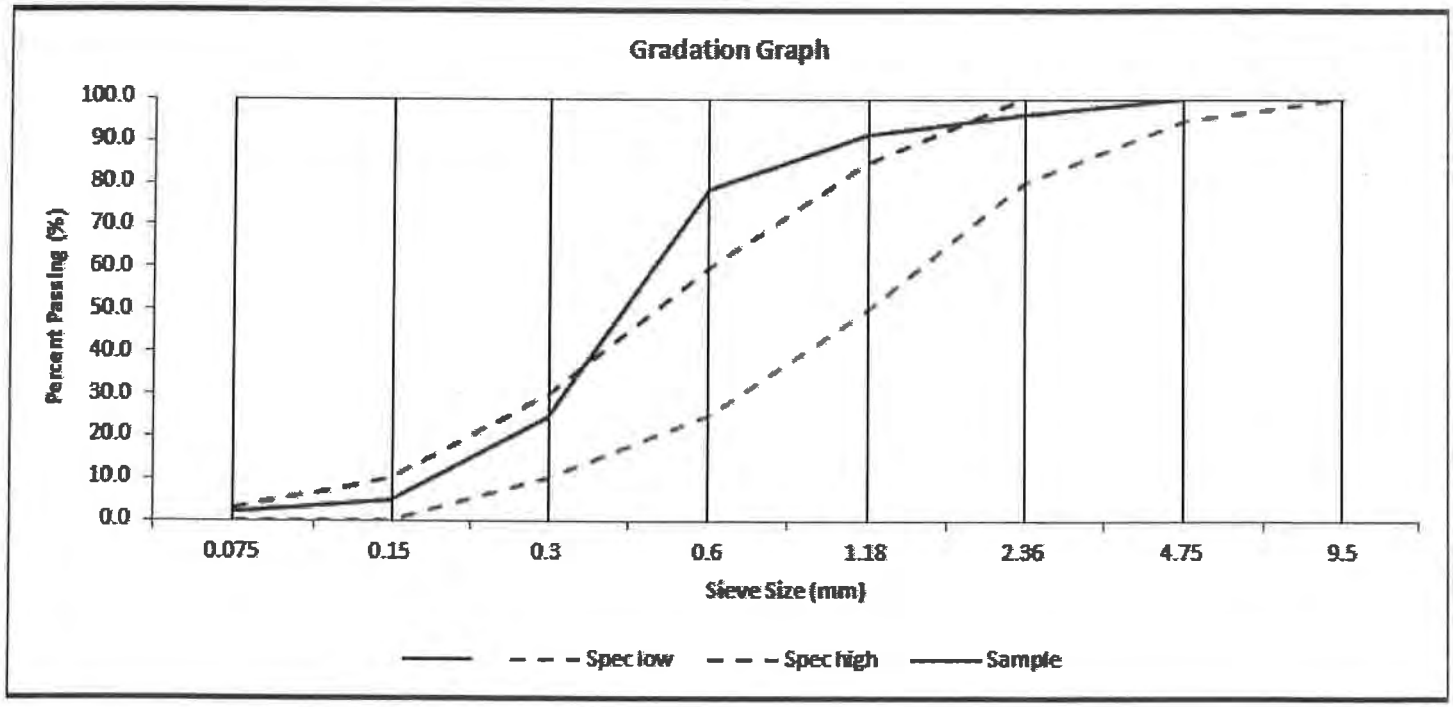
Sample Details

Date Sampled: 09/18/13 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Concrete Sand OPSS 1002
Loss by Washing 1.5
Fineness Modulus 2.04

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	96.4%
1.18 mm	50.0-85.0%	91.6%
0.600 mm	25.0-60.0%	78.6%
0.300 mm	10.0-30.0%	24.7%
0.150 mm	0.0-10.0%	5.1%
0.075 mm	0.0-3.0%	1.8%

NOTES: sam's sample #3, just the sand



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AGGREGATE GRADATION REPORT

A000592

Project Details

Project Name: 2013 Misc. Testing

Sample Details

Date Sampled: 09/18/13 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

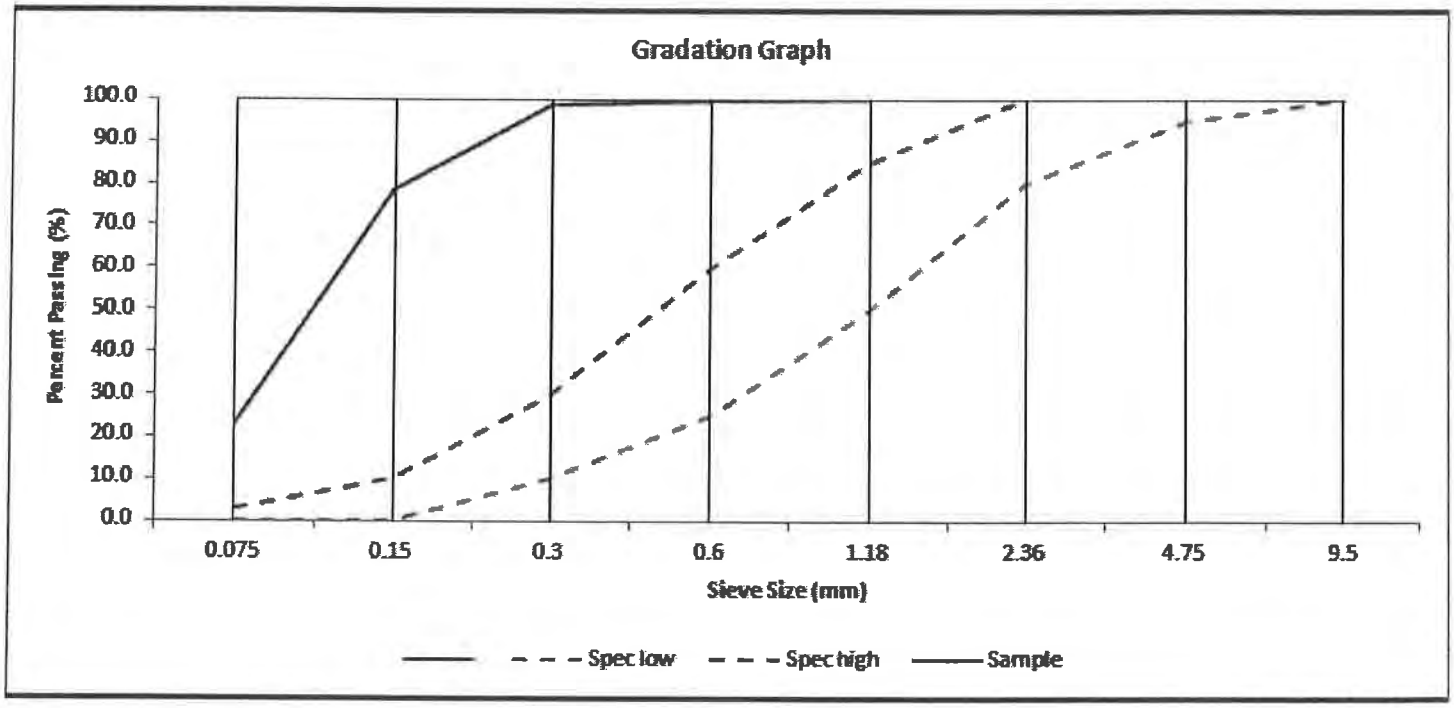
Loss by Washing 15.5

Fineness Modulus 0.23

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	99.9%
1.18 mm	50.0-85.0%	99.9%
0.600 mm	25.0-60.0%	99.6%
0.300 mm	10.0-30.0%	98.6%
0.150 mm	0.0-10.0%	78.8%
0.075 mm	0.0-3.0%	23.3%

NOTES: sam's sample #4, just sand no stone in this sample



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AGGREGATE GRADATION REPORT

A000592

Project Details

Project Name: 2013 Misc. Testing

Sample Details

Date Sampled: 09/18/13 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

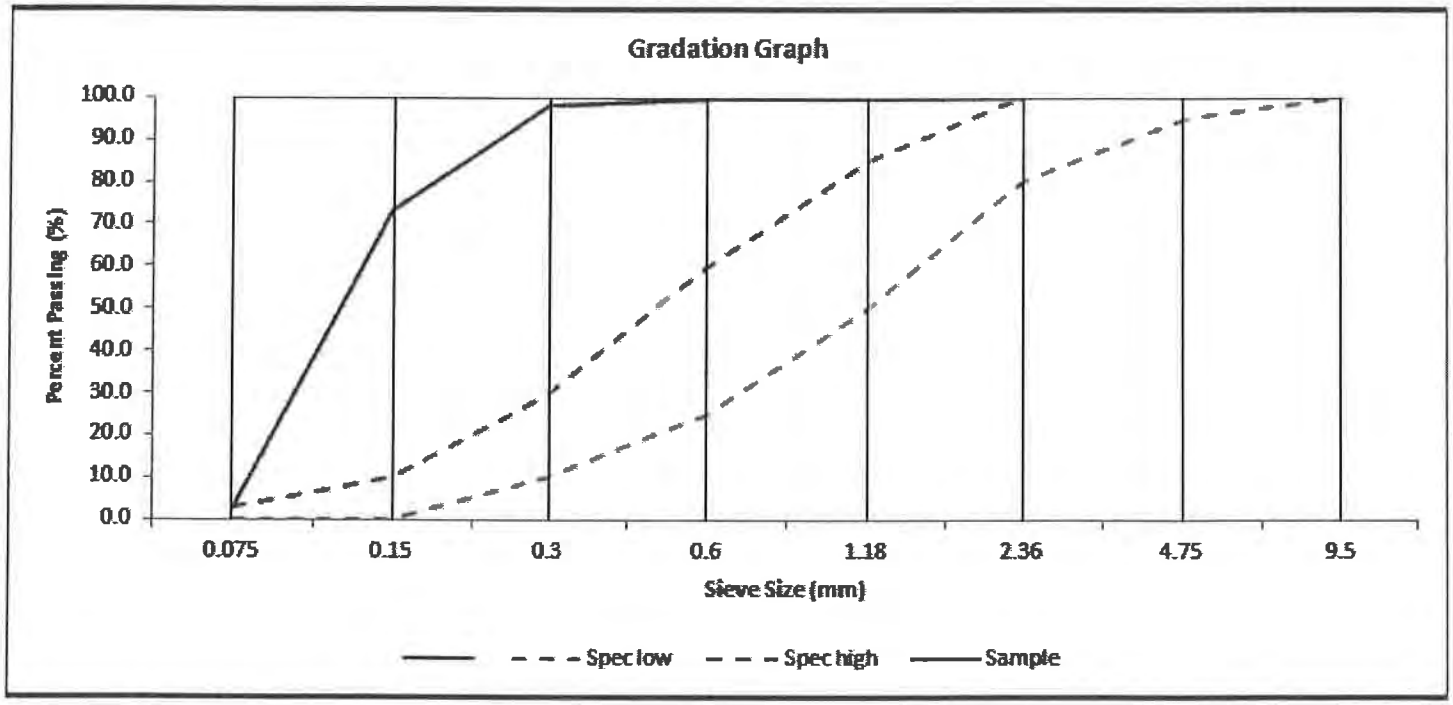
Specification Name: Concrete Sand OPSS 1002

Fineness Modulus 0.3

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	99.9%
1.18 mm	50.0-85.0%	99.8%
0.600 mm	25.0-60.0%	99.5%
0.300 mm	10.0-30.0%	98.2%
0.150 mm	0.0-10.0%	73.1%
0.075 mm	0.0-3.0%	2.4%

NOTES: sam's sample #4, just sand no stone in this sample, if it was washed looks like good blending s and



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AGGREGATE GRADATION REPORT

A000593

Project Details

Project Name: 2013 Misc. Testing

Sample Details

Date Sampled: 09/18/13 12:00:00 PM

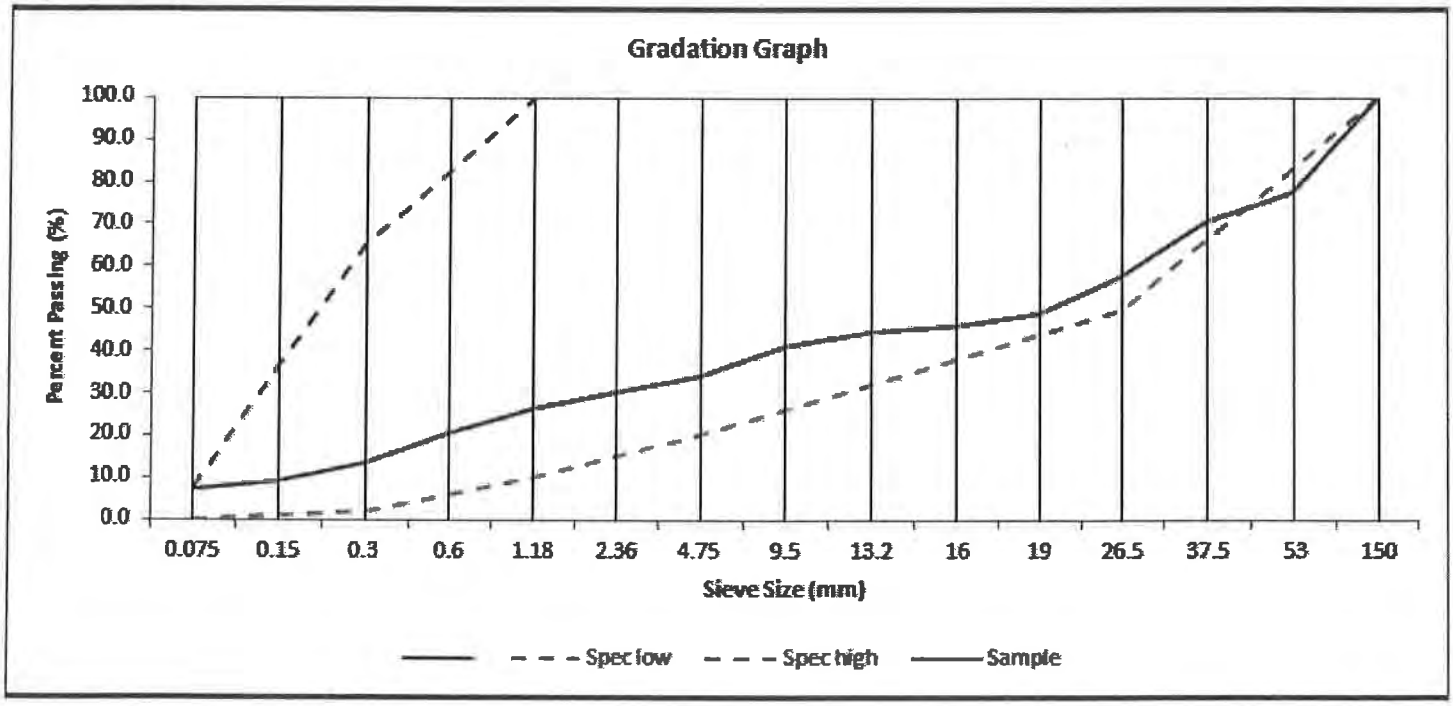
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	77.4%
37.5 mm	-	70.7%
26.5 mm	50.0-100.0%	57.8%
19.0 mm	-	49.1%
16.0 mm	-	46.1%
13.2 mm	-	44.8%
9.5 mm	-	41.1%
6.7 mm	-	-
4.75 mm	20.0-100.0%	34.2%
2.36 mm	-	30.5%
1.18 mm	10.0-100.0%	26.5%
0.600 mm	-	20.6%
0.300 mm	2.0-65.0%	13.3%
0.150 mm	-	9.3%
0.075 mm	0.0-8.0%	7.4%

NOTES: sam's sample #5



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AGGREGATE GRADATION REPORT

A000593

Project Details

Project Name: 2013 Misc. Testing

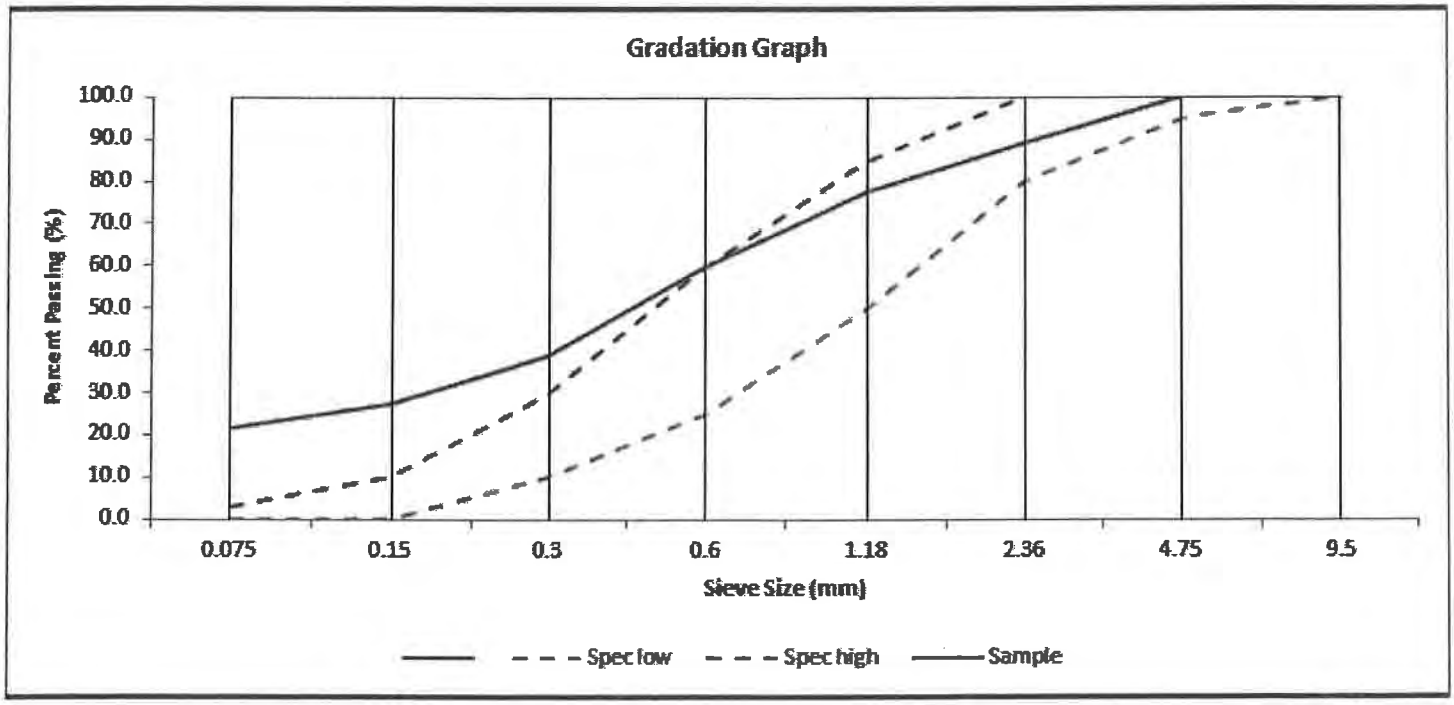
Sample Details

Date Sampled: 09/18/13 12:00:00 PM
Material: MISC AGGREGATE PRODUCT
Specification Name: Concrete Sand OPSS 1002
Loss by Washing 21.1
Fineness Modulus 2.07

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	89.2%
1.18 mm	50.0-85.0%	77.6%
0.600 mm	25.0-60.0%	60.1%
0.300 mm	10.0-30.0%	38.9%
0.150 mm	0.0-10.0%	27.3%
0.075 mm	0.0-3.0%	21.7%

NOTES: sam's sample #5, just the sand



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GEOLOGICAL INVESTIGATIONS

Wake Property

Test Holes Aug. 15, 2014

Wake Farm
W1/2 Lot 31 Conc. 4 EHS
Town of Mono

TH#1	0 – 1′	top soil		
	1 – 2′	overburden		
	2 – 12′	gravel	stone to 12″ coarse sand	
	12 – 20′+	gravel	30% stone medium graded sand	Sample 1
TH#2	(Top of Knoll)			
	0 – 1′	top soil		
	1 – 2.5′	overburden		
	2.5 – 12′	gravel	50% stone to 12″ coarse sand	
	12 – 20′	gravel	40% stone to 6″ Well graded sand	Sample 2
	20′+	gravel	20% stone to 3′ Fine graded sand	
TH#3	0 – 1′	top soil		
	1 – 3′	overburden		
	3 – 13′	gravel	20% stone to 3′ Fine graded sand	
	13 – 20′+	gravel	40% stone to 4″ Well graded sand	Sample 3
TH#4	(side of knoll)			
	0 – 1′	top soil		
	1 – 2′	overburden		
	2 – 10′	gravel	40% stone Well graded sand	
	10 – 16′	gravel	20% stone Fine graded sand	
	16 – 23′	gravel	40% stone Well graded sand	Sample 4
	23′+	fine sand		
TH#5	0 – 1′	top soil		
	1 – 2′	overburden		
	2 – 10′	gravel	50 – 60% stone Dirty coarse sand	Sample 5
	10 – 20′+	gravel	40 – 60% stone Well graded sand	Sample 6

TH#6	0 – 1'	top soil	
	1 – 2'	overburden	
	2 – 20'	gravel 60% stone to 24"	
		Dirty coarse sand – see sample 5	
	20'+	fine sand	
TH#7	1 – 0.5'	top soil	
	0.5 – 1'	overburden	
	1 – 16'+	gravel 30% stone to 4"	Sample 7
		Well graded sand	
TH#8	0 – 1'	top soil and overburden	
	1 – 16'	gravel 35% stone to 6"	Sample 8
		Well graded sand	
	16'+	fine graded sand	
TH#9	0 – 1'	top soil and overburden	
	1 – 20'+	- same as sample 8	

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AGGREGATE GRADATION REPORT

A001309

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

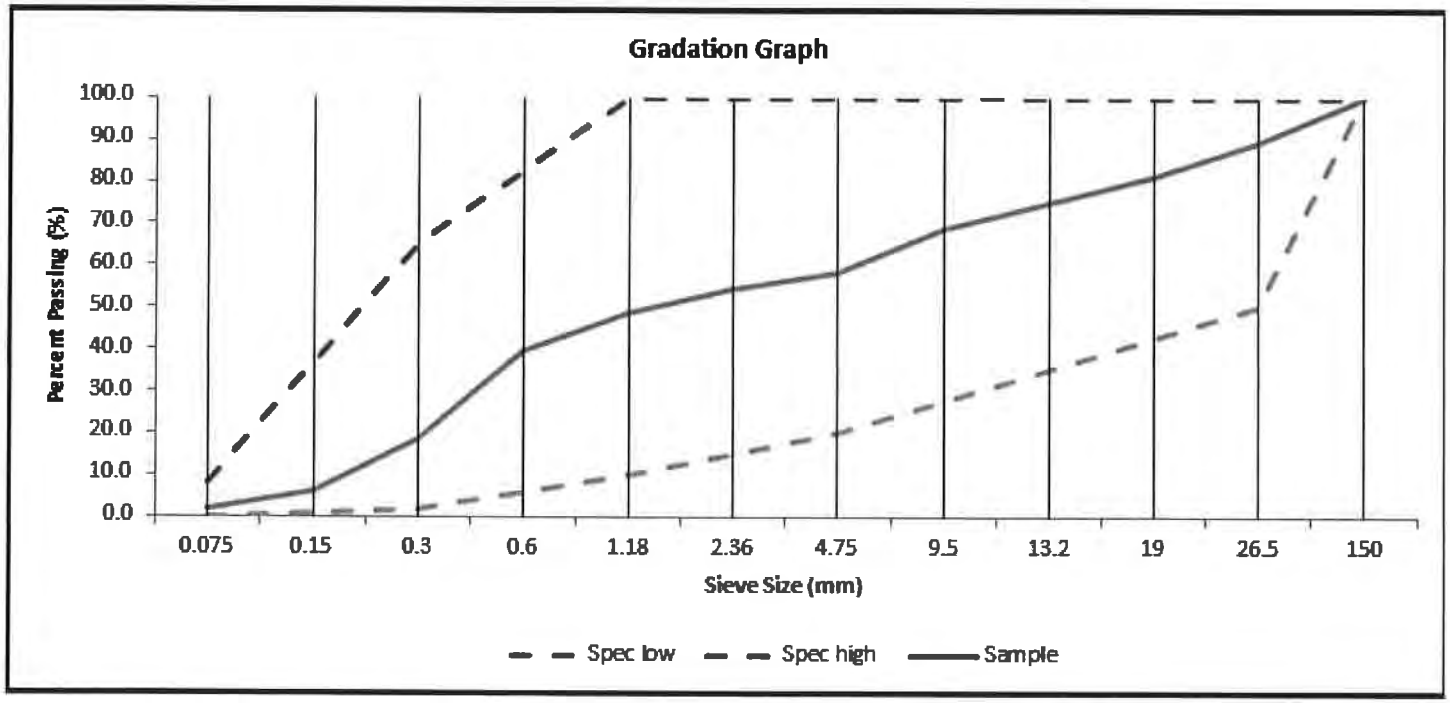
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	100%
37.5 mm	-	-
26.5 mm	50.0-100.0%	89.3%
19.0 mm	-	81.4%
16.0 mm	-	-
13.2 mm	-	74.9%
9.5 mm	-	68.7%
6.7 mm	-	-
4.75 mm	20.0-100.0%	58.3%
2.36 mm	-	54.4%
1.18 mm	10.0-100.0%	48.8%
0.600 mm	-	39.6%
0.300 mm	2.0-65.0%	18.5%
0.150 mm	-	5.9%
0.075 mm	0.0-8.0%	1.9%

NOTES: #1



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AGGREGATE GRADATION REPORT

A001310

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

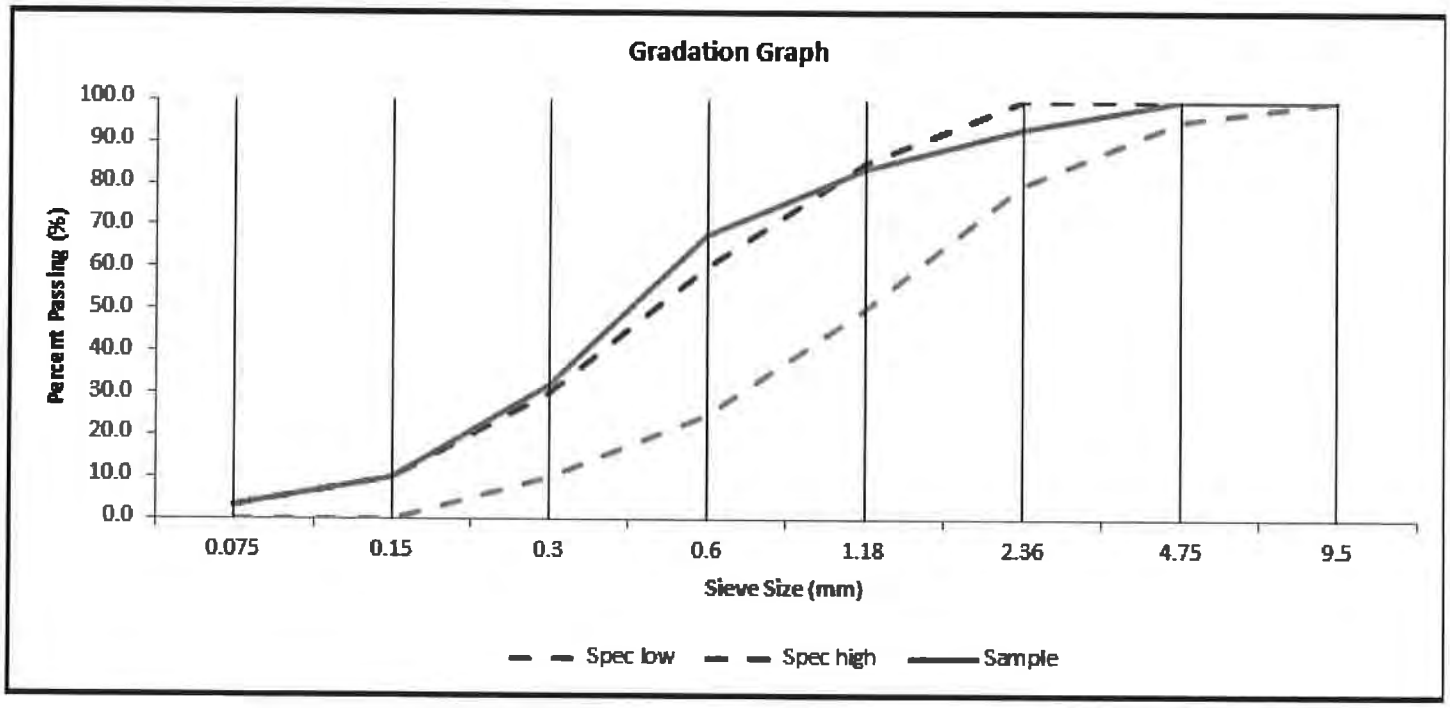
Loss by Washing 2.8

Fineness Modulus 2.13

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	93.2%
1.18 mm	50.0-85.0%	83.7%
0.600 mm	25.0-60.0%	68%
0.300 mm	10.0-30.0%	31.8%
0.150 mm	0.0-10.0%	10.1%
0.075 mm	0.0-3.0%	3.3%

NOTES: #1 stone out



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AGGREGATE GRADATION REPORT

A001311

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

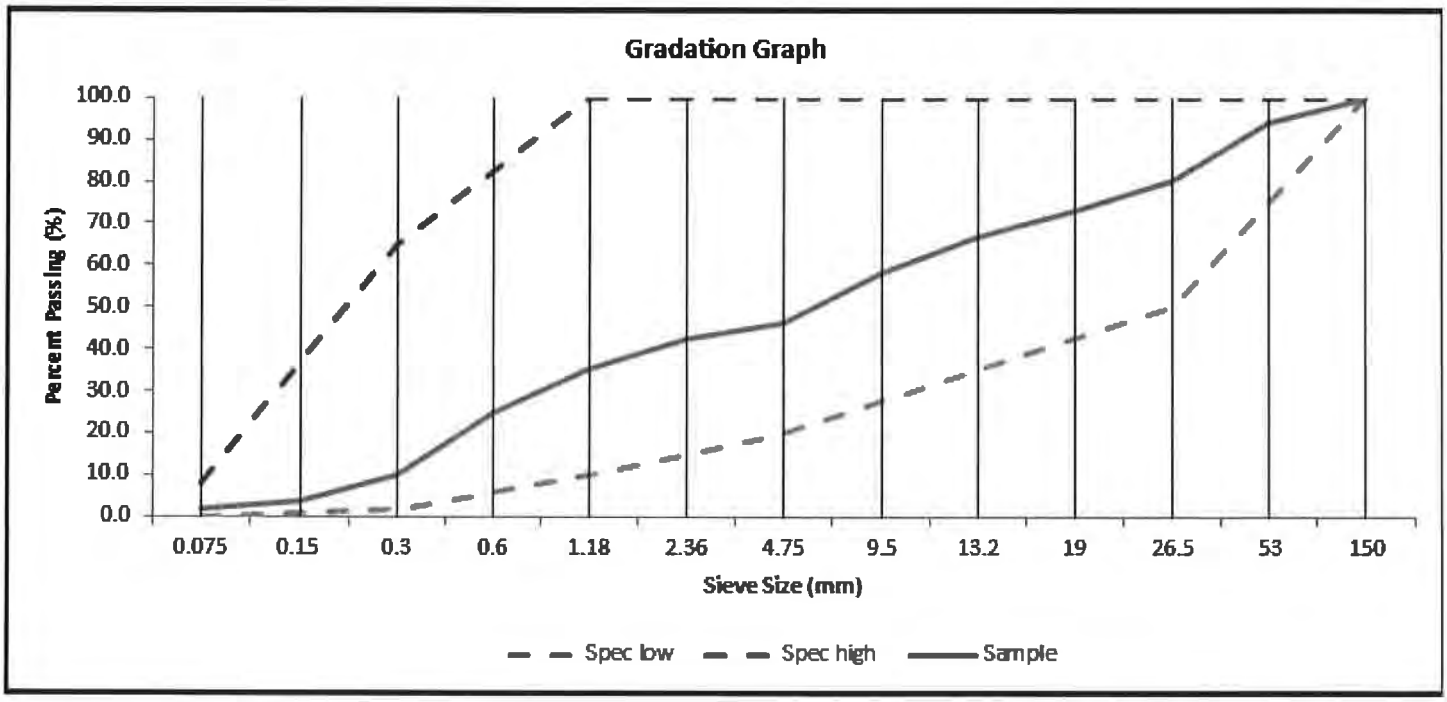
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	94.3%
37.5 mm	-	-
26.5 mm	50.0-100.0%	80.2%
19.0 mm	-	73.3%
16.0 mm	-	-
13.2 mm	-	66.7%
9.5 mm	-	58.1%
6.7 mm	-	-
4.75 mm	20.0-100.0%	46.3%
2.36 mm	-	42.5%
1.18 mm	10.0-100.0%	35.1%
0.600 mm	-	24.6%
0.300 mm	2.0-65.0%	9.9%
0.150 mm	-	3.7%
0.075 mm	0.0-8.0%	2%

NOTES: #2



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AGGREGATE GRADATION REPORT

A001312

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

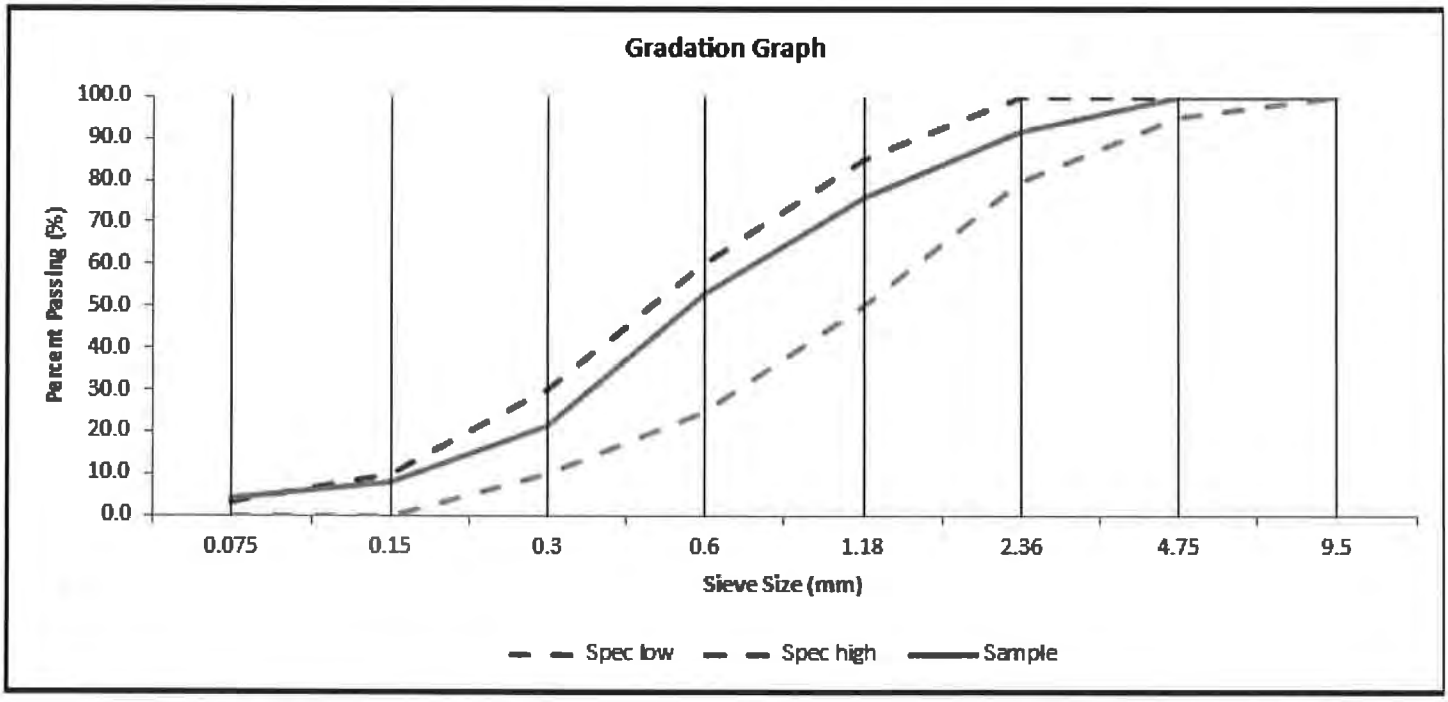
Loss by Washing 3.4

Fineness Modulus 2.5

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	91.9%
1.18 mm	50.0-85.0%	75.9%
0.600 mm	25.0-60.0%	53.2%
0.300 mm	10.0-30.0%	21.4%
0.150 mm	0.0-10.0%	7.9%
0.075 mm	0.0-3.0%	4.4%

NOTES: #2 stone out



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AGGREGATE GRADATION REPORT

A001313

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

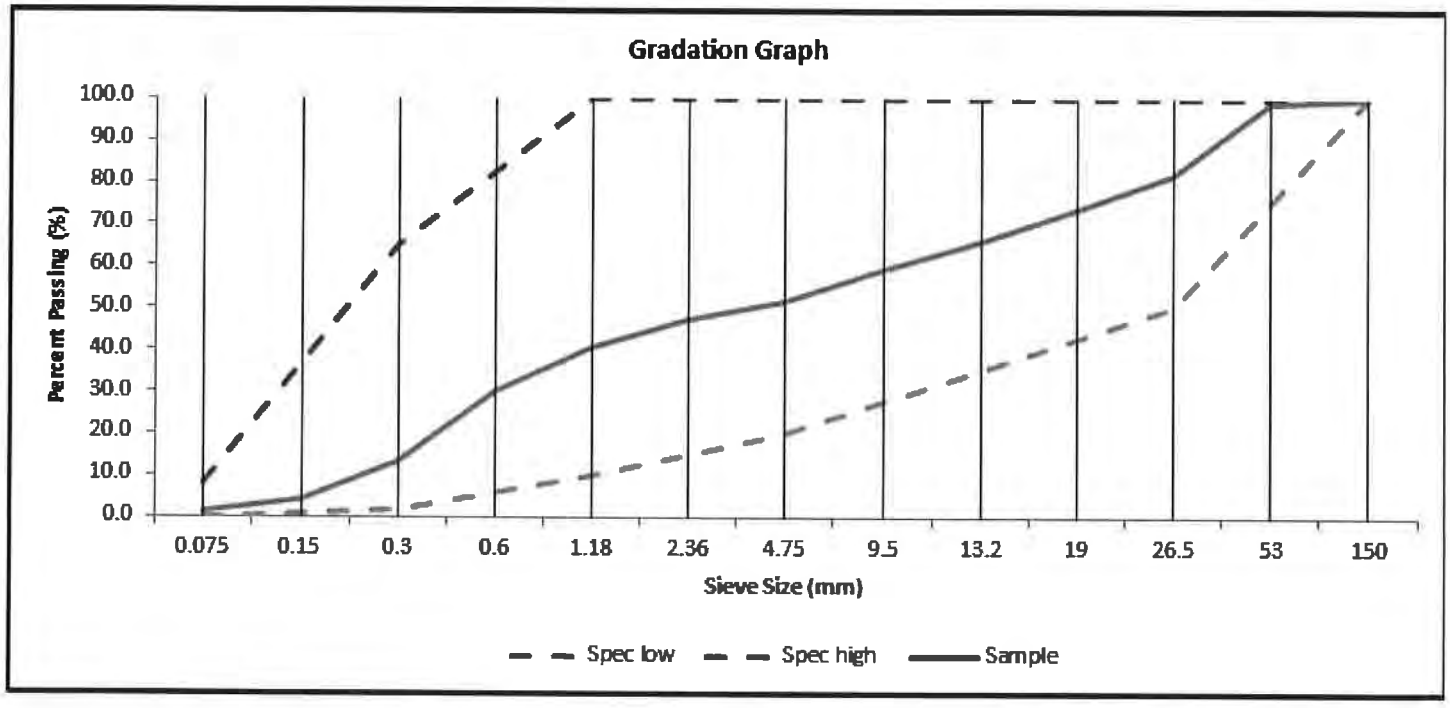
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	98.7%
37.5 mm	-	-
26.5 mm	50.0-100.0%	81.6%
19.0 mm	-	73.5%
16.0 mm	-	-
13.2 mm	-	65.8%
9.5 mm	-	59.3%
6.7 mm	-	-
4.75 mm	20.0-100.0%	51.5%
2.36 mm	-	47.3%
1.18 mm	10.0-100.0%	40.4%
0.600 mm	-	29.8%
0.300 mm	2.0-65.0%	13.4%
0.150 mm	-	4%
0.075 mm	0.0-8.0%	1.5%

NOTES: #3



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AGGREGATE GRADATION REPORT

A001314

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

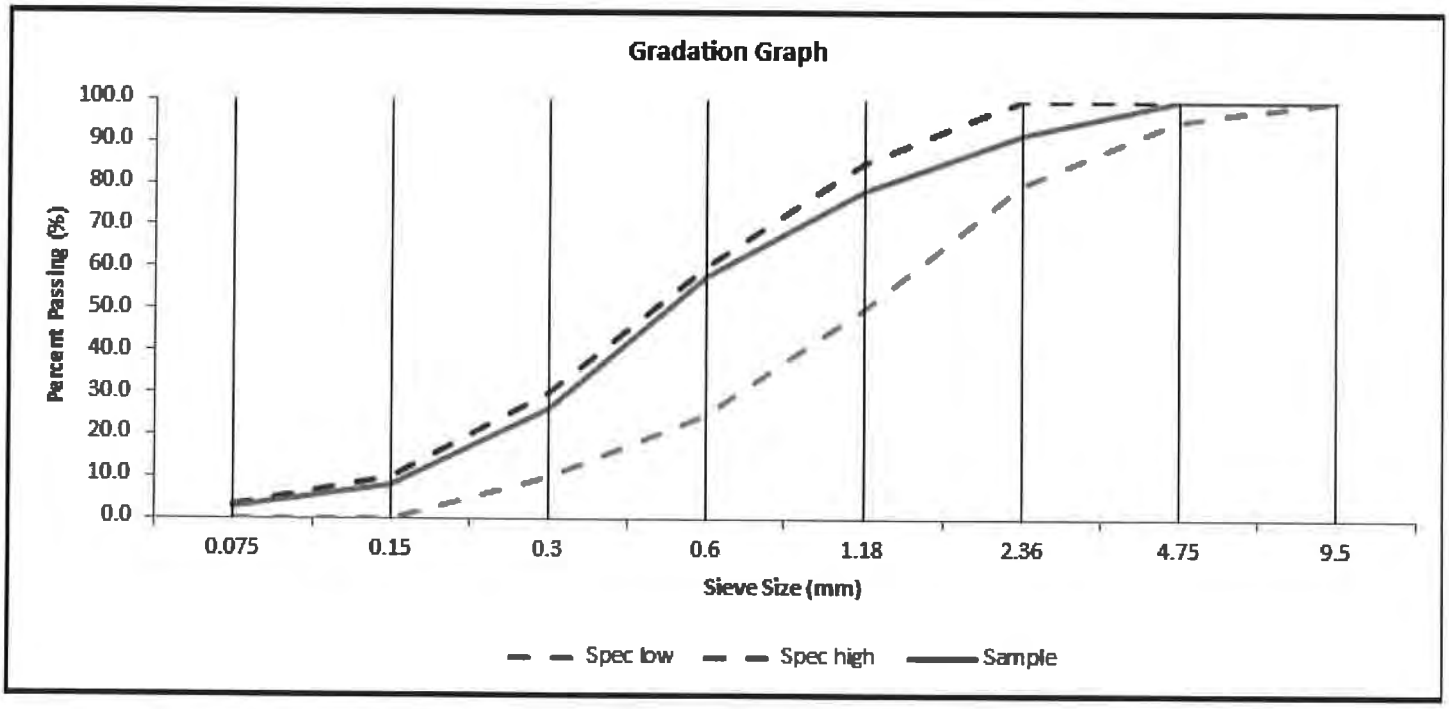
Loss by Washing 2.4

Fineness Modulus 2.38

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	91.9%
1.18 mm	50.0-85.0%	78.4%
0.600 mm	25.0-60.0%	57.9%
0.300 mm	10.0-30.0%	26%
0.150 mm	0.0-10.0%	7.8%
0.075 mm	0.0-3.0%	2.9%

NOTES: #3 stone out



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AGGREGATE GRADATION REPORT

A001315

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

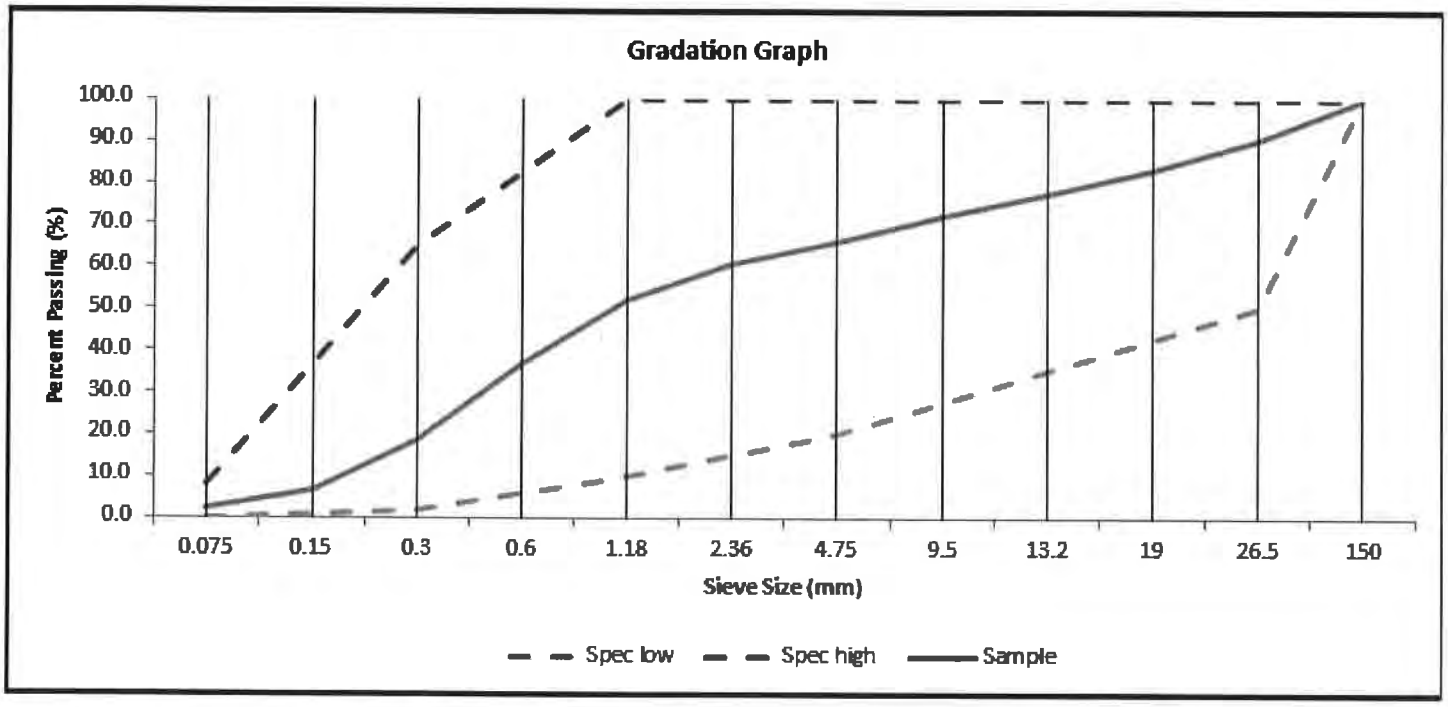
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	100%
37.5 mm	-	-
26.5 mm	50.0-100.0%	90.5%
19.0 mm	-	82.9%
16.0 mm	-	-
13.2 mm	-	77.2%
9.5 mm	-	72.2%
6.7 mm	-	-
4.75 mm	20.0-100.0%	65.8%
2.36 mm	-	60.8%
1.18 mm	10.0-100.0%	52.2%
0.600 mm	-	36.8%
0.300 mm	2.0-65.0%	18.6%
0.150 mm	-	6.8%
0.075 mm	0.0-8.0%	2.2%

NOTES: #4



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AGGREGATE GRADATION REPORT

A001316

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

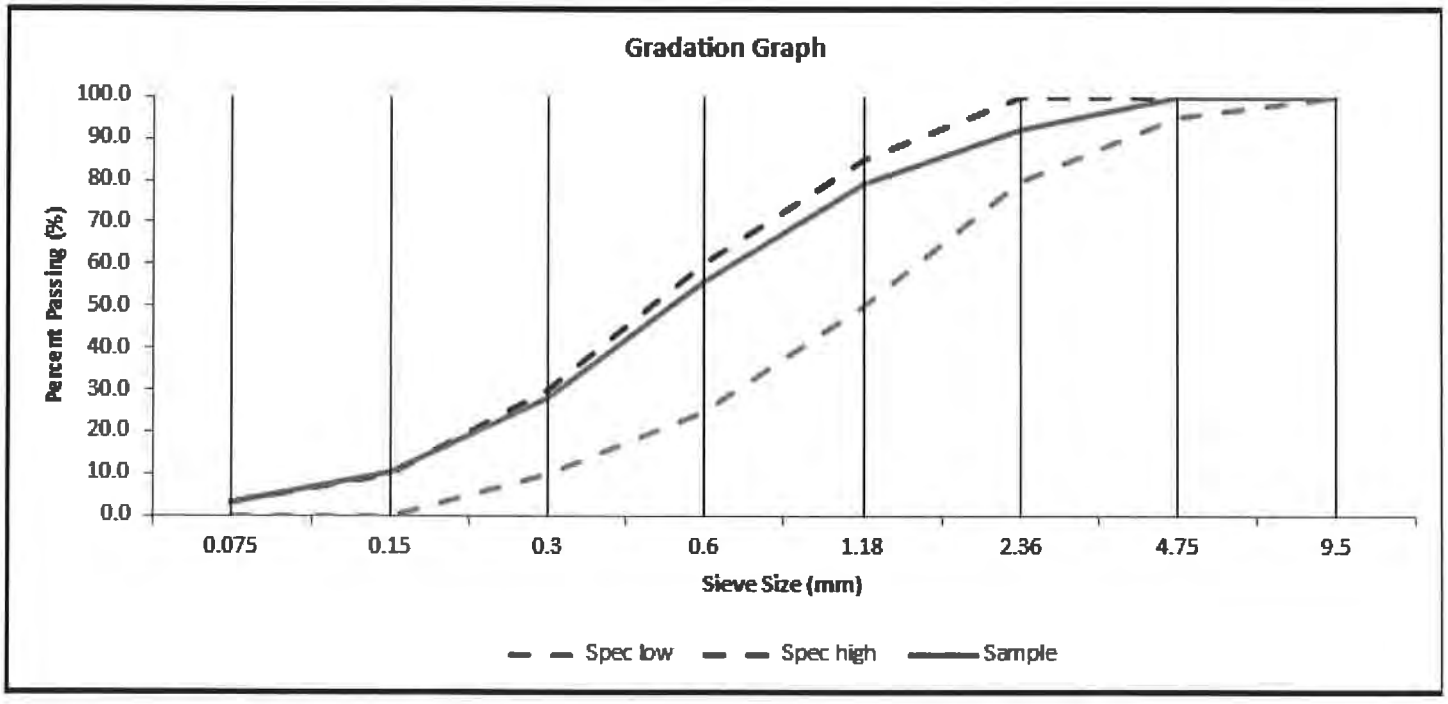
Loss by Washing 2.6

Fineness Modulus 2.34

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	92.4%
1.18 mm	50.0-85.0%	79.4%
0.600 mm	25.0-60.0%	55.9%
0.300 mm	10.0-30.0%	28.2%
0.150 mm	0.0-10.0%	10.3%
0.075 mm	0.0-3.0%	3.4%

NOTES: #4 stone out



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AGGREGATE GRADATION REPORT

A001317

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

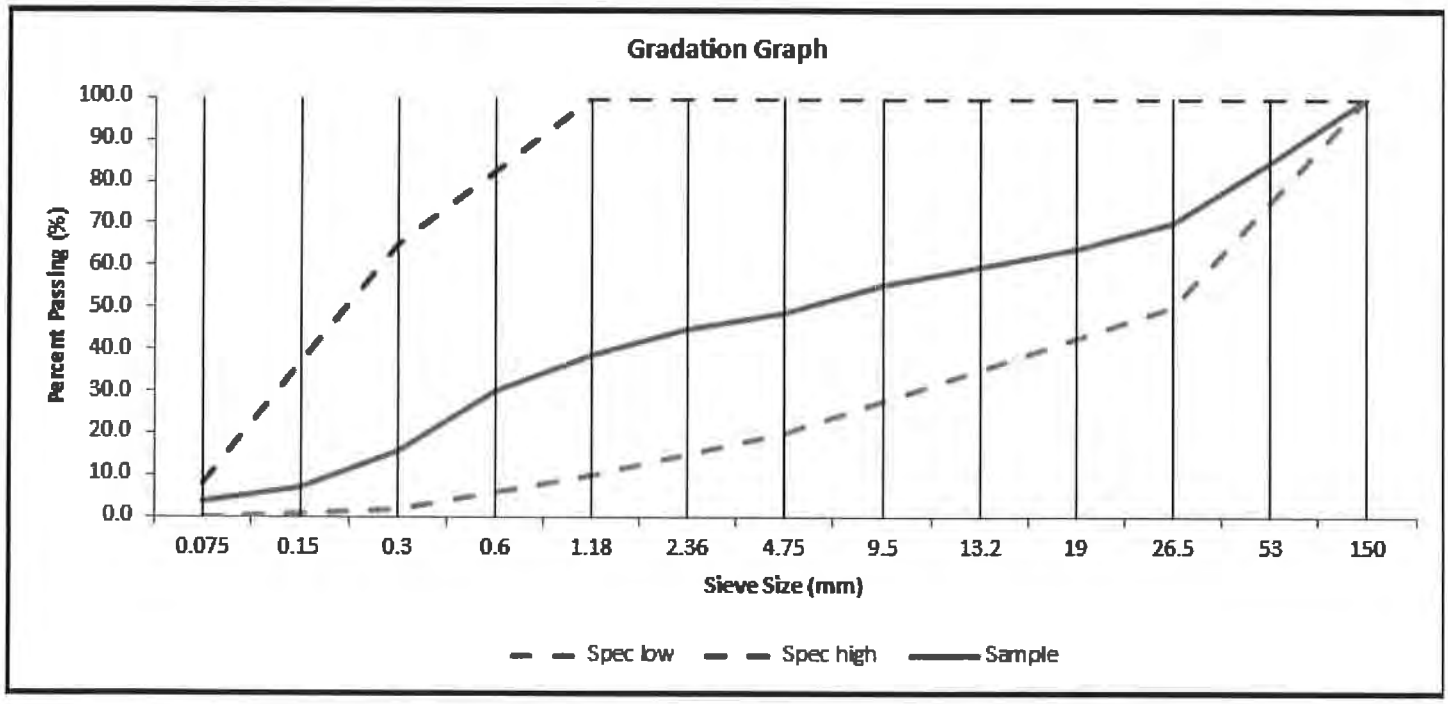
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	84.4%
37.5 mm	-	-
26.5 mm	50.0-100.0%	70.4%
19.0 mm	-	64.1%
16.0 mm	-	-
13.2 mm	-	59.9%
9.5 mm	-	55.4%
6.7 mm	-	-
4.75 mm	20.0-100.0%	48.7%
2.36 mm	-	44.7%
1.18 mm	10.0-100.0%	38.7%
0.600 mm	-	29.9%
0.300 mm	2.0-65.0%	15.8%
0.150 mm	-	7.1%
0.075 mm	0.0-8.0%	3.5%

NOTES: #5



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AGGREGATE GRADATION REPORT

A001318

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

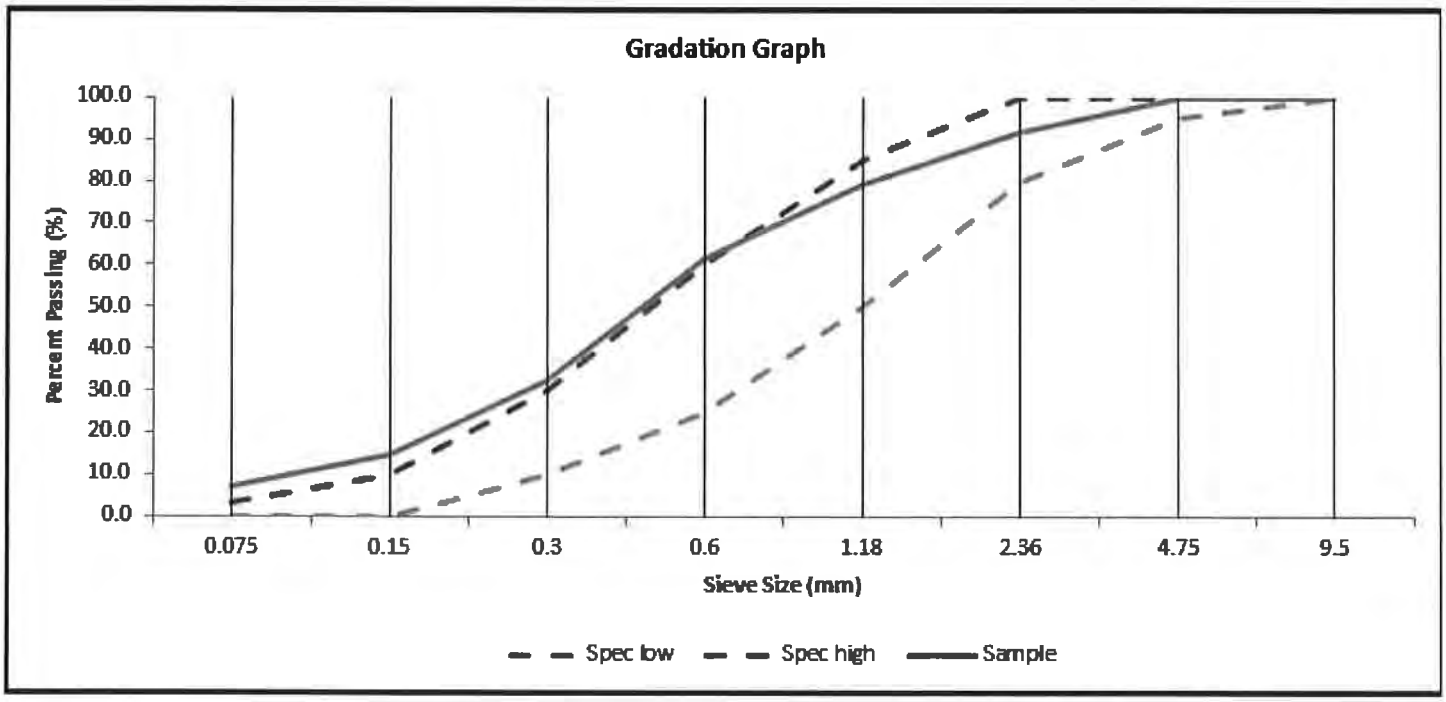
Loss by Washing 6.3

Fineness Modulus 2.2

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	91.7%
1.18 mm	50.0-85.0%	79.4%
0.600 mm	25.0-60.0%	61.5%
0.300 mm	10.0-30.0%	32.5%
0.150 mm	0.0-10.0%	14.6%
0.075 mm	0.0-3.0%	7.1%

NOTES: #5 stone out



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AGGREGATE GRADATION REPORT

A001319

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

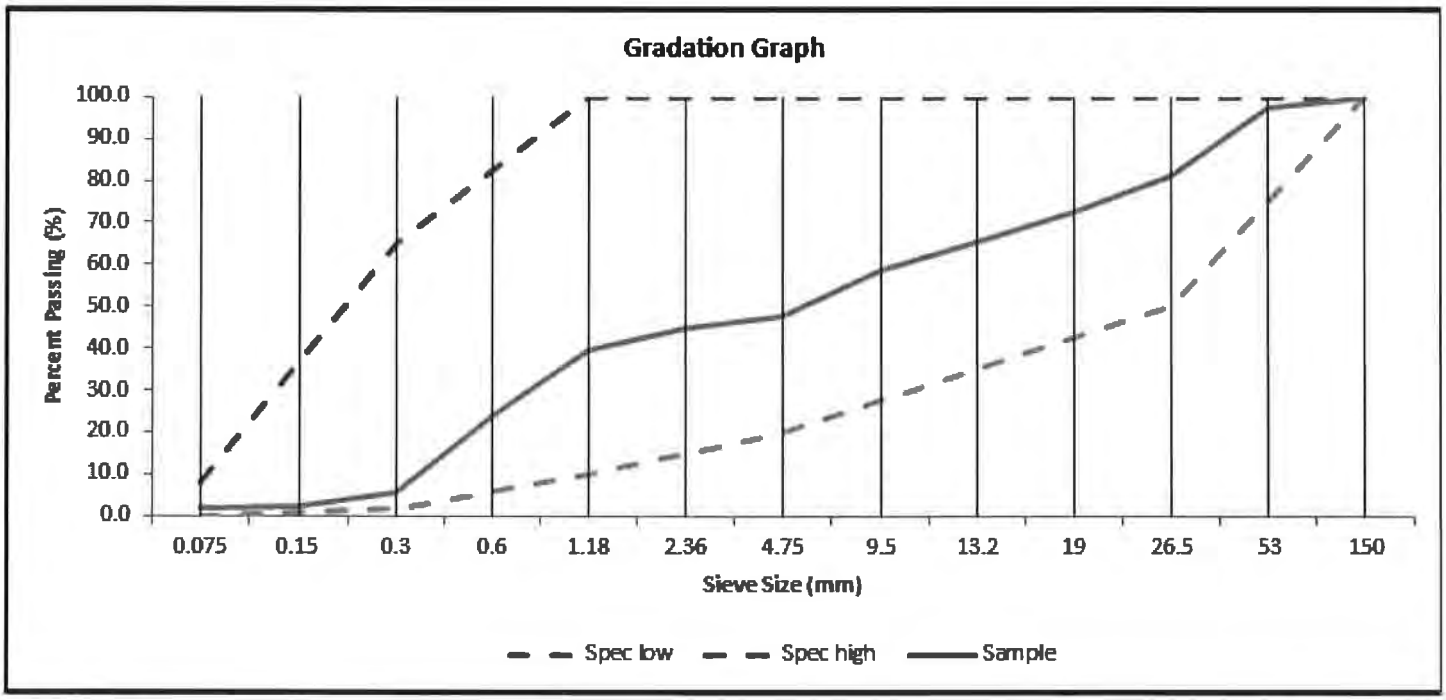
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	97.3%
37.5 mm	-	-
26.5 mm	50.0-100.0%	81.1%
19.0 mm	-	72.5%
16.0 mm	-	-
13.2 mm	-	65.6%
9.5 mm	-	58.7%
6.7 mm	-	-
4.75 mm	20.0-100.0%	47.8%
2.36 mm	-	45%
1.18 mm	10.0-100.0%	39.4%
0.600 mm	-	23.8%
0.300 mm	2.0-65.0%	5.4%
0.150 mm	-	2.3%
0.075 mm	0.0-8.0%	1.7%

NOTES: #6



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AGGREGATE GRADATION REPORT

A001320

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

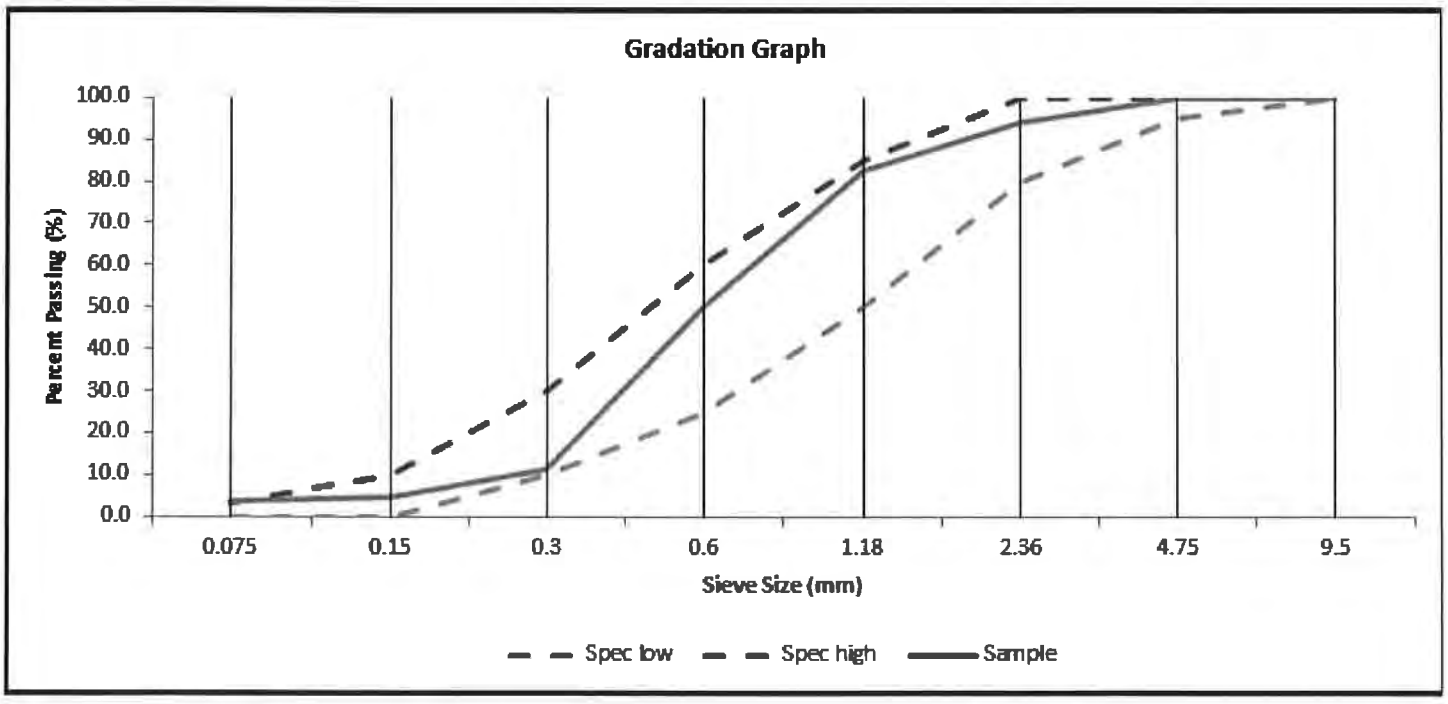
Loss by Washing 2.6

Fineness Modulus 2.57

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	94%
1.18 mm	50.0-85.0%	82.5%
0.600 mm	25.0-60.0%	49.9%
0.300 mm	10.0-30.0%	11.3%
0.150 mm	0.0-10.0%	4.9%
0.075 mm	0.0-3.0%	3.6%

NOTES: #6 stone out



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AGGREGATE GRADATION REPORT

A001321

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

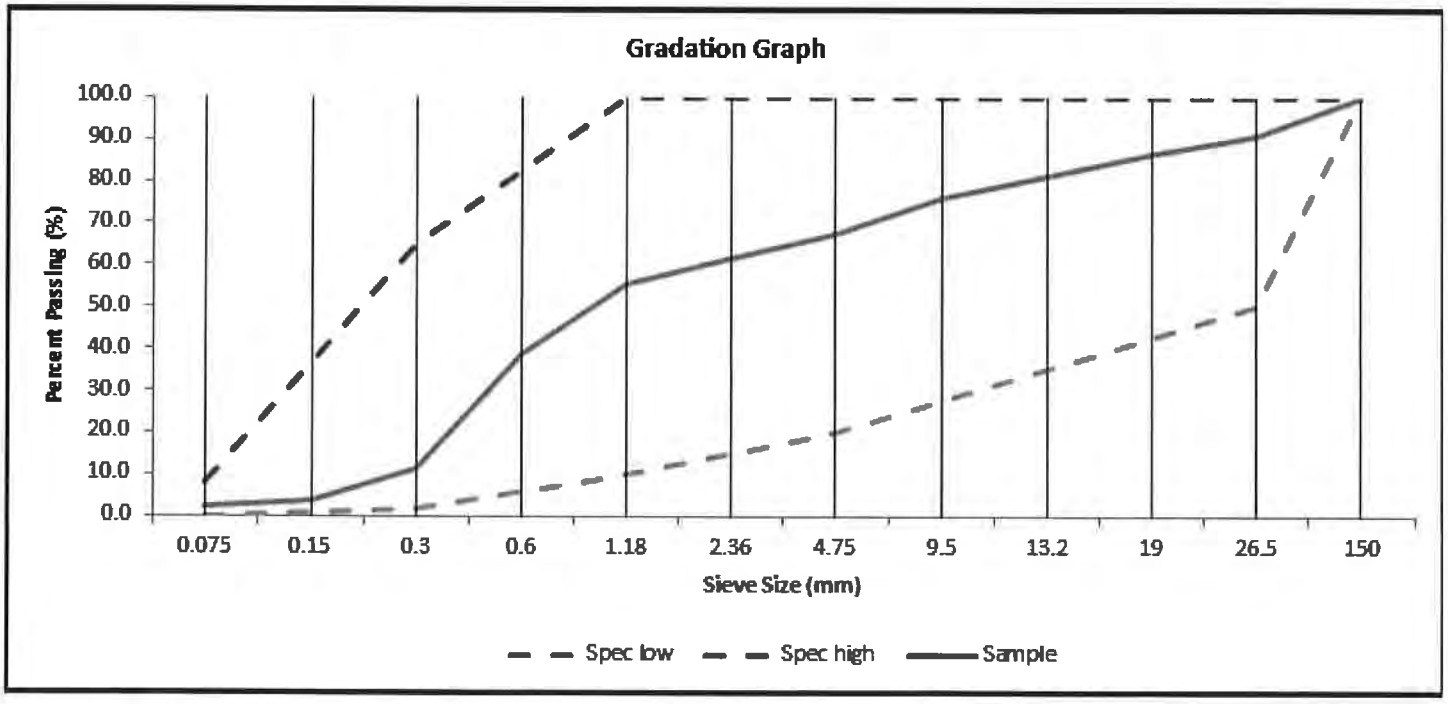
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	100%
37.5 mm	-	-
26.5 mm	50.0-100.0%	90.8%
19.0 mm	-	86.3%
16.0 mm	-	-
13.2 mm	-	81.1%
9.5 mm	-	76%
6.7 mm	-	-
4.75 mm	20.0-100.0%	67.3%
2.36 mm	-	61.7%
1.18 mm	10.0-100.0%	55.6%
0.600 mm	-	38.4%
0.300 mm	2.0-65.0%	11.3%
0.150 mm	-	3.6%
0.075 mm	0.0-8.0%	2.3%

NOTES: #7



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AGGREGATE GRADATION REPORT

A001322

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

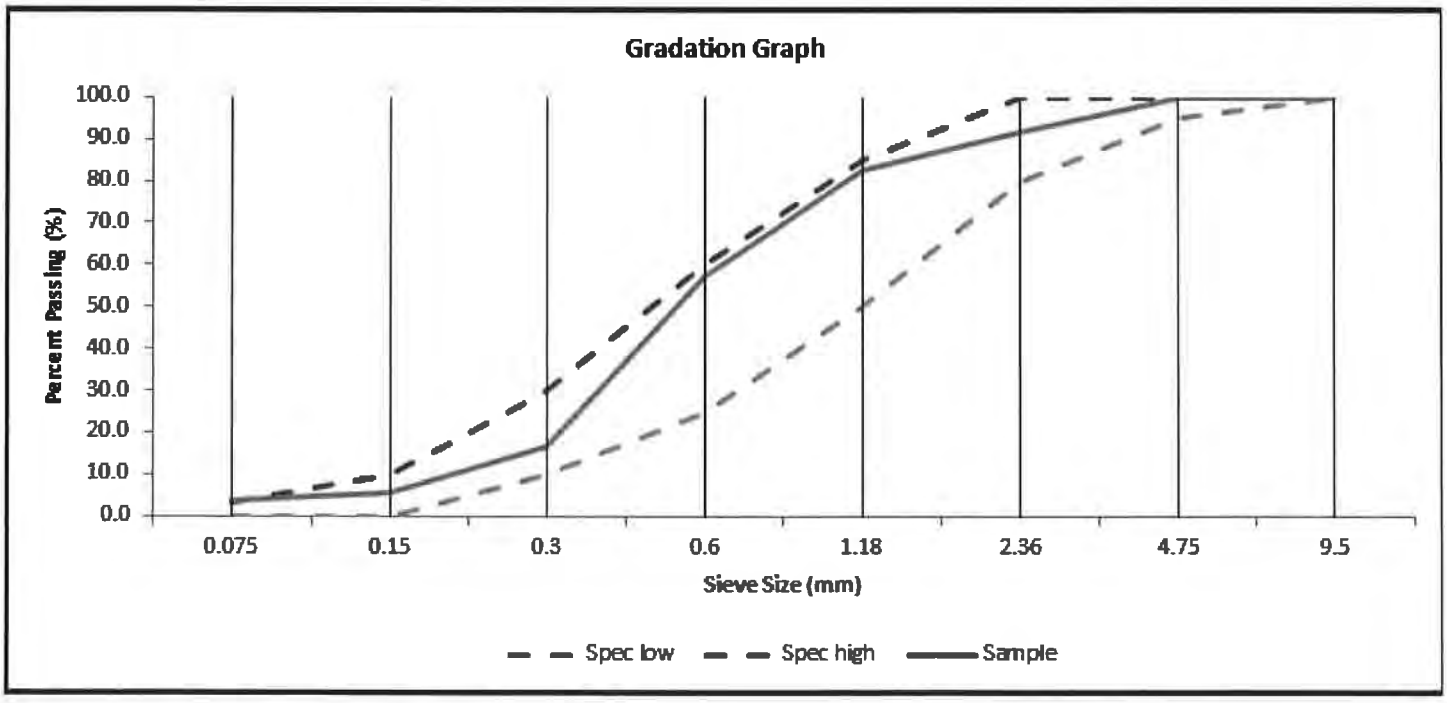
Loss by Washing 2.8

Fineness Modulus 2.46

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	91.7%
1.18 mm	50.0-85.0%	82.6%
0.600 mm	25.0-60.0%	57.1%
0.300 mm	10.0-30.0%	16.8%
0.150 mm	0.0-10.0%	5.4%
0.075 mm	0.0-3.0%	3.5%

NOTES: #7 stone out



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AGGREGATE GRADATION REPORT

A001323

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

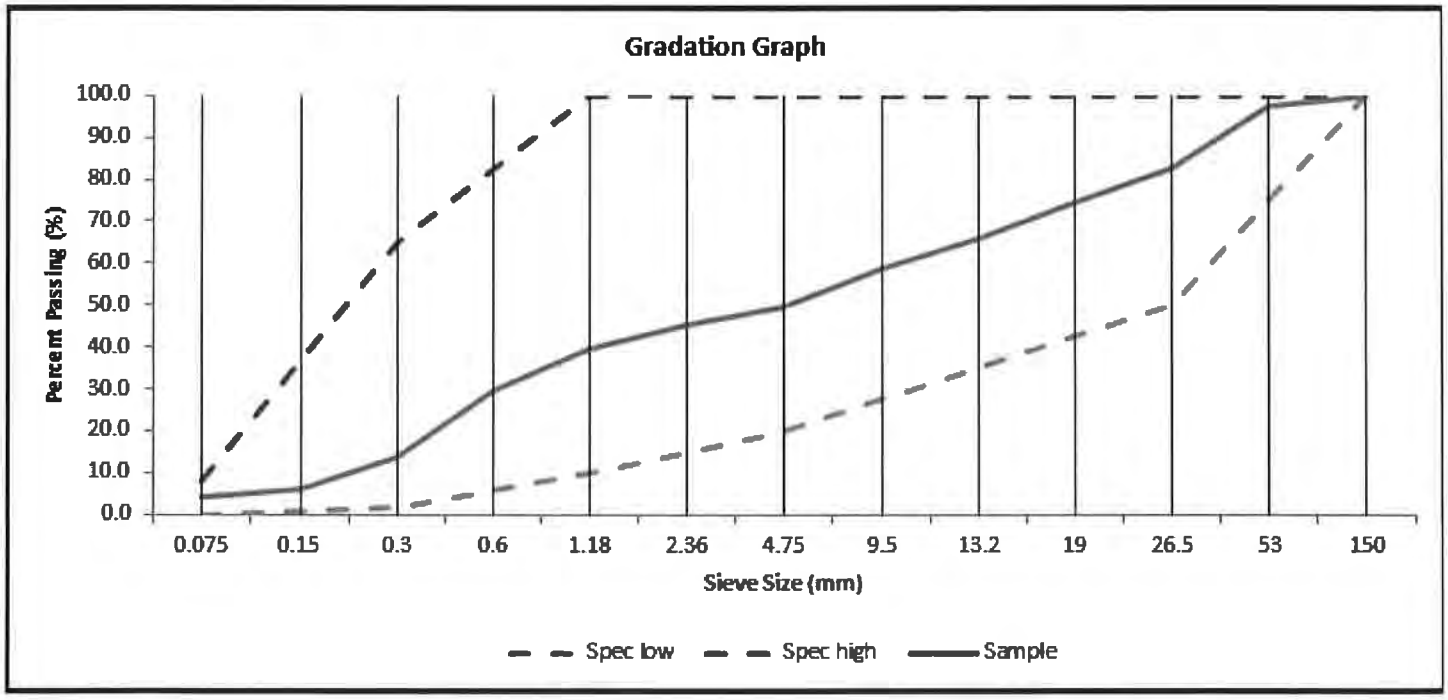
Material: MISC AGGREGATE PRODUCT

Specification Name: Granular "B" Type I OPSS 1010

Gradation Table

Sieve Size	Spec	Sample
150 mm	100.0-100.0%	100%
75 mm	-	-
53 mm	-	97.5%
37.5 mm	-	-
26.5 mm	50.0-100.0%	82.8%
19.0 mm	-	74.3%
16.0 mm	-	-
13.2 mm	-	65.9%
9.5 mm	-	58.8%
6.7 mm	-	-
4.75 mm	20.0-100.0%	49.6%
2.36 mm	-	45.3%
1.18 mm	10.0-100.0%	39.4%
0.600 mm	-	29.6%
0.300 mm	2.0-65.0%	13.9%
0.150 mm	-	6.2%
0.075 mm	0.0-8.0%	4%

NOTES: #8



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AGGREGATE GRADATION REPORT

A001324

Project Details

Project Name: 2014 Misc. Testing

Sample Details

Date Sampled: 11/09/14 12:00:00 PM

Material: MISC AGGREGATE PRODUCT

Specification Name: Concrete Sand OPSS 1002

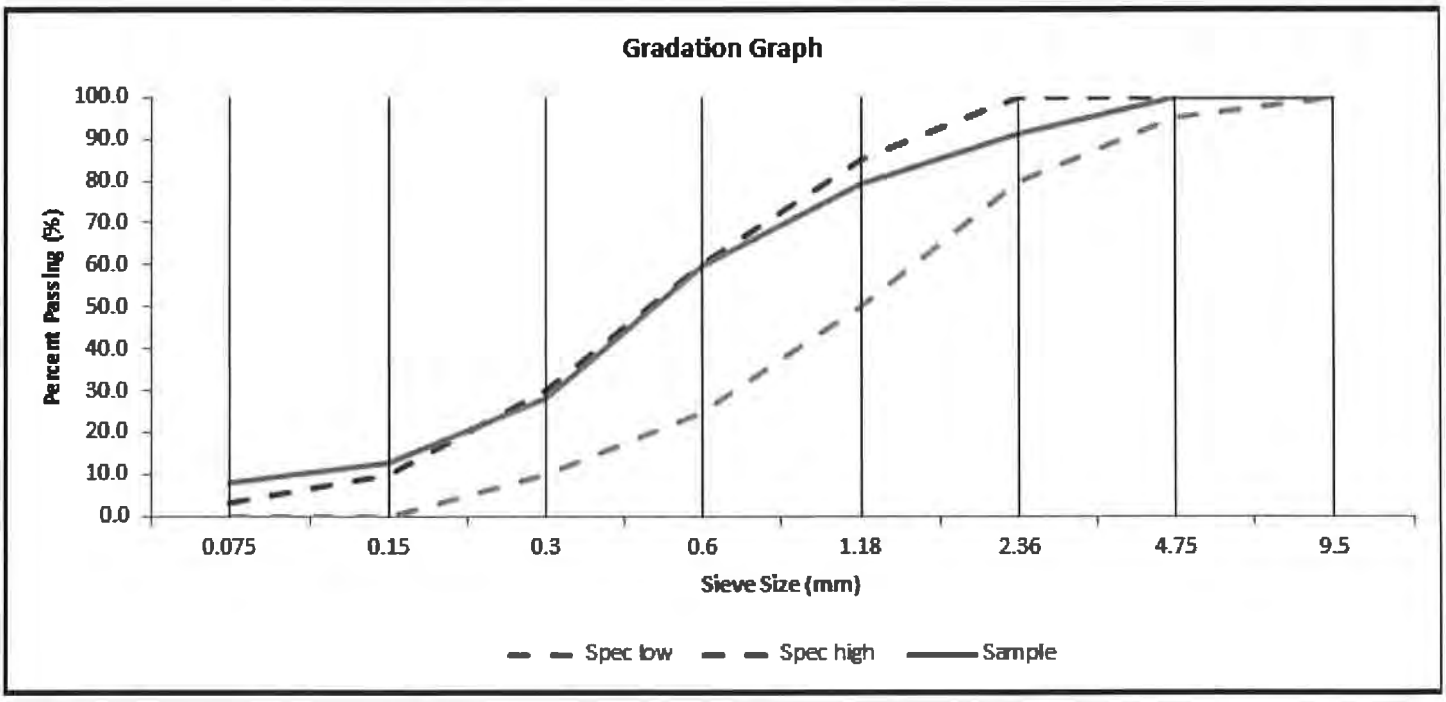
Loss by Washing 6.9

Fineness Modulus 2.29

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	-	-
4.75 mm	95.0-100.0%	100%
2.36 mm	80.0-100.0%	91.4%
1.18 mm	50.0-85.0%	79.5%
0.600 mm	25.0-60.0%	59.6%
0.300 mm	10.0-30.0%	27.9%
0.150 mm	0.0-10.0%	12.6%
0.075 mm	0.0-3.0%	8%

NOTES: #8 stone out



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GEOLOGICAL INVESTIGATIONS

D'Orofino Property

Test Holes Aug. 20, 2013

D'Orofrio Farm
E1/2 Lot 31 Conc. 4 EHS
Town of Mono

TH#1	0 – 2'	top soil		
	2 - 5'	overburden		
	5 – 20'+	gravel	20% stone	
			fine graded sand	
TH#2	0 – 1'	top soil		
	1 – 2'	overburden		
	3 – 12'	gravel	50% stone to 12"	
			coarse sand	
	12'+	silt		
TH#3	0 – 1'	top soil		
	1 – 2'	overburden		
	2 – 20'+	gravel	40% stone to 12"	Sample 1
			Well graded sand	
TH#4	(top of ridge)			
	0 – 1'	top soil		
	1 – 2'	overburden		
	2 – 18'	gravel	10% stone	Sample 2
			Well graded sand	
			Vains of coarse sand	
TH#5	0 – 1'	top soil		
	1 – 3'	overburden		
	3 - 15'	gravel	40% stone	
			Well graged sand	
	15'+	gravel	10% stone	
			Well graded sand	
TH#6	(top of ridge)			
	0 – 1'	top soil		
	1 – 2'	overburden		
	2 – 20'+	gravel	30 - 40% stone to 10"	
			Well graded sand	
TH#7	(beside Wake farm)			
	0 – 1'	top soil		
	1 - 2'	overburden		
	1 – 18'+	gravel	60% stone to 12"	
			Well graded sand	

TH#8	0 – 1′	top soil	
	1 – 2′	overburden	
	3 - 15′	gravel 40% stone to 6″	Sample 8
		Well graded sand	
	15′+	well graded sand	
TH#9	0 – 1′	top soil	
	1 – 2′	overburden	
	2 – 16′+	gravel 50% stone	
		Well graded sand	
	16′+	well graded sand	
TH#10	(bottom of bowl)		
	0 – 3′	top soil	
	3 – 8′	overburden	
	8 – 20′+	gravel 30% stone	Sample 3
		Well graded sand	
TH#11	0 – 1′	top soil and overburden	
	2 – 20′+	gravel 20% stone	
		Well graded sand	
TH#12	(top of knoll)		
	0 – 4′	overburden	
	4 – 20′+	gravel 10% stone	
		Fine graded sand	
TH#13	(flats)		
	0 – 1′	top soil	
	1 – 4′	overburden	
	4 – 10′	gravel 10% stone	
		Fine sand	
	10′+	gravel 60% stone	
		Well graded sand	
TH#14	(flats before knoll)		
	0 – 1′	top soil	
	1 – 2′	overburden	
	2 – 12′	gravel 50% stone	
		Well graded sand	
	12′+	fine sand	Sample 4 @ 16′
TH#15	0 – 1′	top soil	
	1 – 2′	overburden	
	2 – 8′	gravel 10% stone	
		Well graded sand	
	8′+	fine sand	

TH#16	0 – 1'	top soil		
	1 – 2'	overburden		
	2 – 15'	gravel	50% stone Well graded sand	
	15'+	well graded sand – same as sample 4		
TH#17	0 – 1'	top soil		
	1 – 18'	gravel	40% stone to 4" Fine graded sand	Sample 5 @ 12'
	18'+	well graded sand		
TH#18	0 – 18'+	silty sand, trace clay		
TH#19	0 – 15'	silty sand	large stone @ 10'	
TH#20	0 – 20'+	silty sand	trace clay	

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AGGREGATE GRADATION REPORT

A000498

Project Details

Project Name: Kinsley Pit Process Control

Sample Details

Date Sampled: 08/22/13 8:00:00 AM

Material: WINTER SAND

Specification Name: Winter Sand OPSS 1004

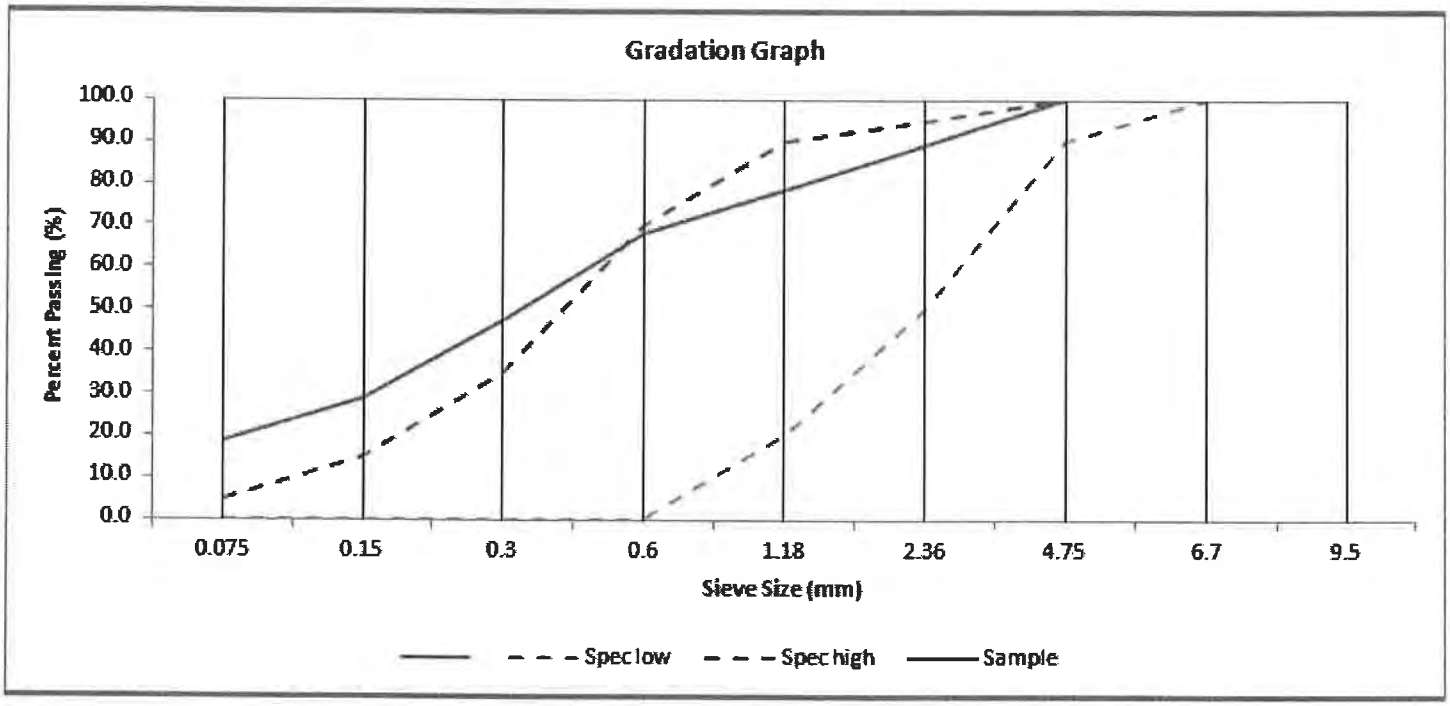
Loss by Washing 17.6

Fineness Modulus 1.88

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	100.0-100.0%	100%
4.75 mm	90.0-100.0%	100%
2.36 mm	50.0-95.0%	89%
1.18 mm	20.0-90.0%	78.6%
0.600 mm	0.0-70.0%	68%
0.300 mm	0.0-35.0%	47.6%
0.150 mm	0.0-15.0%	28.7%
0.075 mm	0.0-5.0%	18.9%

NOTES: sam's sample #1, stone screened out in lab over 4.75, sampled was 57% stone



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AGGREGATE GRADATION REPORT

A000499

Project Details

Project Name: Kinsley Pit Process Control

Sample Details

Date Sampled: 08/22/13 8:00:00 AM

Material: WINTER SAND

Specification Name: Winter Sand OPSS 1004

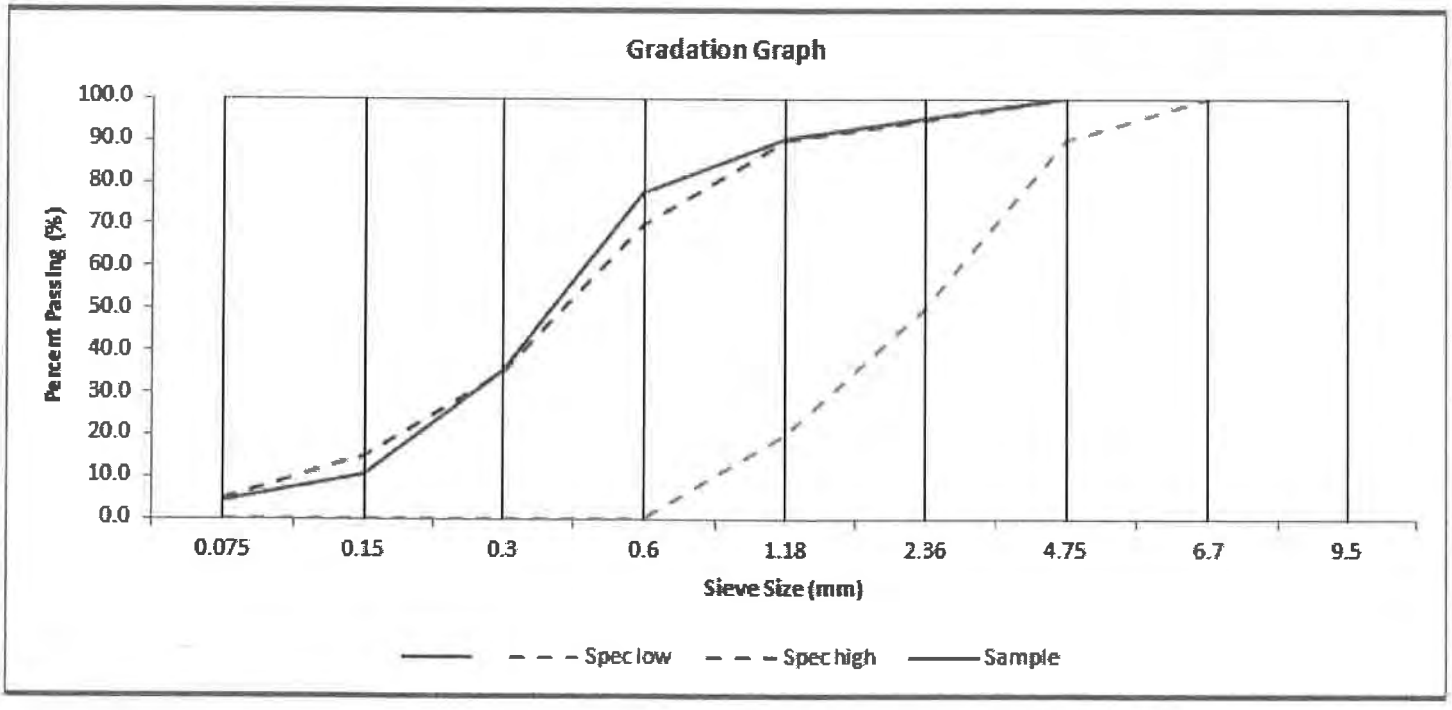
Loss by Washing 3.1

Fineness Modulus 1.9

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	100.0-100.0%	100%
4.75 mm	90.0-100.0%	100%
2.36 mm	50.0-95.0%	95.5%
1.18 mm	20.0-90.0%	90.7%
0.600 mm	0.0-70.0%	77.4%
0.300 mm	0.0-35.0%	35.6%
0.150 mm	0.0-15.0%	10.7%
0.075 mm	0.0-5.0%	4.4%

NOTES: sam's sample #2, stone screened out in lab over 4.75, sample was 17% stone



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AGGREGATE GRADATION REPORT

A000500

Project Details

Project Name: Kinsley Pit Process Control

Sample Details

Date Sampled: 08/22/13 8:00:00 AM

Material: WINTER SAND

Specification Name: Winter Sand OPSS 1004

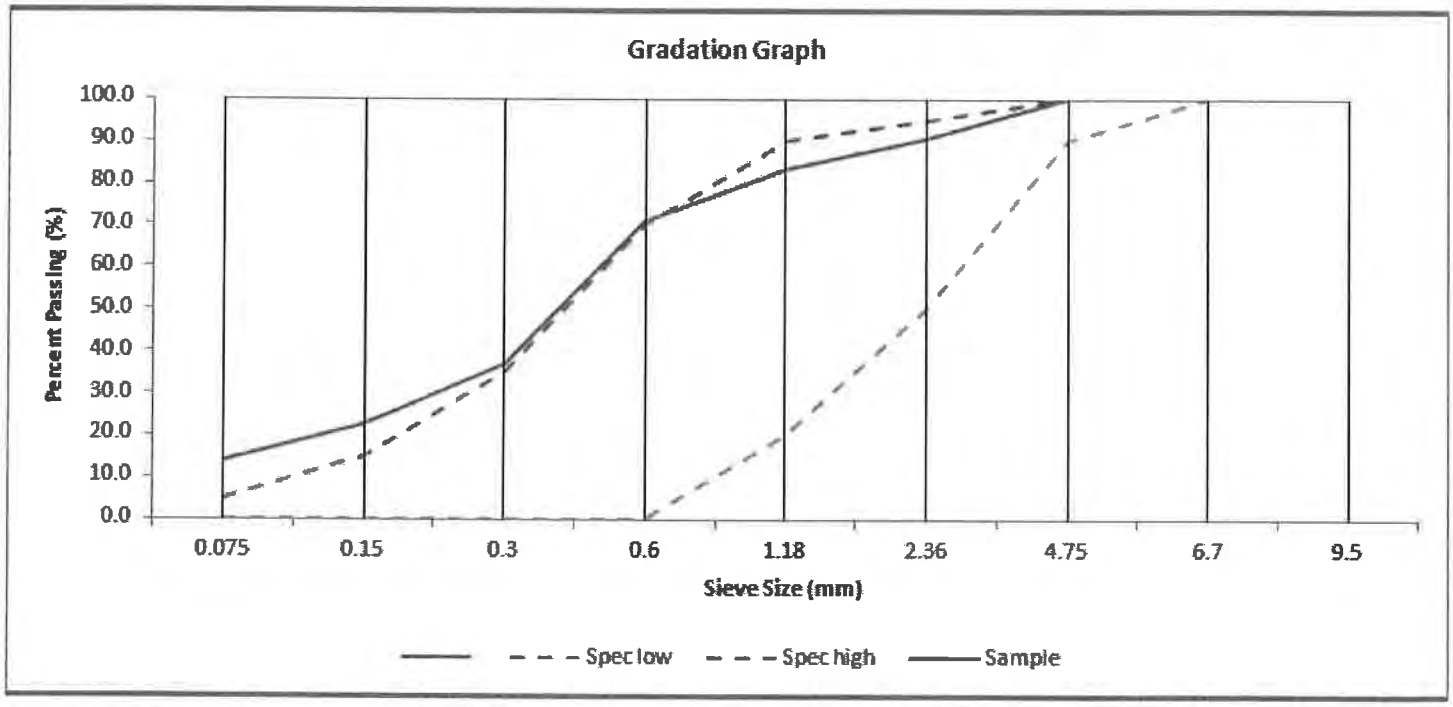
Loss by Washing 13.1

Fineness Modulus 1.95

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	100.0-100.0%	100%
4.75 mm	90.0-100.0%	100%
2.36 mm	50.0-95.0%	90.7%
1.18 mm	20.0-90.0%	83.4%
0.600 mm	0.0-70.0%	70.8%
0.300 mm	0.0-35.0%	37%
0.150 mm	0.0-15.0%	22.8%
0.075 mm	0.0-5.0%	13.8%

NOTES: sam's sample #3, stone screened out in lab over 4.75, sample was 35% stone



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AGGREGATE GRADATION REPORT

A000501

Project Details

Project Name: Kinsley Pit Process Control

Sample Details

Date Sampled: 08/22/13 8:00:00 AM

Material: WINTER SAND

Specification Name: Winter Sand OPSS 1004

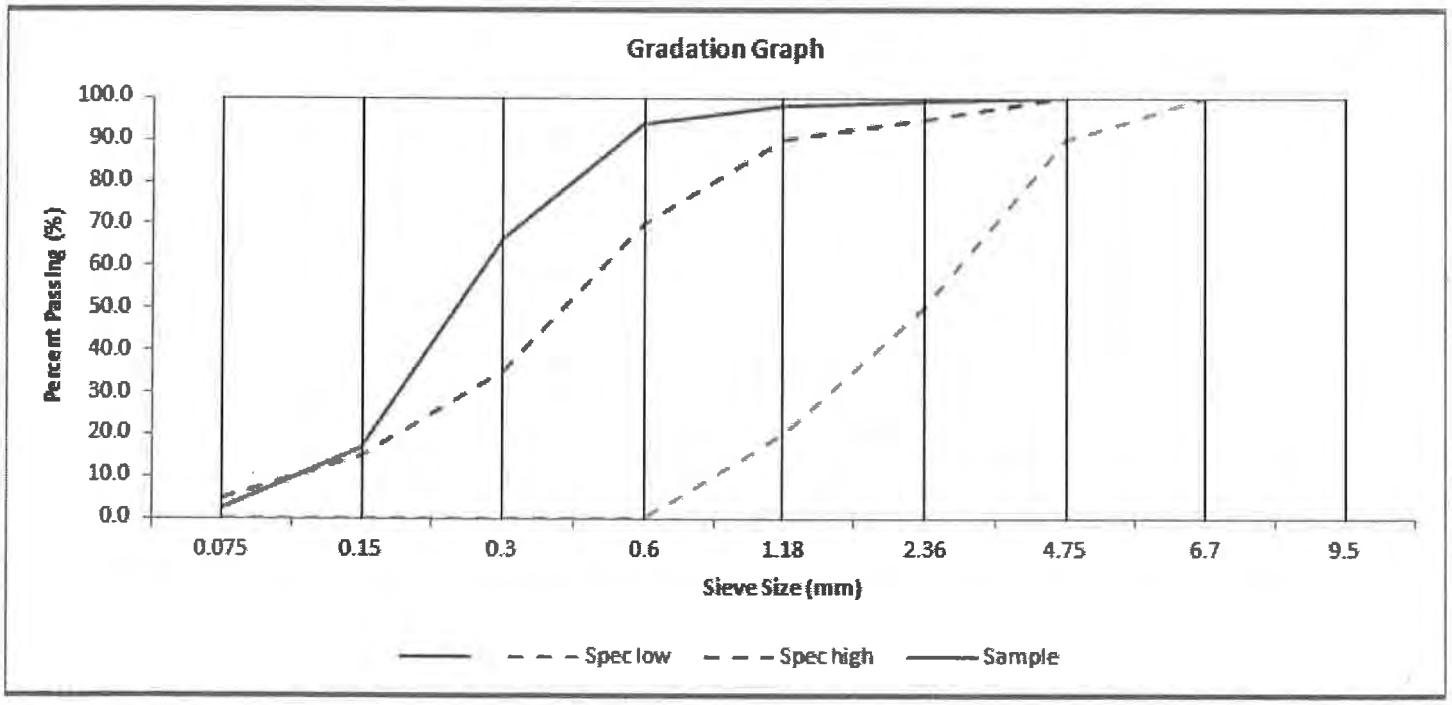
Loss by Washing 0.9

Fineness Modulus 1.25

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	100.0-100.0%	100%
4.75 mm	90.0-100.0%	100%
2.36 mm	50.0-95.0%	99.3%
1.18 mm	20.0-90.0%	98%
0.600 mm	0.0-70.0%	94.1%
0.300 mm	0.0-35.0%	66.8%
0.150 mm	0.0-15.0%	16.7%
0.075 mm	0.0-5.0%	2.3%

NOTES: sam's sample #4, stone screened out in lab over 4.75, sample was 1% stone



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AGGREGATE GRADATION REPORT

A000502

Project Details

Project Name: Kinsley Pit Process Control

Sample Details

Date Sampled: 08/22/13 8:00:00 AM

Material: WINTER SAND

Specification Name: Winter Sand OPSS 1004

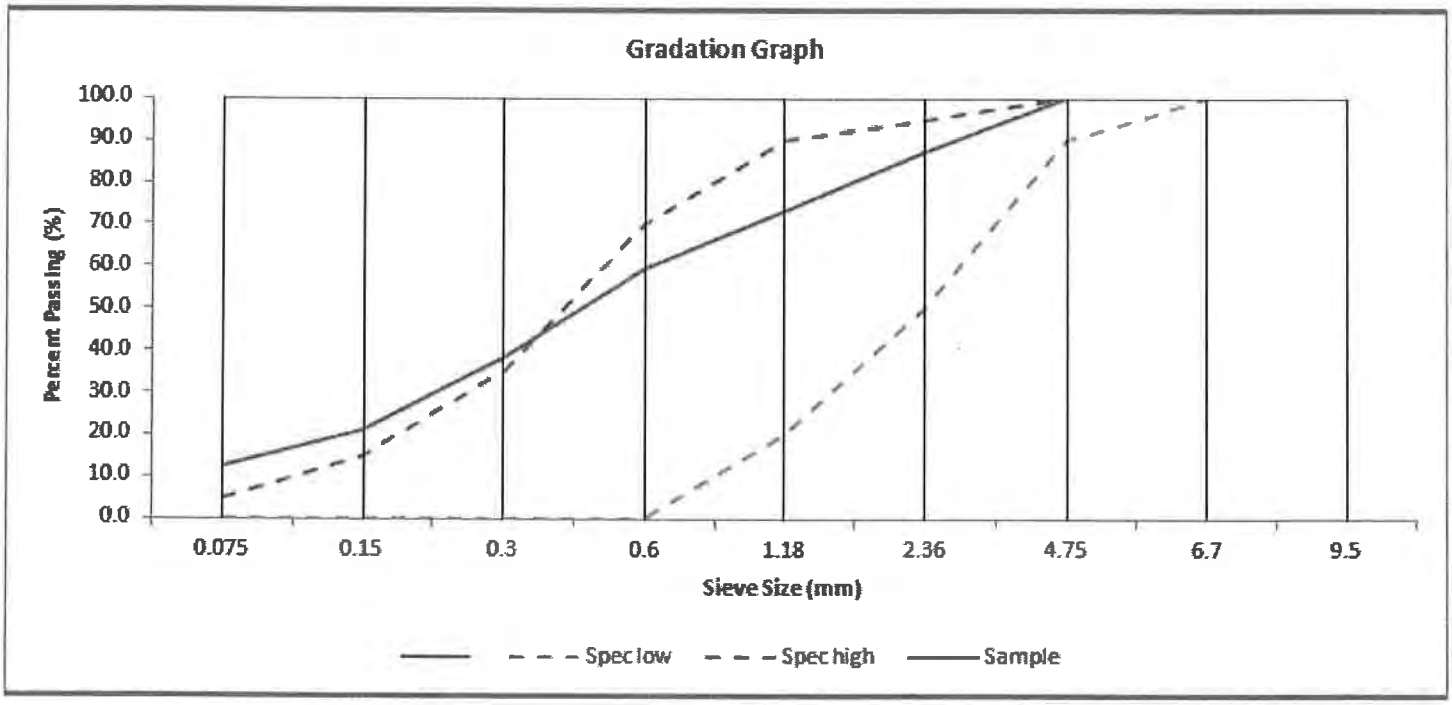
Loss by Washing 11

Fineness Modulus 2.21

Gradation Table

Sieve Size	Spec	Sample
150 mm	-	-
75 mm	-	-
53 mm	-	-
37.5 mm	-	-
26.5 mm	-	-
19.0 mm	-	-
16.0 mm	-	-
13.2 mm	-	-
9.5 mm	100.0-100.0%	100%
6.7 mm	100.0-100.0%	100%
4.75 mm	90.0-100.0%	100%
2.36 mm	50.0-95.0%	87.1%
1.18 mm	20.0-90.0%	73.5%
0.600 mm	0.0-70.0%	59.4%
0.300 mm	0.0-35.0%	38.2%
0.150 mm	0.0-15.0%	21%
0.075 mm	0.0-5.0%	12.5%

NOTES: sam's sample #5, stone screened out in lab over 4.75, sample was 38% stone



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GEOLOGICAL INVESTIGATIONS

Pendleton Property

Test Holes October 16, 2001

Pendleton Farm
E1/2 Lot 32 Conc. 4 EHS
Town of Mono

TH#1	0 – 0.5'	top soil		
	0.5 – 17'+	silty sand	no stone	Sample 1
TH#2	0 – 1'	top soil		
	1 – 17'+	silty sand	20% stone	
TH#3	0 – 1'	top soil		
	1 – 17'+	silty sand	5% stone	
TH#4	0 – 1'	top soil		
	1 – 7'	gravel	30% stone to 3" Well graded sand	
	7 – 16'	gravel	25% stone Fine sand	Sample 2
TH#5	0 – 1'	top soil		
	1 – 15'	gravel	25% stone Fine sand	
	15'+	gravel	40% stone Well graded sand	
TH#6	0 – 1'	top soil		
	1 – 16'	gravel	30 - 40% stone Well graded sand	Sample 3
	16'+	fine sand		
TH#7	0 – 1'	top soil		
	1 –12'	gravel	silty sand	
	12'+	fine sand		
TH#8	0 – 1'	top soil		
	2 – 16'+	silty sand		
TH#9	0 – 0.5'	top soil		
	0.5 - 4'	overburden		
	4 - 16'+	gravel	30% stone fine graded sand	Sample 4
TH#10	0 – 1'	top soil and overburden		
	2 – 16'+	silty fine sand		

Greenwood Construction Co. Ltd.

LABORATORY TEST RESULTS

Pit Name ..... Sample No. .....

Location ..... Date OCT 16/01

Sampled From SAMPLE #1 Customer SAM

Intended Use ..... Tested By REBECKA

PERCENT COARSE AND FINE AGGREGATE		Unit Weight	Loose	lb./cu. ft.
Wt. Total Sample (Dry)			Compacted	lb./cu. ft.
Wt. Sample Ret'd #4 (Dry)		Clay Lumps		%
Wt. Sample Pass #4 (Dry)		Loss By Washing Pass #200		%
% Coarse Aggregate		Flat & Elongated Particles		%
% Fine Aggregate		Crushed Particles		%

Sieve Designation	Individual Weight	CUMULATIVE		
		Weight	% Retained	
			Ret. #4	Total
4"				
3"				
2½"				
1½"				
1"				
⅞"				
¾"				
⅝"				
½"				
⅜"				
#3				
TOTAL				

Sieve Desig.	CUMULATIVE		
	Weight Grams	% RETAINED	
		Pass # 4	Total
#4			
#8	1gram.		0.2%
#16	2grams		0.5%
#30	5grams		1.2%
#50	9grams		2.1%
#100	72grams		17.5%
#200	248grams		60.3%
#270			
Pass #200			
#270			
TOTAL	411grams.		
UNIT WEIGHT	Loose		lb./cu. ft.
	Compact.		lb./cu. ft.
FINENESS MODULUS— 0.22%			

ORGANIC IMPURITIES — Pass #200 or #270 (Pass #4 Fraction) %

DIRT:- 39.7%

Greenwood Construction Co. Ltd.
LABORATORY TEST RESULTS

Pit Name ..... Sample No. .....
Location ..... Date OCT 16/01
Sampled From GRAN "B" (?) Customer SAM
Intended Use SAMPLE #2 Tested By REBECKA

PERCENT COARSE AND FINE AGGREGATE		Unit Loose	lb./cu. ft.
Wt. Total Sample (Dry)		Weight Compacted	lb./cu. ft.
Wt. Sample Ret'd #4 (Dry)		Clay Lumps	%
Wt. Sample Pass #4 (Dry)		Loss By Washing Pass #200	%
% Coarse Aggregate		Flat & Elongated Particles	%
% Fine Aggregate		Crushed Particles	%

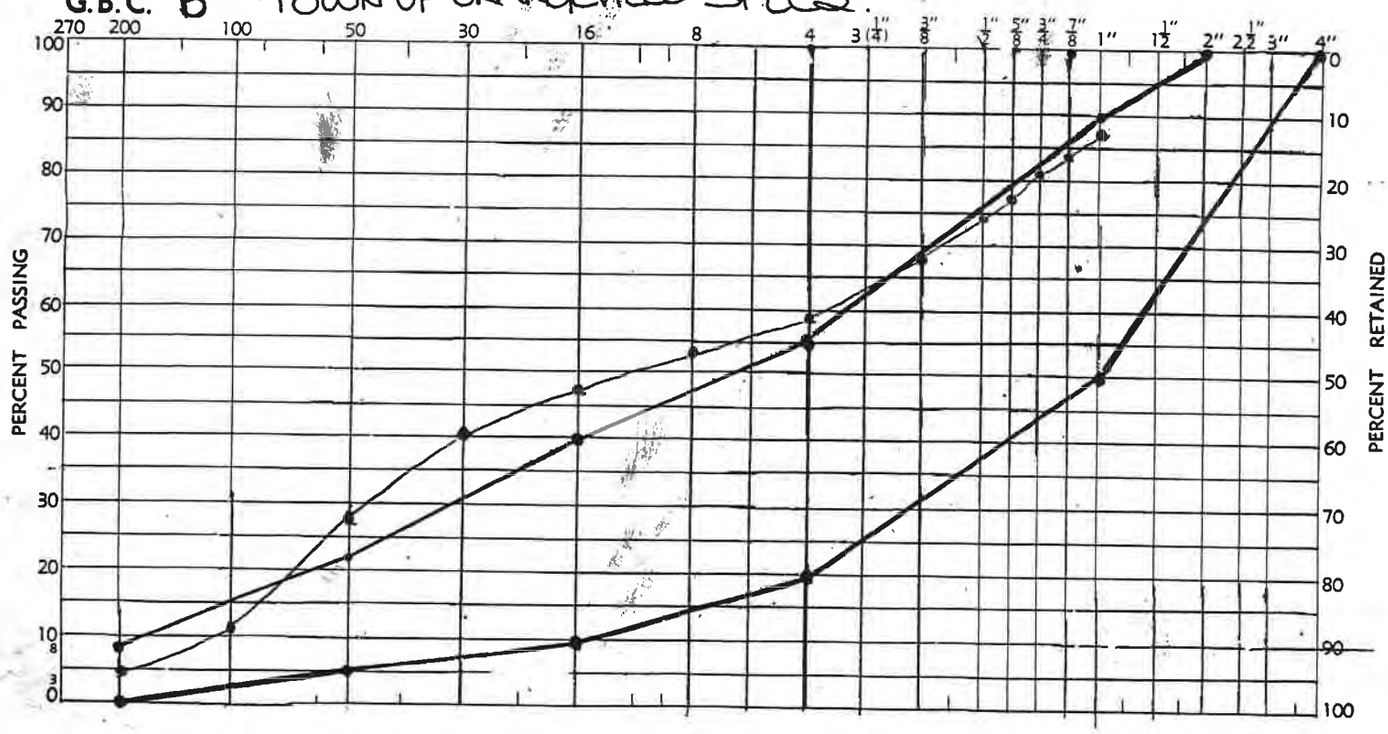
Sieve Designation	Individual Weight	CUMULATIVE Weight	% Retained Ret. #4	% Retained Total
4"				
3"				
2½"				
1½"				
1"	214	214		12.4%
⅞"	59	273		15.8%
¾"	57	333		19.3%
⅝"	61	391		22.7%
½"	49	440		25.5%
⅜"	100	546		31.7%
#3				
TOTAL				

Sieve Desig.	CUMULATIVE Weight Grams	% RETAINED Pass # 4	% RETAINED Total
#4	700		40.6%
#8	803		46.6%
#16	912		52.9%
#30	1030		59.8%
#50	1253		72.7%
#100	1533		89.0%
#200	1646		95.5%
#270			
Pass #200			
#270			
TOTAL	1722		
UNIT	Loose		lb./cu. ft.
WEIGHT	Compact.		lb./cu. ft.
FINENESS MODULUS—			

ORGANIC IMPURITIES — Pass #200 or #270 (Pass #4 Fraction) %

DIRT - 4.5%

G.B.C. "B" - TOWN OF ORANGEVILLE SPECS.



Greenwood Construction Co. Ltd.

LABORATORY TEST RESULTS

Pit Name ..... Sample No. .....

Location ..... Date OCT 16/01

Sampled From GRAN "B" (?) Customer SAM

Intended Use SAMPLE #3 Tested By REBECKA

PERCENT COARSE AND FINE AGGREGATE		Unit Weight	Loose / Compacted	lb./cu. ft.
Wt. Total Sample (Dry)				
Wt. Sample Ret'd #4 (Dry)		Clay Lumps		%
Wt. Sample Pass #4 (Dry)		Loss By Washing Pass #200		%
% Coarse Aggregate		Flat & Elongated Particles		%
% Fine Aggregate		Crushed Particles		%

Sieve Designation	Individual Weight	CUMULATIVE Weight	CUMULATIVE % Retained Ret. #4	CUMULATIVE % Retained Total
4"				
3"				
2½"				
1½"				
1"	257	257		15.1%
⅞"	66	323		19.0%
¾"	40	363		21.4%
⅝"	114	477		28.0%
½"	87	564		33.2%
⅜"	102	666		39.2%
#3				
TOTAL				

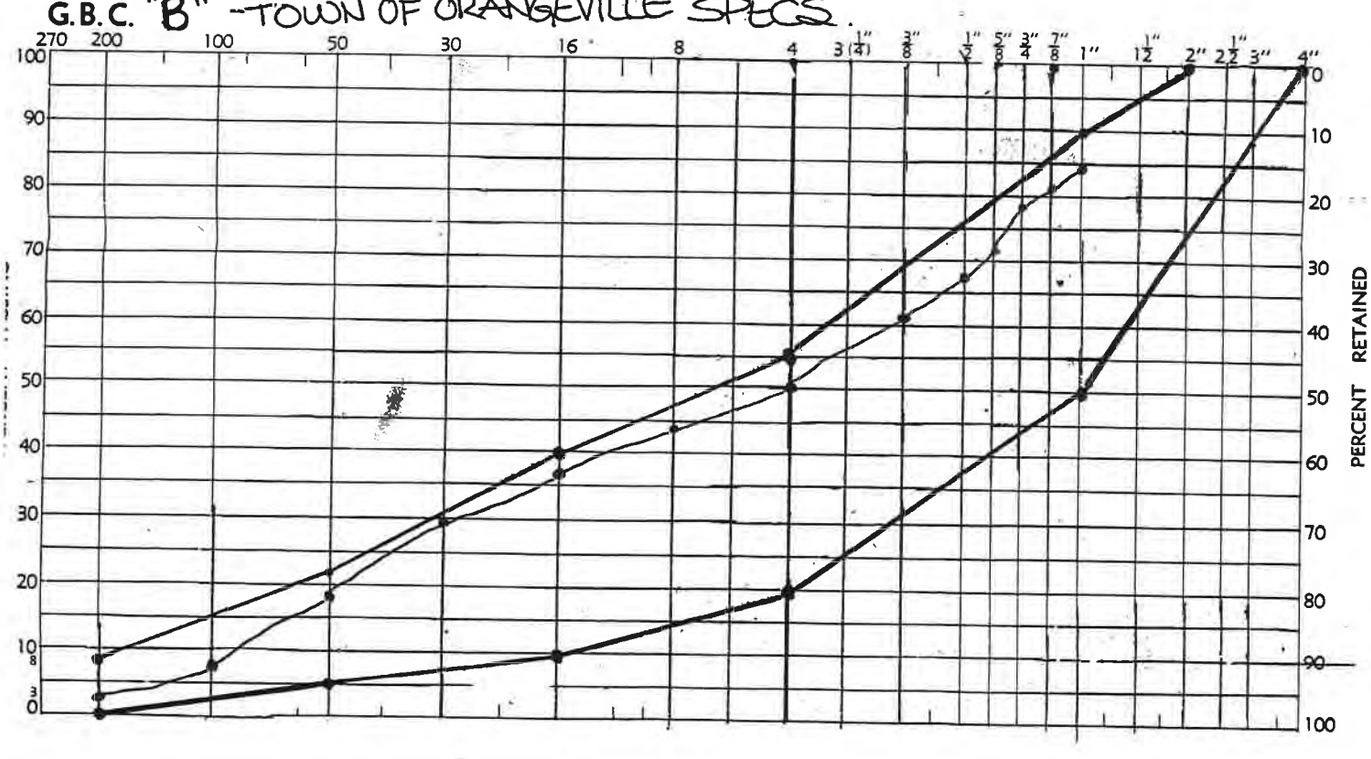
Sieve Desig.	CUMULATIVE Weight Grams	CUMULATIVE % RETAINED Pass # 4	CUMULATIVE % RETAINED Total
#4	841		49.5%
#8	950		55.9%
#16	1066		62.7%
#30	1192		70.2%
#50	1391		81.9%
#100	1570		92.5%
#200	1645		96.8%
#270			
Pass #200			
#270			
TOTAL	1698		

UNIT WEIGHT	Loose / Compact.	lb./cu. ft.
FINENESS MODULUS—		

ORGANIC IMPURITIES	Pass #200 or #270 (Pass #4 Fraction)	%

DIRT - 3.2%

G.B.C. "B" - TOWN OF ORANGEVILLE SPECS.



Greenwood Construction Co. Ltd.

LABORATORY TEST RESULTS

Pit Name ..... Sample No. .....

Location ..... Date OCT 16/01

Sampled From GRAN "B" (?) Customer SAM

Intended Use SAMPLE #4 Tested By REBECKA.

PERCENT COARSE AND FINE AGGREGATE		Unit	Loose	lb./cu. ft.
Wt. Total Sample (Dry)		Weight	Compacted	lb./cu. ft.
Wt. Sample Ret'd #4 (Dry)		Clay Lumps		%
Wt. Sample Pass #4 (Dry)		Loss By Washing Pass #200		%
% Coarse Aggregate		Flat & Elongated Particles		%
% Fine Aggregate		Crushed Particles		%

Sieve Designation	Individual Weight	CUMULATIVE Weight	CUMULATIVE % Retained Ret. #4	CUMULATIVE % Retained Total
4"				
3"				
2½"				
1½"				
1"	257.	257		13.3%
⅞"	93.	350		18.2%
¾"	41	391		20.3%
⅝"	123.	541		28.1%
½"	81	595		30.9%
⅜"	95	690		35.9%
#3				
TOTAL				

Sieve Desig.	CUMULATIVE Weight Grams	CUMULATIVE % RETAINED Pass # 4	CUMULATIVE % RETAINED Total
#4	884.		46.0%
#8	1013		52.7%
#16	1161		60.4%
#30	1333		69.4%
#50	1561		81.3%
#100	1751		91.1%
#200	1844		96.0%
#270			
Pass #200			
#270			
TOTAL	1920		

UNIT	Loose	lb./cu. ft.
WEIGHT	Compact.	lb./cu. ft.
FINENESS MODULUS—		

ORGANIC IMPURITIES	Pass #200 or #270 (Pass #4 Fraction)	%

DIRT - 4.0%

G.B.C. "B" - TOWN OF ORANGEVILLE SPECS.