

# Aggregate Optimization Chart

**PLANT #:** **P-35**

Sample Date: 5/18/26

Concrete Grade: **S2M 3500HP**

Contractor: \_\_\_\_\_

Dates Test Represents: 5/19/2026 through 5/25/2026

MDOT No.: \_\_\_\_\_

Agg. Class	Pit #	Source	Weight (SSD)	ft <sup>3</sup>	Specific Gravity	% Contribution
6AA	58-003	Stoneco	1520	9.06	2.69	48.4
26A	58-003	Stoneco	400	2.38	2.69	12.7
2NS	81-019	Pleasant Lk	1220	7.30	2.64	38.9
<b>Total Wt</b>			<b>3140</b>	<b>18.73</b>		<b>100.0</b>

<----- Verify this number is 100%



**Superior Materials, LLC**  
 30701 W. 10 Mile Rd.  
 Suite 500  
 Farmington Hills, MI 48336

Sieve	6AA	26A	2NS	Cumulative % Passing	% Retained	Cumulative % Retained
2"	100.0	100.0	100.0	100.0	0.0	0.0
1.5"	100.0	100.0	100.0	100.0	0.0	0.0
1"	99.8	100.0	100.0	99.9	0.1	0.1
3/4"	81.9	100.0	100.0	91.2	8.7	8.8
1/2"	40.0	98.9	100.0	70.8	20.4	29.2
3/8"	21.8	82.3	100.0	59.9	10.9	40.1
#4	3.7	9.9	97.8	41.1	18.8	58.9
#8	1.5	2.1	85.9	34.4	6.7	65.6
#16	0.0	1.4	68.9	26.9	7.4	73.1
#30	0.0	1.2	49.7	19.5	7.5	80.5
#50	0.0	1.1	17.3	6.9	12.6	93.1
#100	0.0	1.1	1.8	0.8	6.0	99.2
LBW	0.9	1.0	0.4	0.7	0.1	99.3

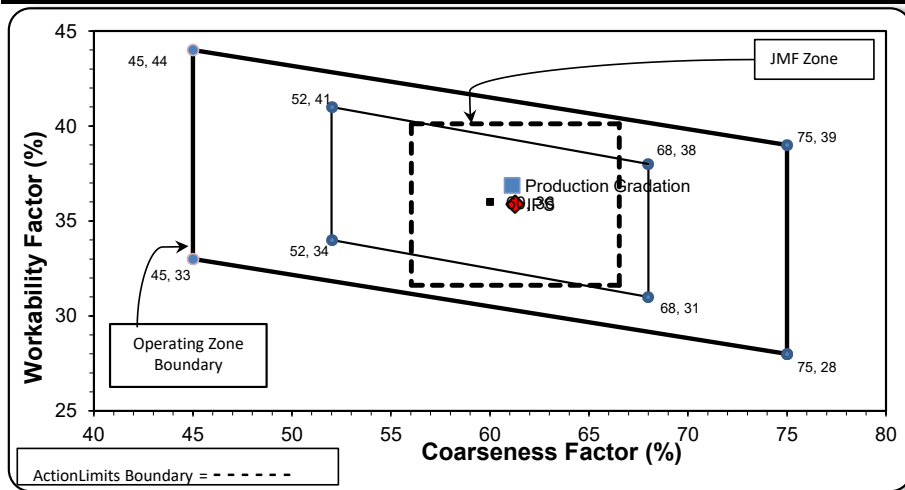
\*Maximum % Retained must be above the 3/8" sieve.  
 \*Any two adjacent sieves must equal 10% except max., nom. max., #100 and #200 sieves.  
 \*% Retained must be at least 4% for each sieve except max., nom. max., #100 and #200 sieves.  
 \*% Retained must be at least 4% for the 3/4" sieve when a 1.5" max. size (nom. Max. 1.0") aggregate is used.

Production Gradation  Batch Plant Gradations  Aggregate Supplier Gradations  Adjusted WF Initial Production Sample (IPS)

<b>Coarseness Factor:</b>	<b>61</b>	<b>Workability Factor:</b>	<b>34</b>	<b>Adjusted WF</b>	<b>36.9</b>
---------------------------	-----------	----------------------------	-----------	--------------------	-------------

<b>Coarseness Factor:</b>	<b>61</b>
---------------------------	-----------

<b>Workability Factor:</b>	<b>36</b>
----------------------------	-----------



Sieve	Cumulative % Passing	% Retained	Cumulative % Retained
2"	100.0	0.0	0.0
1.5"	100.0	0.0	0.0
1"	99.3	0.7	0.7
3/4"	89.2	10.1	10.8
1/2"	70.7	18.5	29.3
3/8"	60.7	10.0	39.3
#4	44.4	16.3	55.6
#8	35.9	8.5	64.1
#16	27.3	8.6	72.7
#30	19.1	8.2	80.9
#50	7.4	11.7	92.6
#100	1.9	5.6	98.1
LBW	0.7	1.2	99.3

PREPARED BY:  
 SM, LLC Technical Service

Approved By:  
 Nancy Donahue

# Aggregate Optimization Chart

**PLANT #:** **P-38**

Contractor: CA Hull Co. Inc.

Sample Date: 5/18/26

Concrete Grade: **S2M 3500HP**

Dates Test Represents: 5/19/2026 through 5/25/2026

MDOT No.: 81032-213485A

Agg. Class	Pit #	Source	Weight (SSD)	ft <sup>3</sup>	Specific Gravity	% Contribution
6AA	58-003	Stoneco	1520	9.06	2.69	48.4
26A	58-003	Stoneco	400	2.38	2.69	12.7
2NS	81-019	Pleasant Lk	1220	7.30	2.64	38.9
<b>Total Wt</b>			<b>3140</b>	<b>18.73</b>		<b>100.0</b>

<----- Verify this number is 100%



**Superior Materials, LLC**  
 30701 W. 10 Mile Rd.  
 Suite 500  
 Farmington Hills, MI 48336

Sieve	6AA	26A	2NS	Cumulative % Passing	% Retained	Cumulative % Retained
2"	100.0	100.0	100.0	100.0	0.0	0.0
1.5"	100.0	100.0	100.0	100.0	0.0	0.0
1"	99.8	100.0	100.0	99.9	0.1	0.1
3/4"	81.9	100.0	100.0	91.2	8.7	8.8
1/2"	40.0	98.9	100.0	70.8	20.4	29.2
3/8"	21.8	82.3	100.0	59.9	10.9	40.1
#4	3.7	9.9	97.8	41.1	18.8	58.9
#8	1.5	2.1	85.9	34.4	6.7	65.6
#16	0.0	1.4	68.9	26.9	7.4	73.1
#30	0.0	1.2	49.7	19.5	7.5	80.5
#50	0.0	1.1	17.3	6.9	12.6	93.1
#100	0.0	1.1	1.8	0.8	6.0	99.2
LBW	0.9	1.0	0.4	0.7	0.1	99.3

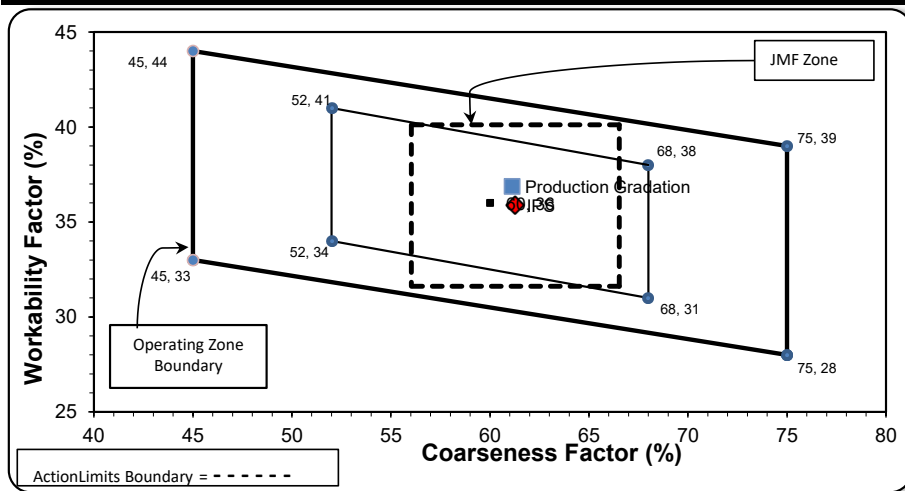
\*Maximum % Retained must be above the 3/8" sieve.  
 \*Any two adjacent sieves must equal 10% except max., nom. max., #100 and #200 sieves.  
 \*% Retained must be at least 4% for each sieve except max., nom. max., #100 and #200 sieves.  
 \*% Retained must be at least 4% for the 3/4" sieve when a 1.5" max. size (nom. Max. 1.0") aggregate is used.

Production Gradation  Batch Plant Gradations  Aggregate Supplier Gradations  Adjusted WF Initial Production Sample (IPS)

<b>Coarseness Factor:</b>	<b>61</b>	<b>Workability Factor:</b>	<b>34</b>	<b>Adjusted WF</b>	<b>36.9</b>
---------------------------	-----------	----------------------------	-----------	--------------------	-------------

<b>Coarseness Factor:</b>	<b>61</b>
---------------------------	-----------

<b>Workability Factor:</b>	<b>36</b>
----------------------------	-----------



Sieve	Cumulative % Passing	% Retained	Cumulative % Retained
2"	100.0	0.0	0.0
1.5"	100.0	0.0	0.0
1"	99.3	0.7	0.7
3/4"	89.2	10.1	10.8
1/2"	70.7	18.5	29.3
3/8"	60.7	10.0	39.3
#4	44.4	16.3	55.6
#8	35.9	8.5	64.1
#16	27.3	8.6	72.7
#30	19.1	8.2	80.9
#50	7.4	11.7	92.6
#100	1.9	5.6	98.1
LBW	0.7	1.2	99.3

PREPARED BY:  
 SM, LLC Technical Service

Approved By:  
 Nancy Donahue