46-0078/Permit 081888
Maymead Materials, Inc.

Annual Production (tpy)	900000
Maximum Capacity (tph)	750
Annual Operating Hours (hrs/yr)	1200

Equipment
Crusher
Screen
Conveyor Transfer Point
Fines Screeing (fluff mill)

Fugitive PM

Equipment	ID	Unit	Controlled EF (lb/ton)
Crusher(s)	CR1	1	0.0012
Crusher	CR2	1	0.0012
Crusher	CR3	1	0.0012
	CR5	1	0.0012
Crusher	P1B	1	0.0012
Screen	S1	2	0.0022
Screen	S2, S4, S5	3	0.0022
Screen	S3, S6	2	0.0022
Screen	P2	1	0.0022
Dewatering Screw	SC1	1	n/a
Bin	BN1	1	0.0043
Bin	BN2	1	0.0043
Bin	BB	1	0.0043
Bin	P1A	1	0.0043
Conveyor(s)	JCC1, JCC2, JCC3, JCC4	4	0.00014
Conveyor(s) - Primary Circuit	C1 - C6	6	0.00014
Conveyor(s)- Finishing Plant	C1, C3	2	0.00014
Conveyor(s)- Finishing Plant	C2, C4 - C13	11	0.00014
Conveyor(s)- Finishing Plant	BBA	1	0.00014
Conveyor(s) - Portable Circuit	P2A	1	0.00014
Conveyor(s) - Portable Circuit	P2B, P2C	2	0.00014

	Allowable	
BN1	750	tph

From Table 2, 1200-03-07-.03	Allowable	
	lbs/hr	tpy
	49.92	**29.95**

Emission Factors (lb/ton)

Uncontrolled	Controlled	AP42 11.19.2-2
0.0054	0.0012	
0.025	0.0022	
0.0030	0.00014	
0.3	0.0036	

	Design		Actual	
Design Rate (TPH)	PM (lbs/hr)	PM (tpy)	PM (lbs/hr)	PM (tpy)
750	0.9	3.942	0.900	0.540
700	0.84	3.679	0.840	0.504
400	0.48	2.102	0.480	0.288
520	0.624	2.733	0.624	0.374
25	0.03	0.131	0.030	0.018
750	3.3	14.454	3.300	1.980
200	1.32	5.782	1.320	0.792
250	1.1	4.818	1.100	0.660
125	0.275	1.205	0.275	0.165
	Wet Process		Wet Process	
750	3.2057	14.041	3.206	1.923
60	0.2565	1.123	0.256	0.154
80	0.3419	1.498	0.342	0.205
25	0.1069	0.468	0.107	0.064
750	0.42	1.8396	0.420	0.252
250	0.21	0.9198	0.210	0.126
250	0.07	0.3066	0.070	0.042
200	0.308	1.34904	0.308	0.185
100	0.014	0.06132	0.014	0.008
125	0.0175	0.07665	0.018	0.011
50	0.014	0.06132	0.014	0.008

	TOTAL		**TOTAL**	
	lbs/hr	tpy*	lbs/hr	tpy
	13.83	60.59	13.83	8.30

*** 8760 hours**

Bin Emission Factor

0.004274223

From AP42 13.2.4

$$E = k(0.0032)\frac{\left(\frac{U}{5}\right)^{1.3}}{\left(\frac{M}{2}\right)^{1.4}} \text{ (pound [lb]/ton)}$$

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E = emission factor
k = particle size multiplier (dimensionless)
U = mean wind speed, meters per second (m/s) (miles per hour [mph])
M = material moisture content (%)

k	U	M
0.74	8.3	2.1