ebmpapst Fans

Drawings shown are a general representation only. For datasheets, please see Digi-Key's website.

Most electronic systems create heat which needs to be removed. Blowers and fans are the most reliable, efficient way to control heat rise in electronic equipment. EBM's Tubeaxial fans come in many sizes and fan speeds and are the most widely used form of cooling. Blowers move larger amounts of air where air drawn in is at a 90° angle from airflow exit. Impellers are the latest cooling types with higher efficiencies and one of the quietest performance of all types.

Fig. 1

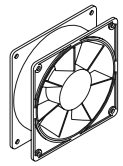

Fig. 2

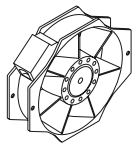

Fig. 3

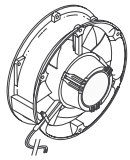

Fig. 4

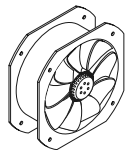

Fig. 5

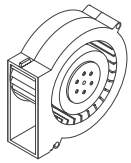

Fig. 6

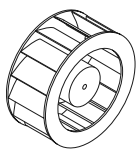

Fig.	Dimensions (mm)	Voltage Nominal	Voltage Range	Power (Watt)	CFM @ 0	Noise dB(A)	Bearing Type	Connection Type	Digi-Key Part No.	Price Each 1	25	50	100	ebmpapst Ind. Part No.
ACmaxx Tubeaxial Fans — RoHS Compliant ‡														
1	92 x 38	115/230	—	11	86	55	Ball	22 AWG 17.7" Leads	381-2284-ND	88.88	68.08	62.41	54.84	AC3200JH
	119 x 32	115/230	—	11	120	51	Ball	22 AWG 17.7" Leads	381-2285-ND	78.21	59.91	54.92	48.26	AC4300H
2	178 x 165 x 51	115/230	85 ~ 265	13.5	206	50	Ball	22 AWG 17.7" Leads	381-2288-ND	119.48	91.53	83.90	73.73	AC6100NM
3	171.5 x 50.8	115/230	—	14	206	50	Ball	22 AWG 17.7" Leads	381-2286-ND	127.91	97.98	89.82	78.93	AC6200NM
AC Tubeaxial Fans — RoHS Compliant ‡														
1	80 x 38	115	—	8	21.2	21	Sintec	18 AWG 12.2" Leads	381-1057-ND	50.97	39.04	35.79	31.45	8830N
	80 x 38	115	—	11	27.7	28	Sintec	18 AWG 12.2" Leads	381-1106-ND	51.53	39.47	36.19	31.80	8800N
	80 x 38	115	—	11	34	41	Sintec	.110" x .02" Terminals	381-1051-ND	53.77	41.20	37.76	33.19	8500A
	80 x 38	115	—	11	35.9	34	Sintec	18 AWG 12.2" Leads	381-1103-ND	46.90	35.93	32.93	28.94	8500N
	80 x 38	115	—	11	35.9	34	Sintec	18 AWG 12.2" Leads	381-1102-ND	53.08	40.66	37.27	32.75	8500DP
	80 x 38	230	—	12	29.4	30	Sintec	18 AWG 12.2" Leads	381-1105-ND	46.62	35.71	32.73	28.77	8550N
	80 x 38	115	—	11	35.9	35	Ball	22 AWG 12.2" Leads	381-1104-ND	55.89	42.81	39.24	34.49	8506N
	80 x 38	115	—	11	36	35	Ball	22 AWG 12.2" Leads	381-1053-ND	59.95	45.93	42.10	37.00	8506VW
	92 x 25	115	—	9	41.2	40	Ball	.110" x .02" Terminals	381-1076-ND	50.97	39.04	35.79	31.45	3906
	92 x 38	115	—	11	52.4	42	Ball	18 AWG 12.2" Leads	381-1075-ND	62.07	47.54	43.58	38.30	3606
	119 x 25	115	—	8	58.9	34.5	Ball	.110" x .02" Terminals	381-1107-ND	55.04	42.16	38.65	33.97	9906L
	119 x 25	115	—	12	79.5	42	Ball	.110" x .02" Terminals	381-1078-ND	55.04	42.16	38.65	33.97	9906
	119 x 25	230	—	14	68.9	37	Ball	.110" x .02" Terminals	381-1079-ND	55.04	42.16	38.65	33.97	9956
	119 x 38	115	—	12	70.6	32	Sintec	.110" x .02" Terminals	381-1026-ND	55.04	42.16	38.65	33.97	4530Z
	119 x 38	230	—	19	94.2	40	Sintec	.110" x .02" Terminals	381-1033-ND	49.71	38.08	34.90	30.67	4650Z
	119 x 38	230	—	19	94.2	40	Ball	.110" x .02" Terminals	381-1035-ND	59.95	45.93	42.10	37.00	4656Z
	119 x 38	115	—	18	105.9	50	Sintec	.110" x .02" Terminals	381-1089-ND	45.35	34.74	31.85	27.99	4600N
	119 x 38	115	—	18	106	50	Sintec	.110" x .02" Terminals	381-1090-ND	45.35	34.74	31.85	27.99	4600X
	119 x 38	230	—	19	94.2	46	Sintec	.110" x .02" Terminals	381-1093-ND	45.35	34.74	31.85	27.99	4650N
	119 x 38	230	—	18	106	50	Sintec	.110" x .02" Terminals	381-1094-ND	45.35	34.74	31.85	27.99	4650X
	119 x 38	115	—	18	105.9	51	Ball	.110" x .02" Terminals	381-1091-ND	54.62	41.84	38.35	33.71	4606N
	119 x 38	230	—	18	106	51	Ball	.110" x .02" Terminals	381-1095-ND	57.14	43.78	40.13	35.27	4656X
	119 x 38	115	—	18	105.9	45	Sintec	.110" x .02" Terminals	381-1029-ND	48.72	37.32	34.21	30.07	4600Z
	119 x 38	115	—	18	105.9	45	Ball	.110" x .02" Terminals	381-1031-ND	59.68	45.71	41.90	36.82	4606Z
	119 x 38	115	—	18	105.9	45	Ball	22 AWG 12.2" Leads	381-1092-ND	62.76	48.08	44.07	38.73	4606ZW
	127 x 38	115	—	17	121.2	47	Ball	.110" x .02" Terminals	381-1119-ND	64.87	49.69	45.55	40.03	5908-105
2	150 x 55	115	—	38	223.6	53	Ball	20 AWG 13" Leads	381-1121-ND	109.94	84.21	77.20	67.84	W2S130-AA25-01
	150 x 55	115	—	46	250.1	62	Ball	20 AWG 13" Leads	381-1124-ND	109.94	84.21	77.20	67.84	W2S130-BM15-01
	172 x 51	230	—	29	294.2	58	Ball	PSC 0.11" Terminals	381-1066-ND	183.38	140.46	128.76	113.15	W2E143-AB09-01
	172 x 150 x 38	230	—	28	230	57	Ball	0.11" Terminals	381-1062-ND	131.57	100.78	92.38	81.18	W2E142-BB01-01
	172 x 150 x 38	115	—	24	230	57	Ball	0.11" Terminals	381-1063-ND	86.91	66.58	61.03	53.63	W2E142-BB05-01
	172 x 51	115	—	26	258.9	60	Ball	.110" x .02" Terminals	381-1065-ND	123.57	94.66	86.77	76.25	W2E143-AA15-01
	172 x 51	115	—	29	294.2	58	Ball	.110" x .02" Terminals	381-1067-ND	183.38	140.46	128.76	113.15	W2E143-AB15-01
4	225 x 80	115	—	80	606	61	Ball	Terminal Block	381-2281-ND	236.59	181.22	166.12	145.98	W2E200-HK86-01
	280 x 280 x 80	230	—	200	1100	73	Ball	Terminal Block	381-2322-ND	307.07	235.21	215.61	189.47	W2E250-HJ28-01
DC Tubeaxial Fans — RoHS Compliant														
1	80 x 38	24	12 ~ 27.6	25	112	66	Ball	24 AWG 12.2" Leads	381-2313-ND	73.86	56.57	51.86	45.57	8214J/2H3
	80 x 38	24	12 ~ 27.6	38	131	71	Ball	24 AWG 12.2" Leads	381-2314-ND	79.48	60.88	55.80	49.04	8214J/2H4
	80 x 38	48	20 ~ 58	36	131	71	Ball	24 AWG 12.2" Leads	381-2315-ND	79.48	60.88	55.80	49.04	8218J/2H4
	92 x 38	12	6 ~ 13.8	50	165	73	Ball	24 AWG 12.2" Leads	381-2305-ND	91.27	69.91	64.08	56.32	3212J/2H4P
	92 x 38	24	12 ~ 27.6	30	140	69	Ball	24 AWG 12.2" Leads	381-2307-ND	68.94	52.81	48.41	42.54	3214JH3
	92 x 38	24	12 ~ 27.6	50	165	73	Ball	24 AWG 12.2" Leads	381-2309-ND	88.88	68.08	62.41	54.84	3214J/2H4P
	92 x 38	48	20 ~ 58	30	140	69	Ball	24 AWG 12.2" Leads	381-2310-ND	68.94	52.81	48.41	42.54	3218JH3
	92 x 38	48	20 ~ 58	50	165	73	Ball	24 AWG 12.2" Leads	381-2312-ND	88.88	68.08	62.41	54.84	3218J/2H4P
	119 x 25	12	7 ~ 13	12	132.4	55	Sintec	22 AWG 12.2" Leads	381-2301-ND	69.50	53.24	48.80	42.89	4412FNH
	119 x 25	24	18 ~ 26	12	132.4	55	Ball	22 AWG 12.2" Leads	381-2303-ND	69.50	53.24	48.80	42.89	4414FNH
	119 X 38	24	16 ~ 28	15	140	61	Ball	.110" x .03" Terminals	381-2323-ND	101.24	77.55	71.08	62.47	W2G110-AK43-31
	119 x 38	24	16 ~ 30	90	294	76	Ball	20 AWG 12.2" Leads	381-2289-ND†	180.01	137.88	126.39	111.07	4114N/2H7P
	119 x 38	24	16 ~ 30	120	336	78	Ball	20 AWG 12.2" Leads	381-2290-ND†	180.01	137.88	126.39	111.07	4114N/2H8P
	119 x 38	48	36 ~ 60	42	229.5	70	Ball	22 AWG 12.2" Leads	381-2291-ND	95.06	72.81	66.75	58.66	4118NH5
	119 x 38	48	36 ~ 60	55	259	73	Ball	22 AWG 12.2" Leads	381-2292-ND	103.34	79.16	72.56	63.77	4118NH6
	119 x 38	48	36 ~ 60	120	336	78	Ball	20 AWG 12.2" Leads	381-2294-ND†	180.01	137.88	126.39	111.07	4118N/2H8P
	140 x 51	48	36 ~ 72	41	241.3	70	Ball	22 AWG 12.2" Leads	381-2298-ND	207.95	159.28	146.01	128.31	5318/2TDHP
2	172 x 51	12	8 ~ 16	41	353.1	64	Ball	20 AWG 14.37" Leads	381-2316-ND	197.42	151.22	138.61	121.81	6312/2TDHP
	172 x 51	24	16 ~ 36	67	417.9	69	Ball	20 AWG 14.37" Leads	381-2317-ND	218.47	167.35	153.40	134.81	6314/2TDHHP
	172 x 51	24	16 ~ 36	41	353.1	64	Ball	20 AWG 14.37" Leads	381-2318-ND	210.47	161.22	147.78	129.87	6314/2TDHP
	172 x 51	48	36 ~ 72	150	559.1	75	Ball	20 AWG 14.37" Leads	381-2319-ND	268.18	205.42	188.30	165.48	6318/2TDH4P
	172 x 51	48	36 ~ 72	67	417.9	69	Ball	20 AWG 14.37" Leads	381-2320-ND	218.47	167.35	153.40	134.81	6318/2TDHHP
AC Flatpak Blowers — RoHS Compliant ‡														
5	121 x 37	115	—	19.5	24.7	60	Sleeve	18 AWG 12.2" Leads	381-1058-ND	70.49	53.99	49.49	43.50	RL90-18/00
	121 x 37	230	—	20	23.5	60	Sleeve	18 AWG 12.2" Leads	381-1061-ND	80.46	61.63	56.49	49.65	RL90-18/50
Brushless DC Tubeaxial Fans														
1	40 x 10	12	10 ~ 14	0.8	5.3	26	Sleeve	28 AWG 12.2" Leads	381-1081-ND◆	16.85	12.91	11.84	10.40	412FH
	40 x 10	24	20 ~ 28	0.8	4.7	22	Sleeve	28 AWG 12.2" Leads	381-1082-ND◆	17.14	13.13	12.03	10.57	414F
	40 x 20	12	10 ~ 14	1.0	5.9	18	Sleeve	28 AWG 12.2" Leads	381-1069-ND◆	17.14	13.13	12.03	10.57	412
	40 x 20	24	20 ~ 28	1.0	5.9	18	Sleeve	28 AWG 12.2" Leads	381-1070-ND◆	19.38	14.85	13.61	11.96	414
	40 x 25	12	8 ~ 14	3.3	14	46	Ball	28 AWG 12.2" Leads	381-1125-ND◆	44.79	34.31	31.45	27.64	412JHH
	40 x 25	24	18 ~ 27	3.6	14	46	Ball	28 AWG 12.2" Leads	381-1126-ND◆	44.79	34.31	31.45	27.64	414JHH
	60 x 25	12	8 ~ 15	.53	12.4	22	Ball	22 AWG 12.2" Leads	381-2266-ND◆	35.38	27.11	24.85	21.84	622L
	60 x 25	12	8 ~ 15	2.3	27.1	39	Ball	22 AWG 12.2" Leads	381-2264-ND◆	37.35	28.61	26.23	23.05	622H
	60 x 25	12	8 ~ 15	3.5	33	43	Ball	22 AWG 12.2" Leads	381-2265-ND◆	37.35	28.61	26.23	23.05	622HH
	60 x 25	24	18 ~ 28	1	12.4	22	Ball	22 AWG 12.2" Leads	381-2270-ND◆	35.38	27.11	24.85	21.84	624L

◆ *RoHS Compliant* † PWM Fan ‡ *Please Note: AC Cords not included, please refer to index – Fans/Blowers.*

(Continued)

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