

Series 300 Curved-Blade Register (Page 14-16) Series 300M Curved-Blade Register (Page 17)

Hart & Cooley 301

Face Velocity	300	400	500	600	700	800	900	1000
6 x 6 Ak .09	CFM .007	30 .013	40 .020	50 .029	60 .040	75 .052	85 .066	95 .081
	Ps 6.0	8.0	10.0	11.0	13.0	15.0	17.0	19.0
	Throw 6.0	8.0	10.0	12.0	14.0	16.0	18.0	20.0
8 x 4 Ak .11	CFM .007	30 .013	40 .021	50 .030	60 .041	75 .053	85 .067	95 .083
	Ps 6.0	8.0	10.0	12.0	14.0	16.0	18.0	20.0
	Throw 6.0	8.0	10.0	12.0	14.0	16.0	18.0	20.0
8 x 6 Ak .12	CFM .007	35 .013	50 .021	60 .030	75 .040	85 .053	100 .067	110 .082
	Ps 7.0	9.0	11.0	13.0	15.0	17.0	19.0	22.0
	Throw 7.0	9.0	11.0	13.0	15.0	17.0	19.0	22.0
8 x 8 Ak .16	CFM .008	50 .014	65 .022	80 .031	95 .042	110 .055	130 .070	145 .086
	Ps 8.0	10.0	12.0	15.0	17.0	20.0	22.0	25.0
	Throw 8.0	10.0	12.0	15.0	17.0	20.0	22.0	25.0
10 x 4 Ak .12	CFM .008	35 .013	50 .021	60 .030	75 .041	85 .054	95 .068	110 .084
	Ps 6.0	9.0	11.0	13.0	15.0	17.0	19.0	21.0
	Throw 6.0	9.0	11.0	13.0	15.0	17.0	19.0	21.0
10 x 6 Ak .14	CFM .008	40 .014	55 .021	70 .031	80 .042	95 .054	110 .069	135 .085
	Ps 7.0	9.0	11.0	14.0	16.0	18.0	20.0	23.0
	Throw 7.0	9.0	11.0	14.0	16.0	18.0	20.0	23.0
10 x 8 Ak .19	CFM .008	55 .014	75 .022	95 .031	115 .043	130 .056	150 .071	170 .087
	Ps 8.0	11.0	13.0	16.0	19.0	21.0	24.0	27.0
	Throw 8.0	11.0	13.0	16.0	19.0	21.0	24.0	27.0
10 x 10 Ak .24	CFM .008	70 .014	95 .021	120 .030	145 .042	170 .054	190 .069	215 .085
	Ps 8.0	11.0	14.0	16.0	19.0	22.0	24.0	27.0
	Throw 8.0	11.0	14.0	16.0	19.0	22.0	24.0	27.0
12 x 4 Ak .13	CFM .008	40 .014	55 .021	65 .031	80 .042	95 .054	105 .069	120 .085
	Ps 9.0	12.0	15.0	18.0	21.0	24.0	27.0	30.0
	Throw 9.0	12.0	15.0	18.0	21.0	24.0	27.0	30.0
12 x 6 Ak .18	CFM .008	55 .015	75 .023	95 .033	110 .045	130 .059	150 .074	165 .091
	Ps 7.0	9.0	11.0	13.0	16.0	18.0	20.0	22.0
	Throw 7.0	9.0	11.0	13.0	16.0	18.0	20.0	22.0
12 x 8 Ak .22	CFM .008	65 .015	85 .023	110 .032	130 .043	150 .056	170 .071	195 .088
	Ps 8.0	11.0	13.0	16.0	19.0	21.0	24.0	26.0
	Throw 8.0	11.0	13.0	16.0	19.0	21.0	24.0	26.0
12 x 12 Ak .30	CFM .008	90 .014	120 .022	150 .032	180 .044	210 .057	235 .073	265 .090
	Ps 10.0	13.0	16.0	19.0	22.0	25.0	28.0	31.0
	Throw 10.0	13.0	16.0	19.0	22.0	25.0	28.0	31.0
14 x 4 Ak .15	CFM .008	45 .014	60 .021	75 .031	90 .042	105 .055	120 .069	145 .086
	Ps 10.0	14.0	17.0	20.0	24.0	27.0	30.0	34.0
	Throw 10.0	14.0	17.0	20.0	24.0	27.0	30.0	34.0
14 x 6 Ak .22	CFM .008	65 .014	85 .022	110 .031	130 .042	150 .055	175 .070	195 .087
	Ps 7.0	9.0	12.0	14.0	16.0	19.0	21.0	23.0
	Throw 7.0	9.0	12.0	14.0	16.0	19.0	21.0	23.0
14 x 8 Ak .24	CFM .008	75 .014	95 .022	120 .032	145 .043	170 .057	195 .072	220 .089
	Ps 9.0	12.0	14.0	17.0	20.0	23.0	26.0	29.0
	Throw 9.0	12.0	14.0	17.0	20.0	23.0	26.0	29.0

Terminal Velocity of 75 FPM

Hart & Cooley 302

Face Velocity	300	400	500	600	700	800	900	1000
8 x 4 Ak .11	CFM .012	30 .021	40 .033	50 .047	60 .064	75 .083	85 .106	95 .113
	Ps 3.0	4.0	6.0	7.0	8.0	9.0	10.0	11.0
	Throw 3.0	4.0	6.0	7.0	8.0	9.0	10.0	11.0
8 x 6 Ak .13	CFM .012	30 .020	40 .032	50 .046	60 .063	75 .082	85 .104	95 .128
	Ps 4.0	5.0	6.0	7.0	8.0	9.0	11.0	12.0
	Throw 4.0	5.0	6.0	7.0	8.0	9.0	11.0	12.0
8 x 8 Ak .19	CFM .011	55 .020	75 .031	90 .045	110 .061	130 .080	150 .101	165 .125
	Ps 5.0	6.0	7.0	9.0	10.0	11.0	13.0	14.0
	Throw 5.0	6.0	7.0	9.0	10.0	11.0	13.0	14.0
10 x 6 Ak .17	CFM .011	50 .020	65 .031	80 .045	95 .062	110 .080	120 .102	135 .126
	Ps 4.0	6.0	7.0	8.0	9.0	11.0	12.0	13.0
	Throw 4.0	6.0	7.0	8.0	9.0	11.0	12.0	13.0
10 x 8 Ak .23	CFM .011	65 .020	90 .031	110 .044	135 .061	155 .079	180 .100	200 .124
	Ps 5.0	7.0	8.0	10.0	11.0	13.0	14.0	15.0
	Throw 5.0	7.0	8.0	10.0	11.0	13.0	14.0	15.0
12 x 6 Ak .21	CFM .011	60 .020	80 .031	100 .045	125 .061	145 .079	165 .101	185 .124
	Ps 5.0	6.0	8.0	9.0	10.0	12.0	13.0	15.0
	Throw 5.0	6.0	8.0	9.0	10.0	12.0	13.0	15.0
12 x 8 Ak .27	CFM .011	80 .020	105 .031	130 .044	160 .060	185 .079	210 .100	240 .123
	Ps 5.0	7.0	9.0	10.0	12.0	14.0	15.0	17.0
	Throw 5.0	7.0	9.0	10.0	12.0	14.0	15.0	17.0
14 x 6 Ak .24	CFM .011	70 .020	95 .031	115 .044	140 .060	165 .079	190 .100	210 .123
	Ps 5.0	7.0	8.0	10.0	11.0	13.0	14.0	16.0
	Throw 5.0	7.0	8.0	10.0	11.0	13.0	14.0	16.0
14 x 8 Ak .31	CFM .011	90 .020	120 .031	150 .044	185 .060	215 .078	245 .100	275 .122
	Ps 6.0	8.0	9.0	11.0	13.0	14.0	16.0	18.0
	Throw 6.0	8.0	9.0	11.0	13.0	14.0	16.0	18.0

Terminal Velocity of 75 FPM

Hart & Cooley 303

Face Velocity	300	400	500	600	700	800	900	1000
6 x 6 Ak .12	CFM .014	35 .025	50 .039	60 .056	75 .077	85 .100	100 .126	110 .156
	Ps 5.0	7.0	9.0	10.0	12.0	14.0	15.0	17.0
	Throw 3.0	4.0	5.0	6.0	7.0	8.0	9.0	10.0
8 x 4 Ak .10	CFM .015	30 .027	40 .041	50 .060	65 .081	75 .106	85 .134	95 .166
	Ps 5.0	6.0	8.0	9.0	11.0	12.0	14.0	15.0
	Throw 3.0	4.0	5.0	6.0	7.0	8.0	9.0	10.0
8 x 6 Ak .14	CFM .015	40 .026	55 .041	70 .059	85 .080	100 .104	115 .132	140 .163
	Ps 6.0	7.0	9.0	11.0	13.0	15.0	16.0	18.0
	Throw 3.0	5.0	6.0	7.0	8.0	9.0	10.0	11.0
8 x 8 Ak .18	CFM .013	55 .022	75 .035	90 .050	110 .069	130 .090	145 .114	165 .140
	Ps 6.0	8.0	11.0	13.0	15.0	17.0	19.0	21.0
	Throw 4.0	5.0	6.0	8.0	9.0	10.0	11.0	12.0
10 x 4 Ak .12	CFM .014	35 .025	50 .039	60 .056	75 .077	85 .100	100 .126	110 .156
	Ps 5.0	7.0	9.0	10.0	12.0	14.0	15.0	17.0
	Throw 3.0	4.0	5.0	6.0	7.0	8.0	9.0	10.0
10 x 6 Ak .17	CFM .015	40 .027	55 .043	70 .062	85 .084	100 .110	115 .139	135 .171
	Ps 6.0	8.0	10.0	12.0	14.0	16.0	18.0	20.0
	Throw 4.0	5.0	6.0	7.0	8.0	9.0	10.0	11.0
10 x 8 Ak .22	CFM .012	65 .022	90 .034	110 .049	135 .066	155 .086	180 .109	205 .135
	Ps 7.0	9.0	12.0	14.0	16.0	18.0	21.0	23.0
	Throw 4.0	6.0	7.0	8.0	10.0	11.0	12.0	14.0
10 x 10 Ak .31	CFM .015	95 .027	125 .043	155 .062	185 .084	220 .110	250 .139	280 .172
	Ps 8.0	11.0	14.0	16.0	19.0	22.0	24.0	27.0
	Throw 5.0	7.0	8.0	10.0	11.0	13.0	14.0	16.0
12 x 6 Ak .21	CFM .012	60 .022	85 .034	105 .049	125 .066	145 .086	165 .109	185 .135
	Ps 7.0	9.0	11.0	13.0	15.0	18.0	20.0	22.0
	Throw 4.0	6.0	7.0	8.0	9.0	11.0	12.0	13.0
12 x 8 Ak .26	CFM .008	80 .014	105 .022	130 .032	160 .044	185 .057	210 .072	240 .089
	Ps 8.0	10.0	13.0	15.0	17.0	20.0	22.0	25.0
	Throw 5.0	6.0	8.0	9.0	11.0	12.0	13.0	15.0
12 x 12 Ak .38	CFM .008	115 .014	155 .023	190 .033	230 .044	270 .058	305 .073	345 .090
	Ps 9.0	12.0	15.0	18.0	21.0	24.0	27.0	30.0
	Throw 6.0	7.0	9.0	11.0	13.0	14.0	16.0	18.0
14 x 4 Ak .16	CFM .008	50 .014	65 .022	80 .031	95 .042	110 .055	125 .070	140 .086
	Ps 6.0	8.0	10.0	12.0	14.0	16.0	17.0	19.0
	Throw 4.0	5.0	6.0	7.0	8.0	9.0	10.0	11.0
14 x 6 Ak .20	CFM .009	60 .017	80 .026	100 .037	120 .051	145 .066	165 .084	185 .104
	Ps 7.0	9.0	11.0	13.0	15.0	17.0	20.0	22.0
	Throw 4.0	6.0	7.0	8.0	9.0	11.0	12.0	13.0
14 x 8 Ak .30	CFM .008	90 .014	120 .022	150 .032	185 .044	215 .057	245 .073	275 .090
	Ps 8.0	11.0	13.0	16.0	19.0	21.0	24.0	27.0
	Throw 5.0	7.0	8.0	10.0	11.0	13.0	14.0	16.0
16 x 6 Ak .26	CFM .008	80 .014	105 .022	130 .032	160 .044	185 .057	210 .072	240 .089
	Ps 8.0	10.0	12.0	15.0	17.0	20.0	22.0	25.0
	Throw 5.0	6.0	8.0	9.0	11.0	12.0	14.0	15.0

Terminal Velocity of 75 FPM

Hart & Cooley 304

Face Velocity	300	400	500	600	700	800	900	1000	
6 x 6	CFM	50	65	80	95	110	125	145	160
Ak .16	Ps	.040	.072	.112	.161	.219	.287	.363	.448
	Throw	3.0	4.0	5.0	6.0	7.0	8.0	9.0	10.0
	S Throw	4.0	5.0	6.0	7.0	8.0	9.0	11.0	12.0
8 x 8	CFM	65	85	110	130	155	175	195	220
Ak .22	Ps	.024	.043	.067	.096	.130	.170	.216	.266
	Throw	4.0	5.0	6.0	7.0	8.0	10.0	11.0	12.0
	S Throw	4.0	6.0	7.0	8.0	10.0	11.0	12.0	14.0
10 x 10	CFM	85	115	140	170	200	225	255	285
Ak .28	Ps	.016	.029	.045	.064	.087	.114	.144	.178
	Throw	4.0	6.0	7.0	8.0	10.0	11.0	12.0	14.0
	S Throw	5.0	6.0	8.0	10.0	11.0	13.0	14.0	16.0
12 x 12	CFM	120	160	200	235	275	315	355	395
Ak .40	Ps	.012	.022	.032	.047	.064	.084	.107	.133
	Throw	5.0	7.0	8.0	10.0	11.0	13.0	14.0	16.0
	S Throw	6.0	8.0	9.0	11.0	13.0	15.0	17.0	18.0
14 x 14	CFM	145	190	240	285	335	380	430	475
Ak .48	Ps	.009	.016	.025	.037	.049	.065	.081	.101
	Throw	6.0	7.0	9.0	11.0	12.0	14.0	16.0	18.0
	S Throw	6.0	8.0	10.0	12.0	14.0	16.0	18.0	20.0