Table 1-18—Atomization Parameters for RD Raindrop Drift Reduction Nozzle

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD4 Orifice, 0° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	751	VC	1.6	668	C	1.4	593	C	1.5	526	M	1.7	466	M	2.0	414	M	2.4	369	M	3.0
30	717	C	1.7	640	C	1.5	570	M	1.5	508	M	1.6	453	M	1.9	407	M	2.3	368	M	2.8
40	684	C	1.9	612	C	1.6	548	M	1.6	491	M	1.6	442	M	1.8	400	M	2.1	367	M	2.6
50	652	C	2.1	585	C	1.8	526	M	1.6	475	M	1.6	431	M	1.7	395	M	2.0	366	M	2.4
60	620	C	2.3	559	M	1.9	505	M	1.7	459	M	1.6	420	M	1.7	389	M	1.9	366	F	2.2

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD4 Orifice, 10° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	756	VC	1.5	671	VC	1.4	594	C	1.5	525	M	1.7	463	M	2.0	409	M	2.5	363	M	3.1
30	722	VC	1.7	643	VC	1.5	571	C	1.5	507	M	1.6	451	M	1.9	402	M	2.3	361	M	2.9
40	689	VC	1.9	615	VC	1.6	549	C	1.6	490	M	1.6	439	M	1.8	396	M	2.2	360	M	2.7
50	657	VC	2.0	588	C	1.8	527	C	1.6	474	M	1.6	428	M	1.8	390	M	2.1	359	M	2.5
60	625	VC	2.2	562	C	1.9	506	M	1.7	458	M	1.6	417	M	1.7	385	M	1.9	360	M	2.3

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD4 Orifice, 20° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	760	VC	1.4	674	VC	1.3	595	C	1.4	523	M	1.6	460	M	1.9	404	M	2.4	355	M	3.0
30	727	VC	1.5	645	VC	1.4	572	C	1.4	506	M	1.6	447	M	1.8	397	M	2.3	354	M	2.8
40	694	VC	1.7	618	VC	1.5	549	C	1.5	489	M	1.5	436	M	1.8	390	M	2.1	353	M	2.6
50	661	VC	1.9	591	C	1.7	528	C	1.5	472	M	1.5	425	M	1.7	385	M	2.0	352	M	2.4
60	629	VC	2.1	564	C	1.8	507	C	1.6	457	M	1.6	414	M	1.7	380	M	1.9	353	M	2.3

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD6 Orifice, 0° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	977	VC	0.5	877	VC	0.5	784	VC	0.6	699	VC	0.9	622	VC	1.3	552	C	1.8	490	M	2.5
30	950	VC	0.6	855	VC	0.5	767	VC	0.6	688	VC	0.8	616	VC	1.1	551	C	1.6	495	M	2.3
40	923	VC	0.7	833	VC	0.6	751	VC	0.6	677	VC	0.7	610	VC	1.0	551	C	1.4	500	M	2.0
50	897	VC	0.8	813	VC	0.6	736	VC	0.6	667	VC	0.7	606	VC	0.9	552	C	1.3	506	M	1.8
60	872	VC	1.0	793	VC	0.7	721	VC	0.6	658	VC	0.6	602	C	0.8	553	C	1.1	513	M	1.5

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD6 Orifice, 10° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	978	VC	0.4	876	VC	0.5	781	VC	0.6	694	VC	0.9	615	VC	1.3	544	C	1.9	480	M	2.6
30	951	VC	0.6	854	VC	0.5	765	VC	0.6	683	VC	0.8	609	VC	1.2	543	C	1.7	484	M	2.3
40	924	VC	0.7	832	VC	0.6	749	VC	0.6	672	VC	0.8	604	VC	1.1	543	C	1.5	489	M	2.1
50	898	VC	0.8	812	VC	0.7	733	VC	0.6	662	VC	0.7	599	VC	1.0	543	C	1.3	495	M	1.9
60	873	VC	1.0	792	VC	0.8	718	VC	0.7	653	VC	0.7	595	VC	0.9	545	C	1.2	502	M	1.6

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD6 Orifice, 20° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	979	VC	0.3	874	VC	0.3	778	VC	0.5	689	VC	0.8	608	VC	1.2	534	C	1.8	469	M	2.6
30	951	VC	0.4	852	VC	0.4	761	VC	0.5	678	VC	0.7	602	VC	1.1	534	C	1.6	473	M	2.3
40	925	VC	0.6	831	VC	0.5	745	VC	0.5	667	VC	0.7	597	VC	1.0	534	C	1.5	479	M	2.1
50	899	VC	0.7	810	VC	0.6	730	VC	0.5	657	VC	0.6	592	VC	0.9	534	C	1.3	484	M	1.8
60	873	VC	0.9	790	VC	0.7	715	VC	0.6	648	VC	0.6	588	VC	0.8	535	C	1.2	491	M	1.6

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD8 Orifice, 0° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1110	EC	0.1	992	EC	0.0	882	VC	0.3	779	VC	0.6	684	VC	1.2	597	VC	1.8	518	C	2.6
30	1089	EC	0.0	976	EC	0.0	871	VC	0.2	774	VC	0.5	685	VC	1.0	603	VC	1.6	529	C	2.3
40	1068	EC	0.1	961	EC	0.1	862	VC	0.2	770	VC	0.4	685	VC	0.8	609	VC	1.3	540	C	2.0
50	1048	EC	0.2	947	VC	0.1	852	VC	0.1	766	VC	0.3	687	VC	0.6	616	VC	1.1	552	C	1.7
60	1029	EC	0.3	933	VC	0.1	844	VC	0.1	763	VC	0.2	689	VC	0.5	623	VC	0.9	565	C	1.4

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD8 Orifice, 10° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1107	EC	0.1	987	EC	0.0	875	VC	0.3	770	VC	0.7	674	VC	1.2	585	VC	1.9	503	C	2.7
30	1086	EC	0.0	971	EC	0.0	865	VC	0.2	765	VC	0.6	674	VC	1.0	590	VC	1.6	514	C	2.4
40	1065	EC	0.1	956	EC	0.1	855	VC	0.2	761	VC	0.5	675	VC	0.9	596	VC	1.4	526	C	2.1
50	1046	EC	0.2	942	EC	0.1	846	VC	0.2	757	VC	0.4	676	VC	0.7	603	VC	1.2	538	C	1.8
60	1027	EC	0.3	928	EC	0.2	837	VC	0.2	754	VC	0.3	679	VC	0.6	611	VC	1.0	551	C	1.6

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD8 Orifice, 20° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1103	EC	0.1	982	EC	0.1	868	VC	0.2	761	VC	0.6	663	VC	1.1	572	VC	1.8	488	M	2.7
30	1082	EC	0.1	966	EC	0.1	857	VC	0.1	756	VC	0.5	663	VC	1.0	577	VC	1.6	499	M	2.4
40	1062	EC	0.1	951	EC	0.1	848	VC	0.1	752	VC	0.4	664	VC	0.8	584	VC	1.4	511	M	2.1
50	1042	EC	0.1	937	EC	0.0	839	VC	0.1	748	VC	0.3	665	VC	0.7	590	VC	1.2	523	M	1.8
60	1023	EC	0.2	923	VC	0.1	830	VC	0.1	745	VC	0.2	668	VC	0.5	598	C	1.0	536	M	1.5

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD10 Orifice, 0° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1149	EC	0.1	1013	EC	0.2	886	VC	0.5	766	VC	1.0	653	VC	1.6	548	VC	2.3	451	M	3.2
30	1134	EC	0.0	1004	EC	0.1	882	VC	0.4	767	VC	0.8	660	VC	1.4	560	VC	2.1	469	C	2.9
40	1120	EC	0.0	995	EC	0.1	878	VC	0.3	769	VC	0.7	667	VC	1.2	573	VC	1.8	487	C	2.5
50	1106	EC	0.1	987	EC	0.1	875	VC	0.2	771	VC	0.5	675	VC	1.0	586	VC	1.5	505	C	2.2
60	1094	EC	0.2	980	EC	0.1	873	VC	0.2	775	VC	0.4	683	VC	0.8	600	VC	1.3	524	M	1.9

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD10 Orifice, 10° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1142	EC	0.1	1005	EC	0.2	875	VC	0.5	753	VC	1.0	639	VC	1.7	532	VC	2.4	433	M	3.3
30	1127	EC	0.0	995	EC	0.2	871	VC	0.4	754	VC	0.9	645	VC	1.4	544	VC	2.1	450	M	3.0
40	1113	EC	0.1	987	EC	0.1	868	VC	0.4	756	VC	0.7	653	VC	1.2	557	VC	1.9	468	M	2.7
50	1100	EC	0.1	978	EC	0.1	865	VC	0.3	759	VC	0.6	660	VC	1.0	570	VC	1.6	487	M	2.3
60	1087	EC	0.2	971	EC	0.1	863	VC	0.2	762	VC	0.5	669	VC	0.9	584	VC	1.4	506	M	2.0

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD10 Orifice, 20° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1135	EC	0.1	996	EC	0.1	864	VC	0.4	740	VC	0.9	624	VC	1.6	515	C	2.4	414	M	3.3
30	1120	EC	0.1	986	EC	0.1	860	VC	0.4	741	VC	0.8	630	VC	1.4	527	C	2.1	432	M	3.0
40	1106	EC	0.1	977	EC	0.0	857	VC	0.3	743	VC	0.7	638	VC	1.2	540	C	1.8	449	M	2.6
50	1093	EC	0.0	969	EC	0.0	854	VC	0.2	746	VC	0.5	646	VC	1.0	553	C	1.6	468	M	2.3
60	1080	EC	0.1	962	EC	0.1	852	VC	0.2	749	VC	0.4	654	VC	0.8	567	C	1.4	487	M	2.0

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD12 Orifice, 0° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1094	EC	0.6	941	EC	0.9	796	VC	1.3	658	VC	1.9	529	C	2.6	406	M	3.4	292	M	4.4
30	1086	EC	0.6	938	EC	0.8	798	VC	1.2	666	VC	1.7	541	VC	2.3	425	M	3.1	315	M	4.0
40	1078	EC	0.6	936	EC	0.7	801	VC	1.0	674	VC	1.5	555	VC	2.1	443	C	2.8	339	M	3.7
50	1071	EC	0.6	934	EC	0.7	805	VC	0.9	683	VC	1.3	569	VC	1.8	463	M	2.5	364	M	3.3
60	1064	EC	0.6	933	VC	0.6	809	VC	0.8	693	VC	1.1	584	VC	1.6	483	M	2.2	390	M	2.9

RD RAINDROP DRIFT REDUCTION NOZZLE ROTARY-WING — RD12 Orifice, 10° Angle

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1084	EC	0.6	929	EC	0.9	782	VC	1.3	642	VC	1.9	510	C	2.7	386	M	3.5	270	F	4.5
30	1075	EC	0.6	926	EC	0.8	784	VC	1.2	650	VC	1.7	523	C	2.4	404	M	3.2	293	M	4.2
40	1067	EC	0.6	923	EC	0.8	787	VC	1.1	658	VC	1.6	537	VC	2.2	423	M	2.9	317	M	3.8
50	1060	EC	0.6	921	EC	0.7	790	VC	1.0	667	VC	1.4	551	VC	1.9	443	M	2.6	342	M	3.4
60	1054	EC	0.6	920	VC	0.7	794	VC	0.9	676	VC	1.2	566	VC	1.7	463	M	2.3	368	M	3.1

RD RAINDROP DRIFT REDUCTION NOZZLE RD12 Orifice, 20° Angle
ROTARY-WING

PSI	Airspeed, mph																				
	30			40			50			60			70			80			90		
	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100	$D_{V0.5}$	DSC	%<100
20	1072	EC	0.5	916	VC	0.8	767	VC	1.3	625	VC	1.9	491	C	2.6	365	M	3.5	247	F	4.5
30	1064	EC	0.5	913	VC	0.7	769	VC	1.1	633	VC	1.7	504	C	2.4	384	M	3.2	270	F	4.1
40	1056	EC	0.5	910	VC	0.7	772	VC	1.0	641	VC	1.5	518	C	2.1	402	M	2.9	295	M	3.8
50	1049	EC	0.5	909	VC	0.6	775	VC	0.9	650	VC	1.3	532	C	1.9	422	M	2.6	320	M	3.4
60	1043	EC	0.5	907	VC	0.6	780	VC	0.8	659	VC	1.2	547	C	1.7	442	M	2.3	345	M	3.1