

**TABLE 1.** Summary of experiments reviewed in the text. Abbreviations in the first column are used in the text for easy reference. If a figure number is given in the second column in addition to the reference, it identifies the source of the data used. Experiment type in the third column is a reference to a text section. Definitions of  $\omega$  and of  $\epsilon$  are given in Eq. (7).

	reference	expt. type	nucleating material added	no of samples	no of cycles	temp. range (°C)	$\omega$	$\epsilon$ (°C) <sup>-1</sup>
Ha13	Hartmann et al. (2013); Fig. 7.	3.2.1	P. syr. (Snowmax)	cloud	1	-6.5 ... -10	2.4	12
He01	Heneghan et al. (2001); Fig. 7	3.1.1	silver iodide	1	3x300	-7.5 ... -8.5	1.12	3.0
He02	Heneghan, Wilson and Haymet, (2002); Fig. 1	3.1.2	none silver iodide	1 1	294 354	-12 ... -15 -4 ... -7	1.8 1.8	5.8 5.8
L10	Lüönd et al. (2010); Fig. 7	3.2.1	kaolinite 200nm	cloud	1	-19 ... -27	0.68	1.9
Mu11	Murray et al. (2011); Fig. 5	3.2.1	kaolinite	16 - 200	1	-27 ... -36	1.1	3.0
N11	Niedermeier et al. (2010) Fig. 6; (2011b)Fig 3a	3.2.1	ATD (pure) ATD + SA(45)	cloud cloud	1 1	-28 ... -36 -32 ... -37	0.34 1.25	1.4 3.5
Nm12	Niemand et al. (2012)	3.2.1	five natural dusts	cloud	1	-13 ... -28	0.52	1.8
Se01a	Seeley and Seidler (2001a); Fig. 2	3.1.2	pentacosanol octacosanol	1 1	~530 ~530	-10 ... -12 -9.5 ... -11.5	2.0 1.2	7.4 3.4
Se01b	Seeley and Seidler (2001b); Fig. 7	3.1.2	pentacosanol (prep 5°C) pentacosanol (prep 45°C)	1 1	>140 >140	-6 ... -9 -10 ... -14	0.9 0.9	2.5 2.5
S94	Stoyanova et al. (1994); Fig. 2	3.2.1	none outdoor dust, 0.001 g	900 789	1 1	-17 ... -25 -7 ... -17	1.0 0.6	2.7 1.8
St09	Stan et al. (2009)		silver iodide	8898	1	-10 ... -18	2.3	10
VB84	Vonnegut and Baldwin, (1984); Fig. 4	3.1.1	silver iodode	1	800	-5.5	1.5	5.4
V94	Vali (1994)	3.2.1	dist. water	468	1	-14 ... -24	0.6	1.8
V08	Vali (2008)	3.1.2	soil particles	40	47	-6.5 ... -15	0.3	1.4
W12	Welti et al. (2012); Fig. 4.	3.2.2	kaolinite 800 nm kaolinite 400 nm	cloud cloud		-29 ... -37 -31 ... -37		1.5 1.5
WP13	Wright and Petters (2013); Fig.5	3.2.1	ATD 0.1 %	~400	1	-23 ... -31	0.52	1.7
WV84	Wang and Vonnegut, (1984); Table 2	3.1.1	none	16	84...597	-13.5 ... -16.5	1.6	5.0
Z07	Zobrist et al. (2007); Fig. 3	3.1.2	nonadecanol	4 large 2 small	80...98 50...70	-8 ... -17 -21 ... -26	0.8 1.3	2.1 ... 2.6 3.8
homogeneous freezing							4.1 3.0 3.2 4.5 3.8	60 20 25 95 45