

温度 (°C)	密度 (kg/m ³)	比热容 (kJ/kg·K)	导热系数 (W/m·K)	热扩散率 (10 ⁻³ m ² /s)	动力粘度 (10 ⁻⁶ Pa·s)	运动粘度 (10 ⁻⁶ m ² /s)
第二章 物 理 数 值						
第一节 空气的物理特性						
一、干空气在压力为100kPa时的参数						

表 2-1

温 度 <i>t</i> (°C)	密 度 ρ (kg/m ³)	比 热 容 c_p (kJ/kg·K)	导 热 系 数 λ (W/m·K)	热 扩 散 率 α (10 ⁻³ m ² /h)	动 力 粘 度 μ (10 ⁻⁶ Pa·s)	运 动 粘 度 ν (10 ⁻⁶ m ² /s)
-180	3.685	1.047	0.756	0.705	6.47	1.76
-150	2.817	1.038	1.163	1.45	8.73	3.10
-100	1.984	1.022	1.617	2.88	11.77	5.94
-50	1.534	1.013	2.035	4.73	14.61	9.54
-20	1.365	1.009	2.258	6.94	16.28	11.93
0	1.252	1.009	2.373	6.75	17.16	13.70
1	1.247	1.009	2.381	6.799	17.220	13.80
2	1.243	1.009	2.389	6.848	17.279	13.90
3	1.238	1.009	2.397	6.897	17.338	14.00
4	1.234	1.009	2.405	6.946	17.397	14.10
5	1.229	1.009	2.413	6.995	17.456	14.20
6	1.224	1.009	2.421	7.044	17.514	14.30
7	1.220	1.009	2.430	7.093	17.574	14.40
8	1.215	1.009	2.438	7.142	17.632	14.50
9	1.211	1.009	2.446	7.191	17.691	14.60
10	1.206	1.009	2.454	7.240	17.750	14.70
11	1.202	1.0095	2.461	7.282	17.799	14.80
12	1.198	1.0099	2.468	7.324	17.848	14.90
13	1.193	1.0103	2.475	7.366	17.897	15.00
14	1.189	1.0107	2.482	7.408	17.946	15.10
15	1.185	1.0112	2.489	7.450	17.995	15.20
16	1.181	1.0116	2.496	7.492	18.044	15.30
17	1.177	1.0120	2.503	7.534	18.093	15.40
18	1.172	1.0124	2.510	7.576	18.142	15.50
19	1.168	1.0128	2.517	7.618	18.191	15.60
20	1.164	1.013	2.524	7.660	18.240	15.70
21	1.161	1.013	2.530	7.708	18.289	15.791
22	1.158	1.013	2.535	7.756	18.338	15.882
23	1.154	1.013	2.541	7.804	18.387	15.973
24	1.149	1.013	2.547	7.852	18.437	16.064
25	1.146	1.013	2.552	7.900	18.486	16.155
26	1.142	1.013	2.559	7.948	18.535	16.246
27	1.138	1.013	2.564	7.996	18.584	16.337
28	1.134	1.013	2.570	8.044	18.633	16.428
29	1.131	1.013	2.576	8.092	18.682	16.519
30	1.127	1.013	2.582	8.140	18.731	16.610

温度 t (°C)	密度 ρ (kg/m ³)	比热容 c_p (kJ/kg·K)	导热系数 λ (W/m·K)	热扩散率 a (10 ⁻² m ² /h)	动力粘度 μ (10 ⁻⁶ Pa·s)	运动粘度 ν (10 ⁻⁶ m ² /s)
31	1.124	1.013	2.589	8.191	18.780	16.709
32	1.120	1.013	2.596	8.242	18.829	16.808
33	1.117	1.013	2.603	8.293	18.878	16.907
34	1.113	1.013	2.610	8.344	18.927	17.006
35	1.110	1.013	2.617	8.395	18.976	17.105
36	1.106	1.013	2.624	8.446	19.025	17.204
37	1.103	1.013	2.631	8.497	19.074	17.303
38	1.099	1.013	2.638	8.548	19.123	17.402
39	1.096	1.013	2.645	8.599	19.172	17.501
40	1.092	1.013	2.652	8.650	19.221	17.600
50	1.056	1.017	2.733	9.14	19.61	18.60
60	1.025	1.017	2.803	9.65	20.10	19.60
70	0.996	1.017	2.861	10.18	20.49	20.45
80	0.968	1.022	2.931	10.65	20.99	21.70
90	0.942	1.022	3.001	11.25	21.57	22.90
100	0.916	1.022	3.070	11.80	21.77	25.78
120	0.870	1.026	3.198	12.90	22.75	26.20
140	0.827	1.026	3.326	14.10	23.54	28.45
160	0.789	1.030	3.442	15.25	24.12	30.60
180	0.755	1.034	3.570	16.50	25.01	33.17
200	0.723	1.034	3.698	17.80	25.89	35.82
250	0.653	1.043	3.977	21.2	27.95	42.8
300	0.596	1.047	4.291	24.8	29.71	49.9
350	0.549	1.055	4.571	28.4	31.48	57.5
400	0.508	1.059	4.850	32.4	32.95	64.9
500	0.450	1.072	5.396	40.0	36.19	80.4
600	0.400	1.089	5.815	49.1	39.23	98.1
800	0.325	1.114	6.687	68.0	44.52	137.0
1000	0.268	1.139	7.618	89.9	49.52	185.0
1200	0.238	1.164	8.455	113.0	53.94	232.5

注：表中数值实际是干空气压力为98.0665kPa时的值。

二、湿空气在压力为100kPa时的参数

表 2-2

温度 (°C)	含湿量 (10 ⁻³ kg/kg)		比容 (m ³ /kg干空气)		比焓 (kJ/kg干空气)			比焓 (kJ/kg干空气·K)			冷 凝 水		
	d	v_a	v_s	v_g	i_a	h_s	i_g	s_a	h_s	s_g	i_w	s_w	P_s
-60	0.0057	0.6027	0.0000	0.6027	-60.351	0.017	-60.334	-0.2495	0.0001	-0.2494	-446.29	-1.6854	0.00108
-59	0.0076	0.6056	0.0000	0.6056	-59.344	0.018	-59.326	-0.2468	0.0001	-0.2447	-444.63	-1.6776	0.00124
-58	0.0087	0.6084	0.0000	0.6084	-58.338	0.021	-58.317	-0.2401	0.0001	-0.2400	-442.95	-1.6698	0.00141
-57	0.0100	0.6113	0.0000	0.6113	-57.332	0.024	-57.308	-0.2354	0.0001	-0.2353	-441.27	-1.6620	0.00161
-56	0.0114	0.6141	0.0000	0.6141	-56.326	0.028	-56.298	-0.2308	0.0001	-0.2307	-439.58	-1.6542	0.00184
-55	0.0129	0.6170	0.0000	0.6170	-55.319	0.031	-55.288	-0.2261	0.0002	-0.2259	-437.89	-1.6464	0.00209
-54	0.0147	0.6198	0.0000	0.6198	-54.313	0.036	-54.278	-0.2215	0.0002	-0.2213	-436.19	-1.6386	0.00238
-53	0.0167	0.6226	0.0000	0.6226	-53.307	0.041	-53.267	-0.2170	0.0002	-0.2168	-434.48	-1.6308	0.00271
-52	0.0190	0.6255	0.0000	0.6255	-52.301	0.046	-52.255	-0.2124	0.0002	-0.2122	-432.76	-1.6230	0.00307
-51	0.0215	0.6283	0.0000	0.6283	-51.295	0.052	-51.243	-0.2079	0.0002	-0.2077	-431.03	-1.6153	0.00348

续表

温度 (°C)	含湿量 (10 ⁻³ kg/kg)	比 容			比 焓			比 熵			冷 凝 水		
		v_a	v_0	v_s	i_a	i_0	i_s	s_a	s_0	s_s	比 焓 (kJ/kg)	比 焓 (kJ/kg·K)	蒸 发 压力 (kPa)
-50	0.0243	0.6312	0.0000	0.6312	-50.289	0.059	-50.230	-0.2633	0.0003	-0.2031	-429.30	-1.6075	0.00397
-49	0.0275	0.6340	0.0000	0.6340	-49.283	0.067	-49.216	-0.1988	0.0003	-0.1985	-427.56	-1.5997	0.00445
-48	0.0311	0.6369	0.0000	0.6369	-48.277	0.075	-48.202	-0.1944	0.0004	-0.1940	-425.82	-1.5919	0.00503
-47	0.0350	0.6397	0.0000	0.6397	-47.271	0.085	-47.186	-0.1891	0.0004	-0.1895	-424.06	-1.5842	0.00568
-46	0.0395	0.6426	0.0000	0.6426	-46.265	0.095	-46.170	-0.1855	0.0004	-0.1850	-422.30	-1.5764	0.00640
-45	0.0445	0.6454	0.0000	0.6454	-45.259	0.108	-45.151	-0.1811	0.0005	-0.1805	-420.54	-1.5686	0.00721
-44	0.0500	0.6483	0.0001	0.6483	-44.253	0.121	-44.132	-0.1767	0.0006	-0.1761	-418.76	-1.5609	0.00811
-43	0.0562	0.6511	0.0001	0.6511	-43.247	0.137	-43.110	-0.1723	0.0006	-0.1718	-416.98	-1.5531	0.00911
-42	0.0631	0.6540	0.0001	0.6540	-42.241	0.153	-42.088	-0.1679	0.0007	-0.1672	-415.19	-1.5453	0.01022
-41	0.0708	0.6568	0.0001	0.6568	-41.235	0.172	-41.063	-0.1636	0.0008	-0.1628	-413.39	-1.5376	0.01147
-40	0.0793	0.6597	0.0001	0.6597	-40.229	0.192	-40.037	-0.1592	0.0009	-0.1584	-411.59	-1.5298	0.01285
-39	0.0887	0.6625	0.0001	0.6625	-39.224	0.216	-39.008	-0.1549	0.0010	-0.1540	-409.77	-1.5221	0.01438
-38	0.0990	0.6653	0.0001	0.6653	-38.218	0.242	-37.976	-0.1507	0.0011	-0.1496	-407.94	-1.5145	0.01608
-37	0.1108	0.6682	0.0001	0.6682	-37.212	0.270	-36.942	-0.1464	0.0012	-0.1452	-406.12	-1.5066	0.01796
-36	0.1237	0.6710	0.0001	0.6710	-36.206	0.302	-35.905	-0.1421	0.0014	-0.1408	-404.29	-1.4988	0.02005
-35	0.1379	0.6739	0.0001	0.6739	-35.200	0.336	-34.864	-0.1379	0.0015	-0.1364	-402.45	-1.4911	0.02235
-34	0.1536	0.6767	0.0002	0.6767	-34.195	0.375	-33.820	-0.1337	0.0017	-0.1320	-400.60	-1.4833	0.02490
-33	0.1710	0.6796	0.0002	0.6796	-33.189	0.417	-32.772	-0.1295	0.0018	-0.1275	-398.75	-1.4756	0.02772
-32	0.1902	0.6824	0.0002	0.6824	-32.183	0.464	-31.718	-0.1253	0.0020	-0.1233	-396.89	-1.4678	0.03082
-31	0.2113	0.6853	0.0002	0.6853	-31.178	0.517	-30.661	-0.1212	0.0023	-0.1189	-395.01	-1.4601	0.03425
-30	0.2346	0.6881	0.0003	0.6881	-30.171	0.574	-29.597	-0.1170	0.0025	-0.1145	-393.14	-1.4524	0.03802
-29	0.2602	0.6909	0.0003	0.6909	-29.166	0.636	-28.529	-0.1129	0.0028	-0.1101	-391.25	-1.4446	0.04217
-28	0.2883	0.6938	0.0003	0.6938	-28.152	0.707	-27.545	-0.1088	0.0031	-0.1057	-389.36	-1.4368	0.04673
-27	0.3193	0.6966	0.0004	0.6966	-27.154	0.782	-26.372	-0.1047	0.0034	-0.1013	-387.46	-1.4291	0.05175
-26	0.3533	0.6995	0.0004	0.6995	-26.149	0.867	-25.282	-0.1005	0.0037	-0.0969	-385.55	-1.4214	0.05725
-25	0.3905	0.7023	0.0004	0.7023	-25.143	0.959	-24.184	-0.0965	0.0041	-0.0924	-383.63	-1.4137	0.06329
-24	0.4314	0.7052	0.0005	0.7052	-24.137	1.059	-23.078	-0.0925	0.0045	-0.0880	-381.71	-1.4059	0.06991
-23	0.4762	0.7080	0.0005	0.7080	-23.132	1.171	-21.961	-0.0885	0.0050	-0.0835	-379.78	-1.3982	0.07716
-22	0.5251	0.7109	0.0006	0.7109	-22.126	1.292	-20.824	-0.0845	0.0054	-0.0790	-377.84	-1.3905	0.08510
-21	0.5787	0.7137	0.0007	0.7137	-21.120	1.425	-19.695	-0.0805	0.0060	-0.0745	-375.90	-1.3828	0.09378
-20	0.6373	0.7165	0.0007	0.7165	-20.115	1.570	-18.545	-0.0765	0.0066	-0.0699	-373.95	-1.3750	0.10326
-19	0.7013	0.7194	0.0008	0.7194	-19.109	1.729	-17.380	-0.0725	0.0072	-0.0653	-371.99	-1.3673	0.11362
-18	0.7711	0.7222	0.0009	0.7222	-18.103	1.902	-16.201	-0.0686	0.0079	-0.0607	-370.02	-1.3596	0.12492
-17	0.8473	0.7251	0.0010	0.7251	-17.098	2.092	-15.000	-0.0646	0.0086	-0.0560	-368.04	-1.3518	0.13725
-16	0.9303	0.7279	0.0011	0.7279	-16.092	2.299	-13.793	-0.0607	0.0094	-0.0513	-366.06	-1.3441	0.15068
-15	1.0207	0.7308	0.0012	0.7308	-15.086	2.524	-12.562	-0.0568	0.0103	-0.0465	-364.07	-1.3364	0.16530
-14	1.1191	0.7336	0.0013	0.7336	-14.080	2.769	-11.311	-0.0529	0.0113	-0.0416	-362.07	-1.3287	0.18122
-13	1.2262	0.7364	0.0014	0.7364	-13.075	3.036	-10.039	-0.0490	0.0123	-0.0367	-360.07	-1.3210	0.19852
-12	1.3425	0.7393	0.0016	0.7393	-12.069	3.327	-8.742	-0.0452	0.0134	-0.0318	-358.06	-1.3132	0.21732
-11	1.4690	0.7421	0.0017	0.7421	-11.063	3.642	-7.421	-0.0415	0.0146	-0.0267	-356.04	-1.3055	0.23775
-10	1.6062	0.7450	0.0019	0.7450	-10.057	3.986	-6.072	-0.0375	0.0160	-0.0215	-354.01	-1.2978	0.25991
-9	1.7551	0.7478	0.0021	0.7478	-9.052	4.358	-4.693	-0.0337	0.0174	-0.0163	-351.97	-1.2901	0.28395
-8	1.9166	0.7507	0.0023	0.7507	-8.046	4.764	-3.283	-0.0299	0.0189	-0.0110	-349.93	-1.2824	0.30999
-7	2.0916	0.7535	0.0025	0.7535	-7.040	5.202	-1.838	-0.0261	0.0206	-0.0055	-347.88	-1.2746	0.33821
-6	2.2811	0.7563	0.0028	0.7563	-6.035	5.677	-0.357	-0.0223	0.0224	-0.0000	-345.82	-1.2669	0.36874
-5	2.4862	0.7592	0.0030	0.7592	-5.029	6.192	1.164	-0.0186	0.0243	0.0057	-343.75	-1.2592	0.40178
-4	2.7081	0.7620	0.0033	0.7620	-4.023	6.751	2.728	-0.0148	0.0264	0.0115	-341.69	-1.2515	0.43748
-3	2.9480	0.7649	0.0036	0.7649	-3.017	7.353	4.336	-0.0111	0.0286	0.0175	-339.61	-1.2438	0.47606
-2	3.2074	0.7677	0.0039	0.7677	-2.011	8.007	5.995	-0.0074	0.0310	0.0236	-337.52	-1.2361	0.51773
-1	3.4874	0.7705	0.0042	0.7705	-1.006	8.712	7.706	-0.0037	0.0336	0.0299	-335.42	-1.2284	0.56268

续表

温度 (°C)	含湿量 (10 ⁻³ kg/ kg)	比 容			比 焓			比 熵			冷 凝 水		
		(m ³ /kg干空气)			(kJ/kg干空气)			(kJ/kg干空气·K)			比 焓 (kJ/ kg)	比 熵 (kJ/ kg·K)	蒸 发 压 力 (kPa)
t	d	v _a	dv	v _s	i _a	di	i _s	s _a	ds ₁	s _s	t _m	x _m	P _s
0	3.7895	0.7734	0.0047	0.7781	0.000	9.473	9.473	0.0000	0.0384	0.0384	-333.32	-1.2206	0.61117
0	3.7895	0.7734	0.0047	0.7781	0.000	9.473	9.473	0.0000	0.0384	0.0384	0.06	-0.0001	0.61117
1	4.076	0.7752	0.0051	0.7813	1.006	10.197	11.203	0.0037	0.0391	0.0427	4.28	0.0153	0.6571
2	4.381	0.7791	0.0055	0.7845	2.012	10.970	12.982	0.0073	0.0419	0.0452	8.49	0.0306	0.7010
3	4.707	0.7819	0.0059	0.7878	3.016	11.793	14.311	0.0110	0.0449	0.0559	12.70	0.0456	0.7581
4	5.054	0.7848	0.0064	0.7911	4.024	12.672	16.496	0.0146	0.0480	0.0627	16.91	0.0611	0.8135
5	5.424	0.7878	0.0068	0.7944	5.029	13.610	18.639	0.0182	0.0514	0.0697	21.12	0.0762	0.8725
6	5.816	0.7904	0.0074	0.7978	6.036	14.608	20.844	0.0219	0.0550	0.0769	25.32	0.0913	0.9353
7	6.237	0.7933	0.0079	0.8012	7.041	15.671	22.713	0.0255	0.0588	0.0843	29.52	0.1064	1.0020
8	6.683	0.7961	0.0085	0.8046	8.047	16.805	24.852	0.0290	0.0628	0.0919	33.72	0.1213	1.0729
9	7.157	0.7990	0.0092	0.8081	9.053	18.010	27.084	0.0326	0.0671	0.0997	37.92	0.1362	1.1481
10	7.661	0.8018	0.0098	0.8116	10.059	19.293	29.352	0.0362	0.0717	0.1078	42.11	0.1511	1.2280
11	8.197	0.8046	0.0106	0.8152	11.065	20.658	31.724	0.0397	0.0765	0.1162	46.31	0.1659	1.3128
12	8.766	0.8075	0.0113	0.8188	12.071	22.108	34.179	0.0433	0.0816	0.1248	50.50	0.1806	1.4026
13	9.370	0.8103	0.0122	0.8225	13.077	23.649	36.726	0.0468	0.0870	0.1337	54.69	0.1953	1.4979
14	10.012	0.8132	0.0131	0.8262	14.084	25.248	39.370	0.0503	0.0927	0.1430	58.88	0.2099	1.5987
15	10.692	0.8160	0.0140	0.8300	15.090	27.023	42.113	0.0538	0.0987	0.1525	63.07	0.2244	1.7055
16	11.413	0.8188	0.0150	0.8338	16.096	28.867	44.963	0.0573	0.1053	0.1624	67.26	0.2389	1.8185
17	12.178	0.8217	0.0160	0.8377	17.102	30.824	47.926	0.0607	0.1119	0.1726	71.44	0.2534	1.9380
18	12.989	0.8245	0.0172	0.8417	18.108	32.900	51.008	0.0642	0.1190	0.1832	75.63	0.2678	2.0643
19	13.848	0.8274	0.0184	0.8457	19.114	35.101	54.216	0.0677	0.1266	0.1942	79.81	0.2821	2.1979
20	14.758	0.8303	0.0196	0.8498	20.121	37.434	57.555	0.0711	0.1348	0.2057	84.00	0.2965	2.3389
21	15.721	0.8330	0.0210	0.8540	21.127	39.908	61.035	0.0745	0.1439	0.2175	88.18	0.3107	2.4878
22	16.741	0.8359	0.0224	0.8583	22.133	42.527	64.660	0.0779	0.1519	0.2298	92.36	0.3249	2.6448
23	17.821	0.8387	0.0240	0.8627	23.140	45.301	68.440	0.0813	0.1613	0.2426	96.55	0.3390	2.8105
24	18.963	0.8416	0.0256	0.8671	24.146	48.239	72.385	0.0847	0.1712	0.2559	100.73	0.3531	2.9852
25	20.170	0.8444	0.0273	0.8717	25.153	51.347	76.500	0.0881	0.1817	0.2698	104.91	0.3672	3.1693
26	21.448	0.8472	0.0291	0.8764	26.159	54.638	80.798	0.0915	0.1927	0.2842	109.09	0.3812	3.3633
27	22.798	0.8501	0.0311	0.8811	27.165	58.120	85.285	0.0948	0.2044	0.2992	113.27	0.3951	3.5674
28	24.226	0.8529	0.0331	0.8860	28.172	61.804	89.976	0.0982	0.2169	0.3148	117.45	0.4099	3.7823
29	25.735	0.8558	0.0353	0.8910	29.179	65.699	94.878	0.1015	0.2296	0.3311	121.63	0.4229	4.0084
30	27.329	0.8586	0.0376	0.8962	30.185	69.820	100.006	0.1048	0.2432	0.3481	125.81	0.4367	4.2462
31	29.014	0.8614	0.0400	0.9015	31.192	74.177	105.369	0.1082	0.2576	0.3658	129.99	0.4505	4.4961
32	30.793	0.8643	0.0426	0.9069	32.198	78.780	110.979	0.1115	0.2728	0.3842	134.17	0.4642	4.7586
33	32.674	0.8671	0.0454	0.9125	33.205	83.652	116.857	0.1148	0.2887	0.4035	138.35	0.4779	5.0315
34	34.660	0.8700	0.0483	0.9183	34.212	88.799	123.011	0.1180	0.3056	0.4236	142.53	0.4915	5.3242
35	36.756	0.8728	0.0514	0.9242	35.219	94.236	129.455	0.1213	0.3233	0.4446	146.71	0.5051	5.6280
36	38.971	0.8756	0.0546	0.9303	36.226	99.983	136.209	0.1246	0.3420	0.4666	150.89	0.5186	5.9448
37	41.309	0.8785	0.0581	0.9366	37.233	106.058	143.290	0.1278	0.3617	0.4895	155.07	0.5321	6.2812
38	43.778	0.8813	0.0618	0.9431	38.239	112.474	150.713	0.1311	0.3824	0.5135	159.25	0.5456	6.6315
39	46.386	0.8842	0.0657	0.9498	39.246	119.258	158.504	0.1343	0.4043	0.5386	163.43	0.5590	6.9988
40	49.141	0.8870	0.0698	0.9568	40.253	126.430	166.683	0.1375	0.4273	0.5649	167.61	0.5724	7.3838
41	52.049	0.8898	0.0741	0.9640	41.261	134.005	175.265	0.1407	0.4516	0.5923	171.79	0.5857	7.7866
42	55.119	0.8927	0.0788	0.9714	42.268	142.007	184.275	0.1439	0.4771	0.6211	175.97	0.5990	8.2081
43	58.365	0.8955	0.0837	0.9792	43.275	150.475	193.749	0.1471	0.5041	0.6512	180.15	0.6122	8.6495
44	61.791	0.8983	0.0888	0.9872	44.282	159.417	203.699	0.1503	0.5325	0.6828	184.33	0.6254	9.1110
45	65.411	0.9012	0.0943	0.9955	45.289	168.874	214.164	0.1535	0.5624	0.7159	188.51	0.6386	9.5935
46	69.239	0.9040	0.1002	1.0042	46.296	178.882	225.179	0.1566	0.5940	0.7507	192.69	0.6517	10.0982
47	73.282	0.9069	0.1063	1.0132	47.304	189.455	236.759	0.1598	0.6273	0.7871	196.88	0.6648	10.6250
48	77.556	0.9097	0.1129	1.0226	48.311	200.644	248.955	0.1629	0.6624	0.8253	201.06	0.6778	11.1754
49	82.077	0.9125	0.1198	1.0323	49.319	212.485	261.803	0.1661	0.6994	0.8655	205.24	0.6908	11.7502
50	86.856	0.9154	0.1272	1.0425	50.326	225.019	275.345	0.1692	0.7385	0.9077	209.42	0.7038	12.3503

续表

温度 (°C)	含湿量 (10 ⁻³ kg/ kg)	比 容			比 焓			比 熵			冷 凝 水		
		(m ³ /kg干空气)			(kJ/kg干空气)			(kJ/kg干空气·K)			比 焓	比 熵	蒸发压力
		<i>v</i>	<i>dv</i>	<i>v_s</i>	<i>i_a</i>	<i>i_s</i>	<i>i_g</i>	<i>s_a</i>	<i>ds</i>	<i>s_a</i>	<i>i_w</i>	<i>s_w</i>	<i>P_s</i>
51	91.918	0.9182	0.1350	1.0532	51.334	238.290	289.824	0.1723	0.7798	0.9521	213.60	0.7167	12.0764
52	97.272	0.9211	0.1433	1.0643	52.341	252.340	304.682	0.1754	0.8234	0.9988	217.78	0.7296	13.6293
53	102.948	0.9239	0.1521	1.0760	53.349	267.247	320.596	0.1785	0.8695	1.0480	221.97	0.7424	14.3108
54	108.954	0.9267	0.1614	1.0882	54.357	283.031	337.348	0.1816	0.9182	1.0998	226.15	0.7552	15.0205
55	115.321	0.9295	0.1713	1.1009	55.365	299.772	355.137	0.1847	0.9698	1.1544	230.33	0.7680	15.7601
56	122.077	0.9324	0.1819	1.1143	56.373	317.549	373.922	0.1877	1.0243	1.2120	234.52	0.7807	16.5311
57	129.243	0.9353	0.1932	1.1284	57.381	336.417	393.798	0.1908	1.0820	1.2728	238.70	0.7934	17.3337
58	136.851	0.9381	0.2051	1.1432	58.389	356.461	414.850	0.1938	1.1432	1.3370	242.88	0.8061	18.1691
59	144.942	0.9409	0.2179	1.1588	59.397	377.788	437.185	0.1969	1.2081	1.4050	247.07	0.8187	19.0393
60	153.54	0.9438	0.2315	1.1752	60.405	400.458	460.883	0.1999	1.2761	1.4760	251.25	0.8313	19.9439
61	162.69	0.9466	0.2460	1.1926	61.413	424.624	486.036	0.2029	1.3500	1.5530	255.44	0.8438	20.8858
62	172.44	0.9494	0.2614	1.2109	62.421	450.377	512.794	0.2059	1.4278	1.6337	259.62	0.8563	21.8651
63	182.84	0.9523	0.2780	1.2303	63.429	477.837	541.268	0.2089	1.5104	1.7194	263.81	0.8688	22.8826
64	193.93	0.9551	0.2957	1.2508	64.438	507.177	571.815	0.2119	1.5985	1.8105	268.00	0.8812	23.9405
65	205.79	0.9580	0.3147	1.2726	65.446	538.548	603.996	0.2149	1.6925	1.9074	272.18	0.8936	25.0397
66	218.48	0.9608	0.3350	1.2958	66.455	572.116	638.571	0.2179	1.7927	2.0106	276.37	0.9060	26.1810
67	232.07	0.9636	0.3568	1.3204	67.463	608.103	675.566	0.2209	1.8999	2.1208	280.56	0.9183	27.3664
68	246.64	0.9665	0.3803	1.3467	68.472	646.724	715.196	0.2238	2.0147	2.2385	284.75	0.9306	28.5967
69	262.31	0.9693	0.4055	1.3749	69.481	688.261	757.742	0.2268	2.1378	2.3646	288.94	0.9429	29.8741
70	279.16	0.9721	0.4328	1.4049	70.489	732.959	803.448	0.2297	2.2699	2.4996	293.13	0.9551	31.1986
71	297.34	0.9750	0.4622	1.4372	71.498	781.208	852.706	0.2327	2.4122	2.6448	297.32	0.9673	32.5734
72	316.98	0.9778	0.4941	1.4719	72.507	833.335	905.842	0.2356	2.5655	2.8010	301.51	0.9794	33.9983
73	338.24	0.9807	0.5287	1.5093	73.516	889.807	963.323	0.2385	2.7311	2.9696	305.70	0.9916	35.4759
74	361.30	0.9835	0.5662	1.5497	74.525	951.077	1025.603	0.2414	2.9104	3.1518	309.89	1.0037	37.0063
75	386.41	0.9862	0.6072	1.5935	75.535	1017.841	1093.375	0.2443	3.1052	3.3496	314.08	1.0157	38.5940
76	413.77	0.9890	0.6519	1.6411	76.543	1090.628	1167.172	0.2472	3.3171	3.5644	318.27	1.0278	40.2369
77	443.72	0.9918	0.7010	1.6939	77.553	1170.328	1247.881	0.2501	3.5486	3.7987	322.47	1.0398	41.9388
78	476.63	0.9947	0.7550	1.7498	78.562	1257.921	1336.483	0.2530	3.8023	4.0553	326.67	1.0517	43.7020
79	512.84	1.0005	0.8145	1.8121	79.572	1354.347	1435.918	0.2559	4.0810	4.3368	330.86	1.0636	45.5248
80	552.95	1.0034	0.8805	1.8810	80.581	1461.200	1541.781	0.2587	4.3890	4.6477	335.05	1.0755	47.4135
81	597.51	1.0063	0.9539	1.9572	81.591	1578.961	1661.552	0.2616	4.7305	4.9921	339.25	1.0874	49.3670
82	647.24	1.0092	1.0360	2.0422	82.600	1712.547	1795.148	0.2644	5.1108	5.3753	343.45	1.0993	51.3860
83	703.11	1.0090	1.1283	2.1373	83.610	1861.548	1945.158	0.2673	5.5372	5.8045	347.65	1.1111	53.4746
84	766.24	1.0119	1.2328	2.2446	84.620	2029.983	2114.693	0.2701	6.0181	6.2882	351.85	1.1228	55.6337
85	838.12	1.0147	1.3518	2.3666	85.630	2221.806	2307.436	0.2729	6.5644	6.8373	356.05	1.1346	57.8653
86	920.62	1.0175	1.4887	2.5062	86.640	2442.036	2528.677	0.2757	7.1901	7.4658	360.25	1.1463	60.1727
87	1016.11	1.0204	1.6473	2.6676	87.650	2697.016	2784.646	0.2785	7.9128	8.1914	364.45	1.1580	62.5544
88	1128.00	1.0232	1.8333	2.8565	88.661	2995.890	3084.551	0.2813	8.7589	9.0393	368.65	1.1696	65.0166
89	1260.64	1.0261	2.0540	3.0800	89.671	3350.254	3439.925	0.2841	9.7577	10.0419	372.86	1.1812	67.5581
90	1420.31	1.0289	2.3199	3.3488	90.681	3776.918	3867.599	0.2869	10.9586	11.2455	377.06	1.1928	70.1817

注：1.表中数值实际是湿空气在压力为101325Pa时之值。

2.表中：

d——在给定的压力和温度条件下，达到饱和状态的每公斤干空气中所含的湿量，kg/kg；*v_a*——干空气的比容，m³/kg；*v_s*——处于饱和状态时含有1公斤干空气的湿空气的比容，m³/kg；*dv = v_s - v_a*，m³/kg；*i_a*——干空气的比焓，kJ/kg；*i_s*——处于饱和状态时含有1公斤干空气的湿空气的比焓，kJ/kg；*di = i_s - i_a*，汽化潜热，kJ/kg；*s_a*——每公斤干空气的比熵，kJ/kg·K；*s_s*——处于饱和状态时含有1公斤干空气的湿空气的比熵，kJ/kg·K；*ds = s_s - s_a*，kJ/kg·K；*i_w*——一定的温度和压力下空气处于饱和状态时单位重量冷凝水（液态或固态）的比焓，kJ/kg；*s_w*——空气处于饱和状态时单位重量冷凝水的比熵，kJ/kg·K；*P_s*——饱和湿空气的水蒸汽分压力（水的蒸发压力），kPa。