

# Manfred Wendisch

## List of Publications by Year in Descending Order

**Source:** <https://exaly.com/author-pdf/4622921/manfred-wendisch-publications-by-year.pdf>

**Version:** 2024-04-27

This document has been generated based on the publications and citations recorded by exaly.com. For the latest version of this publication list, visit the link given above.

The third column is the impact factor (IF) of the journal, and the fourth column is the number of citations of the article.

253  
papers

6,482  
citations

49  
h-index

68  
g-index

330<sup>o</sup>  
ext. papers

7,774  
ext. citations

5  
avg, IF

5.21  
L-index

#	Paper	IF	Citations
253	Overview of the MOSAiC expedition. <i>Atmosphere. Elementa</i> , <b>2022</b> , 10,	3.6	15
252	Overview of the MOSAiC expedition. <i>Elementa</i> , <b>2022</b> , 10,	3.6	13
251	An assessment of macrophysical and microphysical cloud properties driving radiative forcing of shallow trade-wind clouds. <i>Atmospheric Chemistry and Physics</i> , <b>2022</b> , 22, 2727-2744	6.8	0
250	VELOX: A new thermal infrared imager for airborne remote sensing of cloud and surface properties. <i>Atmospheric Measurement Techniques</i> , <b>2022</b> , 15, 1491-1509	4	0
249	Airborne measurements of directional reflectivity over the Arctic marginal sea ice zone. <i>Atmospheric Measurement Techniques</i> , <b>2022</b> , 15, 2939-2953	4	0
248	EUREC4A and HALO. <i>Earth System Science Data</i> , <b>2021</b> , 13, 5545-5563	6.5	7
247	Airborne Solar Radiation Sensors. <i>Springer Handbooks</i> , <b>2021</b> , 1135-1154	1.3	1
246	Passive Solar and Microwave Spectral Radiometers. <i>Springer Handbooks</i> , <b>2021</b> , 821-840	1.3	0
245	Satellite and Aircraft Remote Sensing Platforms. <i>Springer Handbooks</i> , <b>2021</b> , 1053-1068	1.3	
244	Influence of Thermodynamic State Changes on Surface Cloud Radiative Forcing in the Arctic: A Comparison of Two Approaches Using Data From AFLUX and SHEBA. <i>Journal of Geophysical Research D: Atmospheres</i> , <b>2021</b> , 126, e2020JD033589	4.4	1
243	Case study of a humidity layer above Arctic stratocumulus and potential turbulent coupling with the cloud top. <i>Atmospheric Chemistry and Physics</i> , <b>2021</b> , 21, 6347-6364	6.8	3
242	Exploratory analysis of carbonaceous PM <sub>2.5</sub> species in urban environments: Relationship with meteorological variables and satellite data. <i>Atmospheric Environment</i> , <b>2021</b> , 245, 117987	5.3	3
241	Cold-Air Outbreaks in the Marine Boundary Layer Experiment (COMBLE) Field Campaign Report <b>2021</b> ,		2
240	Observations of Aerosol, Cloud, Turbulence, and Radiation Properties at the Top of the Marine Boundary Layer over the Eastern North Atlantic Ocean: The ACORES Campaign. <i>Bulletin of the American Meteorological Society</i> , <b>2021</b> , 102, E123-E147	6.1	4
239	EUREC4A. <i>Earth System Science Data</i> , <b>2021</b> , 13, 4067-4119	10.5	26
238	Influence of atmospheric adjacency effect on top-of-atmosphere radiances and its correction in the retrieval of Lambertian surface reflectivity based on three-dimensional radiative transfer. <i>Remote Sensing of Environment</i> , <b>2021</b> , 263, 112543	13.2	0
237	Linear relationship between effective radius and precipitation water content near the top of convective clouds: measurement results from ACRIDICON-CHUVA campaign. <i>Atmospheric Chemistry and Physics</i> , <b>2021</b> , 21, 14079-14088	6.8	0

236	Observed and Simulated Variability of Droplet Spectral Dispersion in Convective Clouds Over the Amazon. <i>Journal of Geophysical Research D: Atmospheres</i> , <b>2021</b> , 126, e2021JD035076	4.4	1
235	Measurements and Modeling of Optical-Equivalent Snow Grain Sizes under Arctic Low-Sun Conditions. <i>Remote Sensing</i> , <b>2021</b> , 13, 4904	5	
234	Cloud droplet formation at the base of tropical convective clouds: closure between modeling and measurement results of ACRIDICON-CHUVA. <i>Atmospheric Chemistry and Physics</i> , <b>2021</b> , 21, 17513-17528	6.8	0
233	Constraining the Twomey effect from satellite observations: Issues and perspectives <b>2020</b> ,		1
232	Comparison of aircraft measurements during GoAmazon2014/5 and ACRIDICON-CHUVA. <i>Atmospheric Measurement Techniques</i> , <b>2020</b> , 13, 661-684	4	8
231	The challenge of simulating the sensitivity of the Amazonian cloud microstructure to cloud condensation nuclei number concentrations. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 1591-1605	6.8	3
230	Influx of African biomass burning aerosol during the Amazonian dry season through layered transatlantic transport of black carbon-rich smoke. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 4757-4785	6.8	16
229	Small-scale structure of thermodynamic phase in Arctic mixed-phase clouds observed by airborne remote sensing during a cold air outbreak and a warm air advection event. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 5487-5511	6.8	3
228	Solar radiative forcing of aerosol particles near the Taklimakan desert during the Dust Aerosol Observation-Kashi campaign in Spring 2019 <b>2020</b> ,		1
227	Remote Sensing of Arctic Atmospheric Aerosols. <i>Springer Polar Sciences</i> , <b>2020</b> , 505-589	0.4	
226	Airborne Remote Sensing of Arctic Clouds. <i>Springer Series in Light Scattering</i> , <b>2020</b> , 39-66	1.3	
225	Evaluation of ECMWF Radiation Scheme Using Aircraft Observations of Spectral Irradiance above Clouds. <i>Journals of the Atmospheric Sciences</i> , <b>2020</b> , 77, 2665-2685	2.1	
224	Aerosol solar radiative forcing near the Taklimakan Desert based on radiative transfer and regional meteorological simulations during the Dust Aerosol Observation-Kashi campaign. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 10845-10864	6.8	8
223	Employing airborne radiation and cloud microphysics observations to improve cloud representation in ICON at kilometer-scale resolution in the Arctic. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 13145-13165	6.8	1
222	Constraining the Twomey effect from satellite observations: issues and perspectives. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 15079-15099	6.8	14
221	Reassessment of shortwave surface cloud radiative forcing in the Arctic: consideration of surface-albedo-cloud interactions. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 9895-9914	6.8	10
220	Parameterizing anisotropic reflectance of snow surfaces from airborne digital camera observations in Antarctica. <i>Cryosphere</i> , <b>2020</b> , 14, 3959-3978	5.5	5
219	Combining atmospheric and snow radiative transfer models to assess the solar radiative effects of black carbon in the Arctic. <i>Atmospheric Chemistry and Physics</i> , <b>2020</b> , 20, 8139-8156	6.8	3

218	Divergent consensus on Arctic amplification influence on midlatitude severe winter weather. <i>Nature Climate Change</i> , <b>2020</b> , 10, 20-29	21.4	200
217	A biased sampling approach to accelerate backward Monte Carlo atmospheric radiative transfer simulations and its application to Arctic heterogeneous cloud and surface conditions. <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2020</b> , 240, 106690	2.1	1
216	Impact of the near-field effects on radiative transfer simulations of the bidirectional reflectance factor and albedo of a densely packed snow layer. <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2020</b> , 241, 106704	2.1	4
215	Reassessment of the common concept to derive the surface cloud radiative forcing in the Arctic: Consideration of surface albedo-cloud interactions <b>2019</b> ,		2
214	The new BELUGA setup for collocated turbulence and radiation measurements using a tethered balloon: first applications in the cloudy Arctic boundary layer. <i>Atmospheric Measurement Techniques</i> , <b>2019</b> , 12, 4019-4038	4	16
213	A High-Altitude Long-Range Aircraft Configured as a Cloud Observatory: The NARVAL Expeditions. <i>Bulletin of the American Meteorological Society</i> , <b>2019</b> , 100, 1061-1077	6.1	34
212	Cloud geometry from oxygen-A-band observations through an aircraft side window. <i>Atmospheric Measurement Techniques</i> , <b>2019</b> , 12, 1167-1181	4	3
211	Improvement of airborne retrievals of cloud droplet number concentration of trade wind cumulus using a synergetic approach. <i>Atmospheric Measurement Techniques</i> , <b>2019</b> , 12, 1635-1658	4	5
210	Validation of the sea ice surface albedo scheme of the regional climate model HIRHAM/AOSIM using aircraft measurements during the ALOUD/PASCAL campaigns. <i>Cryosphere</i> , <b>2019</b> , 13, 1695-1708	5.5	8
209	Effects of the shape distribution of aerosol particles on their volumetric scattering properties and the radiative transfer through the atmosphere that includes polarization. <i>Applied Optics</i> , <b>2019</b> , 58, 1475-1484	1.7	7
208	A comprehensive in situ and remote sensing data set from the Arctic Cloud Observations Using airborne measurements during polar Day (ALOUD) campaign. <i>Earth System Science Data</i> , <b>2019</b> , 11, 1853-1881	19.5	18
207	The Second ARM Training and Science Application Event: Training the Next Generation of Atmospheric Scientists. <i>Bulletin of the American Meteorological Society</i> , <b>2019</b> , 100, ES5-ES9	6.1	1
206	The Arctic Cloud Puzzle: Using ALOUD/PASCAL Multiplatform Observations to Unravel the Role of Clouds and Aerosol Particles in Arctic Amplification. <i>Bulletin of the American Meteorological Society</i> , <b>2019</b> , 100, 841-871	6.1	85
205	Aerosol characteristics and particle production in the upper troposphere over the Amazon Basin. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 921-961	6.8	69
204	IPRT polarized radiative transfer model intercomparison project - Three-dimensional test cases (phase B). <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2018</b> , 209, 19-44	2.1	24
203	Comparing airborne and satellite retrievals of cloud optical thickness and particle effective radius using a spectral radiance ratio technique: two case studies for cirrus and deep convective clouds. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 4439-4462	6.8	9
202	African volcanic emissions influencing atmospheric aerosols over the Amazon rain forest. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 10391-10405	6.8	12
201	ARCTIC CHANGE AND POSSIBLE INFLUENCE ON MID-LATITUDE CLIMATE AND WEATHER: A US CLIVAR White Paper <b>2018</b> , n/a,		19

200	Aircraft-based observations of isoprene-epoxydiol-derived secondary organic aerosol (IEPOX-SOA) in the tropical upper troposphere over the Amazon region. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 14979-15001	6.8	25
199	Remote Sensing of Droplet Number Concentration in Warm Clouds: A Review of the Current State of Knowledge and Perspectives. <i>Reviews of Geophysics</i> , <b>2018</b> , 56, 409-453	23.1	105
198	Meteorological conditions during the ALOUD/PASCAL field campaign near Svalbard in early summer 2017. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 17995-18022	6.8	23
197	The North Atlantic Waveguide and Downstream Impact Experiment. <i>Bulletin of the American Meteorological Society</i> , <b>2018</b> , 99, 1607-1637	6.1	77
196	Additional global climate cooling by clouds due to ice crystal complexity. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 15767-15781	6.8	16
195	Simulated and observed horizontal inhomogeneities of optical thickness of Arctic stratus. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 13115-13133	6.8	4
194	Role of air-mass transformations in exchange between the Arctic and mid-latitudes. <i>Nature Geoscience</i> , <b>2018</b> , 11, 805-812	18.3	60
193	Overview: Precipitation characteristics and sensitivities to environmental conditions during GoAmazon2014/5 and ACRIDICON-CHUVA. <i>Atmospheric Chemistry and Physics</i> , <b>2018</b> , 18, 6461-6482	6.8	21
192	Aircraft-based observations of isoprene epoxydiol-derived secondary organic aerosol (IEPOX-SOA) in the tropical upper troposphere over the Amazon region <b>2018</b> ,		2
191	Uncertainties of atmospheric polarimetric measurements with sun-sky radiometers induced by errors of relative orientations of polarizers. <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2018</b> , 209, 10-18	2.1	
190	ML-CIRRUS: The Airborne Experiment on Natural Cirrus and Contrail Cirrus with the High-Altitude Long-Range Research Aircraft HALO. <i>Bulletin of the American Meteorological Society</i> , <b>2017</b> , 98, 271-288	6.1	77
189	Degradation of indoor limonene by outdoor ozone: A cascade of secondary organic aerosols. <i>Environmental Pollution</i> , <b>2017</b> , 226, 463-472	9.3	9
188	Vertical distribution of the phase state of particles in tropical deep-convective clouds as derived from cloud-side reflected solar radiation measurements <b>2017</b> ,		1
187	Aerosol characteristics and particle production in the upper troposphere over the Amazon Basin <b>2017</b> ,		5
186	A tandem approach for collocated measurements of microphysical and radiative cirrus properties. <i>Atmospheric Measurement Techniques</i> , <b>2017</b> , 10, 3485-3498	4	2
185	Illustration of microphysical processes in Amazonian deep convective clouds in the Gamma phase space: Introduction and potential applications <b>2017</b> ,		2
184	Comparing Airborne and Satellite Retrievals of Optical and Microphysical Properties of Cirrus and Deep Convective Clouds using a Radiance Ratio Technique <b>2017</b> ,		1
183	Classification of Arctic, Mid-Latitude and Tropical Clouds in the Mixed-Phase Temperature Regime <b>2017</b> ,		2

182	Sensitivities of Amazonian clouds to aerosols and updraft speed <b>2017</b> ,		1
181	Mixed-Phase Clouds: Progress and Challenges. <i>Meteorological Monographs</i> , <b>2017</b> , 58, 5.1-5.50	5.7	100
180	The Green Ocean Amazon Experiment (GoAmazon2014/5) Observes Pollution Affecting Gases, Aerosols, Clouds, and Rainfall over the Rain Forest. <i>Bulletin of the American Meteorological Society</i> , <b>2017</b> , 98, 981-997	6.1	94
179	EURECA: A Field Campaign to Elucidate the Couplings Between Clouds, Convection and Circulation. <i>Surveys in Geophysics</i> , <b>2017</b> , 38, 1529-1568	7.6	82
178	Sensitivities of Amazonian clouds to aerosols and updraft speed. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 10037-10050	6.8	28
177	Vertical distribution of the particle phase in tropical deep convective clouds as derived from cloud-side reflected solar radiation measurements. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 9049-9066	6.8	10
176	Classification of Arctic, midlatitude and tropical clouds in the mixed-phase temperature regime. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 12219-12238	6.8	23
175	Further evidence for CCN aerosol concentrations determining the height of warm rain and ice initiation in convective clouds over the Amazon basin. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 14433-14456	6.8	35
174	Illustration of microphysical processes in Amazonian deep convective clouds in the gamma phase space: introduction and potential applications. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 14727-14746	6.8	8
173	Directional, horizontal inhomogeneities of cloud optical thickness fields retrieved from ground-based and airborne spectral imaging. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 2359-2372	6.8	12
172	Potential of remote sensing of cirrus optical thickness by airborne spectral radiance measurements at different sideward viewing angles. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 4283-4303	6.8	4
171	Comparing parameterized versus measured microphysical properties of tropical convective cloud bases during the ACRIDICON/CHUVA campaign. <i>Atmospheric Chemistry and Physics</i> , <b>2017</b> , 17, 7365-7386	6.8	14
170	Combined retrieval of Arctic liquid water cloud and surface snow properties using airborne spectral solar remote sensing. <i>Atmospheric Measurement Techniques</i> , <b>2017</b> , 10, 3215-3230	4	10
169	Studying aerosol light scattering based on aspect ratio distribution observed by fluorescence microscope. <i>Optics Express</i> , <b>2017</b> , 25, A813-A823	3.3	3
168	Comparison of different methods to retrieve optical-equivalent snow grain size in central Antarctica. <i>Cryosphere</i> , <b>2017</b> , 11, 2727-2741	5.5	14
167	Advanced remote sensing of thunderstorm events and atmospheric electric field <b>2017</b> ,		1
166	EUREC4A: A Field Campaign to Elucidate the Couplings Between Clouds, Convection and Circulation. <i>Space Sciences Series of ISSI</i> , <b>2017</b> , 357-396	0.1	2
165	Understanding Causes and Effects of Rapid Warming in the Arctic. <i>Eos</i> , <b>2017</b> ,	1.5	44

164	Introduction: Observations and Modeling of the Green Ocean Amazon (GoAmazon2014/5). <i>Atmospheric Chemistry and Physics</i> , <b>2016</b> , 16, 4785-4797	6.8	162
163	Spectral optical layer properties of cirrus from collocated airborne measurements and simulations. <i>Atmospheric Chemistry and Physics</i> , <b>2016</b> , 16, 7681-7693	6.8	7
162	ACRIDICON/HUVA Campaign: Studying Tropical Deep Convective Clouds and Precipitation over Amazonia Using the New German Research Aircraft HALO. <i>Bulletin of the American Meteorological Society</i> , <b>2016</b> , 97, 1885-1908	6.1	95
161	Analysis of the Vertical Distribution of the Thermodynamic Phase in Tropical Deep-Convective Clouds <b>2016</b> ,		1
160	SPARTA Solver for Polarized Atmospheric Radiative Transfer Applications: Introduction and application to Saharan dust fields. <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2016</b> , 178, 77-92	2.1	11
159	IPRT polarized radiative transfer model intercomparison project [Phase A]. <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2015</b> , 164, 8-36	2.1	64
158	Turbulent Mixing in Shallow Trade Wind Cumuli: Dependence on Cloud Life Cycle. <i>Journals of the Atmospheric Sciences</i> , <b>2015</b> , 72, 1447-1465	2.1	21
157	Arctic low-level boundary layer clouds: in situ measurements and simulations of mono- and bimodal supercooled droplet size distributions at the top layer of liquid phase clouds. <i>Atmospheric Chemistry and Physics</i> , <b>2015</b> , 15, 617-631	6.8	36
156	Airborne observations and simulations of three-dimensional radiative interactions between Arctic boundary layer clouds and ice floes. <i>Atmospheric Chemistry and Physics</i> , <b>2015</b> , 15, 8147-8163	6.8	13
155	Adaption of the MODIS aerosol retrieval algorithm using airborne spectral surface reflectance measurements over urban areas: a case study. <i>Atmospheric Measurement Techniques</i> , <b>2015</b> , 8, 5237-5249 <sup>4</sup>		7
154	The lasting effect of limonene-induced particle formation on air quality in a genuine indoor environment. <i>Environmental Science and Pollution Research</i> , <b>2015</b> , 22, 14209-19	5.1	4
153	In situ detection of stratosphere-troposphere exchange of cirrus particles in the midlatitudes. <i>Geophysical Research Letters</i> , <b>2015</b> , 42, 949-955	4.9	17
152	Reconstruction of high-resolution time series from slow-response broadband terrestrial irradiance measurements by deconvolution. <i>Atmospheric Measurement Techniques</i> , <b>2015</b> , 8, 3671-3684	4	12
151	The Cloud Particle Spectrometer with Polarization Detection (CPSPD): A next generation open-path cloud probe for distinguishing liquid cloud droplets from ice crystals. <i>Atmospheric Research</i> , <b>2014</b> , 142, 2-14	5.4	34
150	Twomey effect observed from collocated microphysical and remote sensing measurements over shallow cumulus. <i>Journal of Geophysical Research D: Atmospheres</i> , <b>2014</b> , 119, 1534-1545	4.4	36
149	Simulation of the influence of aerosol particles on Stokes parameters of polarized skylight. <i>IOP Conference Series: Earth and Environmental Science</i> , <b>2014</b> , 17, 012026	0.3	2
148	Influence of local surface albedo variability and ice crystal shape on passive remote sensing of thin cirrus. <i>Atmospheric Chemistry and Physics</i> , <b>2014</b> , 14, 1943-1958	6.8	12
147	A new multispectral cloud retrieval method for ship-based solar transmissivity measurements. <i>Journal of Geophysical Research D: Atmospheres</i> , <b>2014</b> , 119, 11,338-11,354	4.4	14

146	A method to calculate Stokes parameters and angle of polarization of skylight from polarized CIMEL sun/sky radiometers. <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2014</b> , 149, 334-346	25
145	In Situ Measurements of Cloud and Precipitation Particles <b>2013</b> , 225-301	12
144	Atmospheric Radiation Measurements <b>2013</b> , 343-411	2
143	Influence of surface albedo inhomogeneities on passive remote sensing of cirrus properties <b>2013</b> ,	1
142	Thermodynamic phase retrieval of convective clouds: impact of sensor viewing geometry and vertical distribution of cloud properties. <i>Atmospheric Measurement Techniques</i> , <b>2013</b> , 6, 539-547	4 25
141	Retrieval of cirrus optical thickness and assessment of ice crystal shape from ground-based imaging spectrometry. <i>Atmospheric Measurement Techniques</i> , <b>2013</b> , 6, 1855-1868	4 12
140	Application of ground-based hyperspectral imaging to retrieve ice crystal shape and fields of cirrus optical thickness <b>2013</b> ,	1
139	Influence of spatial heterogeneity of local surface albedo on the area-averaged surface albedo retrieved from airborne irradiance measurements. <i>Atmospheric Measurement Techniques</i> , <b>2013</b> , 6, 527-537	10
138	The fine-scale structure of the trade wind cumuli over Barbados [An introduction to the CARRIBA project. <i>Atmospheric Chemistry and Physics</i> , <b>2013</b> , 13, 10061-10077	6.8 48
137	New airborne retrieval approach for trade wind cumulus properties under overlying cirrus. <i>Journal of Geophysical Research D: Atmospheres</i> , <b>2013</b> , 118, 3634-3649	4.4 25
136	Optical thickness and effective radius of Arctic boundary-layer clouds retrieved from airborne nadir and imaging spectrometry. <i>Atmospheric Measurement Techniques</i> , <b>2013</b> , 6, 1189-1200	4 24
135	<b>2013</b> ,	77
134	In Situ, Airborne Instrumentation: Addressing and Solving Measurement Problems in Ice Clouds. <i>Bulletin of the American Meteorological Society</i> , <b>2012</b> , 93, ES29-ES34	6.1 34
133	Optical thickness and effective radius of Arctic boundary-layer clouds retrieved from airborne spectral and hyperspectral radiance measurements <b>2012</b> ,	1
132	Airborne hyperspectral observations of surface and cloud directional reflectivity using a commercial digital camera. <i>Atmospheric Chemistry and Physics</i> , <b>2012</b> , 12, 3493-3510	6.8 13
131	Airborne instruments to measure atmospheric aerosol particles, clouds and radiation: A cook@ tour of mature and emerging technology. <i>Atmospheric Research</i> , <b>2011</b> , 102, 10-29	5.4 101
130	On realistic size equivalence and shape of spheroidal Saharan mineral dust particles applied in solar and thermal radiative transfer calculations. <i>Atmospheric Chemistry and Physics</i> , <b>2011</b> , 11, 4469-4490	6.8 22
129	Saharan Mineral Dust Experiments SAMUM@ and SAMUM@: what have we learned?. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2011</b> , 63, 403-429	3.3 164



128	Airborne spectral radiation measurements to derive solar radiative forcing of Saharan dust mixed with biomass burning smoke particles. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2011</b> , 63, 742-750	3.3	20
127	Regional modelling of Saharan dust and biomass-burning smoke. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2011</b> , 63, 800-813	3.3	18
126	Thermal IR radiative properties of mixed mineral dust and biomass aerosol during SAMUM-2. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2011</b> , 63, 751-769	3.3	15
125	Particulate matter pollution in the megacities of the Pearl River Delta, China - a systematic literature review and health risk assessment. <i>International Journal of Hygiene and Environmental Health</i> , <b>2011</b> , 214, 281-95	6.9	48
124	Dependence of extinction cross-section on incident polarization state and particle orientation. <i>Journal of Quantitative Spectroscopy and Radiative Transfer</i> , <b>2011</b> , 112, 2035-2039	2.1	12
123	A New Approach to Link Satellite Observations with Human Health by Aircraft Measurements. <i>Contributions To Statistics</i> , <b>2011</b> , 233-242	0.1	
122	Apparent absorption of solar spectral irradiance in heterogeneous ice clouds. <i>Journal of Geophysical Research</i> , <b>2010</b> , 115,		13
121	Aerosol layers from the 2008 eruptions of Mount Okmok and Mount Kasatochi: In situ upper troposphere and lower stratosphere measurements of sulfate and organics over Europe. <i>Journal of Geophysical Research</i> , <b>2010</b> , 115,		39
120	A new method to retrieve the aerosol layer absorption coefficient from airborne flux density and actinic radiation measurements. <i>Journal of Geophysical Research</i> , <b>2010</b> , 115,		7
119	Effect of measured surface albedo on modeled Saharan dust solar radiative forcing. <i>Journal of Geophysical Research</i> , <b>2010</b> , 115,		14
118	Collocated measurements of boundary layer cloud microphysical and radiative properties: A feasibility study. <i>Journal of Geophysical Research</i> , <b>2010</b> , 115,		12
117	A new method for deriving aerosol solar radiative forcing and its first application within MILAGRO/INTEX-B. <i>Atmospheric Chemistry and Physics</i> , <b>2010</b> , 10, 7829-7843	6.8	11
116	Lidar characterization of the Arctic atmosphere during ASTAR 2007: four cases studies of boundary layer, mixed-phase and multi-layer clouds. <i>Atmospheric Chemistry and Physics</i> , <b>2010</b> , 10, 2847-2866	6.8	13
115	In-situ observations of young contrails Overview and selected results from the CONCERT campaign. <i>Atmospheric Chemistry and Physics</i> , <b>2010</b> , 10, 9039-9056	6.8	75
114	A new airborne tandem platform for collocated measurements of microphysical cloud and radiation properties. <i>Atmospheric Measurement Techniques</i> , <b>2009</b> , 2, 147-158	4	11
113	Desert dust aerosol air mass mapping in the western Sahara, using particle properties derived from space-based multi-angle imaging. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2009</b> , 61, 239-251	3.3	52
112	Dust mobilization and transport in the northern Sahara during SAMUM 2006 A meteorological overview. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2009</b> , 61, 12-31	3.3	73
111	Solar radiative effects of a Saharan dust plume observed during SAMUM assuming spheroidal model particles. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2009</b> , 61, 270-296	3.3	78

110	Retrieval of aerosol optical thickness for desert conditions using MERIS observations during the SAMUM campaign. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2009</b> , 61, 229-238	3-3	21
109	Spectral surface albedo over Morocco and its impact on radiative forcing of Saharan dust. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2009</b> , 61, 252-269	3-3	59
108	Measurements of desert dust optical characteristics at Porte au Sahara during SAMUM. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2009</b> , 61, 206-215	3-3	18
107	Influence of ice crystal shape on retrieval of cirrus optical thickness and effective radius: A case study. <i>Journal of Geophysical Research</i> , <b>2009</b> , 114,		26
106	EUFAR goes hyperspectral in FP7 <b>2009</b> ,		1
105	Irradiance in polluted cumulus fields: Measured and modeled cloud-aerosol effects. <i>Geophysical Research Letters</i> , <b>2009</b> , 36, n/a-n/a	4-9	19
104	Microphysical and optical properties of Arctic mixed-phase clouds. The 9 April 2007 case study.. <i>Atmospheric Chemistry and Physics</i> , <b>2009</b> , 9, 6581-6595	6.8	33
103	Microphysical and radiative characterization of a subvisible midlevel Arctic ice cloud by airborne observations – a case study. <i>Atmospheric Chemistry and Physics</i> , <b>2009</b> , 9, 2647-2661	6.8	35
102	Evidence of ice crystals at cloud top of Arctic boundary-layer mixed-phase clouds derived from airborne remote sensing. <i>Atmospheric Chemistry and Physics</i> , <b>2009</b> , 9, 9401-9416	6.8	20
101	. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2009</b> , 61,	3-3	3
100	Radiative and dynamic effects of absorbing aerosol particles over the Pearl River Delta, China. <i>Atmospheric Environment</i> , <b>2008</b> , 42, 6405-6416	5-3	51
99	Relative humidity dependence of aerosol optical properties and direct radiative forcing in the surface boundary layer at Xinken in Pearl River Delta of China: An observation based numerical study. <i>Atmospheric Environment</i> , <b>2008</b> , 42, 6373-6397	5-3	136
98	Hygroscopic properties and extinction of aerosol particles at ambient relative humidity in South-Eastern China. <i>Atmospheric Environment</i> , <b>2008</b> , 42, 6321-6334	5-3	70
97	Ice crystal shape effects on solar radiative properties of Arctic mixed-phase clouds Dependence on microphysical properties. <i>Atmospheric Research</i> , <b>2008</b> , 88, 266-276	5-4	16
96	Combining Upcoming Satellite Missions and Aircraft Activities: Future Challenges for the EUFAR Fleet. <i>Bulletin of the American Meteorological Society</i> , <b>2008</b> , 89, 385-388	6-1	4
95	Laboratory Studies of Scattering Properties of Polluted Cloud Droplets: Implications for FSSP Measurements. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>2008</b> , 25, 1894-1898	2	3
94	Influence of clouds on the spectral actinic flux density in the lower troposphere (INSPECTRO): overview of the field campaigns. <i>Atmospheric Chemistry and Physics</i> , <b>2008</b> , 8, 1789-1812	6.8	17
93	Cloud phase identification of Arctic boundary-layer clouds from airborne spectral reflection measurements: test of three approaches. <i>Atmospheric Chemistry and Physics</i> , <b>2008</b> , 8, 7493-7505	6.8	55

92	On the direct and semidirect effects of Saharan dust over Europe: A modeling study. <i>Journal of Geophysical Research</i> , <b>2007</b> , 112,		68
91	Effects of ice crystal habit on thermal infrared radiative properties and forcing of cirrus. <i>Journal of Geophysical Research</i> , <b>2007</b> , 112,		49
90	Comparing irradiance fields derived from Moderate Resolution Imaging Spectroradiometer airborne simulator cirrus cloud retrievals with solar spectral flux radiometer measurements. <i>Journal of Geophysical Research</i> , <b>2007</b> , 112,		7
89	Reproducing cloud microphysical and irradiance measurements using three 3D cloud generators. <i>Quarterly Journal of the Royal Meteorological Society</i> , <b>2007</b> , 133, 765-780	6.4	21
88	Evidence for inertial droplet clustering in weakly turbulent clouds. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2007</b> , 59, 57-65	3.3	12
87	A CCD Spectroradiometer for Ultraviolet Actinic Radiation Measurements. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>2007</b> , 24, 449-462	2	16
86	Atmospheric radiative effects of an in situ measured Saharan dust plume and the role of large particles. <i>Atmospheric Chemistry and Physics</i> , <b>2007</b> , 7, 4887-4903	6.8	78
85	Probing Finescale Dynamics and Microphysics of Clouds with Helicopter-Borne Measurements. <i>Bulletin of the American Meteorological Society</i> , <b>2006</b> , 87, 1727-1738	6.1	78
84	Airborne measurements of spectral direct aerosol radiative forcing in the Intercontinental chemical Transport Experiment/Intercontinental Transport and Chemical Transformation of anthropogenic pollution, 2004. <i>Journal of Geophysical Research</i> , <b>2006</b> , 111,		32
83	Potential of lidar backscatter data to estimate solar aerosol radiative forcing. <i>Applied Optics</i> , <b>2006</b> , 45, 770-83	1.7	5
82	Observations of Small-Scale Turbulence and Energy Dissipation Rates in the Cloudy Boundary Layer. <i>Journals of the Atmospheric Sciences</i> , <b>2006</b> , 63, 1451-1466	2.1	83
81	Parameterization of Ozone Photolysis Frequency in the Lower Troposphere Using Data from Photodiode Array Detector Spectrometers. <i>Journal of Atmospheric Chemistry</i> , <b>2006</b> , 54, 67-87	3.2	7
80	Airborne system for fast measurements of upwelling and downwelling spectral actinic flux densities. <i>Applied Optics</i> , <b>2005</b> , 44, 434-44	1.7	19
79	Impact of cirrus crystal shape on solar spectral irradiance: A case study for subtropical cirrus. <i>Journal of Geophysical Research</i> , <b>2005</b> , 110,		48
78	Spectral actinic flux in the lower troposphere: measurement and 1-D simulations for cloudless, broken cloud and overcast situations. <i>Atmospheric Chemistry and Physics</i> , <b>2005</b> , 5, 1975-1997	6.8	34
77	Laboratory Studies and Numerical Simulations of Cloud Droplet Formation under Realistic Supersaturation Conditions. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>2004</b> , 21, 876-887	2	65
76	Airborne measurements of areal spectral surface albedo over different sea and land surfaces. <i>Journal of Geophysical Research</i> , <b>2004</b> , 109,		50
75	Airborne measurements of ground and cloud spectral albedos under low aerosol loads. <i>Journal of Geophysical Research</i> , <b>2004</b> , 109,		15

74	Aircraft Particle Inlets: State-of-the-Art and Future Needs. <i>Bulletin of the American Meteorological Society</i> , <b>2004</b> , 85, 89-92	6.1	15
73	Supplement to Aircraft Particle Inlets: State-of-the-Art and Future Needs. <i>Bulletin of the American Meteorological Society</i> , <b>2004</b> , 85, 92-92	6.1	12
72	THE BALTEX BRIDGE CAMPAIGN: An Integrated Approach for a Better Understanding of Clouds. <i>Bulletin of the American Meteorological Society</i> , <b>2004</b> , 85, 1565-1584	6.1	31
71	Minimizing Instrumental Broadening of the Drop Size Distribution with the M-Fast-FSSP. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>2004</b> , 21, 1855-1867	2	15
70	Assessing 1D Atmospheric Solar Radiative Transfer Models: Interpretation and Handling of Unresolved Clouds. <i>Journal of Climate</i> , <b>2003</b> , 16, 2676-2699	4.4	109
69	Performance of a Counterflow Virtual Impactor in the NASA Icing Research Tunnel. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>2003</b> , 20, 781-790	2	49
68	New-particle formation events in a continental boundary layer: first results from the SATURN experiment. <i>Atmospheric Chemistry and Physics</i> , <b>2003</b> , 3, 1445-1459	6.8	49
67	Dependence of solar radiative forcing of forest fire aerosol on ageing and state of mixture. <i>Atmospheric Chemistry and Physics</i> , <b>2003</b> , 3, 881-891	6.8	57
66	A New Tethered Balloon-Borne Payload for Fine-Scale Observations in the Cloudy Boundary Layer. <i>Boundary-Layer Meteorology</i> , <b>2003</b> , 106, 461-482	3.4	30
65	. <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2003</b> , 55, 796-807	3.3	11
64	Vertical distribution of spectral solar irradiance in the cloudless sky: A case study. <i>Geophysical Research Letters</i> , <b>2003</b> , 30,	4.9	15
63	Ground-based measured and calculated spectra of actinic flux density and downward UV irradiance in cloudless conditions and their sensitivity to aerosol microphysical properties. <i>Journal of Geophysical Research</i> , <b>2003</b> , 108,		4
62	Size-dependent aerosol activation at the high-alpine site Jungfraujoch (3580 m asl). <i>Tellus, Series B: Chemical and Physical Meteorology</i> , <b>2002</b> , 54, 82-95	3.3	7
61	Wind Tunnel Tests of the Airborne PVM-100A Response to Large Droplets. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>2002</b> , 19, 1577-1584	2	26
60	Vertical variability of aerosol properties observed at a continental site during the Lindenberg Aerosol Characterization Experiment (LACE 98). <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, LAC 10-1-LAC 10-18		52
59	STAAARTE-MED 1998 summer airborne measurements over the Aegean Sea 1. Aerosol particles and trace gases. <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, AAC 1-1-AAC 1-15		31
58	STAAARTE-MED 1998 summer airborne measurements over the Aegean Sea 2. Aerosol scattering and absorption, and radiative calculations. <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, AAC 2-1-AAC 2-14		56
57	Optical closure for an aerosol column: Method, accuracy, and inferable properties applied to a biomass-burning aerosol and its radiative forcing. <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, LAC 12-1-LAC 12-15		65

56	Optical and microphysical characterization of biomass-burning and industrial-pollution aerosols from- multiwavelength lidar and aircraft measurements. <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, LAC 7-1-LAC 7-20		139
55	Aerosol-radiation interaction in the cloudless atmosphere during LACE 98 1. Measured and calculated broadband solar and spectral surface insulations. <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, LAC 6-1-LAC 6-20		17
54	Particle scattering, backscattering, and absorption coefficients: An in situ closure and sensitivity study. <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, LAC 4-1-LAC 4-18		63
53	Aerosol-radiation interaction in the cloudless atmosphere during LACE 98 2. Aerosol-induced solar irradiance changes determined from airborne pyranometer measurements and calculations. <i>Journal of Geophysical Research</i> , <b>2002</b> , 107, LAC 12-1-LAC 12-15		9
52	A case study on microphysical and radiative properties of power-plant-originated clouds. <i>Atmospheric Research</i> , <b>2002</b> , 63, 291-301	5-4	2
51	An Airborne Spectral Albedometer with Active Horizontal Stabilization. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>2001</b> , 18, 1856-1866	2	76
50	Measured profiles of aerosol particle absorption and its influence on clear-sky solar radiative forcing. <i>Journal of Geophysical Research</i> , <b>2001</b> , 106, 1237-1247		22
49	Aerosol optical properties and large-scale transport of air masses: Observations at a coastal and a semiarid site in the eastern Mediterranean during summer 1998. <i>Journal of Geophysical Research</i> , <b>2001</b> , 106, 9807-9826		53
48	Bursts of Aitken mode and ultrafine particles observed at the top of continental boundary layer clouds. <i>Journal of Aerosol Science</i> , <b>2001</b> , 32, 649-660	4-3	26
47	Measurement-based aerosol forcing calculations: The influence of model complexity. <i>Meteorologische Zeitschrift</i> , <b>2001</b> , 10, 45-60	3-1	10
46	RADIATIVE FORCING OF A BIOMASS BURNING LAYER AND ITS DEPENDENCE ON AEROSOL MICROPHYSICS. <i>Journal of Aerosol Science</i> , <b>2001</b> , 32, 47-48	4-3	
45	Measurement-based J(NO <sub>2</sub> ) sensitivity in a cloudless atmosphere under low aerosol loading and high solar zenith angle conditions. <i>Atmospheric Environment</i> , <b>2000</b> , 34, 5249-5254	5-3	3
44	Microphysical particle parameters from extinction and backscatter lidar data by inversion with regularization: experiment. <i>Applied Optics</i> , <b>2000</b> , 39, 1879-92	1-7	58
43	Comparison of observed and simulated NO <sub>2</sub> photodissociation frequencies in a cloudless atmosphere and in continental boundary layer clouds. <i>Journal of Geophysical Research</i> , <b>2000</b> , 105, 9843-9857		16
42	H. R. Pruppacher and J. D. Klett, Microphysics of Clouds and Precipitation. <i>Journal of Atmospheric Chemistry</i> , <b>1999</b> , 32, 420-422	3-2	2
41	The Great Dun Fell Experiment 1995: an overview. <i>Atmospheric Research</i> , <b>1999</b> , 50, 151-184	5-4	29
40	Droplet nucleation and growth in orographic clouds in relation to the aerosol population. <i>Atmospheric Research</i> , <b>1999</b> , 50, 289-315	5-4	37
39	Discrepancies between measured and modeled solar and UV radiation within polluted boundary layer clouds. <i>Journal of Geophysical Research</i> , <b>1999</b> , 104, 27373-27385		24

38	Enhanced particle number concentration at the top of stratiform boundary layer clouds. <i>Journal of Aerosol Science</i> , <b>1998</b> , 29, S705-S706	4-3	
37	Aerosol absorption in a heavily polluted area. <i>Journal of Aerosol Science</i> , <b>1998</b> , 29, S1257-S1258	4-3	
36	A Quantitative Comparison of Ground-Based FSSP and PVM Measurements. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>1998</b> , 15, 887-900	2	18
35	Microphysical and optical features of polluted cooling tower clouds. <i>Atmospheric Research</i> , <b>1997</b> , 44, 271-292	5-4	1
34	Meteorology of the great dun fell cloud experiment 1993. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2407-2420	9-3	35
33	Source identification during the Great Dun Fell cloud experiment 1993. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2441-2451	5-3	15
32	Cloud droplet nucleation scavenging in relation to the size and hygroscopic behaviour of aerosol particles. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2463-2475	5-3	80
31	Experimental determination of the connection between cloud droplet size and its dry residue size. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2477-2490	5-3	22
30	The reduced nitrogen budget of an orographic cloud. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2599-2614	5-3	23
29	The size-dependent chemical composition of cloud droplets. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2561-2576	5-3	44
28	Night-time formation and occurrence of new particles associated with orographic clouds. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2545-2559	5-3	63
27	The great dun fell cloud experiment 1993: An overview. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2393-2405	5-3	60
26	Observations and modelling of the processing of aerosol by a hill cap cloud. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2527-2543	5-3	49
25	Microphysics of clouds: Model vs measurements. <i>Atmospheric Environment</i> , <b>1997</b> , 31, 2453-2462	5-3	25
24	FSSP sizing tests using monodisperse water drops. <i>Journal of Aerosol Science</i> , <b>1996</b> , 27, S545-S546	4-3	
23	Vertical Profiles of Aerosol and Radiation and the Influence of a Temperature Inversion: Measurements and Radiative Transfer Calculations. <i>Journal of Applied Meteorology and Climatology</i> , <b>1996</b> , 35, 1703-1715		37
22	FSSP Characterization with Monodisperse Water Droplets. <i>Journal of Atmospheric and Oceanic Technology</i> , <b>1996</b> , 13, 1152-1165	2	34
21	14.P.37 Change in the submicron particle size distribution during a cloud process measured with three DMPS systems. <i>Journal of Aerosol Science</i> , <b>1994</b> , 25, 181-182	4-3	

20	Possibility of refractive index determination of atmospheric aerosol particles by ground-based solar extinction and scattering measurements. <i>Atmospheric Environment</i> , <b>1994</b> , 28, 785-792	5.3	67
19	Variability of aerosol optical parameters by advective processes. <i>Atmospheric Environment</i> , <b>1994</b> , 28, 923-933	5.3	30
18	Measurements of the optical depth and retrieval of aerosol parameters in the polar regions. <i>Journal of Aerosol Science</i> , <b>1991</b> , 22, S415-S418	4.3	2
17	VELOX – a new thermal infrared imager for airborne remote sensing of cloud and surface properties		2
16	African volcanic emissions influencing atmospheric aerosol particles over the Amazon rain forest		4
15	In-situ observations of young contrails – overview and selected results from the CONCERT campaign		4
14	A new method for deriving aerosol solar radiative forcing and its first application within MILAGRO/INTEX-B		4
13	The fine-scale structure of the trade wind cumuli over Barbados – an introduction to the CARRIBA project		4
12	Arctic low-level boundary layer clouds: in-situ measurements and simulations of mono- and bimodal supercooled droplet size distributions at the cloud top layer		1
11	Spectral optical layer properties of cirrus from collocated airborne measurements – a feasibility study		3
10	Introduction: Observations and Modeling of the Green Ocean Amazon (GoAmazon2014/5)		9
9	Observations of boundary layer, mixed-phase and multi-layer Arctic clouds with different lidar systems during ASTAR 2007		3
8	Comparison of different methods to retrieve effective snow grain size in central Antarctica		2
7	Size-dependent aerosol activation at the high-alpine site Jungfraujoch (3580 m asl)		59
6	Cloud phase identification of low-level Arctic clouds from airborne spectral radiation measurements: test of three approaches		3
5	Microphysical and optical properties of Arctic mixed-phase clouds – the 9 April 2007 case study		2
4	Evidence of ice crystals at cloud top of Arctic boundary-layer mixed-phase clouds derived from airborne remote sensing		1
3	EUREC4A – HALO		2

2	Introduction to Airborne Measurements of the Earth Atmosphere and Surface1-5	3
1	Measurement of Aircraft State and Thermodynamic and Dynamic Variables7-75	17