

6. 成果発表

6.1. 論文等

気象研究所の職員が、平成 26 年度に発表した原著論文や報告書、著書、翻訳、解説などの著作物について、単独・共著の区別なく掲載した。ただし、口頭発表に伴う著作物のうち学会予稿集など簡易なものについては除いている。

各著作物の情報は、整理番号、著者、発表年、タイトル、掲載誌（書名）、掲載巻、掲載頁、doi（オンライン論文誌）または ISBN（著書（分担執筆含む））の順で掲載した。整理番号の後ろに「*」を付した著作物は、査読付きであることを示している。

- 青木輝夫 1* Yasunari, T. J., K.-M. Lau, S. P. P. Mahanama, P. R. Colarco, A. M. da Silva, Te. Aoki, K. Aoki, N. Murao, S. Yamagata and Y. Kodama, 2014: The GODDARD SNOW Impurity Module (GOSWIM) for the NASA GEOS-5 Earth System Model: Preliminary comparisons with observations in Sapporo, Japan. *SOLA*, **10**, 50-56, doi:10.2151/sola.2014-011.
- 2* Sugiyama, S., D. Sakakibara, S. Matsuno, S. Yamaguchi, S. Matoba and Te. Aoki, 2014: Initial field observations on Qaanaaq ice cap in northwestern Greenland. *Annals of Glaciology*, **55**, 25-33, doi:10.3189/2013AoG66A102.
- 3* Aoki, Te., S. Matoba, J. Uetake, N. Takeuchi and H. Motoyama, 2014: Field activities of “Snow Impurities and Glacial Microbe effects on abrupt warming in the Arctic” (SIGMA) Project in Greenland in 2011-2013. *Bulletin of Glaciological Research*, **32**, 3-20, doi:10.5331/bgr.32.3.
- 4* Aoki, Te., S. Matoba, S. Yamaguchi, T. Tanikawa, M. Niwano, K. Kuchiki, K. Adachi, J. Uetake, H. Motoyama and M. Hori, 2014: Light-absorbing snow impurity concentrations measured on northwest Greenland ice sheet in 2011 and 2012. *Bulletin of Glaciological Research*, **32**, 21-31, doi:10.5331/bgr.32.21.
- 5* Hori, M., Te. Aoki, T. Tanikawa, K. Kuchiki, M. Niwano, S. Yamaguchi and S. Matoba, 2014: Dependence of thermal infrared emissive behaviors of snow cover on the surface snow type. *Bulletin of Glaciological Research*, **32**, 33-45, doi:10.5331/bgr.32.33.
- 6* Yamaguchi, S., H. Motoyoshi, T. Tanikawa, Te. Aoki, M. Niwano, Y. Takeuchi and Y. Endo, 2014: Application of snow specific surface area measurement using an optical method based on near-infrared reflectance around 900-nm wavelength to wet snow zones in Japan. *Bulletin of Glaciological Research*, **32**, 55-64, doi:10.5331/bgr.32.55.
- 7* Niwano, M., T. Aoki, K. Kuchiki, M. Hosaka, Y. Kodama, S. Yamaguchi, H. Motoyoshi and Y. Iwata, 2014: Evaluation of updated physical snowpack model SMAP. *Bulletin of Glaciological Research*, **32**, 65-78, doi:10.5331/bgr.32.65.
- 8* Hachikubo, A., S. Yamaguchi, H. Arakawa, T. Tanikawa, M. Hori, K. Sugiura, S. Matoba, M. Niwano, K. Kuchiki and Te. Aoki, 2014: Effects of temperature and grain type on time variation of snow specific surface area. *Bulletin of Glaciological Research*, **32**, 47-53, doi:10.5331/bgr.32.47.
- 9* Yamaguchi, S., S. Matoba, T. Yamazaki, A. Tsushima, M. Niwano, T. Tanikawa and Te. Aoki, 2014: Glaciological observations in 2012 and 2013 at SIGMA-A site, Northwest Greenland. *Bulletin of Glaciological Research*, **32**, 95-105, doi:10.5331/bgr.32.95.
- 10 八久保晶弘, M. Schneebeli, 山口悟, 堀雅裕, 谷川朋範, 杉浦幸之助, 的場澄人, 庭野匡思, 朽木勝幸, 青木輝夫, 2014: 積雪の比表面積と粒径との関係. *北海道の雪氷*, **33**, 121-124.
- 11* Chen, N., W. Li, T. Tanikawa, M. Hori, Te. Aoki and K. Stamnes, 2014: Cloud mask

- over snow/ice-covered areas for the GCOM-C1/SGLI cryosphere mission: Validations over Greenland. *Journal of Geophysical Research Atmosphere*, **119**, 287-300, doi:10.1002/2014JD022017.
- 12 Aoki, Te, 2014: Radiative properties of snow and their application to climate study. *Proc. International Snow and Ice Science Workshop*, 3-6.
- 13* Tanikawa, T., M. Hori, Te. Aoki, A. Hachikubo, K. Kuchiki, M. Niwano, S. Matoba, S. Yamaguchi, and K. Stamnes, 2014: In situ measurements of polarization properties of snow surface under the Brewster geometry in Hokkaido, Japan, and northwest Greenland ice sheet. *Journal of Geophysical Research Atmosphere*, **119**, 946-964, doi:10.1002/2014JD022325.
- 14* 平島寛行, 山口悟, 小杉健二, 根本征樹, 青木輝夫, 的場澄人, 2015: 断面観測結果を用いた積雪変質モデルの検証. *雪氷*, **77**, 5-16.
- 15* Kuchiki, K., Te. Aoki, M. Niwano, S. Matoba, Y. Kodama and K. Adachi, 2015: Elemental carbon, organic carbon, and dust concentrations in snow measured with thermal optical method and filter weighing: variations during 2007-2013 winters in Sapporo, Japan. *Journal of Geophysical Research Atmosphere*, **120**, 868-882, doi:10.1002/2014JD022144.
- 16 山口悟, 青木輝夫, 的場澄人, 2015: グリーンランド北西部における雪氷学的研究. *月刊地球*, **37**, 59-71.
- 青梨和正 1 Origuchi, S., K. Aonashi, T. Kawabata and M. Kunii, 2014: Development of a new Ensemble Variational Assimilation System in Meteorological Research Institute. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.17-1.18.
- 青柳曉典 1 Seino, N., T. Aoyagi and H. Tsuguti, 2014: Urban impact on summertime precipitation in Tokyo: Numerical simulation using NHM and the Square Prism Urban Canopy scheme. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 4.07-4.08.
- 2* Adachi, S. A., F. Kimura, H. Kusaka, M. G. Duda, Y. Yamagata, H. Seya, K. Nakamichi and T. Aoyagi, 2014: Moderation of summertime heat island phenomena via modification of the urban form in the Tokyo metropolitan area.. *Journal of Applied Meteorology and Climatology*, **53**, 1886-1900, doi:10.1175/JAMC-D-13-0194.1.
- 3* 青柳曉典, 泉敏治, 酒井哲, 永井智広, 2014: ドップラーライダーDBS 計測による都市域の粗度長とゼロ面変位高の推定. *風工学シンポジウム論文集*, **23**, 43-48.
- 4 青柳曉典, 2015: 都市化に伴う気候変化. *隔月刊誌「地球温暖化」*, **35**, 46-47.
- 足立アホロ 1* Horiguchi, M., T. Hayashi, A. Adachi and S. Onogi, 2014: Stability Dependence and Diurnal Change of Large-Scale Turbulence Structures in the Near-Neutral Atmospheric Boundary Layer Observed from a Meteorological Tower. *Boundary-Layer Meteorology*, **151**, 221-237, doi:10.1007/s10546-013-9903-1.
- 足立光司 1* Adachi, K., Y. Zaizen, M. Kajino and Y. Igarashi, 2014: Mixing state of regionally transported soot particles and the coating effect on their size and shape at a mountain site in Japan. *Journal of Geophysical Research Atmosphere*, **119**, 5386-5396, doi:10.1002/2013JD020880.
- 2* Abe, Y., Y. Iizawa, Y. Terada, K. Adachi, Y. Igarashi and I. Nakai, 2014: Detection of uranium and chemical state analysis of individual radioactive microparticles emitted from the Fukushima nuclear accident using multiple synchrotron radiation X-ray analyses. *Analytical Chemistry*, **86**, 8521-8525, doi:10.1021/ac501998d.
- 3* Adachi, K. and P. R. Buseck, 2015: Changes in shape and composition of sea-salt particles upon aging in an urban atmosphere. *Atmospheric Environment*, **100**, 1-9.

- 荒木健太郎 1* Araki, K., H. Ishimoto, M. Murakami and T. Tajiri, 2014: Temporal variation of close-proximity soundings within a tornadic supercell environment. *SOLA*, **10**, 57-61.
- 2 荒木健太郎, 2014: 雲の中では何が起きているのか. ベレ出版, 344pp, ISBN: 9784860643973
- 3 Saito, K., M. Kunii and K. Araki, 2014: Cloud resolving simulation of a local heavy rainfall event on 26 August 2011 observed by the Tokyo Metropolitan Area Convection Study (TOMACS). *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 5.05-5.06.
- 4 荒木健太郎, 中井専人, 前多良一, 2015: 2014 年度秋季大会スペシャル・セッション「南岸低気圧による大雪: その要因, 実態, 予測可能性」報告. *天気*, **62**, 133-142.
- 安藤忍 1* Takagi, A., K. Fujiwara, T. Ohkura, A. C. Luis, Jr., A. V. Baloloy, S. Ando, E. Laguerta and Ma. A. V. Bornas, 2015: Ground Deformation of Mayon Volcano Revealed by GPS Campaign Survey. *Journal of Disaster Research*, **10**, 106-112.
- 五十嵐康人 1* Adachi, K., Y. Zaizen, M. Kajino and Y. Igarashi, 2014: Mixing state of regionally transported soot particles and the coating effect on their size and shape at a mountain site in Japan. *Journal of Geophysical Research Atmosphere*, **119**, 5386-5396, doi:10.1002/2013JD020880.
- 2* Abe, Y., Y. Iizawa, Y. Terada, K. Adachi, Y. Igarashi and I. Nakai, 2014: Detection of uranium and chemical state analysis of individual radioactive microparticles emitted from the Fukushima nuclear accident using multiple synchrotron radiation X-ray analyses. *Analytical Chemistry*, **86**, 8521-8525, doi:10.1021/ac501998d.
- 3 青野辰雄, 青山道夫, 五十嵐康人, 石丸隆, 今田正俊, 植松光夫, 海老原充, 大塚孝治, 大原利眞, 恩田裕一, 河野健, 神田穰太, 北和之, 坂口綾, 篠原厚, 柴田徳思, 下浦享, 高橋知之, 高橋嘉夫, 滝川雅之, 竹中千里, 竹村俊彦, 田中万也, 田中泰宙, 谷畑勇夫, 茅野政道, 津田敦, 津旨大輔, 鶴田治雄, 永井晴康, 長尾誠也, 中島映至, 中村尚, 浜島靖典, 藤原守, 升本順夫, 森口祐一, 森野悠, 2014: 原発事故環境汚染—福島第一原発事故の地球科学的側面. 東京大学出版会, 312pp, ISBN: 9784130603126
- 4 五十嵐康人, 梶野瑞王, 栗原治, 小林卓也, 関山剛, 竹村俊彦, 滝川雅之, 田中泰宙, 津旨大輔, 永井晴康, 眞木貴史, 升本順夫, 森野悠, 速水洋, 内山雄介, 木田新一郎, 斉藤和雄, 新堀敏基, 東博紀, 宮澤泰正, P. Bailly du Bois, Bocquet, M. Boust, D. Brovchenko, I. Brovchenko, A. Choe, T. Christoudias, D. Didier, H. Dietze, P. Garreau *et al.*, 2014: 東京電力福島第一原子力発電所事故によって環境中に放出された放射性物質の輸送沈着過程に関するモデル計算結果の比較. 日本学術会議報告.
- 5* Kobayashi H., Hayashi M., Shiraishi K., Nakura Y., Enomoto T., Miura K., Takahashi H., Igarashi Y., Naoe H., Kaneyasu N., Nishizawa T., Sugimoto N., 2014: Development of a polarization optical particle counter capable of aerosol type classification. *Atmospheric Environment*, **97**, 486-492, doi:10.1016/j.atmosenv.2014.05.006.
- 石井雅男 1* Takatani, Y., K. Enyo, Y. Iida, A. Kojima, T. Nakano, D. Sasano, N. Kosugi, T. Midorikawa, T. Suzuki and M. Ishii, 2014: Relationships between total alkalinity in surface water and sea surface dynamic height in the Pacific Ocean. *Journal of Geophysical Research Oceans*, **119**, 2806-2814, doi:10.1002/2013JC009739.
- 2 蒲生俊敬, 小畑元, 石井雅男, 宗林由樹, 田上英一郎, 植松光夫, 石橋純一郎, 村山正史, 2014: 第 3 章: 海洋の炭酸物質と栄養塩. *海洋地球化学*, 講談社, 53-77, ISBN: 9784061552371.
- 石井正好 1* Imada, Y., H. Shiogama, M. Watanabe, M. Mori, M. Kimoto, and M. Ishii, 2014: The Contribution of anthropogenic forcing to the Japanese heat waves of 2013.

- Bulletin of the American Meteorological Society*, **95**, 52-54, doi:10.1175/1520-0477-95.9.S1.1.
- 2* Storto, A. S. Masina, M. Balmaseda, S. Guinehut, Y. Xue, T. Szekely, I. Fukumori, G. Forget, Y.-S. Chang, S. A. Good, A. Köhl, G. Vernieres, N. Ferry, K. A. Peterson, D. Behringer, M. Ishii, S. Masuda, Y. Fujii, T. Toyoda, Y. Yin, M. Valdivieso and B. Barnier, 2015: Steric sea level variability (1993-2010) in an ensemble of ocean reanalyses and objective analyses. *Climate Dynamics*, doi:10.1007/s00382-015-2554-9.
- 石橋俊之 1 Okamoto, K., S. Ishii, P. Baron, T. Ishibashi and T. Tanaka, 2014: Observing Simulation System Experiment (OSSE) of Spaceborne Doppler Wind Lidar. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 115-116.
- 2* Ishibashi, T., 2014: Observing system simulation experiments with multiple Methods. *Proc. of SPIE*, **9265**, 926508-12.
- 3 石橋俊之, 2015: FSO による評価. *数値予報課報告別冊*, **61**, 90-92.
- 石元裕史 1* Araki, K., H. Ishimoto, M. Murakami and T. Tajiri, 2014: Temporal variation of close-proximity soundings within a tornadic supercell environment. *SOLA*, **10**, 57-61.
- 2* Ishimoto, H., K. Okamoto, H. Okamoto and K. Sato, 2014: One-dimensional variational (1D-Var) retrieval of middle to upper tropospheric humidity using AIRS radiance data. *Journal of Geophysical Research Atmosphere*, **119**, 7633-7654, doi:10.1002/2014JD021706.
- 泉敏治 1* 青柳曉典, 泉敏治, 酒井哲, 永井智広, 2014: ドップラーライダーDBS 計測による都市域の粗度長とゼロ面変位高の推定. *風工学シンポジウム論文集*, **23**, 43-48.
- 猪上華子 1 Nishihashi, M., C. Fujiwara, K. Kusunoki, S. Yoshida, S. Hayashi, H. Y. Inoue, K. Arai, K. Shimose, R. Kato, S. Saito, E. Sato, W. Mashiko and H. Suzuki, 2014: Three-Dimensional Characteristics of Lightning Channels, Reflectivity Cores, and Vortices in Winter Thunderstorms. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-01-10.
- 今田由紀子 1 今田由紀子, 2014: 第2回・異常気象の要因分析. *日報ビジネス隔月刊「地球温暖化」*, **32**.
- 2* Imada, Y., H. Shiogama, M. Watanabe, M. Mori, M. Kimoto and M. Ishii, 2014: The Contribution of anthropogenic forcing to the Japanese heat waves of 2013. *Bulletin of the American Meteorological Society*, **95**, 52-54, doi:10.1175/1520-0477-95.9.S1.1.
- 碓氷典久 1 小川浩司, 碓氷典久, 倉賀野連, 藤井陽介, 豊田隆寛, 蒲地政文, 2014: MOVE/MRI.COM-WNP 再解析データに見られた黒潮流路変動と瀬戸内海水位変動との関係. *測候時報*, **81(特別号)**, S77-S91.
- 2* Nishikawa, H., H. Igarashi, Y. Ishikawa, M. Sakai, Y. Kato, M. Ebina, N. Usui, M. Kamachi and T. Awaji, 2014: Impact of paralarvae and juveniles feeding environment on the neon flying squid (*Ommastrephes bartramii*) winter-spring cohort stock. *Fisheries Oceanography*, **23**, 289-303, doi:10.1111/fog.12064.
- 3 碓氷典久, 坂本圭, 小川浩司, 藤井陽介, 辻野博之, 山中吾郎, 倉賀野連, 蒲地政文, 2014: 日本沿岸海況監視予測システムによる2011年瀬戸内海異常潮位の再現実験. *測候時報*, **81(特別号)**, 53-62.
- 4* Kawamura, H., T. Kobayashi, A. Furuno, N. Usui and M. Kamachi, 2014: Numerical simulation on the long-term variation of radioactive cesium concentration in the North Pacific due to the Fukushima disaster. *Journal of Environmental Radioactivity*, **136**, 64-75, doi:10.1016/j.jenvrad.2014.05.005.
- 5* Kawamura, H., T. Kobayashi, S. Nishikawa, Y. Ishikawa, N. Usui, M. Kamachi, N. Aso, Y. Tanaka and T. Awaji, 2014: Drift Simulation of Tsunami Debris in the

- North Pacific. *Global Environmental Research*, **18**, 91-96.
- 6* 辻野博之, 坂本圭, 碓氷典久, 2015: 気象庁気象研究所における沿岸モデル開発. *沿岸海洋研究*, **52**, 119-129.
- 7* Alabia, I. D., S. Saitoh, R. Mugo, H. Igarashi, Y. Ishikawa, N. Usui, M. Kamachi, T. Awaji and M. Seito, 2015: Seasonal potential fishing ground prediction of neon flying squid (*Ommastrephes bartramii*) in the western and central North Pacific. *Fisheries Oceanography*, **24**, 190-203, doi:10.1111/fog.12102.
- 内山明博 1* Uchiyama, A., A. Yamazaki, M. Shiobara and H. Kobayashi, 2014: Case study on microphysical properties of boundary layer mixed-phase cloud observed at Ny-Ålesund, Svalbard: Observed cloud microphysics and calculated optical properties on 9 June 2011. *Polar Science*, **8**, 57-72, doi:10.1016/j.polar.2013.11.001.
- 2* Uchiyama, A., 2014: Method to retrieve single-scattering properties of aerosols using multi-wavelength scattering and absorption coefficient data measured by integrating nephelometer and absorption photometer.. *Journal of the Meteorological Society of Japan*, **92A**, 71-91, doi:10.2151/jmsj.2014-A05.
- 3* Uchiyama, A., A. Yamazaki, R. Kudo, E. Kobayashi, H. Togawa and D. Uesawa, 2014: Continuous Ground-Based Observation of Aerosol Optical Properties at Tsukuba, Japan (Trend and Climatology). *Journal of the Meteorological Society of Japan*, **92A**, 93-108, doi:10.2151/jmsj.2014-A06.
- 4* Uchiyama, A., A. Yamazaki and R. Kudo, 2014: Column Water Vapor Retrievals from Sky-radiometer (POM-02) 940nm Data. *Journal of the Meteorological Society of Japan*, **92A**, 195-203, doi:10.2151/jmsj.2014-A13.
- 5* Khatri, P., T. Takamura, A. Yamazaki and A. Uchiyama, 2014: Use of 315nm channel data of sky radiometer to estimate columnar ozone amount.. *Journal of the Meteorological Society of Japan*, **92A**, 185-194, doi:10.2151/jmsj.2014-A12.
- 6* Jin, Y., K. Kai, K. Kawai, T. Nagai, T. Sakai, A. Yamazaki, A. Uchiyama, D. Batdorj, N. Sugimoto and T. Nishizawa, 2015: Ceilometer calibration for retrieval of aerosol optical properties. *Journal of Quantitative Spectroscopy & Radiative Transfer*, **153**, 49-56, doi:10.1016/j.jqsrt.2014.10.009.
- 遠藤洋和 1* Endo, H. and A. Kitoh, 2014: Thermodynamic and dynamic effects on regional monsoon rainfall changes in a warmer climate. *Geophysical Research Letters*, **41**, 1704-1710, doi:10.1002/2013GL059158.
- 2 原田やよい, 古林慎哉, 太田行哉, 海老田綾貴, 守谷昌己, 小野田浩克, 大野木和敏, 釜堀弘隆, 小林ちあき, 遠藤洋和, 2014: 気象庁 55 年長期再解析 (JRA-55) . *天気*, **61**, 43-49.
- 3 榎本剛, 水田亮, 森正人, 宮坂貴文, 遠藤洋和, 松枝未遠, 2014: 研究集会「異常気象と気候システム変動のメカニズムと予測可能性」の報告. *天気*, **61(4)**, 280-284.
- 4 遠藤洋和, 2014: 第 1 回 異常気象の変化の実態. *隔月刊 地球温暖化*, **31**, 44-45.
- 5* Kobayashi, C., H. Endo, Y. Ota, S. Kobayashi, H. Onoda, Y. Harada, K. Onogi and H. Kamahori, 2014: Preliminary results of JRA-55C: atmospheric reanalysis assimilating conventional observations only. *SOLA*, **10**, 78-82, doi:10.2151/sola.2014-016.
- 6* Mizuta, R., O. Arakawa, T. Ose, S. Kusunoki, H. Endo and A. Kitoh, 2014: Classification of CMIP5 future climate responses by the tropical sea surface temperature changes. *SOLA*, **10**, 167-171.
- 7* Kobayashi, S., Y. Ota, Y. Harada, A. Ebata, M. Moriya, H. Onoda, K. Onogi, H. Kamahori, C. Kobayashi, H. Endo, K. Miyaoka and K. Takahashi, 2015: The JRA-55 Reanalysis: General Specifications and Basic Characteristics. *Journal of the Meteorological Society of Japan*, **93**, 5-48, doi:10.2151/jmsj.2015-001.

- 大島長 1* Mori, T., Y. Kondo, S. Ohata, N. Moteki, H. Matsui, N. Oshima and A. Iwasaki, 2014: Wet deposition of black carbon at a remote site in the East China Sea. *Journal of Geophysical Research*, **119**, 10,485-10,498, doi:10.1002/2014JD022103.
- 2* Samset, B. H., G. Myhre, A. Herber, Y. Kondo, S.-M. Li, N. Moteki, M. Koike, N. Oshima, J. P. Schwarz, Y. Balkanski, S. E. Bauer, N. Bellouin, T. K. Berntsen, H. Bian, M. Chin, T. Diehl, R. C. Easter, S. J. Ghan, T. Iversen, A. Kirkevåg, and J.-F. Lamarque, G, 2014: Modelled black carbon radiative forcing and atmospheric lifetime in AeroCom Phase II constrained by aircraft observations. *Atmospheric Chemistry and Physics*, **14**, 12,465-12,477, doi:10.5194/acp-14-12465-2014.
- 3* Takegawa, N., N. Moteki, N. Oshima, M. Koike, K. Kita, A. Shimizu, N. Sugimoto and Y. Kondo, 2014: Variability of aerosol particle number concentrations observed over the western Pacific in the spring of 2009. *Journal of Geophysical Research*, **119**, 13,474-13,488, doi: 10. 1002/2014JD022014.
- 大塚道子 1 Otsuka, M., M. Kunii, H. Seko, K. Shimoji and M. Hayashi, 2014: Assimilation Experiments of MTSAT Rapid Scan Atmospheric Motion Vectors. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.19-1.20.
- 岡本幸三 1* Ishimoto, H., K. Okamoto, H. Okamoto, and K. Sato, 2014: One-dimensional variational (1D-Var) retrieval of middle to upper tropospheric humidity using AIRS radiance data. *Journal of Geophysical Research Atmosphere*, **119**, 7633-7654, doi:10.1002/ 2014JD021706.
- 2 Okamoto, K., S. Ishii, P. Baron, T. Ishibashi and T. Tanaka, 2014: Observing Simulation System Experiment (OSSE) of Spaceborne Doppler Wind Lidar. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 115-116.
- 3* Okamoto, K., T. McNally and W. Bell, 2014: Progress towards the assimilation of all-sky infrared radiances: an evaluation of cloud effects. *Quarterly Journal of the Royal Meteorological Society*, **140**, 1603-1614, doi: 10.1002/qj.2242.
- 4 岡本幸三, 2014: 数値予報における衛星データの利用. *計測と制御*, **53**, 1006-1012.
- 小木曾仁 1 小木曾仁, 青木重樹, 干場充之, 2014: S波スペクトル比から推定した全国のサイト特性と、リアルタイム地震動予測への活用. *第14回地震工学シンポジウム論文集*, 3698-3705.
- 尾瀬智昭 1* Mizuta, R., O. Arakawa, T. Ose, S. Kusunoki, H. Endo and A. Kitoh, 2014: Classification of CMIP5 future climate responses by the tropical sea surface temperature changes. *SOLA*, **10**, 167-171.
- 小山亮 1 小山亮, 2015: マイクロ波探査計／マイクロ波探査計データを用いた台風中心気圧推定. *量的予報技術資料 (予報技術研修テキスト)*, **20**, 94-113.
- 折口征二 1 Origuchi, S., K. Aonashi, T. Kawabata and M. Kunii, 2014: Development of a new Ensemble Variational Assimilation System in Meteorological Research Institute. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.17-1.18.
- 2 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
- 梶野瑞王 1* Uchino, O., T. sakai, T. Nagai, I. Morino, T. Maki, M. Deushi, K. Shibata, M. Kajino, T. Kawasaki, T. Akaho, S. Takubo, H. Okumura, K. Arai, M. Nakazato, T. Matsunaga, T. Yokota, S. Kawakami, K. Kita and Y. Sasano, 2014: DIAL measurement of lower tropospheric ozone over Saga(33.24° N,130.29° E),Japan,and comparison with a chemistry-climate

- model. *Atmospheric Measurement Techniques*, **7**, 1385-1394, doi:10.5194/amt-7-1385-2014.
- 2* Adachi, K., Y. Zaizen, M. Kajino and Y. Igarashi, 2014: Mixing state of regionally transported soot particles and the coating effect on their size and shape at a mountain site in Japan. *Journal of Geophysical Research Atmosphere*, **119**, 5386-5396, doi:10.1002/2013JD020880.
- 3* Sheel, V., L. K. Sahu, M. Kajino, M. Deushi, O. Stein and P. Nedelec, 2014: Seasonal and interannual variability of carbon monoxide based on MOZAIC observations, MACC reanalysis, and model simulations over an urban site in India. *Journal of Geophysical Research Atmosphere*, **119**, 9123-9141, doi:10.1002/2013JD021425.
- 4 五十嵐康人, 梶野瑞王, 栗原治, 小林卓也, 関山剛, 竹村俊彦, 滝川雅之, 田中泰宙, 津旨大輔, 永井晴康, 眞木貴史, 升本順夫, 森野悠, 速水洋, 内山雄介, 木田新一郎, 斉藤和雄, 新堀敏基, 東博紀, 宮澤泰正, P. Bailly du Bois, Bocquet, M. Boust, D. Brovchenko, I. Brovchenko, A. Choe, T. Christoudias, D. Didier, H. Dietze, P. Garreau *et al.*, 2014: 東京電力福島第一原子力発電所事故によって環境中に放出された放射性物質の輸送沈着過程に関するモデル計算結果の比較. *日本学術会議報告*.
- 5* Aikawa, M., M. Kajino, T. Hiraki and H. Mukai, 2014: The contribution of site to washout and rainout: precipitation chemistry based on sample analysis from 0.5 mm precipitation increments and numerical simulation. *Atmospheric Environment*, **95**, 165-174, doi:10.1016/j.atmosenv.2014.06.015.
- 6* Katata, G., M. Kajino, K. Matsuda, A. Takahashi and K. Nakaya, 2014: A numerical study of the effects of aerosol hygroscopic properties to dry deposition on a broad-leaved forest. *Atmospheric Environment*, **97**, 501-510, doi:10.1016/j.atmosenv.2013.11.028.
- 7* Li, Y., J. An, M. Kajino, J. Li and Y. Qu, 2015: Impacts of additional HONO sources on concentrations and deposition of NO_y in the Beijing-Tianjin-Hebei region of China. *SOLA*, **11**, 36-42, doi:10.2151/sola.2015-009.
- 8* Katata, G., M. Chino, T. Kobayashi, H. Terada, M. Ota, H. Nagai, M. Kajino, R. Draxler, M. C. Hort, A. Malo, T. Torii and Y. Sanada, 2015: Detailed source term estimation of the atmospheric release for the Fukushima Daiichi Nuclear Power Station accident by coupling simulations of atmospheric dispersion model with improved deposition scheme and oceanic dispersion model. *Atmospheric Chemistry and Physics*, **15**, 1029-1070, doi:10.5194/acp-15-1029-2015.
- 9* Sekiyama, T. T., M. Kunii, M. Kajino and T. Shimbori, 2015: Horizontal Resolution Dependence of Atmospheric Simulations of the Fukushima Nuclear Accident Using 15-km, 3-km, and 500-m Grid Models. *Journal of Oceanography*, **93-1**, 49-64, doi:10.2151/jmsj.2015-002.
- 10* Li, Y., J. An, M. Kajino, I. Gultepe, Y. Chen, T. Song and J. Xin, 2015: Impacts of additional HONO sources on O₃ and PM_{2.5} chemical coupling strategies in the Beijing-Tianjin-Hebei region of China. *Tellus*, **B – 67**, doi:10.3402/tellusb.v67.23930.
- 勝間田明男 1 國友孝洋, 山岡耕春, 渡辺俊樹, 吉田康宏, 勝間田明男, 生田領野, 加藤愛太郎, 飯高隆, 津村紀子, 大久保慎人, 2014: 弾性波アクロスによる東海地域地殻の P 波および S 波速度構造の推定. *地震 第2輯*, **67**, 41663, doi:10.4294/zisin.67.1.
- 2* 馬場久紀, 平田賢治, 山崎明, 対馬弘晃, 勝間田明男, 前田憲二, 上野寛, 青木重樹, 小林昭夫, 木村一洋, 弘瀬冬樹, 長尾年恭, 2015: 自己浮上式海底地震計 (OBS) を用いた駿河湾石花海周辺海域における連続地震観測. *東海大学海洋研究所報告*, **36**, 23-29.
- 加藤輝之 1* Tsuguti, H. and T. Kato, 2014: Contributing Factors of the Heavy Rainfall Event at

- Amami-Oshima Island, Japan, on 20 October 2010. *Journal of the Meteorological Society of Japan*, **92**, 163-183, doi:10.2151/jmsj.2014-202.
- 2* Kanada, S., H. Tsuguti, T. Kato and F. Fujibe, 2014: Diurnal variation of precipitation around western Japan during the warm season. *SOLA*, **10**, 72-77.
- 3 齊藤和雄, 新堀敏基, 原旅人, 豊田英司, 加藤輝之, 藤田司, 永田和彦, 本田有機, 2014: WMO「福島第一原発事故に関する気象解析についての技術タスクチーム」活動. *測候時報*, **81**, 1-30.
- 4* 津口裕茂, 加藤輝之, 2014: 集中豪雨事例の客観的な抽出とその特性・特徴に関する統計解析. *天気 (論文・短報)*, **61**, 455-469.
- 5 Kato, T., 2014: Dependency of horizontal resolution and turbulent scheme on accumulation processes of low-level water vapor. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**.
- 6 加藤輝之, 柳瀬亘, 嶋田宇大, 末木健太, 本田匠, 小司禎教, 津口裕茂, 山田広幸, 横田祥, 若月泰孝, 南雲信宏, 村田文絵, 2015: 第10回「メソスケール気象と熱帯低気圧に関する国際会議(ICMCS-X)」参加報告. *天気*, **62**, 25-32.
- 7 加藤輝之, 2015: 線状降水帯発生要因としての鉛直シアと上空の湿度について. *量的予報技術資料 (予報技術研修テキスト)*, **20**, 114-132.
- 8 加藤輝之, 2015: 集中豪雨のメカニズムー線状降水帯とバックビルディング型形成ー. *じっきょう理科資料*, **77**, 7-10.
- 蒲地政文 1 小川浩司, 碓氷典久, 倉賀野連, 藤井陽介, 豊田隆寛, 蒲地政文, 2014: MOVE/MRI.COM-WNP 再解析データに見られた黒潮流路変動と瀬戸内海水位変動との関係. *測候時報*, **81(特別号)**, S77-S91.
- 2* Nishikawa, H., H. Igarashi, Y. Ishikawa, M. Sakai, Y. Kato, M. Ebina, N. Usui, M. Kamachi and T. Awaji, 2014: Impact of paralarvae and juveniles feeding environment on the neon flying squid (*Ommastrephes bartramii*) winter-spring cohort stock. *Fisheries Oceanography*, **23**, 289-303, doi:10.1111/fog.12064.
- 3 碓氷典久, 坂本圭, 小川浩司, 藤井陽介, 辻野博之, 山中吾郎, 倉賀野連, 蒲地政文, 2014: 日本沿岸海況監視予測システムによる2011年瀬戸内海異常潮位の再現実験. *測候時報*, **81(特別号)**, 53-62.
- 4* Kawamura, H., T. Kobayashi, A. Furuno, N. Usui and M. Kamachi, 2014: Numerical simulation on the long-term variation of radioactive cesium concentration in the North Pacific due to the Fukushima disaster. *Journal of Environmental Radioactivity*, **136**, 64-75, doi:10.1016/j.jenvrad.2014.05.005.
- 5* Kawamura, H., T. Kobayashi, S. Nishikawa, Y. Ishikawa, N. Usui, M. Kamachi, N. Aso, Y. Tanaka and T. Awaji, 2014: Drift Simulation of Tsunami Debris in the North Pacific. *Global Environmental Research*, **18**, 91-96.
- 6* Alabia, I.D., S. Saitoh, R. Mugo, H. Igarashi, Y. Ishikawa, N. Usui, M. Kamachi, T. Awaji and M. Seito, 2015: Seasonal potential fishing ground prediction of neon flying squid (*Ommastrephes bartramii*) in the western and central North Pacific. *Fisheries Oceanography*, **24**, 190-203, doi:10.1111/fog.12102.
- 釜堀弘隆 1 原田やよい, 古林慎哉, 太田行哉, 海老田綾貴, 守谷昌己, 小野田浩克, 大野木和敏, 釜堀弘隆, 小林ちあき, 遠藤洋和, 2014: 気象庁55年長期再解析(JRA-55). *天気*, **61**, 43-49.
- 2* Kobayashi, C., H. Endo, Y. Ota, S. Kobayashi, H. Onoda, Y. Harada, K. Onogi and H. Kamahori, 2014: Preliminary results of JRA-55C: atmospheric reanalysis assimilating conventional observations only. *SOLA*, **10**, 78-82, doi:10.2151/sola.2014-016.
- 3* Kobayashi, S., Y. Ota, Y. Harada, A. Ebata, M. Moriya, H. Onoda, K. Onogi, H. Kamahori, C. Kobayashi, H. Endo, K. Miyaoka and K. Takahashi, 2015: The

- JRA-55 Reanalysis: General Specifications and Basic Characteristics. *Journal of the Meteorological Society of Japan*, **93**, 5-48, doi:10.2151/jmsj.2015-001.
- 川合秀明 1 Kawai, H., S. Yabu and Y. Hagihara, 2014: The Evaluation of the Vertical Structures of Marine Boundary Layer Clouds over Mid-Latitudes. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 0611-0612.
- 2 釜江陽一, 小倉知夫, 神代剛, 小玉知央, 野田暁, 清木達也, Ying-Wen Chen, 塩竈秀夫, 川合秀明, 渡部雅浩, 2014: 雲フィードバックに関するモデル相互比較プロジェクト (CFMIP) 会議 2014 参加報告. *天気*, **61**, 997-1004.
- 3* Mark J. Webb, A. P. Lock, A. B. Salcedo, S. Bony, J. N. S. Cole, T. Koshiro, H. Kawai, C. Lacagnina, F. M. Selten, R. Roehrig and B. Stevens, 2015: The diurnal cycle of marine cloud feedback in climate models. *Climate Dynamics*, **44**, 1419-1436.
- 4* Jiang, J. H., H. Su, C. Zhai, T. J. Shen, T. Wu, J. Zhang, J. N. S. Cole, K. von Salzen, L. J. Donner, C. Seman, A. D. Genio, L. S. Nazarenko, J.-L. Dufresne, ..., T. Koshiro, H. Kawai, *et al.*, 2015: Evaluating the Diurnal Cycle of Upper-Tropospheric Ice Clouds in Climate Models Using SMILES Observations. *Journal of the Atmospheric Sciences*, **72**, 1022-1044, doi:10.1175/JAS-D-14-0124.1.
- 川畑拓矢 1 Origuchi, S., K. Aonashi, T. Kawabata and M. Kunii, 2014: Development of a new Ensemble Variational Assimilation System in Meteorological Research Institute. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.17-1.18.
- 2 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
- 3* Kawabata, T., K. Ito and K. Saito, 2014: Recent progress of the NHM-4DVAR towards a super-high resolution data assimilation. *SOLA*, **10**, 145-149, doi:10.2151/sola.2014-030.
- 4* Kawabata, T., H. Iwai, H. Seko, Y. Shoji, K. Saito, S. Ishii and K. Mizutani, 2014: Cloud-Resolving 4D-Var Assimilation of Doppler Wind Lidar Data on a Meso-Gamma-Scale Convective System. *Monthly Weather Review*, **142**, 4484-4498, doi:10.1175/MWR-D-13-00362.1.
- 北畠尚子 1* Shimada, U., A. Wada, K. Yamazaki and N. Kitabatake, 2014: Roles of an upper-level cold vortex and low-level baroclinicity in the development of polar lows over the Sea of Japan. *Tellus A*, **66**, 24694, doi:10.3402/tellusa.v66.24694.
- 2* 北畠尚子, 星野俊介, 櫻木智明, 2014: TRMM/TMI 輝度温度の非対称分布を考慮した台風強度推定. *気象研究所研究報告*, **65**, 57-74, doi:10.2467/mripapers.65.57.
- 3 北畠尚子, 城岡竜一, 和田章義, 末木健太, 津口裕茂, 筆保弘徳, 2014: 第41回メソ気象研究会の報告 一台風～発生・発達と日本への影響～. *天気*, **61**, 893-898.
- 北村祐二 1 富田浩文, 梶川義幸, 宮本佳明, 吉村裕正, 榎本剛, 北村祐二, 佐藤陽祐, 清水達也, 大塚成徳, 柳瀬亘, 2015: 第3回非静力学モデルに関する国際ワークショップ・第6回全球雲解像モデリングワークショップの開催報告. *天気*, **62**, 57-62.
- 2* Kitamura, Y., 2015: Estimating dependence of the turbulent length scales on model resolution based on a priori analysis. *Journal of the Atmospheric Sciences*, **72**, 750-762, doi:10.1175/JAS-D-14-0189.1.
- 木村一洋 1* 木村一洋, 露木貴裕, 菅沼一成, 長谷川浩, 見須裕美, 藤田健一, 2015: タンクモデルによる体積ひずみ計データの降水補正について. *駿震時報 (論文)*, **78**, 93-158.
- 2* 馬場久紀, 平田賢治, 山崎明, 対馬弘晃, 勝間田明男, 前田憲二, 上野寛, 青木重樹, 小林昭夫, 木村一洋, 弘瀬冬樹, 長尾年恭, 2015: 自己浮上式海底地震計 (OBS) を用いた駿河湾石花海周辺海域における連続地震観測. *東海大学海洋研究所報告*,

- 36, 23-29.
- 楠研一
- 1 Suzuki, T, M. Hayakawa, Y. Hobara and K. Kusunoki, 2014: Summer Thunderstorm Associated with Cluster of Blue Jets and Starters in Japan. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-09-09.
 - 2 Nishihashi, M., C. Fujiwara, K. Kusunoki, S. Yoshida, S. Hayashi, H. Y. Inoue, K. Arai, K. Shimose, R. Kato, S. Saito, E. Sato, W. Mashiko and H. Suzuki, 2014: Three-Dimensional Characteristics of Lightning Channels, Reflectivity Cores, and Vortices in Winter Thunderstorms. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-01-10.
 - 3 Suzuki, Y., T. Suzuki, M. Nakamura, T. Torii, M. Kamogawa and K. Kusunoki, 2014: Preliminary reports of Summer sprite observation campaign at summit of Mt. Fuji, Japan. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-09-07.
 - 4 楠研一, 2014: 台風研究における空港気象ドップラーレーダーの持つ利用可能性. 電気学会技術報告「自然災害軽減のための早期警戒システムと電磁界技術」, **1315**, 41893.
 - 5 齋藤将監, 庄司智美, 鈴木裕子, 片倉翔, 鳥居建男, 杉田武志, 楠研一, 林修吾, 鈴木智幸, 鴨川仁, 2014: 2013 年富士山山頂で観測された雷雲に関連する高エネルギー放射線. 日本大気電気学会誌, **85**, 69-70.
 - 6* S. Yoshida, T. Wu, T. Ushio, K. Kusunoki and Y. Nakamura, 2014: Initial results of LF sensor network for lightning observation and characteristics of lightning emission in LF band. *Journal of Geophysical Research Atmosphere*, **119**, 12034-12051, doi:10.1002/2014JD022065.
 - 7* Nishihashi, M., K. Arai, C. Fujiwara, W. Mashiko, S. Yoshida, S. Hayashi and K. Kusunoki, 2015: Characteristics of Lightning Jumps Associated with a Tornadic Supercell on 2 September 2013. *SOLA*, **11**, 18-22, doi:10.2151/sola.2015-005.
- 楠昌司
- 1 Perez, E. P., V. Magana, E. Caetano and S. Kusunoki, 2014: Cold surge activity over the Gulf of Mexico in a warmer climate. *frontiers in Earth Science*, **2**, 41649, doi:10.3389/feart.2014.00019.
 - 2* Nakaegawa, T., A. Kitoh, S. Kusunoki, H. Murakami and O. Arakawa, 2014: Hydroclimate changes over Central America and the Caribbean in a global warming climate projected with 20-km and 60-km mesh MRI atmospheric general circulation models. 気象研究所研究報告, **65**, 15-33, doi:10.2467/mripapers.65.15.
 - 3* Mizuta, R., O. Arakawa, T. Ose, S. Kusunoki, H. Endo and A. Kitoh, 2014: Classification of CMIP5 future climate responses by the tropical sea surface temperature changes. *SOLA*, **10**, 167-171.
- 朽木勝幸
- 1* Aoki, Te., S. Matoba, S. Yamaguchi, T. Tanikawa, M. Niwano, K. Kuchiki, K. Adachi, J. Uetake, H. Motoyama and M. Hori, 2014: Light-absorbing snow impurity concentrations measured on northwest Greenland ice sheet in 2011 and 2012. *Bulletin of Glaciological Research*, **32**, 21-31, doi:10.5331/bgr.32.21.
 - 2* Hori, M., Te. Aoki, T. Tanikawa, K. Kuchiki, M. Niwano, S. Yamaguchi and S. Matoba, 2014: Dependence of thermal infrared emissive behaviors of snow cover on the surface snow type. *Bulletin of Glaciological Research*, **32**, 33-45, doi:10.5331/bgr.32.33.
 - 3* Niwano, M., Te. Aoki, K. Kuchiki, M. Hosaka, Y. Kodama, S. Yamaguchi, H. Motoyoshi and Y. Iwata, 2014: Evaluation of updated physical snowpack model SMAP. *Bulletin of Glaciological Research*, **32**, 65-78, doi:10.5331/bgr.32.65.
 - 4* Hachikubo, A., S. Yamaguchi, H. Arakawa, T. Tanikawa, M. Hori, K. Sugiura, S. Matoba, M. Niwano, K. Kuchiki and Te. Aoki, 2014: Effects of temperature and grain type on time variation of snow specific surface area. *Bulletin of*

- Glaciological Research*, **32**, 47-53, doi:10.5331/bgr.32.47.
- 5 八久保晶弘, M. Schneebeli, 山口悟, 堀雅裕, 谷川朋範, 杉浦幸之助, 的場澄人, 庭野匡思, 朽木勝幸, 青木輝夫, 2014: 積雪の比表面積と粒径との関係. *北海道の雪氷*, **33**, 121-124.
- 6* Tanikawa, T., M. Hori, Te. Aoki, A. Hachikubo, K. Kuchiki, M. Niwano, S. Matoba, S. Yamaguchi and K. Stamnes, 2014: In situ measurements of polarization properties of snow surface under the Brewster geometry in Hokkaido, Japan, and northwest Greenland ice sheet. *Journal of Geophysical Research Atmosphere*, **119**, 946-964, doi:10.1002/2014JD022325.
- 7* Kuchiki, K., Te. Aoki, M. Niwano, S. Matoba, Y. Kodama and K. Adachi, 2015: Elemental carbon, organic carbon, and dust concentrations in snow measured with thermal optical method and filter weighing: variations during 2007-2013 winters in Sapporo, Japan. *Journal of Geophysical Research Atmosphere*, **120**, 868-882, doi:10.1002/2014JD022144.
- 工藤玲 1* Uchiyama, A., A. Yamazaki, R. Kudo, E. Kobayashi, H. Togawa and D. Uesawa, 2014: Continuous Ground-Based Observation of Aerosol Optical Properties at Tsukuba, Japan (Trend and Climatology). *Journal of the Meteorological Society of Japan*, **92A**, 93-108, doi:10.2151/jmsj.2014-A06.
- 2* Uchiyama, A., A. Yamazaki and R. Kudo, 2014: Column Water Vapor Retrievals from Sky-radiometer(POM-02) 940nm Data. *Journal of the Meteorological Society of Japan*, **92A**, 195-203, doi:10.2151/jmsj.2014-A13.
- 國井勝 1 Origuchi, S., K. Aonashi, T. Kawabata and M. Kunii, 2014: Development of a new Ensemble Variational Assimilation System in Meteorological Research Institute. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.17-1.18.
- 2 Kunii, M., 2014: Data assimilation experiments for tropical cyclones with the NHM-LETKF. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, 09-10.
- 3 Yokota, S., M. Kunii and H. Seko, 2014: Doppler radar radial wind assimilation for the tornado outbreak on May 6, 2012. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.29-1.30.
- 4 Wada, A. and M. Kunii, 2014: Introduction of an atmosphere-wave-ocean coupled model into the NHM-LETKF. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 9-03.
- 5 Saito, K., M. Kunii and K. Araki, 2014: Cloud resolving simulation of a local heavy rainfall event on 26 August 2011 observed by the Tokyo Metropolitan Area Convection Study (TOMACS). *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 5.05-5.06.
- 6 Otsuka, M., M. Kunii, H. Seko, K. Shimoji and M. Hayashi, 2014: Assimilation Experiments of MTSAT Rapid Scan Atmospheric Motion Vectors. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.19-1.20.
- 7 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
- 8* Kunii, M., 2014: Mesoscale Data Assimilation for a Local Severe Rainfall Event with the NHM-LETKF System. *Weather and Forecasting*, **29**, 1093-1105.
- 9* Kunii, M., 2014: The 1000-member Ensemble Kalman Filtering with the JMA Nonhydrostatic Mesoscale Model on the K computer. *Journal of the Meteorological Society of Japan*, **92**, 623-633.

- 倉賀野連 1 小川浩司, 碓氷典久, 倉賀野連, 藤井陽介, 豊田隆寛, 蒲地政文, 2014: MOVE/MRL.COM-WNP 再解析データに見られた 黒潮流路変動と瀬戸内海水位変動との関係. *測候時報*, **81(特別号)**, S77-S91.
- 2 碓氷典久, 坂本圭, 小川浩司, 藤井陽介, 辻野博之, 山中吾郎, 倉賀野連, 蒲地政文, 2014: 日本沿岸海況監視予測システムによる 2011 年瀬戸内海異常潮位の再現実験. *測候時報*, **81(特別号)**, 53-62.
- 黒田友二 1* Tripathi O.P., M. Baldwin, A. Charlton-Perez, M. Charron, S. Eckermann, E. Gerber, G. Harrison, D. Jackson, B-M. Kim, Y. Kuroda, A. Lang, C. Lee, S. Mahmood, R. Mizuta, G. Roff, M. Sigmond and S-W. Son, 2014: The predictability of the extra-tropical stratosphere and its impacts on the skill of tropospheric forecasts. *Quarterly Journal of the Royal Meteorological Society*, **141**, 987-1003, doi:10.1002/qj.2432.
- 小杉如央 1* Takatani, Y., K. Enyo, Y. Iida, A. Kojima, T. Nakano, D. Sasano, N. Kosugi, T. Midorikawa, T. Suzuki and M. Ishii, 2014: Relationships between total alkalinity in surface water and sea surface dynamic height in the Pacific Ocean. *Journal of Geophysical Research Oceans*, **119**, 2806-2814, doi:10.1002/2013JC009739.
- 小林昭夫 1* 小林昭夫, 2014: A long-term slow slip event from 1996 to 1997 in the Kii Channel, Japan. *Earth, Planets and Space*, **66**, doi:10.1186/1880-5981-66-11.
- 2* 馬場久紀, 平田賢治, 山崎明, 対馬弘晃, 勝間田明男, 前田憲二, 上野寛, 青木重樹, 小林昭夫, 木村一洋, 弘瀬冬樹, 長尾年恭, 2015: 自己浮上式海底地震計 (OBS) を用いた駿河湾石花海周辺海域における連続地震観測. *東海大学海洋研究所報告*, **36**, 23-29.
- 小林ちあき 1 原田やよい, 古林慎哉, 太田行哉, 海老田綾貴, 守谷昌己, 小野田浩克, 大野木和敏, 釜堀弘隆, 小林ちあき, 遠藤洋和, 2014: 気象庁 55 年長期再解析 (JRA-55) . *天気*, **61**, 43-49.
- 2* Kobayashi, C., H. Endo, Y. Ota, S. Kobayashi, H. Onoda, Y. Harada, K. Onogi and H. Kamahori, 2014: Preliminary results of JRA-55C: atmospheric reanalysis assimilating conventional observations only. *SOLA*, **10**, 78-82, doi:10.2151/sola.2014-016.
- 3* Kobayashi, S., Y. Ota, Y. Harada, A. Ebita, M. Moriya, H. Onoda, K. Onogi, H. Kamahori, C. Kobayashi, H. Endo, K. Miyaoka and K. Takahashi, 2015: The JRA-55 Reanalysis: General Specifications and Basic Characteristics. *Journal of the Meteorological Society of Japan*, **93**, 5-48, doi:10.2151/jmsj.2015-001.
- 財前祐二 1* Adachi, K., Y. Zaizen, M. Kajino and Y. Igarashi, 2014: Mixing state of regionally transported soot particles and the coating effect on their size and shape at a mountain site in Japan. *Journal of Geophysical Research Atmosphere*, **119**, 5386-5396, doi:10.1002/2013JD020880.
- 齋藤篤思 1* 山下克也, 村上正隆, 田尻拓也, 齋藤篤思, 2014: 気象研究所における雲核の地上モニタリング観測とその品質管理. *エアロゾル研究*, **29(3)**, 174-182, doi:10.11203/jar.29.174.
- 2* 田尻拓也, 山下克也, 齋藤篤思, 村上正隆, 2015: MRI 雲生成チェンバー実験 —雲シーディング物質の雲核・氷晶核能—. *エアロゾル研究*, **30(1)**, 14-23, doi:10.11203/jar.30.14.
- 3* 折笠成宏, 村上正隆, 齋藤篤思, 2015: 航空機を用いた雲へのシーディングによる人工降雨・降雪実験. *エアロゾル研究*, **30**, 24-31, doi:10.11203/jar.30.24.
- 齋藤和雄 1 齋藤和雄, 新堀敏基, 原旅人, 豊田英司, 加藤輝之, 藤田司, 永田和彦, 本田有機, 2014: WMO「福島第一原発事故に関する気象解析についての技術タスクチーム」活動. *測候時報*, **81**, 1-30.
- 2 Saito, K., M. Kunii and K. Araki, 2014: Cloud resolving simulation of a local heavy rainfall event on 26 August 2011 observed by the Tokyo Metropolitan Area

酒井哲

- Convection Study (TOMACS). *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 5.05-5.06.
- 3 中谷剛, 三隅良平, 小司禎教, 斉藤和雄, 瀬古弘, 清野直子, 鈴木真一, 出世ゆかり, 前坂剛, 菅原広史, 2014: 第1回 TOMACS 国際ワークショップの報告 –WMO 世界天気研究計画・研究開発プロジェクトの開始–. *天気*, **61**, 557-564.
 - 4 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
 - 5 Saito, K., 2014: Northward Ageostrophic Winds Associated with a Tropical Cyclone. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 114-115.
 - 6 五十嵐康人, 梶野瑞王, 栗原治, 小林卓也, 関山剛, 竹村俊彦, 滝川雅之, 田中泰宙, 津旨大輔, 永井晴康, 眞木貴史, 升本順夫, 森野悠, 速水洋, 内山雄介, 木田新一郎, 斉藤和雄, 新堀敏基, 東博紀, 宮澤泰正, P. Bailly du Bois, Bocquet, M. Boust, D. Brovchenko, I. Brovchenko, A. Choe, T. Christoudias, D. Didier, H. Dietze, P. Garreau *et al.*, 2014: 東京電力福島第一原子力発電所事故によって環境中に放出された放射性物質の輸送沈着過程に関するモデル計算結果の比較. *日本学術会議報告*.
 - 7* Kawabata, T., K. Ito and K. Saito, 2014: Recent progress of the NHM-4DVAR towards a super-high resolution data assimilation. *SOLA*, **10**, 145-149, doi:10.2151/sola.2014-030.
 - 8* Kawabata, T., H. Iwai, H. Seko, Y. Shoji, K. Saito, S. Ishii and K. Mizutani, 2014: Cloud-Resolving 4D-Var Assimilation of Doppler Wind Lidar Data on a Meso-Gamma-Scale Convective System. *Monthly Weather Review*, **142**, 4484-4498, doi:10.1175/MWR-D-13-00362.1.
 - 9* Draxler, R., D. Arnold, M. Chino, S. Galmarini, M. Hort, A. Jones, S. Leadbetter, A. Malo, C. Maurer, G. Rolph, K. Saito, R. Servranckx, T. Shimbori, E. Solazzo and G. Wotawa, 2015: World Meteorological Organization's model simulation of the radionuclide dispersion and deposition from the Fukushima Daiichi nuclear power plant accident. . *Journal of Environmental Radioactivity*, **139**, 172-184. , doi:10.1016/j.jenvrad.2013.09.014.
 - 10* Saito, K, T Shimbori and R. Draxler, 2015: JMA's regional atmospheric transport model calculations for the WMO technical task team on meteorological analyses for Fukushima Daiichi Nuclear Power Plant accident. *Journal of Environmental Radioactivity*, **139**, 185-199, doi:10.1016/j.jenvrad.2014.02.007.
 - 11* Arnold, D., C. Maurer, G. Wotawa, R. Draxler, K. Saito and P. Seibert, 2015: Influence of the meteorological input on the local and global atmospheric transport of radionuclides after the Fukushima Daiichi nuclear accident. . *Journal of Environmental Radioactivity*, **139**, 215-225, doi:10.1016/j.jenvrad.2014.02.013.
 - 12* Sawada, M., T. Sakai, T. Iwasaki, H. Seko, K. Saito and T. Miyoshi, 2015: Assimilating high-resolution winds from a Doppler lidar using an ensemble Kalman filter with lateral boundary adjustment. *Tellus A*, **67**, 23473, doi:10.3402/tellusa.v67.23473.
 - 1* Uchino, O., T. sakai, T. Nagai, I. Morino, T. Maki, M. Deushi, K. Shibata, M. Kajino, T. Kawasaki, T. Akaho, S. Takubo, H. Okumura, K. Arai, M. Nakazato, T. Matsunaga, T. Yokota, S. Kawakami, K. Kita and Y. Sasano, 2014: DIAL measurement of lower tropospheric ozone over Saga(33.24° N,130.29° E),Japan, and comparison with a chemistry-climate model. *Atmospheric Measurement Techniques*, **7**, 1385-1394,

- doi:10.5194/amt-7-1385-2014.
- 2* 酒井哲, 内野修, 森野勇, 永井智広, 赤穂大河, 川崎健, 奥村浩, 新井康平, 内山明博, 山崎明宏, 松永恒雄, 横田達也, 2014: 佐賀のライダーとスカイラジオメータによって検出された桜島の火山灰の高度分布と光学特性. *日本リモートセンシング学会誌*, **34**, 197-204, doi:10.11440/rssj.34.197.
- 3 Okumura, H., T. Akaho, Y. Kojiro, O. Uchino, I. Morino, T. Yokota, T. Nagai, T. Sakai, T. Maki, A. Yamazaki and K. Arai, 2014: Development of PM2.5 density distribution visualization system using ground-level sensor network and Mie lidar. *Proceedings of SPIE 9246, Lidar Technologies, Techniques, and Measurements for Atmospheric Remote Sensing X*, **9246**, doi:10.1117/12.2067589.
- 4* D. A. Ridley, S. Solomon, J. E. Barnes, V. D. Burlakov, T. Deshler, S. I. Dolgii, A. B. Herber, T. Nagai, R. R. Neely III, A. V. Nevzorov, C. Ritter, T. Sakai, B. D. Santer, M. Sato, A. Schmidt, O. Uchino and J. P. Vernier, 2014: Total volcanic stratospheric aerosol optical depths and implications for global climate change. *Geophysical Research Letters*, **41**, 7763-7769, doi:10.1002/2014GL061541.
- 5* Nakamae, K., O. Uchino, I. Morino, B. Liley, T. Sakai, T. Nagai and T. Yokota, 2014: Lidar observation of the 2011 Puyehue-Cordón Caulle volcanic aerosols at Lauder, New Zealand. *Atmospheric Chemistry and Physics*, **14**, 12099-12108, doi:10.5194/acp-14-12099-2014.
- 6* 青柳曉典, 泉敏治, 酒井哲, 永井智広, 2014: ドップラーライダーDBS 計測による都市域の粗度長とゼロ面変位高の推定. *風工学シンポジウム論文集*, **23**, 43-48.
- 7* Jin, Y., K. Kai, K. Kawai, T. Nagai, T. Sakai, A. Yamazaki, A. Uchiyama, D. Batdorj, N. Sugimoto and T. Nishizawa, 2015: Ceilometer calibration for retrieval of aerosol optical properties. *Journal of Quantitative Spectroscopy & Radiative Transfer*, **153**, 49-56, doi:10.1016/j.jqsrt.2014.10.009.
- 坂本圭 1 碓氷典久, 坂本圭, 小川浩司, 藤井陽介, 辻野博之, 山中吾郎, 倉賀野連, 蒲地政文, 2014: 日本沿岸海況監視予測システムによる 2011 年瀬戸内海異常潮位の再現実験. *測候時報*, **81(特別号)**, 53-62.
- 2 坂本圭, 山中吾郎, 辻野博之, 中野英之, 平原幹俊, 2014: 水平解像度 2km の瀬戸内海モデル MRI.COM-Seto 及び日本沿岸モデル MRI.COM-JPN の開発. *測候時報*, **81(特別号)**, S63-S75.
- 3* 辻野博之, 坂本圭, 碓氷典久, 2015: 気象庁気象研究所における沿岸モデル開発. *沿岸海洋研究*, **52**, 119-129.
- 櫻木智明 1* 北畠尚子, 星野俊介, 櫻木智明, 2014: TRMM/TMI 輝度温度の非対称分布を考慮した台風強度推定. *気象研究所研究報告*, **65**, 57-74, doi:10.2467/mripapers.65.57.
- 佐々木秀孝 1* Murata, A., H. Sasaki, M. Hanafusa and K. Kurihara, 2014: Mechanism of early-summer low-temperature extremes in Japan projected by a nonhydrostatic regional climate model. *Weather and Climate Extremes*, **4**, 62-74, doi:10.1016/j.wace.2014.04.007.
- 笹野大輔 1* Takatani, Y., K. Enyo, Y. Iida, A. Kojima, T. Nakano, D. Sasano, N. Kosugi, T. Midorikawa, T. Suzuki and M. Ishii, 2014: Relationships between total alkalinity in surface water and sea surface dynamic height in the Pacific Ocean. *Journal of Geophysical Research Oceans*, **119**, 2806-2814, doi:10.1002/2013JC009739.
- 佐藤英一 1 Nishihashi, M., C. Fujiwara, K. Kusunoki, S. Yoshida, S. Hayashi, H. Y. Inoue, K. Arai, K. Shimose, R. Kato, S. Saito, E. Sato, W. Mashiko and H. Suzuki, 2014: Three-Dimensional Characteristics of Lightning Channels, Reflectivity Cores, and Vortices in Winter Thunderstorms. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-01-10.
- 2* Shoji Y., W. Mashiko, H. Yamauchi and E. Sato, 2015: Estimation of Local-scale

- Precipitable Water Vapor Distribution Around Each GNSS Station Using Slant Path Delay: Evaluation of a Severe Tornado Case Using High-Resolution NHM. *SOLA*, **11**, 31-35, doi:10.2151/sola.2015-008.
- 澤庸介 1* Zhang, H. F., B. Z. Chen, I. T. van der Laan-Luijkx, T. Machida, H. Matsueda, Y. Sawa, Y. Fukuyama, R. Langenfelds, M. van der Schoot, G. Xu, J. W. Yan, M. L. Cheng, L. X. Zhou, P. P. Tans and W. Peters, 2014: Estimating Asian terrestrial carbon fluxes from CONTRAIL aircraft and surface CO₂ observations for the period 2006-2010. *Atmospheric Chemistry and Physics*, **14**, 5807-5824, doi:10.5194/acp-14-5807-2014.
- 2 Takahashi, M., T. Nakazawa, S. Aoki, D. Goto, K. Kato, N. Aoki, T. Watanabe, T. Machida, Y. Tohjima, K. Katsumata, S. Murayama, S. Ishidoya, S. Morimoto, T. Fujitani, H. Koide, A. Takizawa, H. Matsueda, Y. Sawa and K. Tsuboi, 2014: INTERCOMPARISON EXPERIMENTS FOR GREENHOUSE GASES OBSERVATION (iceGGO) IN JAPAN. *17th WMO/IAEA Meeting on Carbon Dioxide, Other Greenhouse Gases and Related Tracers Measurement Techniques (GGMT-2013)*, **213**, 138-143.
- 3* Inoue, M., I. Morino, O. Uchino, Y. Miyamoto, T. Saeki, Y. Yoshida, T. Yokota, C. Sweeney, P. P. Tans, S. C. Biraud, T. Machida, J. V. Pettman, E. A. Kort, T. Tanaka, S. Kawakami, Y. Sawa, K. Tsuboi and H. Matsueda, 2014: Validation of XCH₄ derived from SWIR spectra of GOSAT TANSO-FTS with aircraft measurement data. *Atmospheric Measurement Techniques*, **7**, 2987-3005, doi:10.5194/amt-7-2987-2014.
- 4* Jiang, F., H. M. Wang, J. M. Cheu, T. Machida, L. X. Zhou, W. M. Ju, H. Matsueda and Y. Sawa, 2014: Carbon balance of China constrained by CONTRAIL aircraft CO₂ measurements. *Atmospheric Chemistry and Physics*, **14**, 10133-10144, doi:10.5194/acp-14-10133-2014.
- 5 森本真司, 町田敏暢, 澤庸介, 石戸谷重之, 遠嶋康德, 青木周司, 2014: 大気観測に基づく地球規模炭素循環の研究. *天気*, **61**, 922-926.
- 6* M. Reuter, M., M. Buchwitz, M. Hilker, J. Heymann, O. Schneising, D. Pillai, H. Bovensmann, J. P. Burrows, H. Bosch, R. Parker, A. Butz, O. Hasekamp, C. W. O' Dell, Y. Yoshida, C. Gerbig, T. Nehrkorn, ..., H. Matsueda, Y. Sawa, 2014: Satellite-inferred European carbon sink larger than expected. *Atmospheric Chemistry and Physics*, **14**, 13739-13753, doi:10.5194/acp-14-13739-2014.
- 7* Sawa, Y., T. Machida, H. Matsueda, Y. Niwa, K. Tsuboi, S. Murayama, S. Morimoto and S. Aoki, 2015: Seasonal changes of CO₂, CH₄, N₂O, and SF₆ in the upper troposphere/lower stratosphere over the Eurasian continent observed by commercial airliner. *Geophysical Research Letters*, **42**, 2001-2008, doi:10.1002/2014GL062734.
- 沢田雅洋 1* Sawada, M., T. Sakai, T. Iwasaki, H. Seko, K. Saito and T. Miyoshi, 2015: Assimilating high-resolution winds from a Doppler lidar using an ensemble Kalman filter with lateral boundary adjustment. *Tellus A*, **67**, 23473, doi:10.3402/tellusa.v67.23473.
- 嶋田宇大 1* Shimada, U., A. Wada, K. Yamazaki and N. Kitabatake, 2014: Roles of an upper-level cold vortex and low-level baroclinicity in the development of polar lows over the Sea of Japan. *Tellus A*, **66**, 24694, doi:10.3402/tellusa.v66.24694.
- 2 加藤輝之, 柳瀬亘, 嶋田宇大, 末木健太, 本田匠, 小司禎教, 津口裕茂, 山田広幸, 横田祥, 若月泰孝, 南雲信宏, 村田文絵, 2015: 第10回「メソスケール気象と熱帯低気圧に関する国際会議(ICMCS-X)」参加報告. *天気*, **62**, 25-32.
- 小司禎教 1 中谷剛, 三隅良平, 小司禎教, 齊藤和雄, 瀬古弘, 清野直子, 鈴木真一, 出世ゆかり, 前坂剛, 菅原広史, 2014: 第1回 TOMACS 国際ワークショップの報告 -WMO 世界天気研究計画・研究開発プロジェクトの開始-. *天気*, **61**, 557-564.
- 2* Kawabata, T., H. Iwai, H. Seko, Y. Shoji, K. Saito, S. Ishii and K. Mizutani, 2014:

- Cloud-Resolving 4D-Var Assimilation of Doppler Wind Lidar Data on a Meso-Gamma-Scale Convective System. *Monthly Weather Review*, **142**, 4484-4498, doi:10.1175/MWR-D-13-00362.1.
- 3 小司禎教, 2015: 精密衛星測位を用いた豪雨の監視・予測に関する研究. *Electronics Communications*, **30**, 12-16.
- 4 加藤輝之, 柳瀬亘, 嶋田宇大, 末木健太, 本田匠, 小司禎教, 津口裕茂, 山田広幸, 横田祥, 若月泰孝, 南雲信宏, 村田文絵, 2015: 第10回「メソスケール気象と熱帯低気圧に関する国際会議(ICMCS-X)」参加報告. *天気*, **62**, 25-32.
- 5* Shoji Y., W. Mashiko, H. Yamauchi and E. Sato, 2015: Estimation of Local-scale Precipitable Water Vapor Distribution Around Each GNSS Station Using Slant Path Delay: Evaluation of a Severe Tornado Case Using High-Resolution NHM. *SOLA*, **11**, 31-35, doi:10.2151/sola.2015-008.
- 新堀敏基 1* Fujiwara, Y., H. Yamasato, T. Shimbori and T. Sakai, 2014: Characteristics of dilatational infrasonic pulses accompanying low-frequency earthquakes at Miyakejima volcano, Japan. *Earth, Planets and Space*, **66**, 11, doi:10.1186/1880-5981-66-11.
- 2 齊藤和雄, 新堀敏基, 原旅人, 豊田英司, 加藤輝之, 藤田司, 永田和彦, 本田有機, 2014: WMO「福島第一原発事故に関する気象解析についての技術タスクチーム」活動. *測候時報*, **81**, 1-30.
- 3 五十嵐康人, 梶野瑞王, 栗原治, 小林卓也, 関山剛, 竹村俊彦, 滝川雅之, 田中泰宙, 津旨大輔, 永井晴康, 眞木貴史, 升本順夫, 森野悠, 速水洋, 内山雄介, 木田新一郎, 齊藤和雄, 新堀敏基, 東博紀, 宮澤泰正, P. Bailly du Bois, Bocquet, M. Boust, D. Brovchenko, I. Brovchenko, A. Choe, T. Christoudias, D. Didier, H. Dietze, P. Garreau *et al.*, 2014: 東京電力福島第一原子力発電所事故によって環境中に放出された放射性物質の輸送沈着過程に関するモデル計算結果の比較. *日本学術会議報告*.
- 4* Kozono, T., H. Ueda, T. Shimbori and K. Fukui, 2014: Correlation between magma chamber deflation and eruption cloud height during the 2011 Shinmoe-dake eruptions. *Earth, Planets and Space*, **66**, 139, doi:10.1186/s40623-014-0139-1.
- 5* 新堀敏基, 甲斐玲子, 林洋介, 林勇太, 菅井明, 長谷川嘉彦, 橋本明弘, 高木朗充, 山本哲也, 福井敬一, 2014: 領域移流拡散モデルによる降下火砕物予測—2011年霧島山(新燃岳)噴火の事例—. *気象研究所研究報告*, **65**, 75-107, doi:10.2467/mripapers.65.75.
- 6* Hasegawa, Y., A. Sugai, Yo. Hayashi, Yu. Hayashi, S. Saito and T. Shimbori, 2015: Improvements of volcanic ash fall forecasts issued by the Japan Meteorological Agency. *Journal of Applied Volcanology*, **4**, 2.
- 7* Draxler, R., D. Arnold, M. Chino, S. Galmarini, M. Hort, A. Jones, S. Leadbetter, A. Malo, C. Maurer, G. Rolph, K. Saito, R. Servranckx, T. Shimbori, E. Solazzo and G. Wotawa, , 2015: World Meteorological Organization's model simulation of the radionuclide dispersion and deposition from the Fukushima Daiichi nuclear power plant accident. . *Journal of Environmental Radioactivity*, **139**, 172-184. , doi:10.1016/j.jenvrad.2013.09.014.
- 8* Saito, K, T Shimbori and R. Draxler, 2015: JMA's regional atmospheric transport model calculations for the WMO technical task team on meteorological analyses for Fukushima Daiichi Nuclear Power Plant accident. *Journal of Environmental Radioactivity*, **139**, 185-199, doi:10.1016/j.jenvrad.2014.02.007.
- 清野直子 1 Seino, N., T. Aoyagi and H. Tsuguti, 2014: Urban impact on summertime precipitation in Tokyo: Numerical simulation using NHM and the Square Prism Urban Canopy scheme. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 4.07-4.08.
- 2 中谷剛, 三隅良平, 小司禎教, 齊藤和雄, 瀬古弘, 清野直子, 鈴木真一, 出世ゆかり, 前

- 坂剛, 菅原広史, 2014: 第1回 TOMACS 国際ワークショップの報告 –WMO 世界天気研究計画・研究開発プロジェクトの開始–. 天気, **61**, 557-564.
- 関山剛 1 五十嵐康人, 梶野瑞王, 栗原治, 小林卓也, 関山剛, 竹村俊彦, 滝川雅之, 田中泰宙, 津旨大輔, 永井晴康, 眞木貴史, 升本順夫, 森野悠, 速水洋, 内山雄介, 木田新一郎, 斉藤和雄, 新堀敏基, 東博紀, 宮澤泰正, P. Bailly du Bois, Bocquet, M. Boust, D. Brovchenko, I. Brovchenko, A. Choe, T. Christoudias, D. Didier, H. Dietze, P. Garreau *et al.*, 2014: 東京電力福島第一原子力発電所事故によって環境中に放出された放射性物質の輸送沈着過程に関するモデル計算結果の比較. 日本学術会議報告.
- 2 Benedetti, A., ..., T. T. Sekiyama, T. Y. Tanaka *et al.*, 2014: Chapter 10 Operational Dust Prediction. *Mineral Dust: A Key Player in the Earth System*, Springer, 223-265, ISBN:9789401789776.
- 3* Sekiyama, T. T., M. Kunii, M. Kajino and T. Shimbori, 2015: Horizontal Resolution Dependence of Atmospheric Simulations of the Fukushima Nuclear Accident Using 15-km, 3-km, and 500-m Grid Models. *Journal of Oceanography*, **93**-1, 49-64, doi:10.2151/jmsj.2015-002.
- 瀬古弘 1 瀬古弘, 2014: 降水予測の最前線. *RRR*, **71**(6), 41736.
- 2 Yokota, S., M. Kunii and H. Seko, 2014: Doppler radar radial wind assimilation for the tornado outbreak on May 6, 2012. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.29-1.30.
- 3 Otsuka, M., M. Kunii, H. Seko, K. Shimoji and M. Hayashi, 2014: Assimilation Experiments of MTSAT Rapid Scan Atmospheric Motion Vectors. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.19-1.20.
- 4 Seko, H., Y. Kimata and T. Tsuda, 2014: Data Assimilation Experiments of Refractivity Observed by JMA Operational Radar. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.21-1.22.
- 5 中谷剛, 三隅良平, 小司禎教, 斉藤和雄, 瀬古弘, 清野直子, 鈴木真一, 出世ゆかり, 前坂剛, 菅原広史, 2014: 第1回 TOMACS 国際ワークショップの報告 –WMO 世界天気研究計画・研究開発プロジェクトの開始–. 天気, **61**, 557-564.
- 6* Oigawa, M., E. Realini, H. Seko and T. Tsuda, 2014: Numerical Simulation on Retrieval of Meso- γ Scale Precipitable Water Vapor Distribution with the Quasi-Zenith Satellite System (QZSS). *Journal of the Meteorological Society of Japan*, **92**, 189-205.
- 7 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
- 8* Kawabata, T., H. Iwai, H. Seko, Y. Shoji, K. Saito, S. Ishii and K. Mizutani, 2014: Cloud-Resolving 4D-Var Assimilation of Doppler Wind Lidar Data on a Meso-Gamma-Scale Convective System. *Monthly Weather Review*, **142**, 4484-4498, doi:10.1175/MWR-D-13-00362.1.
- 9* Kunoki, S., A. Manda, Y. Kodama, S. Iizuka, K. Sato, I. Fathrio, T. Mitsui, H. Seko, Q. Moteki, S. Minobe and Y. Tachibana, 2015: Oceanic influence on the Baiu frontal zone in the East China Sea. *Journal of Geophysical Research Atmosphere*, **120**, 449-463, doi:10.1002/2014JD022234.
- 10* Sawada, M., T. Sakai, T. Iwasaki, H. Seko, K. Saito and T. Miyoshi, 2015: Assimilating high-resolution winds from a Doppler lidar using an ensemble Kalman filter with lateral boundary adjustment. *Tellus A*, **67**, 23473, doi:10.3402/tellusa.v67.23473.

- 高木朗充 1* 新堀敏基, 甲斐玲子, 林洋介, 林勇太, 菅井明, 長谷川嘉彦, 橋本明弘, 高木朗充, 山本哲也, 福井敬一, 2014: 領域移流拡散モデルによる降下火砕物予測—2011 年霧島山（新燃岳）噴火の事例—. *気象研究所研究報告*, **65**, 75-107, doi:10.2467/mripapers.65.75.
- 2* Takagi, A., K. Fujiwara, T. Ohkura, A. C. Luis, Jr., A. V. Baloloy, S. Ando, E. Laguerta and Ma. A. V. Bornas, 2015: Ground Deformation of Mayon Volcano Revealed by GPS Campaign Survey. *Journal of Disaster Research*, **10**, 106-112.
- 高薮出 1 高薮出, 2014: 異常気象と温暖化の関係. *土木学会誌*, **99**, 14-15.
- 田尻拓也 1* Araki, K., H. Ishimoto, M. Murakami and T. Tajiri, 2014: Temporal variation of close-proximity soundings within a tornadic supercell environment. *SOLA*, **10**, 57-61.
- 2* 山下克也, 村上正隆, 田尻拓也, 齋藤篤思, 2014: 気象研究所における雲核の地上モニタリング観測とその品質管理. *エアロゾル研究*, **29(3)**, 174-182, doi:10.11203/jar.29.174.
- 3* Hiranuma, N., O. Möhler, K. Yamashita, T. Tajiri, A. Saito, A. Kisele1, N. Hoffman, C. Hoose and M. Murakami, 2015: Ice nucleation by cellulose and its potential impact on clouds and climate. *Nature Geoscience*, **8**, 273-277, doi:10.1038/ngeo2374.
- 4* Hiranuma, N., M. Murakami, A. Saito, T. Tajiri, *et al.*, 2015: A comprehensive laboratory study on the immersion freezing behavior of illite NX particles: a comparison of seventeen ice nucleation measurement techniques. *Atmospheric Chemistry and Physics*, **15**, 2489-2518, doi:10.5194/acp-15-2489-2015.
- 5* 田尻拓也, 山下克也, 齋藤篤思, 村上正隆, 2015: MRI 雲生成チェンバー実験—雲シーディング物質の雲核・氷晶核能—. *エアロゾル研究*, **30(1)**, 14-23, doi:10.11203/jar.30.14.
- 津口裕茂 1* Tsuguti, H. and T. Kato, 2014: Contributing Factors of the Heavy Rainfall Event at Amami-Oshima Island, Japan, on 20 October 2010. *Journal of the Meteorological Society of Japan*, **92**, 163-183, doi:10.2151/jmsj.2014-202.
- 2* Kanada, S., H. Tsuguti, T. Kato and F. Fujibe, 2014: Diurnal variation of precipitation around western Japan during the warm season. *SOLA*, **10**, 72-77.
- 3 Seino, N., T. Aoyagi and H. Tsuguti, 2014: Urban impact on summertime precipitation in Tokyo: Numerical simulation using NHM and the Square Prism Urban Canopy scheme. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 4.07-4.08.
- 4* 津口裕茂, 加藤輝之, 2014: 集中豪雨事例の客観的な抽出とその特性・特徴に関する統計解析. *天気 (論文・短報)*, **61**, 455-469.
- 5 北畠尚子, 城岡竜一, 和田章義, 末木健太, 津口裕茂, 筆保弘徳, 2014: 第41回メソ気象研究会の報告—台風～発生・発達と日本への影響—. *天気*, **61**, 893-898.
- 6 下瀬健一, 津口裕茂, 栃本英伍, 鶴沼昂, 2014: 第1回メソ気象セミナー開催報告. *天気*, **61**, 947-951.
- 7 加藤輝之, 柳瀬亘, 嶋田宇大, 末木健太, 本田匠, 小司禎教, 津口裕茂, 山田広幸, 横田祥, 若月泰孝, 南雲信宏, 村田文絵, 2015: 第10回「メソスケール気象と熱帯低気圧に関する国際会議(ICMCS-X)」参加報告. *天気*, **62**, 25-32.
- 辻野博之 1* Griffies, S. M., J. Yin, P. J. Durack, P. Goddard, H. Tsujino, *et al.*, 2014: An assessment of global and regional sea level for years 1993 - 2007 in a suite of interannual CORE - II simulations.. *Ocean Modelling*, **78**, 35-89, doi:10.1016/j.ocemod.2014.03.004.
- 2 碓氷典久, 坂本圭, 小川浩司, 藤井陽介, 辻野博之, 山中吾郎, 倉賀野連, 蒲地政文, 2014: 日本沿岸海況監視予測システムによる 2011 年瀬戸内海異常潮位の再現実

- 駿. 測候時報, **81(特別号)**, 53-62.
- 3 坂本圭, 山中吾郎, 辻野博之, 中野英之, 平原幹俊, 2014: 水平解像度 2km の瀬戸内海モデル MRI.COM-Seto 及び日本沿岸モデル MRI.COM-JPN の開発. 測候時報, **81(特別号)**, S63-S75.
- 4* Yamanaka, G., H. Tsujino, H. Nakano and M. Hirabara, 2015: Decadal variability of the Pacific Subtropical Cells and its relevance to the sea surface height in the western tropical Pacific during recent decades. *Journal of Geophysical Research Oceans*, **120**, 201-224, doi:10.1002/2014JC010190.
- 5* 辻野博之, 坂本圭, 碓氷典久, 2015: 気象庁気象研究所における沿岸モデル開発. 沿岸海洋研究, **52**, 119-129.
- 対馬弘晃 1* Tsushima, H. and Y. Ohta, 2014: Review on near-field tsunami forecasting from offshore tsunami data and onshore GNSS data for tsunami early warning. *Journal of Disaster Research*, **9(3)**, 339-357.
- 2* Tsushima, H., R. Hino, Y. Ohta, T. Iinuma and S. Miura, 2014: tFISH/RAPiD: Rapid improvement of near-field tsunami forecasting based on offshore tsunami data by incorporating onshore GNSS data. *Geophysical Research Letters*, **41**, doi:10.1002/2014GL059863.
- 3* Gusman, A. R., Y. Tanioka, B. T. MacInnes and H. Tsushima, 2014: A methodology for near-field tsunami inundation forecasting: Application to the 2011 Tohoku tsunami. *Journal of Geophysical Research*, **119**, 8186-8206, doi:10.1002/2014JB010958.
- 4* 馬場久紀, 平田賢治, 山崎明, 対馬弘晃, 勝間田明男, 前田憲二, 上野寛, 青木重樹, 小林昭夫, 木村一洋, 弘瀬冬樹, 長尾年恭, 2015: 自己浮上式海底地震計 (OBS) を用いた駿河湾石花海周辺海域における連続地震観測. 東海大学海洋研究所報告, **36**, 23-29.
- 坪井一寛 1 Takahashi, M., T. Nakazawa, S. Aoki, D. Goto, K. Kato, N. Aoki, T. Watanabe, T. Machida, Y. Tohjima, K. Katsumata, S. Murayama, S. Ishidoya, S. Morimoto, T. Fujitani, H. Koide, A. Takizawa, H. Matsueda, Y. Sawa and K. Tsuboi, 2014: INTERCOMPARISON EXPERIMENTS FOR GREENHOUSE GASES OBSERVATION (iceGGO) IN JAPAN. *17th WMO/IAEA Meeting on Carbon Dioxide, Other Greenhouse Gases and Related Tracers Measurement Techniques(GGMT-2013)*, **213**, 138-143.
- 2* Inoue, M., I. Morino, O. Uchino, Y. Miyamoto, T. Saeki, Y. Yoshida, T. Yokota, C. Sweeney, P. P. Tans, S. C. Biraud, T. Machida, J. V. Pettman, E. A. Kort, T. Tanaka, S. Kawakami, Y. Sawa, K. Tsuboi and H. Matsueda, 2014: Validation of XCH₄ derived from SWIR spectra of GOSAT TANSO-FTS with aircraft measurement data. *Atmospheric Measurement Techniques*, **7**, 2987-3005, doi:10.5194/amt-7-2987-2014.
- 3* Sawa, Y., T. Machida, H. Matsueda, Y. Niwa, K. Tsuboi, S. Murayama, S. Morimoto and S. Aoki, 2015: Seasonal changes of CO₂, CH₄, N₂O, and SF₆ in the upper troposphere/lower stratosphere over the Eurasian continent observed by commercial airliner. *Geophysical Research Letters*, **42**, 2001-2008, doi:10.1002/2014GL062734.
- 露木義 1 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
- 出牛真 1* Uchino, O., T. Sakai, T. Nagai, I. Morino, T. Maki, M. Deushi, K. Shibata, M. Kajino, T. Kawasaki, T. Akaho, S. Takubo, H. Okumura, K. Arai, M. Nakazato, T. Matsunaga, T. Yokota, S. Kawakami, K. Kita and Y. Sasano, 2014: DIAL measurement of lower tropospheric ozone over

- Saga(33.24° N,130.29° E),Japan,and comparison with a chemistry-climate model. *Atmospheric Measurement Techniques*, **7**, 1385-1394, doi:10.5194/amt-7-1385-2014.
- 2* Sheel, V., L. K. Sahu, M. Kajino, M. Deushi, O. Stein and P. Nedelec, 2014: Seasonal and interannual variability of carbon monoxide based on MOZAIC observations, MACC reanalysis, and model simulations over an urban site in India. *Journal of Geophysical Research Atmosphere*, **119**, 9123-9141, doi:10.1002/2013JD021425.
- 豊田隆寛 1 小川 浩 司, 碓 氷 典 久, 倉 賀 野 連, 藤 井 陽 介, 豊 田 隆 寛, 蒲 地 政 文, 2014: MOVE/MRI.COM-WNP 再解析データに見られた 黒潮流路変動と瀬戸内海水位変動との関係. *測候時報*, **81(特別号)**, S77-S91.
- 2* Nishikawa, H., T. Toyoda, S. Masuda, Y. Ishikawa, Y. Sasaki, H. Igarashi, M. Sakai, M. Seito and T. Awaji, 2015: Wind-induced stock variation of the neon flying squid (*Ommastrephes bartramii*) winter-spring cohort in the subtropical North Pacific Ocean. *Fisheries Oceanography*, **24**, 229-241, doi:10.1111/fog.12106.
- 永井智広 1* Uchino, O., T. sakai, T. Nagai, I. Morino, T. Maki, M. Deushi, K. Shibata, M. Kajino, T. Kawasaki, T. Akaho, S. Takubo, H. Okumura, K. Arai, M. Nakazato, T. Matsunaga, T. Yokota, S. Kawakami, K. Kita and Y. Sasano, 2014: DIAL measurement of lower tropospheric ozone over Saga(33.24° N,130.29° E),Japan,and comparison with a chemistry-climate model. *Atmospheric Measurement Techniques*, **7**, 1385-1394, doi:10.5194/amt-7-1385-2014.
- 2* 酒井 哲, 内野 修, 森野 勇, 永井 智広, 赤穂 大河, 川崎 健, 奥村 浩, 新井 康平, 内山 明博, 山崎 明宏, 松 永 恒 雄, 横 田 達 也, 2014: 佐賀のライダーとスカイラジオメータによって検出された桜島の火山灰の高度分布と光学特性. *日本リモートセンシング学会誌*, **34**, 197-204, doi:10.11440/rssj.34.197.
- 3 Okumura, H., T. Akaho, Y. Kojiro, O. Uchino, I. Morino, T. Yokota, T. Nagai, T. Sakai, T. Maki, A. Yamazaki and K. Arai, 2014: Development of PM2.5 density distribution visualization system using ground-level sensor network and Mie lidar. *Proceedings of SPIE 9246, Lidar Technologies, Techniques, and Measurements for Atmospheric Remote Sensing X*, **9246**, doi:10.1117/12.2067589.
- 4* D. A. Ridley, S. Solomon, J. E. Barnes, V. D. Burlakov, T. Deshler, S. I. Dolgii, A. B. Herber, T. Nagai, R. R. Neely III, A. V. Nevzorov, C. Ritter, T. Sakai, B. D. Santer, M. Sato, A. Schmidt, O. Uchino and J. P. Vernier, 2014: Total volcanic stratospheric aerosol optical depths and implications for global climate change. *Geophysical Research Letters*, **41**, 7763-7769, doi:10.1002/2014GL061541.
- 5* Nakamae, K., O. Uchino, I. Morino, B. Liley, T. Sakai, T. Nagai and T. Yokota, 2014: Lidar observation of the 2011 Puyehue-Cordón Caulle volcanic aerosols at Lauder, New Zealand. *Atmospheric Chemistry and Physics*, **14**, 12099-12108, doi:10.5194/acp-14-12099-2014.
- 6* 青柳 曉 典, 泉 敏 治, 酒 井 哲, 永 井 智 広, 2014: ドップラーライダーDBS 計測による都市域の粗度長とゼロ面変位高の推定. *風工学シンポジウム論文集*, **23**, 43-48.
- 7* Jin, Y., K. Kai, K. Kawai, T. Nagai, T. Sakai, A. Yamazaki, A. Uchiyama, D. Batdorj, N. Sugimoto and T. Nishizawa, 2015: Ceilometer calibration for retrieval of aerosol optical properties. *Journal of Quantitative Spectroscopy & Radiative Transfer*, **153**, 49-56, doi:10.1016/j.jqsrt.2014.10.009.
- 仲江川敏之 1* Nakaegawa, T., A. Kitoh, S. Kusunoki, H. Murakami and O. Arakawa, 2014: Hydroclimate changes over Central America and the Caribbean in a global warming climate projected with 20-km and 60-km mesh MRI atmospheric general circulation models. *気象研究所研究報告*, **65**, 15-33,

- doi:10.2467/mripapers.65.15.
- 2* Charles, A. N., J. R. Brown, A. Cottrill, K. L. Shelton, T. Nakaegawa and Y. Kuleshov, 2014: Seasonal prediction of the South Pacific Convergence Zone in the austral wet season. *Journal of Geophysical Research Atmosphere*, **119**, 12546-12557, doi:10.1002/2014JD021756.
- 中田健嗣 1* Igarashi Y., T. Ueno, K. Nakata, V. C. Hernandez-Grennan, J. L. Cruz-Salcedo, I. C. Narag, B. C. Bautista and T. Koizumi, 2015: Building a Tsunami Simulation Database for the Tsunami Warning System in the Philippines. *Journal of Disaster Research*, **10(1)**, 51-58.
- 中野英之 1 坂本圭, 山中吾郎, 辻野博之, 中野英之, 平原幹俊, 2014: 水平解像度 2km の瀬戸内海モデル MRI.COM-Seto 及び日本沿岸モデル MRI.COM-JPN の開発. *測候時報*, **81(特別号)**, S63-S75.
- 2* Yamanaka, G., H. Tsujino, H. Nakano and M. Hirabara, 2015: Decadal variability of the Pacific Subtropical Cells and its relevance to the sea surface height in the western tropical Pacific during recent decades. *Journal of Geophysical Research Oceans*, **120**, 201-224, doi:10.1002/2014JC010190.
- 南雲信宏 1 加藤輝之, 柳瀬亘, 嶋田宇大, 末木健太, 本田匠, 小司禎教, 津口裕茂, 山田広幸, 横田祥, 若月泰孝, 南雲信宏, 村田文絵, 2015: 第 10 回「メソスケール気象と熱帯低気圧に関する国際会議(ICMCS-X)」参加報告 . *天気*, **62**, 25-32.
- 丹羽洋介 1 丹羽洋介, 2014: インバージョン解析による CO₂ フラックス推定. *日本大気化学会ニュースレター*, **31**, 24-27.
- 2* Satoh, M., H. Tomita, H. Yashiro, H. Miura, C. Kodama, T. Seiki, A. T. Noda, Y. Yamada, D. Goto, M. Sawada, T. Miyoshi, Y. Niwa, M. Hara, T. Ohno, S. Iga, T. Arakawa, T. Inoue and H. Kubokawa, 2014: The Non-hydrostatic Icosahedral Atmospheric Model:description and development. *Progress in Earth and Planetary Science*, **1**, 18, doi:10.1186/s40645-014-0018-1.
- 3* Sawa, Y., T. Machida, H. Matsueda, Y. Niwa, K. Tsuboi, S. Murayama, S. Morimoto and S. Aoki, 2015: Seasonal changes of CO₂, CH₄, N₂O, and SF₆ in the upper troposphere/lower stratosphere over the Eurasian continent observed by commercial airliner. *Geophysical Research Letters*, **42**, 2001-2008, doi:10.1002/2014GL062734.
- 庭野匡思 1* Aoki, Te., S. Matoba, S. Yamaguchi, T. Tanikawa, M. Niwano, K. Kuchiki, K. Adachi, J. Uetake, H. Motoyama and M. Hori, 2014: Light-absorbing snow impurity concentrations measured on northwest Greenland ice sheet in 2011 and 2012. *Bulletin of Glaciological Research*, **32**, 21-31, doi:10.5331/bgr.32.21.
- 2* Hori, M., Te. Aoki, T. Tanikawa, K. Kuchiki, M. Niwano, S. Yamaguchi and S. Matoba, 2014: Dependence of thermal infrared emissive behaviors of snow cover on the surface snow type. *Bulletin of Glaciological Research*, **32**, 33-45, doi:10.5331/bgr.32.33.
- 3* Yamaguchi, S., H. Motoyoshi, T. Tanikawa, Te. Aoki, M. Niwano, Y. Takeuchi and Y. Endo, 2014: Application of snow specific surface area measurement using an optical method based on near-infrared reflectance around 900-nm wavelength to wet snow zones in Japan. *Bulletin of Glaciological Research*, **32**, 55-64, doi:10.5331/bgr.32.55.
- 4* Niwano, M., Te. Aoki, K. Kuchiki, M. Hosaka, Y. Kodama, S. Yamaguchi, H. Motoyoshi and Y. Iwata, 2014: Evaluation of updated physical snowpack model SMAP. *Bulletin of Glaciological Research*, **32**, 65-78, doi:10.5331/bgr.32.65.
- 5* Hachikubo, A., S. Yamaguchi, H. Arakawa, T. Tanikawa, M. Hori, K. Sugiura, S. Matoba, M. Niwano, K. Kuchiki and Te. Aoki, 2014: Effects of temperature and grain type on time variation of snow specific surface area. *Bulletin of Glaciological Research*, **32**, 47-53, doi:10.5331/bgr.32.47.
- 6* Yamaguchi, S., S. Matoba, T. Yamazaki, A. Tsushima, M. Niwano, T. Tanikawa and

- Te. Aoki, 2014: Glaciological observations in 2012 and 2013 at SIGMA-A site, Northwest Greenland. *Bulletin of Glaciological Research*, **32**, 95-105, doi:10.5331/bgr.32.95.
- 7 庭野匡思, 2014: 新刊紹介「新版 雪氷辞典」. *雪氷*, **76**, 367-368.
- 8 八久保晶弘, M. Schneebeli, 山口悟, 堀雅裕, 谷川朋範, 杉浦幸之助, 的場澄人, 庭野匡思, 朽木勝幸, 青木輝夫, 2014: 積雪の比表面積と粒径との関係. *北海道の雪氷*, **33**, 121-124.
- 9* Tanikawa, T., M. Hori, Te. Aoki, A. Hachikubo, K. Kuchiki, M. Niwano, S. Matoba, S. Yamaguchi, and K. Stamnes, 2014: In situ measurements of polarization properties of snow surface under the Brewster geometry in Hokkaido, Japan, and northwest Greenland ice sheet. *Journal of Geophysical Research Atmosphere*, **119**, 946-964, doi:10.1002/2014JD022325.
- 10* Kuchiki, K., Te. Aoki, M. Niwano, S. Matoba, Y. Kodama and K. Adachi, 2015: Elemental carbon, organic carbon, and dust concentrations in snow measured with thermal optical method and filter weighing: variations during 2007-2013 winters in Sapporo, Japan. *Journal of Geophysical Research Atmosphere*, **120**, 868-882, doi:10.1002/2014JD022144.
- 萩野谷成徳 1* 小野木茂, 萩野谷成徳, 堀晃浩, 八木俊政, 毛利英明, 2014: 汎用デジタルカメラを使用した野外P I V撮影技術. *日本風工学会論文集*, **39**, 63-66.
- 2* 甲斐智博, 萩野谷成徳, 2014: 草地における地表面熱収支の季節変化及び植生の影響. *天気 (論文・短報)*, **61**, 777-784.
- 3* 萩野谷成徳, 2015: 突風率から推定した地表面粗度の長期変化. *天気 (論文・短報)*, **62**, 17-27.
- 橋本明弘 1 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
- 2* 新堀敏基, 甲斐玲子, 林洋介, 林勇太, 菅井明, 長谷川嘉彦, 橋本明弘, 高木朗充, 山本哲也, 福井敬一, 2014: 領域移流拡散モデルによる降下火砕物予測—2011 年霧島山 (新燃岳) 噴火の事例—. *気象研究所研究報告*, **65**, 75-107, doi:10.2467/mripapers.65.75.
- 3* 橋本明弘, 久芳奈遠美, 村上正隆, 2015: 数値モデルを用いた人工降雨・降雪研究. *エアロゾル研究*, **30(1)**, 32-39, doi:10.11203/jar.30.32.
- 林修吾 1 Nishihashi, M., C. Fujiwara, K. Kusunoki, S. Yoshida, S. Hayashi, H. Y. Inoue, K. Arai, K. Shimose, R. Kato, S. Saito, E. Sato, W. Mashiko and H. Suzuki, 2014: Three-Dimensional Characteristics of Lightning Channels, Reflectivity Cores, and Vortices in Winter Thunderstorms. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-01-10.
- 2* Ishii, K., S. Hayashi and F. Fujibe, 2014: Statistical analysis of temporal and spatial distribution of cloud-to-ground lightning in Japan from 2002 to 2008. *Journal of Atmospheric Electricity*, **34**, 79-86, doi:10.1541/jae.34.79.
- 3 齋藤将監, 庄司智美, 鈴木裕子, 片倉翔, 鳥居建男, 杉田武志, 楠研一, 林修吾, 鈴木智幸, 鴨川仁, 2014: 2013 年富士山山頂で観測された雷雲に関連する高エネルギー放射線. *日本大気電気学会誌*, **85**, 69-70.
- 4* Nishihashi, M., K. Arai, C. Fujiwara, W. Mashiko, S. Yoshida, S. Hayashi and K. Kusunoki, 2015: Characteristics of Lightning Jumps Associated with a Tornadic Supercell on 2 September 2013. *SOLA*, **11**, 18-22, doi:10.2151/sola.2015-005.
- 林豊 1 林豊, 2014: 潮位・津波観測施設. *東日本大震災合同調査報告 共通編2 津波の特性と被害*, 共通編2, 62-69.

- 2* 今井健太郎, 田野邊睦, 林豊, 今村文彦, 2014: 2011 年東北地方太平洋沖地震津波における日本列島太平洋沿岸の津波減衰過程. *土木学会論文集*, **70(2)**, I_276-I_280.
- 3* 今井健太郎, 都司嘉宣, 林豊, 2014: 東京湾における津波伝播特性の励起源一観測と数値実験による検証一. *土木学会論文集*, **70(2)**, I_211-I_215.
- 林元直樹 1 林元直樹, 中村武史, 干場充之, 2014: 海底地震計の強震入力時における地震波形の特徴と緊急地震速報処理への影響について: JAMSTEC の釧路沖 OBS を用いた検証. *第14回地震工学シンポジウム論文集*, 3624-3630.
- 2* 林元直樹, 干場充之, 2015: エアガン発振記録を用いた東南海海底地震計の設置方位推定. *駿震時報 (論文)*, **78**, 159-167.
- 原田やよい 1 原田やよい, 古林慎哉, 太田行哉, 海老田綾貴, 守谷昌己, 小野田浩克, 大野木和敏, 釜堀弘隆, 小林ちあき, 遠藤洋和, 2014: 気象庁 55 年長期再解析 (JRA-55). *天気*, **61**, 43-49.
- 2* Kobayashi, C., H. Endo, Y. Ota, S. Kobayashi, H. Onoda, Y. Harada, K. Onogi and H. Kamahori, 2014: Preliminary results of JRA-55C: atmospheric reanalysis assimilating conventional observations only. *SOLA*, **10**, 78-82, doi:10.2151/sola.2014-016.
- 3* Kobayashi, S., Y. Ota, Y. Harada, A. Ebata, M. Moriya, H. Onoda, K. Onogi, H. Kamahori, C. Kobayashi, H. Endo, K. Miyaoka and K. Takahashi, 2015: The JRA-55 Reanalysis: General Specifications and Basic Characteristics. *Journal of the Meteorological Society of Japan*, **93**, 5-48, doi:10.2151/jmsj.2015-001.
- 弘瀬冬樹 1 弘瀬冬樹, 前田憲二, 藤田健一, 2015: 南海トラフ沿い巨大地震とスロースリップ. *地震予知連絡会会報*, **93**, 429-431.
- 2* 馬場久紀, 平田賢治, 山崎明, 対馬弘晃, 勝間田明男, 前田憲二, 上野寛, 青木重樹, 小林昭夫, 木村一洋, 弘瀬冬樹, 長尾年恭, 2015: 自己浮上式海底地震計 (OBS) を用いた駿河湾石花海周辺海域における連続地震観測. *東海大学海洋研究所報告*, **36**, 23-29.
- 福井敬一 1* Kozono, T., H. Ueda, T. Shimbori and K. Fukui, 2014: Correlation between magma chamber deflation and eruption cloud height during the 2011 Shinmoe-dake eruptions. *Earth, Planets and Space*, **66**, 139, doi:10.1186/s40623-014-0139-1.
- 2* 新堀敏基, 甲斐玲子, 林洋介, 林勇太, 菅井明, 長谷川嘉彦, 橋本明弘, 高木朗充, 山本哲也, 福井敬一, 2014: 領域移流拡散モデルによる降下火砕物予測ー2011 年霧島山 (新燃岳) 噴火の事例ー. *気象研究所研究報告*, **65**, 75-107, doi:10.2467/mripapers.65.75.
- 藤井陽介 1 Balmaseda, M. A., A. Kumar, E. Andersson, Y. Takaya, D. Anderson, P. Janssen, M. Martin and Y. Fujii, 2014: White Paper #4 - Operational forecasting systems. *Report of the Tropical Pacific Observing System 2020 Workshop (TPOS2020). Volume II -White Papers.(GCOS Rep. 184/ GOOS Rep. 206/ WCRP Rep. 6/2014)*, 64-101.
- 2 Fujii, Y., J. Cummings, Y. Xue, A. Schiller, T. Lee, M. A. Balmaseda, E. Remy, S. Masuda, O. Alves, G. Brassington, B. Cornuelle, M. Martin, P. Oke, G. Smith and X. Yang, 2014: White Paper #5 - Evaluation of the Tropical Pacific Observing System from the data assimilation perspective. *Report of the Tropical Pacific Observing System 2020 Workshop (TPOS2020). Volume II -White Papers.(GCOS Rep. 184/ GOOS Rep. 206/ WCRP Rep. 6/2014)*, 102-129.
- 3 小川浩司, 碓氷典久, 倉賀野連, 藤井陽介, 豊田隆寛, 蒲地政文, 2014: MOVE/MRLCOM-WNP 再解析データに見られた 黒潮流路変動と瀬戸内海水位変動との関係. *測候時報*, **81(特別号)**, S77-S91.
- 4 碓氷典久, 坂本圭, 小川浩司, 藤井陽介, 辻野博之, 山中吾郎, 倉賀野連, 蒲地政文, 2014: 日本沿岸海況監視予測システムによる 2011 年瀬戸内海異常潮位の再現実験. *測候時報*, **81(特別号)**, 53-62.

- 藤枝鋼 1 K. N. Liou 著, 藤枝鋼, 深堀正志訳, 2014: 大気放射学—衛星リモートセンシングと気候問題へのアプローチ. 共立出版, 664pp, ISBN: 9784320047266
- 藤田健一 1 弘瀬冬樹, 前田憲二, 藤田健一, 2015: 南海トラフ沿い巨大地震とスロースリップ. *地震予知連絡会会報*, **93**, 429-431.
- 藤部文昭 1 藤部文昭, 2014: 長期観測データから見た異常気象. *学士会会報*, **907**, 92-102.
- 2* Ishii, K., S. Hayashi and F. Fujibe, 2014: Statistical analysis of temporal and spatial distribution of cloud-to-ground lightning in Japan from 2002 to 2008. *Journal of Atmospheric Electricity*, **34**, 79-86, doi:10.1541/jae.34.79.
- 3* Fujibe, F., 2015: Relationship between interannual variations of extreme hourly precipitation and air/sea-surface temperature in Japan. *SOLA*, **11**, 5-9, doi:10.2151/sola.2015-002.
- 古舘友通 1 古舘友通, 2014: 並列処理による震源計算の高速化. *第14回地震工学シンポジウム論文集*, 3345.
- 保坂征宏 1* Niwano, M., Te. Aoki, K. Kuchiki, M. Hosaka, Y. Kodama, S. Yamaguchi, H. Motoyoshi and Y. Iwata, 2014: Evaluation of updated physical snowpack model SMAP. *Bulletin of Glaciological Research*, **32**, 65-78, doi:10.5331/bgr.32.65.
- 干場充之 1 Hoshiba, M., 2014: Review of the Nationwide Earthquake Early Warning in Japan during Its First Five Years. *Earthquake Hazard, Risk, and Disasters*, Academic Press, 505-529, ISBN: 9780123948489.
- 2 干場充之, 青木重樹, 2014: 揺れの数値予報 —データ同化, リアルタイム Shake-map, 波動伝播シミュレーション—. *第14回地震工学シンポジウム論文集*.
- 3 林元直樹, 中村武史, 干場充之, 2014: 海底地震計の強震入力時における地震波形の特徴と緊急地震速報処理への影響について: JAMSTEC の釧路沖 OBS を用いた検証. *第14回地震工学シンポジウム論文集*, 3624-3630.
- 4 小木曾仁, 青木重樹, 干場充之, 2014: S波スペクトル比から推定した全国のサイト特性と、リアルタイム地震動予測への活用. *第14回地震工学シンポジウム論文集*, 3698-3705.
- 5* 林元直樹, 干場充之, 2015: エアガン発振記録を用いた東南海海底地震計の設置方位推定. *験震時報 (論文)*, **78**, 159-167.
- 前田憲二 1 弘瀬冬樹, 前田憲二, 藤田健一, 2015: 南海トラフ沿い巨大地震とスロースリップ. *地震予知連絡会会報*, **93**, 429-431.
- 2* 馬場久紀, 平田賢治, 山崎明, 対馬弘晃, 勝間田明男, 前田憲二, 上野寛, 青木重樹, 小林昭夫, 木村一洋, 弘瀬冬樹, 長尾年恭, 2015: 自己浮上式海底地震計 (OBS) を用いた駿河湾石花海周辺海域における連続地震観測. *東海大学海洋研究所報告*, **36**, 23-29.
- 眞木貴史 1* Uchino, O., T. Sakai, T. Nagai, I. Morino, T. Maki, M. Deushi, K. Shibata, M. Kajino, T. Kawasaki, T. Akaho, S. Takubo, H. Okumura, K. Arai, M. Nakazato, T. Matsunaga, T. Yokota, S. Kawakami, K. Kita and Y. Sasano, 2014: DIAL measurement of lower tropospheric ozone over Saga (33.24° N, 130.29° E), Japan, and comparison with a chemistry-climate model. *Atmospheric Measurement Techniques*, **7**, 1385-1394, doi:10.5194/amt-7-1385-2014.
- 2 五十嵐康人, 梶野瑞王, 栗原治, 小林卓也, 関山剛, 竹村俊彦, 滝川雅之, 田中泰宙, 津旨大輔, 永井晴康, 眞木貴史, 升本順夫, 森野悠, 速水洋, 内山雄介, 木田新一郎, 斉藤和雄, 新堀敏基, 東博紀, 宮澤泰正, P. Bailly du Bois, Bocquet, M. Boust, D. Brovchenko, I. Brovchenko, A. Choe, T. Christoudias, D. Didier, H. Dietze, P. Garreau *et al.*, 2014: 東京電力福島第一原子力発電所事故によって環境中に放出された放射性物質の輸送沈着過程に関するモデル計算結果の比較. *日本学術会議報告*.
- 益子渉 1 Nishihashi, M., C. Fujiwara, K. Kusunoki, S. Yoshida, S. Hayashi, H. Y. Inoue, K.

- Arai, K. Shimose, R. Kato, S. Saito, E. Sato, W. Mashiko and H. Suzuki, 2014: Three-Dimensional Characteristics of Lightning Channels, Reflectivity Cores, and Vortices in Winter Thunderstorms. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-01-10.
- 2 Mashiko, W., 2014: Super high-resolution simulation of the fine-scale tornado structure. *CAS/JSC WGENE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 5.07-5.08.
 - 3 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
 - 4* Shoji Y., W. Mashiko, H. Yamauchi and E. Sato, 2015: Estimation of Local-scale Precipitable Water Vapor Distribution Around Each GNSS Station Using Slant Path Delay: Evaluation of a Severe Tornado Case Using High-Resolution NHM. *SOLA*, **11**, 31-35, doi:10.2151/sola.2015-008.
 - 5* Nishihashi, M., K. Arai, C. Fujiwara, W. Mashiko, S. Yoshida, S. Hayashi and K. Kusunoki, 2015: Characteristics of Lightning Jumps Associated with a Tornadic Supercell on 2 September 2013. *SOLA*, **11**, 18-22, doi:10.2151/sola.2015-005.
- 松枝秀和
- 1* Zhang, H. F., B. Z. Chen, I. T. van der Laan-Luijkx, T. Machida, H. Matsueda, Y. Sawa, Y. Fukuyama, R. Langenfelds, M. van der Schoot, G. Xu, J. W. Yan, M. L. Cheng, L. X. Zhou, P. P. Tans and W. Peters, 2014: Estimating Asian terrestrial carbon fluxes from CONTRAIL aircraft and surface CO₂ observations for the period 2006-2010. *Atmospheric Chemistry and Physics*, **14**, 5807-5824, doi:10.5194/acp-14-5807-2014.
 - 2 Takahashi, M., T. Nakazawa, S. Aoki, D. Goto, K. Kato, N. Aoki, T. Watanabe, T. Machida, Y. Tohjima, K. Katsumata, S. Murayama, S. Ishidoya, S. Morimoto, T. Fujitani, H. Koide, A. Takizawa, H. Matsueda, Y. Sawa and K. Tsuboi, 2014: INTERCOMPARISON EXPERIMENTS FOR GREENHOUSE GASES OBSERVATION (iceGGO) IN JAPAN. *17th WMO/IAEA Meeting on Carbon Dioxide, Other Greenhouse Gases and Related Tracers Measurement Techniques (GGMT-2013)*, **213**, 138-143.
 - 3* Inoue, M., I. Morino, O. Uchino, Y. Miyamoto, T. Saeki, Y. Yoshida, T. Yokota, C. Sweeney, P. P. Tans, S. C. Biraud, T. Machida, J. V. Pettman, E. A. Kort, T. Tanaka, S. Kawakami, Y. Sawa, K. Tsuboi and H. Matsueda, 2014: Validation of XCH₄ derived from SWIR spectra of GOSAT TANSO-FTS with aircraft measurement data. *Atmospheric Measurement Techniques*, **7**, 2987-3005, doi:10.5194/amt-7-2987-2014.
 - 4* Jiang, F., H. M. Wang, J. M. Cheu, T. Machida, L. X. Zhou, W. M. Ju, H. Matsueda and Y. Sawa, 2014: Carbon balance of China constrained by CONTRAIL aircraft CO₂ measurements. *Atmospheric Chemistry and Physics*, **14**, 10133-10144, doi:10.5194/acp-14-10133-2014.
 - 5* M. Reuter, M., M. Buchwitz, M. Hilker, J. Heymann, O. Schneising, D. Pillai, H. Bovensmann, J. P. Burrows, H. Bosch, R. Parker, A. Butz, O. Hasekamp, C. W. O' Dell, Y. Yoshida, C. Gerbig, T. Nehrkorn, ..., H. Matsueda, Y. Sawa, 2014: Satellite-inferred European carbon sink larger than expected. *Atmospheric Chemistry and Physics*, **14**, 13739-13753, doi:10.5194/acp-14-13739-2014.
 - 6* Sawa, Y., T. Machida, H. Matsueda, Y. Niwa, K. Tsuboi, S. Murayama, S. Morimoto and S. Aoki, 2015: Seasonal changes of CO₂, CH₄, N₂O, and SF₆ in the upper troposphere/lower stratosphere over the Eurasian continent observed by commercial airliner. *Geophysical Research Letters*, **42**, 2001-2008, doi:10.1002/2014GL062734.

- 水田亮 1 榎本剛, 水田亮, 森正人, 宮坂貴文, 遠藤洋和, 松枝未遠, 2014: 研究集会「異常気象と気候システム変動のメカニズムと予測可能性」の報告. *天気*, **61**(4), 280-284.
- 2* Mizuta, R., O. Arakawa, T. Ose, S. Kusunoki, H. Endo and A. Kitoh, 2014: Classification of CMIP5 future climate responses by the tropical sea surface temperature changes. *SOLA*, **10**, 167-171.
- 3* Tripathi O.P., M. Baldwin, A. Charlton-Perez, M. Charron, S. Eckermann, E. Gerber, G. Harrison, D. Jackson, B-M. Kim, Y. Kuroda, A. Lang, C. Lee, S. Mahmood, R. Mizuta, G. Roff, M. Sigmond and S-W. Son, 2014: The predictability of the extra-tropical stratosphere and its impacts on the skill of tropospheric forecasts. *Quarterly Journal of the Royal Meteorological Society*, **141**, 987-1003, doi:10.1002/qj.2432.
- 4* Yoshimura, H., R. Mizuta and H. Murakami, 2015: A Spectral Cumulus Parameterization Scheme Interpolating between Two Convective Updrafts with Semi-Lagrangian Calculation of Transport by Compensatory Subsidence. *Monthly Weather Review*, **143**, 597-621, doi:10.1175/MWR-D-14-00068.1.
- 緑川貴 1* Takatani, Y., K. Enyo, Y. Iida, A. Kojima, T. Nakano, D. Sasano, N. Kosugi, T. Midorikawa, T. Suzuki and M. Ishii, 2014: Relationships between total alkalinity in surface water and sea surface dynamic height in the Pacific Ocean. *Journal of Geophysical Research Oceans*, **119**, 2806-2814, doi:10.1002/2013JC009739.
- 宮岡一樹 1 宮岡一樹, 原田昌武, 道家涼介, 2015: スタッキング法を用いた GNSS 地殻変動監視. *神奈川県温泉地学研究所報告*, **46**, 1-8.
- 村上正隆 1* Araki, K., H. Ishimoto, M. Murakami and T. Tajiri, 2014: Temporal variation of close-proximity soundings within a tornadic supercell environment. *SOLA*, **10**, 57-61.
- 2* 山下克也, 村上正隆, 田尻拓也, 齋藤篤思, 2014: 気象研究所における雲核の地上モニタリング観測とその品質管理. *エアロゾル研究*, **29**(3), 174-182, doi:10.11203/jar.29.174.
- 3* Orikasa, N. and M. Murakami, 2015: Ice crystal shapes in midlatitude cirrus clouds derived from hydrometeor videosonde (HYVIS) observations. *Journal of the Meteorological Society of Japan*, **93**, 143-155, doi:10.2151/jmsj.2015-004..
- 4* Hiranuma, N., O. Möhler, K. Yamashita, T. Tajiri, A. Saito, A. Kisele1, N. Hoffman, C. Hoose and M. Murakami, 2015: Ice nucleation by cellulose and its potential impact on clouds and climate. *Nature Geoscience*, **8**, 273-277, doi:10.1038/ngeo2374.
- 5* Hiranuma, N., M. Murakami, A. Saito, T. Tajiri, *et al.*, 2015: A comprehensive laboratory study on the immersion freezing behavior of illite NX particles: a comparison of seventeen ice nucleation measurement techniques. *Atmospheric Chemistry and Physics*, **15**, 2489-2518, doi:10.5194/acp-15-2489-2015.
- 6* 村上正隆, 2015: 人工降雨とは. *エアロゾル研究*, **30**, 5-13, doi:10.11203/jar.30.5.
- 7* 折笠成宏, 村上正隆, 齋藤篤思, 2015: 航空機を用いた雲へのシーディングによる人工降雨・降雪実験. *エアロゾル研究*, **30**, 24-31, doi:10.11203/jar.30.24.
- 8* 田尻拓也, 山下克也, 齋藤篤思, 村上正隆, 2015: MRI 雲生成チェンバー実験 —雲シーディング物質の雲核・氷晶核能—. *エアロゾル研究*, **30**(1), 14-23, doi:10.11203/jar.30.14.
- 9* 橋本明弘, 久芳奈遠美, 村上正隆, 2015: 数値モデルを用いた人工降雨・降雪研究. *エアロゾル研究*, **30**(1), 32-39, doi:10.11203/jar.30.32.
- 村田昭彦 1* Murata, A., H. Sasaki, M. Hanafusa and K. Kurihara, 2014: Mechanism of early-summer low-temperature extremes in Japan projected by a nonhydrostatic regional climate model. *Weather and Climate Extremes*, **4**,

- 62-74, doi:10.1016/j.wace.2014.04.007.
- 毛利英明 1* 小野木茂, 萩野谷成徳, 堀晃浩, 八木俊政, 毛利英明, 2014: 汎用デジタルカメラを使用した野外P I V撮影技術. *日本風工学会論文集*, **39**, 63-66.
- 2 片岡浩人, 田村哲郎, 又吉直樹, 毛利英明, 2014: LESによる都市キャノピー内外の風の乱流構造の予測. *第23回 風工学シンポジウム論文集*, 535-540.
- 3 Mouri, H., 2015: Lognormality Observed for Additive Processes: Application to Turbulence. *Emergence, Complexity and Computation*, **14**, 109-114, doi:10.1007/978-3-319-10759-2_12.
- 4* Mouri, H., 2015: Log-stable law of energy dissipation as a framework of turbulence intermittency. *Physical Review E*, **91**, 033017, doi:10.1103/PhysRevE.91.033017.
- 安田珠幾 1 安田珠幾, 鈴木立郎, 野崎太, 三上正男, 2014: 海面水位上昇. *地球温暖化 そのメカニズムと不確実性*, 朝倉書店, 118-131, ISBN: 9784254161267.
- 2 安田珠幾, 2015: 地球温暖化に伴う海面水位上昇. *隔月刊 地球温暖化*, **36**, 44-45.
- 山口宗彦 1* Magnusson, L., J.-R. Bidlot, S. Lang, A. Thorpe, N. Wedi and M. Yamaguchi, 2014: Evaluation of medium-range forecasts for hurricane Sandy. *Monthly Weather Review*, **142**, 1962-1981.
- 2* Yamaguchi, M., T. Nakazawa and S. Hoshino, 2014: North Western Pacific Tropical Cyclone Ensemble Forecast Project. *Tropical Cyclone Research and Review*, **3**, 193-201, doi:10.6057/2014TCRR03.05.
- 3 筆保弘徳, 伊藤耕介, 山口宗彦, 2014: 台風の正体. 朝倉書店, 184pp, ISBN: 9784254167726
- 4 Elliott, G. and M. Yamaguchi, 2014: Advances in Forecasting Motion. *Topic report of WMO 8th International Workshop on Tropical Cyclones (IWTC-8)*, 44.
- 山崎明宏 1* Uchiyama, A., A. Yamazaki, M. Shiobara and H. Kobayashi, 2014: Case study on microphysical properties of boundary layer mixed-phase cloud observed at Ny-Ålesund, Svalbard: Observed cloud microphysics and calculated optical properties on 9 June 2011. *Polar Science*, **8**, 57-72, doi:10.1016/j.polar.2013.11.001.
- 2* 酒井哲, 内野修, 森野勇, 永井智広, 赤穂大河, 川崎健, 奥村浩, 新井康平, 内山明博, 山崎明宏, 松永恒雄, 横田達也, 2014: 佐賀のライダーとスカイラジオメータによって検出された桜島の火山灰の高度分布と光学特性. *日本リモートセンシング学会誌*, **34**, 197-204, doi:10.11440/rssj.34.197.
- 3* Uchiyama, A., A. Yamazaki, R. Kudo, E. Kobayashi, H. Togawa and D. Uesawa, 2014: Continuous Ground-Based Observation of Aerosol Optical Properties at Tsukuba, Japan (Trend and Climatology). *Journal of the Meteorological Society of Japan*, **92A**, 93-108, doi:10.2151/jmsj.2014-A06.
- 4* Uchiyama, A., A. Yamazaki and R. Kudo, 2014: Column Water Vapor Retrievals from Sky-radiometer(POM-02) 940nm Data. *Journal of the Meteorological Society of Japan*, **92A**, 195-203, doi:10.2151/jmsj.2014-A13.
- 5* Khatri, P., T. Takamura, A. Yamazaki and A. Uchiyama, 2014: Use of 315nm channel data of sky radiometer to estimate columnar ozone amount.. *Journal of the Meteorological Society of Japan*, **92A**, 185-194, doi:10.2151/jmsj.2014-A12.
- 6* Jin, Y., K. Kai, K. Kawai, T. Nagai, T. Sakai, A. Yamazaki, A. Uchiyama, D. Batdorj, N. Sugimoto and T. Nishizawa, 2015: Ceilometer calibration for retrieval of aerosol optical properties. *Journal of Quantitative Spectroscopy & Radiative Transfer*, **153**, 49-56, doi:10.1016/j.jqsrt.2014.10.009.
- 山田芳則 1 山田芳則, 2014: 気象庁 気象研究所 予報研究部 第一研究室. 一般財団法人電気学会電力・エネルギー部門ニュースレター, *電気学会誌*, **134(4)**, 付録.

- 2* 下瀬健一, 大竹秀明, J. G. S. Fonseca Jr., 高島工, 大関崇, 山田芳則, 2014: 気象庁メソモデルの日射予測誤差要因の解析. *電気学会論文誌 B*, **134**, 518-526.
- 3* 大竹秀明, 下瀬健一, J. G. S. Fonseca Jr, 高島工, 大関崇, 山田芳則, 2014: 気象庁週間予報モデルの日射量予測の誤差評価. *電気学会論文誌 B*, **134**, 501-509.
- 4 山田芳則, 2014: 数値予報の原理と気象庁数値予報モデルの概要. *技術雑誌「スマートグリッド」* 2014年7月号, **55(10)**, 19-23.
- 5 山田芳則, 2014: 気象庁数値予報の再生可能エネルギー分野での利用. *電気現場技術*, **53**, 41989.
- 6 Ohtake. H., K-I. Shimose., Fonseca. Jr., T. Takashima., T. Oozeki and Y. Yamada, 2014: Seasonal and regional variations of the range of forecast errors of global irradiance by the Japanese operational physical model. *Energy Procedia*, **57**, 1247-1256, doi:10.1016/j.egypro.2014.10.114.
- 山中吾郎 1 碓氷典久, 坂本圭, 小川浩司, 藤井陽介, 辻野博之, 山中吾郎, 倉賀野連, 蒲地政文, 2014: 日本沿岸海況監視予測システムによる 2011 年瀬戸内海異常潮位の再現実験. *測候時報*, **81(特別号)**, 53-62.
- 2 坂本圭, 山中吾郎, 辻野博之, 中野英之, 平原幹俊, 2014: 水平解像度 2km の瀬戸内海モデル MRI.COM-Seto 及び日本沿岸モデル MRI.COM-JPN の開発. *測候時報*, **81(特別号)**, S63-S75.
- 3* Yamanaka, G., H. Tsujino, H. Nakano and M. Hirabara, 2015: Decadal variability of the Pacific Subtropical Cells and its relevance to the sea surface height in the western tropical Pacific during recent decades. *Journal of Geophysical Research Oceans*, **120**, 201-224, doi:10.1002/2014JC010190.
- 山本哲 1 熊本真理子, 山本哲, 2014: 世界気象機関 (WMO) 気象・環境測器及び観測法に関する技術会合 (TECO-2012) 報告. *天気*, **61(6)**, 471-476.
- 山本哲也 1* 新堀敏基, 甲斐玲子, 林洋介, 林勇太, 菅井明, 長谷川嘉彦, 橋本明弘, 高木朗充, 山本哲也, 福井敬一, 2014: 領域移流拡散モデルによる降下火砕物予測—2011 年霧島山 (新燃岳) 噴火の事例—. *気象研究所研究報告*, **65**, 75-107, doi:10.2467/mripapers.65.75.
- 弓本桂也 1* Uno, I., N. Sugimoto, A. Shimizu, K. Yumimoto, Y. Hara and Z. Wang, 2014: Record heavy PM2.5 air pollution over China in January 2013: Vertical and horizontal dimensions. *SOLA*, **10**, 136-140, doi:10.2151/sola.2014-028.
- 2* Yumimoto, K, I. Uno and S. Itahasi, 2014: Long-term inverse modeling of Chinese CO emission from satellite observations. *Environmental Pollution*, **195**, 308-318, doi:10.1016/j.envpol.2014.07.026.
- 3* Yumimoto, K. and T. Takemura, 2015: Long - term Inverse Modeling of Asian Dust: Inter - annual Variations of Its Emission, Transport, Deposition and Radiative Forcing. *Journal of Geophysical Research*, **119**, 1582-1607, doi:10.1002/2014JD022390.
- 横田祥 1* Iga, K., S. Yokota, S. Watanabe, T. Ikeda, H. Niino and N. Misawa, 2014: Various phenomena on a water vortex in a cylindrical tank over a rotating bottom. *Fluid Dynamics Research*, **46**, 031409, doi:10.1088/0169-5983/46/3/031409.
- 2 Yokota, S., M. Kunii and H. Seko, 2014: Doppler radar radial wind assimilation for the tornado outbreak on May 6, 2012. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 1.29-1.30.
- 3 Saito, K., H. Seko, M. Kunii, G. Chen, S. Yokota, L. Duc, T. Kuroda, T. Oizumi, K. Ito, T. Kawabata, S. Origuchi, W. Mashiko, A. Hashimoto, J. Ito, K. Tsuboki, T. Tsuyuki, F. Kimura and SPIRE mesoscale NWP group member, 2014: Super high-resolution mesoscale NWP with the K-computer. *Proceeding, 3rd International Workshop on Nonhydrostatic Numerical Models*, 81-81.
- 4 加藤輝之, 柳瀬亘, 嶋田宇大, 末木健太, 本田匠, 小司禎教, 津口裕茂, 山田広幸, 横田

- 祥, 若月泰孝, 南雲信宏, 村田文絵, 2015: 第10回「メソスケール気象と熱帯低気圧に関する国際会議(ICMCS-X)」参加報告. 天気, **62**, 25-32.
- 吉田智 1* 吉田智, W. Ting, 牛尾知雄, 高柳雄次, 2014: 多地点LF帯センサによる雷放電リーダの三次元標定とレーダ反射因子との比較. 電気学会論文誌 A, **134(4)**, 188-196, doi:10.1541/ieejfms.134.188.
- 2* 嶋村重治, 吉川栄一, 吉田智, 牛尾知雄, 又吉直樹, 2014: Ku 帯広帯域レーダによる山形県庄内空港における低層擾乱アドバイザリシステムの検討. 電気学会論文誌 A, **134(4)**, 182-187, doi:10.1541/ieejfms.134.182.
- 3* 円尾晃一, 嶋村重治, 吉川栄一, 吉田智, 牛尾知雄, 水谷文彦, 佐藤晋介, 2014: 気象用フェーズドアレイレーダにおける最小二乗平均誤差法を用いたクラッタエコー低減の観測的検討. 電気学会論文誌 A, **134(4)**, 197-203, doi:10.1541/ieejfms.134.197.
- 4* 平野裕基, 円尾晃一, 嶋村重治, 吉田智, 牛尾知雄, 水谷文彦, 佐藤晋介, 2014: 気象用フェーズドアレイレーダの精度検証. 電気学会論文誌 A, **134(4)**, 204-210, doi:10.1541/ieejfms.134.204.
- 5 Nishihashi, M., C. Fujiwara, K. Kusunoki, S. Yoshida, S. Hayashi, H. Y. Inoue, K. Arai, K. Shimose, R. Kato, S. Saito, E. Sato, W. Mashiko and H. Suzuki, 2014: Three-Dimensional Characteristics of Lightning Channels, Reflectivity Cores, and Vortices in Winter Thunderstorms. *Proceedings of 15th International Conference on Atmospheric Electricity*, **15**, P-01-10.
- 6* Wu, T., S. Yoshida, T. Ushio, Z. Kawasaki and D. Wang, 2014: Lightning-initiator type of narrow bipolar events and their subsequent pulse trains. *Journal of Geophysical Research Atmosphere*, **119**, 7425-7438, doi:10.1002/2014JD021842.
- 7* S. Yoshida, T. Wu, T. Ushio, K. Kusunoki and Y. Nakamura, 2014: Initial results of LF sensor network for lightning observation and characteristics of lightning emission in LF band. *Journal of Geophysical Research Atmosphere*, **119**, 12034-12051, doi:10.1002/2014JD022065.
- 8* T. Ushio, T. Wu and S. Yoshida, 2015: Review of recent progress in lightning and thunderstorm detection techniques in Asia. *Atmospheric Research*, **154**, 89-102, doi:10.1016/j.atmosres.2014.10.001.
- 9* Nishihashi, M., K. Arai, C. Fujiwara, W. Mashiko, S. Yoshida, S. Hayashi and K. Kusunoki, 2015: Characteristics of Lightning Jumps Associated with a Tornadic Supercell on 2 September 2013. *SOLA*, **11**, 18-22, doi:10.2151/sola.2015-005.
- 吉村裕正 1 富田浩文, 梶川義幸, 宮本佳明, 吉村裕正, 榎本剛, 北村祐二, 佐藤陽祐, 清水達也, 大塚成徳, 柳瀬亘, 2015: 第3回非静力学モデルに関する国際ワークショップ・第6回全球雲解像モデリングワークショップの開催報告. 天気, **62**, 57-62.
- 2* Yoshimura, H., R. Mizuta and H. Murakami, 2015: A Spectral Cumulus Parameterization Scheme Interpolating between Two Convective Updrafts with Semi-Lagrangian Calculation of Transport by Compensatory Subsidence. *Monthly Weather Review*, **143**, 597-621, doi:10.1175/MWR-D-14-00068.1.
- 和田章義 1* Wada, A., T. Uehara and S. Ishizaki, 2014: Typhoon-induced sea surface cooling during the 2011 and 2012 typhoon seasons: observational evidence and numerical investigations of the sea surface cooling effect using typhoon simulations. *Progress in Earth and Planetary Science*, **1**, 11.
- 2 Wada, A. and M. Kunii, 2014: Introduction of an atmosphere-wave-ocean coupled model into the NHM-LETKEF. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 9-03.
- 3 Wada, A., 2014: Numerical simulations of Typhoon Haiyan in 2013. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 9-07.

- 4 Wada, A., 2014: Numerical simulations of intensity changes of Typhoon Man-Yi in 2013. *CAS/JSC WGNE Research Activities in Atmospheric and Oceanic Modelling*, **44**, 9-05.
- 5* Shimada, U., A. Wada, K. Yamazaki and N. Kitabatake, 2014: Roles of an upper-level cold vortex and low-level baroclinicity in the development of polar lows over the Sea of Japan. *Tellus A*, **66**, 24694, doi:10.3402/tellusa.v66.24694.
- 6 北畠尚子, 城岡竜一, 和田章義, 末木健太, 津口裕茂, 筆保弘徳, 2014: 第41回メソ気象研究会の報告 一台風～発生・発達と日本への影響～. *天気*, **61**, 893-898.
- 7 Kepert J., Y-H Huang, S. Kanada, M. Powell, J. Schwendike, C. Slocum, A. Wada, C-C. Wu and J. Zhang, 2014: Role of the Boundary Layer. *Topic report of WMO 8th International Workshop on Tropical Cyclones (IWTC-8)*, 37.
- 8 Shay L. K., M. M. Ali, S. Chen, I. Ginis, G. Halliwell, H-S Kim, Marie-Dominique Leroux, I-I Lin and A. Wada, 2014: Air-sea Interface and Oceanic Influences. *Topic report of WMO 8th International Workshop on Tropical Cyclones (IWTC-8)*, 53.
- 9 Wada, A., 2015: Utilization of Tropical Cyclone Heat Potential for Improving Tropical Cyclone Intensity Forecasts. *RSMC Technical Review*, **17**, 1-27.