The 9th Workshop of the Virtual Laboratory for the Earth's Climate Diagnostics Program, and the University Allied Workshop

Sep. 29—Oct. 1, 2015, Atmosphere and Ocean Research Institute, The University of Tokyo

http://157.82.240.172/~vl/index-eng.html

Venue

Kashiwa Research Complex
Conference Room (Room 634 & 635) on 6th Floor
Kashiwa Campus, The University of Tokyo
http://www.aori.u-tokyo.ac.jp/access/index.html
http://www.aori.u-tokyo.ac.jp/english/access/index.html

Program

September 29 (Tue)

10:00-13:00 Registration and Free discussion / Poster preparation

13:00-13:15 Opening

13:15-13:45 Masahiro Watanabe (Invited)
Climate change research using GCMs: Recent progress and outlook

13:45-14:00 Break

14:00-14:15 Yechul Shin, Sarah M. Kang, Masahiro Watanabe
Dependence of climate response to Arctic warming on the meridional position of stationary waves

14:15-14:30 Chia-Wei Lan, Min-Hui Lo, Chia Chou
Contrast Responses of Seasonal Precipitation Changes over the Land and the Ocean under Global Warming

14:30-14:45 Hyung-Gyu Lim, Jong-Seong Kug and Jong-Yeon Park
Impact of the chlorophyll bias on tropical mean states with bio-geophysical feedback

14:45-15:00 Takuro Michibata, Toshihiko Takemura
Evaluation of microphysical conversion processes for warm rain in the

MIROC-SPRINTARS with satellite observations

15:00-15:15 Kiwoong Park, Sarah M. Kang, and Jeongbin Seo
Sensitivity of tropical responses to the latitudinal position of zonally asymmetric thermal forcing in an aqua-planet setting

15:15-15:30 Li-Huan Hsu, Li-Rung Hwang, Yi-Chiu Lin, and Gong-Do Hwang
The performance of typhoon forecasts and spring rainfall forecasts in Taiwan with MPAS model

15:30-15:45 Break

15:45-16:00 Daisuke Takasuka, Tomoki Miyakawa, Masaki Satoh, and Hiroaki Miura
Topographical effects on internally produced MJO-like disturbances in an aqua-planet version of NICAM

16:00-16:15 Wei-Jen Tseng, Chung-Hsiung Sui, and Ming-Jen Yang
Evaluation of simulated water cycle over NW Pacific by a cloud-resolving model

16:15-16:30 Shi-Hou Luo, Cheng-Ta Chen, and Chung-Chieh Wang
How the different analyses forcing fields affect the tropical cyclone simulation?

16:30-16:45 Chien-Ming Wu
Understanding diurnal evolution of moist convection using a cloud-resolving model

16:45-17:00 Kazuyoshi Souma and Ryosuke Noyori
Localized heavy rainfall simulations by using a cloud resolving model that considers urban activity information in Osaka, Japan

17:00-17:15 Yuki Nishikawa and Masaki Satoh
A conservative topographical representation scheme in z-coordinates

17:15-17:30 Yuto Suzuki, Kazuhisa Tsuboki, Tadayasu Ohigashi, Takeharu Hikida, Maiko Kukiyama, Keita Katsuno, Tatsuya Morino, Yoshio Owaki, Takeharu Koketsu, and Hiroyuki Yamada
Hydrometeor characteristics of cirrus clouds in the upper outflow layer of typhoons observed by the hydrometeor videosondes

18:00-18:30 Reception (Ikoi)

September 30 (Wednesday)

9:30-9:35 Logistics

9:35-10:05 Andrew Marshall, Harry H. Hendon, Guomin Wang (Invited)
On the role of anomalous ocean surface temperatures for promoting the record Madden-Julian Oscillation in March 2015

10:05-10:15 Break

10:15-10:30 Pradeep Khatri, Hiotshi Irie, Tamio Takamura, and Hiroaki Kuze
Study of aerosol and cloud effects on atmospheric heat budget using SKYNET data

10:30-10:45 Hitoshi Hirose, Atsushi Higuchi, Tomoaki Mega, Tomoo Ushio, Munehisa K. Yamamoto, Shoichi Shige, Atushi Hamada
Precipitation retrievals from a new generation geostationary meteorological satellite, Himawari-8

10:45-11:00 Keita Katsuno and Kazuhisa Tsuboki
Characteristics of the precipitation band caused the heavy rain in the Tokai region on September 4, 2013

11:00-11:15 Andung Bayu Sekaranom, Hirohiko Masunaga
Observation of xtreme rainfall over Maritime Continent using high-resolution TRMM-based precipitation products

11:15-11:30 Naohiro Manago, Khatri Pradeep, Hitoshi Irie, Tamio Takamura, and Hiroaki Kuze
A novel calibration method of solid view angle for improving aerosol single-scattering albedo measurement in SKYNET

11:30-11:45 Tatsuya Morino, Kazuhisa Tsuboki, Masaya Kato, and Taro Shinoda
Comparison of the simulated charge structure in a winter thunderstorm with hydrometeor distribution observed by polarimetric radars

11:45-12:00 Akinori Yamada
An estimation of oxygen isotopic ratio on sun derived from infrared spectroscopy by ACE satellite

12:00-13:30 Lunch

13:30-13:35 Opening of VL workshop

13:35-14:05 Masaki Satoh (Lecture talk)
Introduction to NICAM: Extended-range forecast experiments with NICAM using the K computer

14:05-14:15 Break

14:15-17:00 Lecture and Practice (VL workshop)
14:15-15:00 Lecture 1 (Group A) / Tutorial (Group B)
15:15-16:00 Lecture1 (Group B) / Tutorial (Group A)
16:00-17:00 Practice

18:00-20:00 Banquet (Oak Village, Kashiwanoha)

October 1 (Thursday)

9:30-12:00 Lecture and Practice (VL workshop)
9:30-10:15 Lecture 2 (Group A) / Tutorial (Group B)
10:30-11:15 Lecture2 (Group B) / Tutorial (Group A)
11:15-12:00 Practice

12:00 Closing

Posters

P1 Shahid Mehmood, Huang-Hsiung Hsu
Performance of RegCM4.1 in simulating extreme precipitation events

P2 Hien X. Bui, Chia-Chi Wang, Wei-Liang Lee, and Chia Chou
The Role of Shallow Convection in Tropical Climate: Moist Static Energy Framework

P3 ChiaYing Tu, Wan-Ling Tseng, Yung-Yao Lan, Ben-Jei Tsuang, Huang-Hsiung Hsu
Improving MJO Simulation in AGCM by Coupling SIT One Dimensional Ocean Model

P4 Yi-Chi Wang, Hua-Lu Pan, and Huang-Hsiung Hsu
Impacts of Convective Triggering on the Diurnal Rainfall Cycle

P5 Mu-Hua Chien, and Chien-Ming Wu
Representation of topography by partial steps using the immersed boundary method in a vector vorticity equation model (VVM)

P6 Po-Shumn Hsu, Li-Huan Hsu, Chung-Hsiung Sui
A Modeling Study of Multi-Scale Nature of Tropical Disturbances with MPAS

P7 Chisa Iwasaki, Sachiko Hayashida, Ryoichi Imasu, Akiko Ono, Tatsuya Yokota, Isamu Morino, Yukio Yoshida, Oshchepkov Sergey, Bril Andrey, and TCCON Partners
Validation of GOSAT SWIR XCO2 and XCH4 retrieved by PPDF-S method

P8 Woosub Roh, Masaki Satoh, and Tomoe Nasuno
Improvement of microphysics in NICAM using TRMM and a satellite simulator

P9 Tomoki Ohno, Masaki Satoh, and Yohei Yamada
Relationship between eyewall slopes, inner-core structures, and intensities of TCs

P10 Hiroyasu Kubokawa, Masaki Satoh, Masatomo Fujiwara
Influence of topography on temperature variations in the Tropical Tropopause Layer

P11 Yohei Yamada, Masaki Satoh, Masato Sugi, Chihiro Kodama, Akira T. Noda, Masuo Nakano, and, Tomoe Nasuno
Response of tropical cyclone structure to a global warming using

NICAM

P12 Junya Uchida, Masato Mori, Hisashi Nakamura, Masaki Satoh, Kentaroh Suzuki, and Teruyuki Nakajima
Error analysis of a non-hydrostatic stretched-grid global atmospheric model

P13 Atsushi Hamada, Yukari N. Takayabu, Chuntao Liu, and Edward J. Zipser
Weak linkage between the heaviest rainfall and tallest storms

P14 Nagio Hirota, Yukari N. Takayabu, Masaya Kato, and Sho Arakane
Roles of an Atmospheric River and a Cut-off Low in the Extreme Precipitation Event in Hiroshima on August 19, 2014

P15 Yu Someya, Ryoichi Imasu, Naoko Saitoh, and Kei Shiomi
Comparison of cloud detection performances of modified CO_2 slicing method and Chi-square method using GOSAT-TIR spectra