

A horizontal banner at the top of the slide features a grid of 12 small images related to meteorology and climate, including a globe, a sunset, clouds, Earth from space, a snowy tree, green leaves, a sunset with clouds, red leaves, a lightning bolt, and a satellite view of a storm.

Journal of the Meteorological Society of Japan

since 1882

日本気象学会気象集誌： ジャーナルのプレゼンス向上 の取り組み

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気象集誌 編集委員長

2018年第1回J-STAGEセミナー

2018年9月14日（金） JST東京本部別館1階ホール

内容

- 日本気象学会、気象集誌の紹介
- 気象集誌のJournal Impact Factor
- プレゼンス向上の取り組み



(公社) 日本気象学会

The Meteorological Society of Japan

公益社団法人 日本気象学会について

<http://www.metsoc.jp/>

- 設立：1882年（明治15年）東京気象学会として創立
- 1888年（明治21年）6月 大日本気象学会
- 1941年（昭和16年）7月 社団法人日本気象学会
- 2013年（平成25年）4月 公益社団法人の認定
- 会員数 約3,500名（2018年7月現在）
- 刊行物
 - 天気：和文機関誌、一部JSTAGEに搭載開始予定
 - 気象集誌：英文論文誌、JSTAGE搭載、団体会員に冊子体を頒布
 - SOLA：英文レター誌：JSTAGE搭載
 - 気象研究ノート：和文解説誌

気象集誌

Journal of the Meteorological Society of Japan

- 刊行開始 1882: 第一輯として 1922年まで
- 1923より 第二輯として刊行、2018年現在 第96巻
- 通常号年6号、特集号（通常号の一部として）、特別号（年1-2巻程度）
- 全編英文
- スコープ
 - ✓ 気象学に関する広範なテーマを対象とする。特に、アジアモンスーン、気候モデル、領域モデル研究に特徴。観測、同化、化学、地域気候、地球流体力学等。台風や豪雨などのシミュレーション研究、数値天気予報の研究が多い。
 - ✓ 科学的新規性、気象および関連分野の科学的理解の促進に寄与する技術的開発
- 投稿者
 - ✓ 気象学会会員・非会員を問わない
 - ✓ 気象庁職員による投稿
 - ✓ 研究を主務としない研究者や発展途上国からの投稿料免除

JMSJの10の特徴

1. 広範な気象学の研究分野がスコープ
2. 多様なタイプの論文
科学的新規性・技術開発、Article, Notes and Correspondence (速報、質疑応答)、招待レビュー論文、データ付き論文(電子補助ファイルの利用)
3. オープンアクセス、全論文がフリーでダウンロード可能
4. 比較的安価な掲載料(APC)
カラー図版、ページ数に関わらず固定価格
5. 比較的迅速な査読プロセス
レビューは一か月以内、Notes and Correspondenceは4か月以内に査読終了
6. 早期公開
受理後直ちにDOIを発行、電子版を直ちに公開
7. 特別号・特集号。招待レビュー論文
8. 気象集誌論文賞
若手研究者の投稿について教育的配慮
9. 1882年依頼の長い歴史
10. WEB広報、SNS等による論文のプロモーション

Ten great features of the Journal of the Meteorological Society of Japan (JMSJ)

Latest Journal Impact Factor: 5.023 (©Clarivate Analytics)

1. **Broad scope in meteorology.** JMSJ publishes papers on meteorological observations, modeling, data assimilation, analyses, global and regional climate research, satellite remote sensing, chemistry and transport, and dynamic meteorology including geophysical fluid dynamics. Papers related to Asian monsoons, climate and mesoscale models, and numerical weather forecasts are particularly welcome.
2. **Varied article types.** JMSJ publishes Articles and Notes and Correspondence reporting novel scientific discoveries or technical developments that advance understanding in meteorology and related sciences. Notes and Correspondence consist of Express Notes and Comments and Replies. Authors are encouraged to include the underlying data with their papers (when less than 50MB). The data can be in the form of databases, simulations, movies, large figures or as appropriate.
3. **Freely accessible content.** JMSJ became fully Open Access in January 2018 and anyone can read your article at any time at the redeveloped J-STAGE [website](#).
4. **Affordable Article Processing Charge (APC).** The APC is a flat, fixed price, regardless of the number of pages and color figures. Society members receive an APC discount: Articles cost only 200,000 yen.
5. **Rapid peer review.** Peer reviews are returned within [one month](#) for most submissions, and we ask authors to submit revisions within three months. Notes and Correspondence have quicker peer review and a cheaper APC: final decisions are usually made within 4 months and the member APC is 150,000 yen.
6. **Advanced online publication.** Accepted articles are immediately assigned a DOI and published online as Advance Online Publications. Copyedited and typeset articles are posted soon after on the journal's page at the [J-STAGE platform](#).
7. **Special Issues/Editions and Invited Review Articles.** Selected articles in specific subject areas are published as [Special Issues and Editions](#) after deliberation by the Editorial Committee. Invited Review Articles are original comprehensive reviews of subjects deemed topical and important by the Chief Editor, who should be contacted if you have an idea for a review article. Invited Review Articles are free to [access](#) and to publish.
8. **JMSJ Awards.** We offer an annual award to [a number of articles](#) each year. We welcome and encourage submissions particularly from young researchers, although all articles are considered for the Awards. Editors mentor and assist our younger authors through the peer review process.
9. **Permanent journal archive.** All articles are permanently preserved with [Portico](#). Since 1882, JMSJ has published many influential papers – such as [Matsuno's seminal 1966](#) article on equatorial waves. [Kobayashi et al's 2015](#) JRA-55 article continues to attract wide interest.
10. **Active article promotion.** JMSJ increases the visibility, reach and downloads of your published articles by posting your Graphical Abstract to [Twitter](#) and [Facebook](#), attending conferences, and doing other promotional work. Altmetrics are available for all JMSJ articles at the J-STAGE platform.

Discover more about JMSJ today!

<http://jmsj.metsoc.jp/>



Journal of the Meteorological Society of Japan



気象集誌の特徴

- 多様な論文タイプ
 - Notes and Correspondence
 - 速報
 - 質疑応答
 - Invited Review Articles 招待レビュー論文
 - 電子補助ファイル(50MB上限)の利用の促進：データ付き論文等
いわゆる、「データ論文」ではない。
- 姉妹紙SOLAとの連携
 - JMSJ Article
 - JMSJ Notes and Correspondence
 - SOLA (Scientific Online Letters on the Atmosphere)

気象集誌の特徴

- 歴史が長い。(1882年創刊)
 - 論文の良い点をくみ上げようとする査読プロセス
 - JMSJ論文賞
 - 比較的迅速なreview：査読は一か月、改訂は3か月。Note は4カ月ルール。
 - 迅速な公開：受理後直ちにDOIを付番、電子版を即座に早期公開
 - 編集委員会システムを採用。合議で採否を決定。
-
- 会員の研究発表の場としてのプラットフォーム。
 - 安定性が重要。
 - 国際的に高品質な品位のある専門誌としての地位を保つ。

論文数、ページ数

<http://jmsj.metsoc.jp/statistics/index.html>

Number of papers, pages

Year (vol)	total		regular issues		special issues		special editions	
	papers	pages	papers	pages	papers	pages	papers	pages
2017 (95)	23	454	23	454	--	--	--	--
2016 (94)	43	744	28	522	14	208	1	14
2015 (93)	45	822	34	602	9	178	3	42
2014 (92)	44	836	27	559	13	203	4	74
2013 (91)	61	1141	51	850	10	291	--	--
2012 (90)	103	1709	46	815	48	733	9	161

評価指標

<http://jmsj.metsoc.jp/statistics/index.html>

Journal Metrics

Journal Metrics	2017	2016	2015	2014	2013
Impact Factor	5.023	2.909	0.933	1.250	1.318
5-Year Impact Factor	2.651	2.038	1.368	1.440	1.590
CiteScore	3.57	2.33	1.46	1.25	1.28
IPP	--	--	--	1.221	--
SJR	2.768	1.873	1.331	1.153	1.130
SNIP	1.607	1.186	0.840	0.731	0.777
h5-index	23	20	18	20	20
h5-median	31	27	22	34	27

Journal Impact Factor (Clarivate Analytics)

Journal Impact Factor Calculation

$$\text{2017 Journal Impact Factor} = \frac{437}{87} = 5.023$$

How is Journal Impact Factor Calculated?

$$\text{JIF} = \frac{\text{Citations in 2017 to items published in 2015 (324) + 2016 (113)}{\text{Number of citable items in 2015 (44) + 2016 (43)}} = \frac{437}{87}$$

Journal Impact Factor contributing items

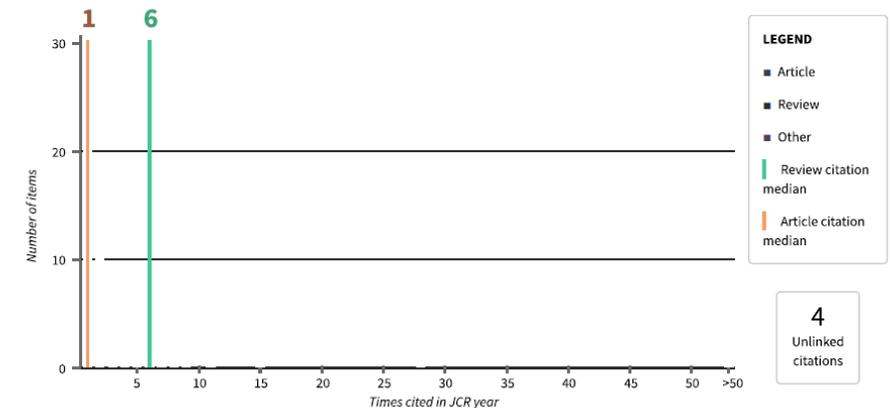
Show all

Citable items in 2016 and 2015 (87)

Citations in 2017 (437)

TITLE	CITATIONS COUNTED TOWARDS JIF
The JRA-55 Reanalysis: General Specifications and Basic Characteristics	247
By: Kobayashi, Shinya; Ota, Yukinari; Harada, Yayoi; Ebata, Ayataka; Moriya, Masami; et al. Volume: 93 Page: 5-48 Accession number: WOS:000351353200003 Document Type:Article	
An Introduction to Himawari-8/9-Japan's New-Generation Geostationary Meteorological Satellites	28
By: Bessho, Kotaro; Date, Kenji; Hayashi, Masahiro; Ikeda, Akio; Imai, Takahito; et al. Volume: 94 Page: 151-183 Accession number: WOS:000375803600003 Document Type:Article	
The JRA-55 Reanalysis: Representation of Atmospheric Circulation and Climate Variability	15
By: Harada, Yayoi; Kamahori, Hirotaka; Kobayashi, Chiaki; Endo, Hirokazu; Kobayashi, Shinya; et al. Volume: 94 Page: 269-302 Accession number: WOS:000379518300004 Document Type:Article	
A 20-Year Climatology of a NICAM AMIP-Type Simulation	11
By: Kodama, Chihiro; Yamada, Yohei; Noda, Akira T.; Kikuchi, Kazuyoshi; Kajikawa, Yoshiyuki; et al. Volume: 93 Page: 393-424 Accession number: WOS:000367691700001 Document Type:Article	
First Assessment of the Advanced Microwave Scanning Radiometer 2 (AMSR2) Soil Moisture Contents in Northeast Asia	9
By: Cho, Eunsang; Moon, Heewon; Choi, Minha Volume: 93 Page: 117-129 Accession number: WOS:000351353200008 Document Type:Article	

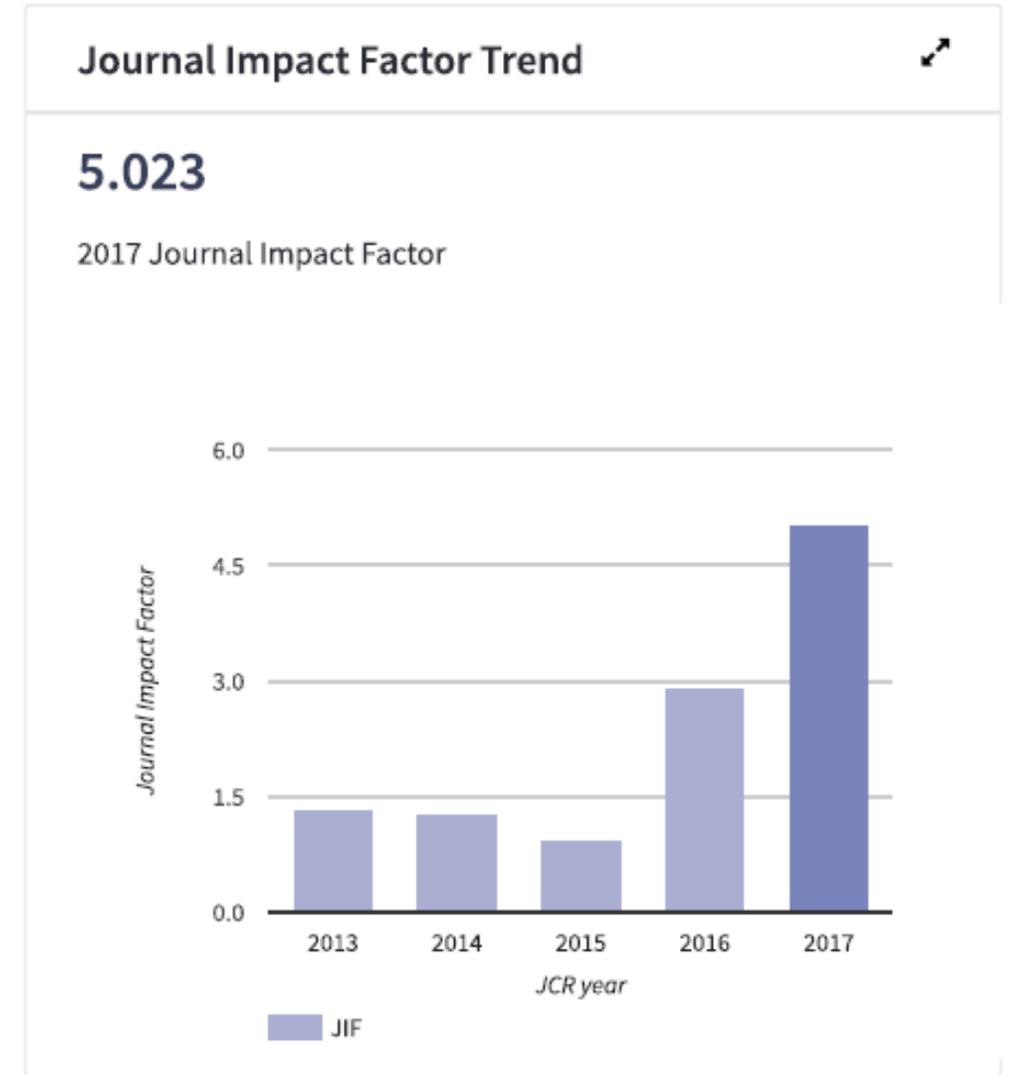
Citation distribution of items cited in 2017



Journal Impact Factor (Clarivate Analytics)

Impact Factors

Year	Impact Factor	5-Year Impact Factor
2017	5.023	2.651
2016	2.909	2.038
2015	0.933	1.368
2014	1.250	1.440
2013	1.318	1.590
2012	0.800	1.967
2011	1.233	1.955
2010	1.149	1.237
2009	1.104	1.315
2008	0.951	1.148
2007	0.793	1.494
2006	0.797	Not Available
2005	0.838	Not Available
2004	1.286	Not Available
2003	1.243	Not Available
2002	0.697	Not Available
2001	1.007	Not Available



Journal Impact Factor (Clarivate Analytics)

- DORA (San Francisco Declaration on Research Assessment)
<https://sfdora.org/read/>
“the need to eliminate the use of journal-based metrics, such as Journal Impact Factors, in funding, appointment, and promotion considerations”
- JIFの問題は認識しつつも、留意せざるを得ない。
 - ✓ (公式な) 目標とすべきではない。
 - ✓ JIFの短期的な増減に一喜一憂すべきでない、5年IFの方がより適切。
 - ✓ JIFを上げるための方策を考えることは、Journalに活力を与える。

JMSJの目標

- Tier 1: Nature+Science系, PNAS
- Tier 2: 欧米の有力誌：American Geophysical Union(AGU), American Meteorological Society(AMS)系, EGU系
- Tier 3: **JMSJ**, Climate Dynamics, QJRMS
- 新興ジャーナル: Adv. Atmos. Sci.(中国), JAMES(AGU), Current Climate Change Reports

Tier 2に食い込むための努力を継続。実際にはなかなか難しい。
欧米の研究者がJMSJに当たり前に投稿するようにはなっていない。
欧米のスタンダードの運営

JIF ランキング 2017 (Meteorology, Atmospheric Science)

	Full Journal Title	Total Cites	Journal Impact Factor <small>▼</small>	Eigenfactor Score
1	Nature Climate Change	17,986	19.181	Nature 0.09670
2	Earth System Science Data	1,363	8.792	0.00823
3	BULLETIN OF THE AMERICAN METEOROLOGICAL SOCIETY	20,169	7.804	AMS 0.04033
4	ATMOSPHERIC CHEMISTRY AND PHYSICS	43,818	5.509	EGU 0.09045
5	Wiley Interdisciplinary Reviews-Climate Change	2,404	5.124	0.00629
6	JOURNAL OF THE METEOROLOGICAL SOCIETY OF JAPAN	3,730	5.023	0.00477
7	JOURNAL OF CLIMATE	47,036	4.661	AMS 0.08595
8	Earths Future	873	4.594	AGU 0.00472
9	Environmental Research Letters	11,797	4.541	0.04441
10	GLOBAL BIOGEOCHEMICAL CYCLES	13,353	4.457	0.01708

11	AGRICULTURAL AND FOREST METEOROLOGY	15,550	4.039	0.01997
12	Journal of Advances in Modeling Earth Systems	2,238	3.970	AGU 0.01065
13	ATMOSPHERIC RESEARCH	9,182	3.817	0.01713
14	JOURNAL OF HYDROMETEOROLOGY	8,437	3.790	0.01582
15	CLIMATE DYNAMICS	17,023	3.774	0.04698
16	ATMOSPHERIC ENVIRONMENT	51,951	3.708	0.05429
17	CLIMATIC CHANGE	18,223	3.537	0.03201
18	JOURNAL OF GEOPHYSICAL RESEARCH-ATMOSPHERES	63,717	3.380	AGU 0.09161
19	Atmospheric Measurement Techniques	7,016	3.248	EGU 0.02507
20	MONTHLY WEATHER REVIEW	26,177	3.247	AMS 0.02704
21	Climate of the Past	3,808	3.174	0.01544
22	JOURNAL OF THE ATMOSPHERIC SCIENCES	26,231	3.159	AMS 0.02563
23	INTERNATIONAL JOURNAL OF CLIMATOLOGY	17,395	3.100	0.02469
24	OCEAN MODELLING	3,871	3.013	0.00886
25	QUARTERLY JOURNAL OF THE ROYAL METEOROLOGICAL SOCIETY	16,676	2.978	英国 0.02065

JIF向上への取り組み

- 雑誌の質の向上を主目的とする
 - ✓ 品質の高い論文を多く掲載する
 - ✓ 品質の低い論文を掲載しない
 - 品質の低い論文が掲載されることはジャーナルの致命傷になる
- 著者が気にすること
 - ✓ 投稿のしやすさ、査読・出版の迅速性
 - ✓ 掲載論文が、他の研究者の目にふれること
 - ✓ 査読の公平性・専門的見地からの妥当性
 - ✓ 組み版の正確性、品質
 - ✓ 費用の安さ
- 技術的方策
 - ✓ 高引用論文をコンスタントに掲載
 - ✓ ゼロ引用を減らす
 - まず、著者自身による引用を奨励
 - cf. 著者自身の1年以内の投稿はAPC減免。
 - 著者自身による宣伝：SNSによるretweet等を期待
 - 呼び水効果によるVisibilityの向上。
 - 実際には、JMSJのSNSでのアナウンスに著者自身が応答することは多くない
 - 編集事務局による広報

プレゼンス向上の取り組み

<https://www.facebook.com/jmsj.metsoc/>

- Journal web:
<http://jmsj.metsoc.jp/>
- SNS: Facebook, Twitter, RSS
- Altmetrics
- Graphical Abstract の作成、紹介
- Cited Alert :
引用文献の著者に出版論文を通知
(手作業、現在休止中)
有償サービスも存在(Clarivate Analytics)



https://twitter.com/JMSJ_metsoc





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- Announcement from Chief Editor
- Editorial Committee
- Links



Today's paper

Ito, T., S. Nishimoto, and H. Kanehisa, 2018: Growing vortex Rossby waves with azimuthal wavenumber one in quasigeostrophic system. *J. Meteor. Soc. Japan*, **96**, <https://doi.org/10.2151/jmsj.2018-055> .
Early Online Release Graphical Abstract with highlights

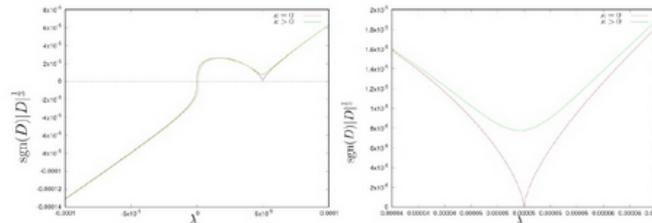


Figure 1: Graphs of $\text{sgn}(D)|D|^{1/2}$ for $\kappa = \frac{fN}{NH} = 0 \text{ m}^{-2}$ (red) and $\kappa = \frac{fN}{NH} = 2 \times 10^{-6} \text{ m}^{-2}$ (green) as functions of λ , where f is the Coriolis parameter, H is the fluid depth, and N is the reference buoyancy frequency. An enlarged view in the vicinity of multiple root for $\kappa = 0$ is shown at the right. The parameter values are set such that the linear growth condition is satisfied.

Highlights:

- ◆ Analytically solving the disturbance potential vorticity (PV) equation linearized about an axisymmetric vortex with radially piecewise uniform basic PV, we show that the vortex Rossby waves (VRWs) with azimuthal wavenumber one can grow exponentially in a quasi-geostrophic system (with disturbances projected on the first baroclinic mode) although they cannot do so in a barotropic system.
- ◆ The exponential growth of the VRWs, whose temporal dependence is expressed as $e^{i\lambda t}$, is possible when the eigenequation $D(\lambda) = 0$ has non-real roots

Impact Factor 5.023

NEW
2017 Clarivate Analytics Impact Factor

New Issue



Vol.96 No.4, 2018

News > archive

- ◆ 07. SEP. 2018 : The Guide for Authors is updated. (7 September 2018)
<http://jmsj.metsoc.jp/GuideforAuthors.pdf>
The length of the manuscripts should not exceed 18,000 words for an Article and 4,500 words for Notes and Correspondence

The JRA-55 Reanalysis: General Specifications and Basic Characteristics

Overview of attention for article published in Journal of the Meteorological Society of Japan, January 2015



? About this Attention Score

In the top 25% of all research outputs scored by Altmetric

MORE...

Mentioned by

- 2 blogs
- 9 tweeters
- 3 Facebook pages
- 1 Google+ user

Citations

714 Dimensions

Readers on

376 Mendeley

SUMMARY

[Blogs](#)[Twitter](#)[Facebook](#)[Google+](#)[Dimensions citations](#)

Title The JRA-55 Reanalysis: General Specifications and Basic Characteristics

Published in Journal of the Meteorological Society of Japan, January 2015

DOI 10.2151/jmsj.2015-001 [↗](#)

Authors Shinya KOBAYASHI, Yukinari OTA, Yayoi HARADA, Ayataka EBITA, Masami MORIYA, Hirokatsu ONODA... [\[show\]](#)

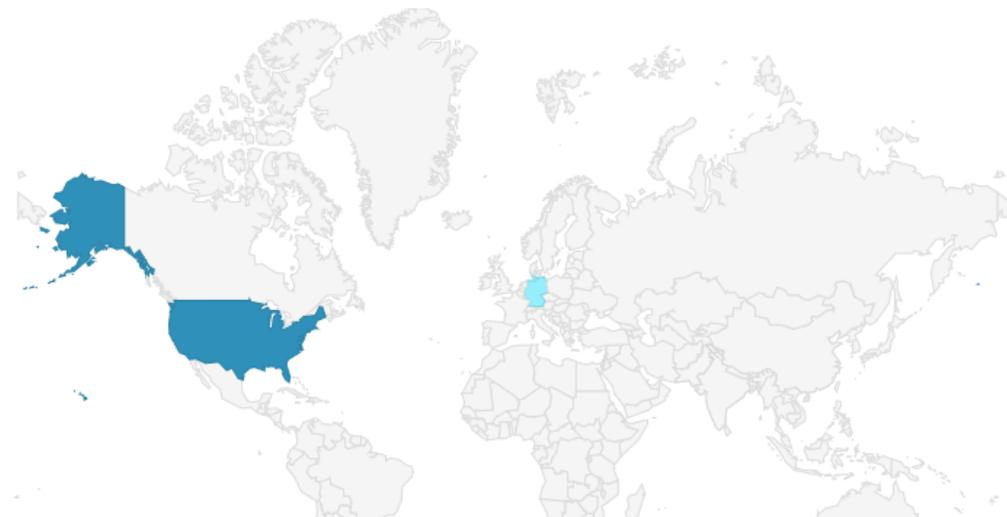
[View on publisher site](#)[Alert me about new mentions](#)

TWITTER DEMOGRAPHICS

MENDELEY READERS

ATTENTION SCORE IN CONTEXT

The data shown below were collected from the profiles of 9 tweeters who shared this research output. [Click here to find out more about how the information was compiled.](#)



Altmetrics (JSTAGEの新機能) : 一般的な論文 の場合



Cloud Property Retrieval from Multiband Infrared Measurements by Himawari-8

Overview of attention for article published in Journal of the Meteorological Society of Japan, September 2017



About this Attention Score

In the top 25% of all research outputs scored by Altmetric

MORE...

Mentioned by

- 6 tweeters
- 1 Facebook page

Citations

- 2 Dimensions

Readers on

- 9 Mendeley

What is this page?

SUMMARY Twitter Facebook Dimensions citations

So far, Altmetric has seen 7 tweets from 6 users, with an upper bound of 2,950 followers.



Takashi Unuma

@UNUSB

Cloud property retrieval from multiband infrared measurements by Himawari-8. <https://t.co/EhkkF73x4k>

02 Apr 2018



茂木耕作@9/11横浜市防災センターイベント参加受付中

@motesaku

RT @JMSJ_metsoc: JMSJ New paper published: Iwabuchi, H., N. S. Putri, M. Saito, Y. Tokoro, M. Sekiguchi, P. Yang, and B. A. Baum, 2018: Cl...

22 Mar 2018



Masa Saito

@77masanori

RT @JMSJ_metsoc: JMSJ New paper published: Iwabuchi, H., N. S. Putri, M. Saito, Y. Tokoro, M. Sekiguchi, P. Yang, and B. A. Baum, 2018: Cl...

22 Mar 2018



日本気象学会

@metsocjp

RT JMSJ_metsoc: <https://t.co/Xu8KeE1U4f>

22 Mar 2018

576

FOLLOWERS

Reply Retweet Favourite



JMSJ

@JMSJ_metsoc

JMSJ New paper published: Iwabuchi, H., N. S. Putri, M. Saito, Y. Tokoro, M. Sekiguchi, P. Yang, and B. A. Baum, 2018: Cloud property retrieval from multiband infrared measurements by Himawari-8. J. Meteor. Soc. Japan, 96B, 27-42. <https://t.co/bLmYrVj8Eo>

22 Mar 2018



Masaki Satoh

@masakisatoh2015

RT @JMSJ_metsoc: JMSJ New paper: Iwabuchi et al 2018: Cloud property retrieval from multiband infrared measurements by Himawari-8. <https://...>

25 Sep 2017



JMSJ

@JMSJ_metsoc

JMSJ New paper: Iwabuchi et al 2018: Cloud property retrieval from multiband infrared measurements by Himawari-8. <https://t.co/tyccn5FTxF> <https://t.co/yBjQXCKRes>

25 Sep 2017

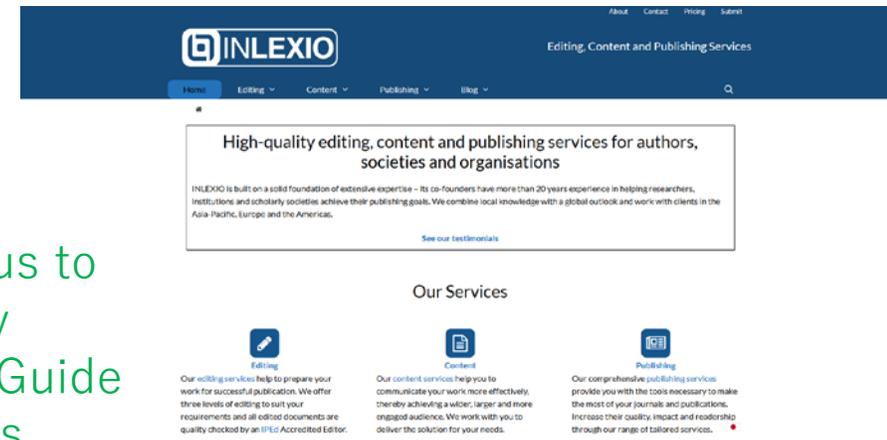
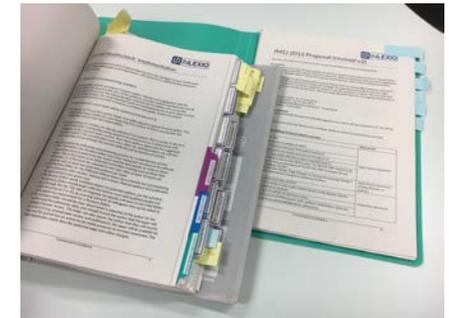
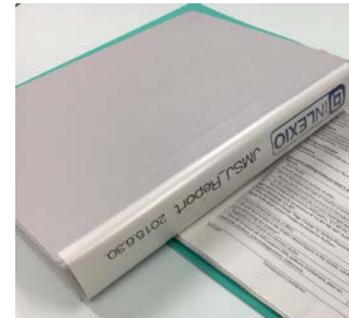
今後の取り組み：

以下の方策を通じて、JMSJ/SOLAのさらなる国際情報発信を強化し、両誌の質の向上を図り、気象学分野を国際的にリードする専門紙としての地位を確立する。

1. 従来、取り組んでいなかったJMSJ、SOLAの両誌の密接な連携を図る。
2. CC-BY 4.0 のもとでの完全Open Access化を実現。
3. 独立採算化のためArticle Processing Charge(APC)を新設。
4. 広報体制を拡充し、2誌の連携によりvisibilityの向上を図る。
5. 査読、出版プロセスの迅速化。
6. 招待論文、特集号・特別号、国際会議開催等の戦略的な推進。
7. データ付き論文、技術開発論文、速報ノート等の論文の投稿を促進。
8. JMSJ/SOLA合同運営委員会を通じた体制強化。

ジャーナルコンサルティングの利用

- INLEXIO: <https://www.inlexio.com/>
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The screenshot shows the DOAJ website interface. At the top, there is a navigation bar with links for Home, Search, Browse Subjects, Apply, News, About, and For Publishers/API. A 'SUPPORT DOAJ' button is also visible. The main content area features the journal title 'Journal of the Meteorological Society of Japan' with its ISSN (JMSJ 0026-1165 (Print)) and a Creative Commons Attribution 4.0 International license icon. Below the title, there are two columns of information: 'Homepage' with publisher details (Meteorological Society of Japan, Country: Japan, Platform/Host: J-STAGE, Date added to DOAJ: 24 Apr 2018, Record Last Updated: 24 Apr 2018) and 'LCC Subject Category' (Science: Physics: Meteorology: Climatology) with keywords (meteorology, climate, weather, atmosphere), language (English), and full-text format (PDF). At the bottom, there are sections for 'PUBLICATION CHARGES' (Article Processing Charges (APCs): Yes, 220000JPY; Submission Charges: No; Waiver policy for charges?: Yes) and 'EDITORIAL INFORMATION' (Peer review, Editorial Board, Aims and scope, Instructions for authors, Time From Submission to Publication: 6 weeks).

NOTES AND CORRESPONDENCE

Extension of a Multisensor Satellite Radiance-Based Evaluation for Cloud System Resolving Models

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Abstract

As an alternative approach to previous multisensor satellite evaluations for cloud system resolving models (CSRMs), a technique for precipitation clouds over the ocean of CSRMs is presented using combined infrared and microwave channels. This method quantitatively analyzes precipitation clouds using cloud-top temperatures and ice scatterings from infrared 11 μm and high frequency microwave (89.0 GHz) brightness temperatures (TBs). The TB threshold at low frequencies (18.7 GHz) is used to identify precipitation regions. This method extends a previous approach based on tropical rainfall measuring mission (TRMM) precipitation radar which uses a narrow coverage, by incorporating a wide passive microwave sensor swath and ice cloud sensitivity.

The numerical results of the non-hydrostatic icosahedral atmospheric model, NICAM, with two cloud microphysics schemes were evaluated over the tropical open ocean using this method. The scattering intensities in both simulations at 89.0 GHz were different due to the parameterizations of the snow and graupel size distributions. A bimodal snow size distribution improved the TB underestimation at 89.0 GHz. These results exhibited similar structures to the joint histograms of cloud-top temperatures and precipitation-top heights generated using the previous method; the frequencies of overestimated scattering intensities in this study and the frequencies of high precipitation-top heights above 12 km in the previous study. It was observed that the change in the snow size distribution in the cloud microphysics scheme can lead to better agreements of simulated TBs at 89.0 GHz. Furthermore, we investigated the impacts of nonspherical snow assumptions using a satellite simulator. The effect of a nonspherical snow shape in the radiative transfer model caused a smaller change in TBs at 89.0 GHz compared to the difference between the TBs of the two simulations without nonspherical assumptions.

Keywords: cloud system resolving models; satellite simulator; evaluations of cloud microphysics; passive microwave satellites

1. Introduction

Recently, various methods have been proposed to evaluate and improve the cloud microphysics schemes in cloud system resolving models (CSRMs) using satellite data. One method is a radiance-based evaluation using a satellite simulator, which avoids

making different settings of the microphysics between retrieval algorithms and CSRMs (Masunaga et al. 2010; Hashino et al. 2013; Matsui et al. 2014). Using the tropical rainfall measuring mission (TRMM) and a satellite simulator (Matsui et al. 2009, 2016), Roh and Satoh (2014) (hereafter RS14) improved cloud properties over the tropical Pacific Ocean simulated by the non-hydrostatic icosahedral atmospheric model (NICAM; Tomita and Satoh 2004; Satoh et al. 2008; Satoh et al. 2014). These properties included precipitation cloud statistics in terms of cloud-top temperature (CTT) and the precipitation-top height (PTH), and

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<http://jmsj.metsoc.jp/editors/index.html>

The screenshot displays the JMSJ website's Editorial Committee page. At the top, the JMSJ logo and the text 'Journal of the Meteorological Society of Japan since 1882' are visible. A navigation menu on the left includes links for 'About JMSJ', 'Submission', 'Browse JMSJ (Free)', 'Journal Statistics', 'Instructions for Authors', 'Open Access, Copyright and Permissions', 'Subscription', 'Announcement from Chief Editor', 'Editorial Committee', and 'Links'. Below the menu are social media icons for Facebook and Twitter, and an RSS feed icon. The main content area is titled 'Editorial Committee' and features a link to 'A List of papers handled by editors since 2014'. Under the 'Chief Editor' section, a profile for Masaki Satoh is shown, including his photo, name, and contact information. The 'Co-Chief Editor' section features a profile for Tetsuya Takemi. The 'Editors' section is a grid of nine profiles, each with a photo, name, and affiliation. The bottom of the page shows covers for the journals SOLA and TENKI.

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