

履歴書

伊丹 健一郎

所属

理化学研究所 開拓研究所 伊丹分子創造研究室 主任研究員
理化学研究所 環境資源科学研究センター 拡張ケミカルスペース研究チーム チームディレクター
台湾・中央研究院化学研究所 研究フェロー
名古屋大学トランスフォーマティブ生命分子研究所 (ITbM) 主任研究者

生年月日

1971 年 4 月 4 日生

学歴・職歴

1990 年 3 月 東京都立国立高等学校 卒業
1994 年 3 月 京都大学工学部合成化学科 卒業 (生越久靖教授)
1996 年 3 月 京都大学大学院工学研究科合成・生物化学専攻 博士前期課程修了 (伊藤嘉彦教授)
1998 年 7 月 京都大学大学院工学研究科合成・生物化学専攻 博士後期課程修了 (伊藤嘉彦教授)
1996~1998 年 日本学術振興会特別研究員 (DC1)
1997~1998 年 スウェーデン・ウプサラ大学/ストックホルム大学 留学 (Jan-E. Bäckvall 教授)
1998~2005 年 京都大学大学院工学研究科合成・生物化学専攻 助手 (吉田潤一教授)
2005~2008 年 名古屋大学物質科学国際研究センター 准教授 (野依良治特別教授)
2005~2009 年 JST さきがけ研究員
2008 ~2024 年 名古屋大学大学院理学研究科 教授 (研究室主宰)
2012 年~現在 名古屋大学トランスフォーマティブ生命分子研究所 (ITbM) 主任研究者
2012~2022 年 名古屋大学トランスフォーマティブ生命分子研究所 (ITbM) 拠点長
2013~2020 年 JST-ERATO 伊丹分子ナノカーボンプロジェクト 研究総括
2019 年~現在 台湾・中央研究院化学研究所 研究フェロー (研究室主宰)
2024 年~現在 理化学研究所 開拓研究所 伊丹分子創造研究室 主任研究員 (研究室主宰)
2025 年~現在 理化学研究所 環境資源科学研究センター 拡張ケミカルスペース研究チーム
チームディレクター (研究室主宰)

専門

有機化学、合成化学、分子ナノカーボン科学、触媒科学、材料科学、ケミカルバイオロジー

研究業績

論文・著書	436 報
主な論文	<i>Science</i> (5), <i>Nature Chem.</i> (4), <i>Nature Commun.</i> (13), <i>Nature Synth.</i> (1), <i>Nature Catal.</i> (1), <i>Nature Chem. Biol.</i> (2), <i>Proc. Nat. Acad. Sci. USA</i> (1), <i>J. Am. Chem. Soc.</i> (58), <i>Angew. Chem.</i> (48), <i>Chem</i> (4), <i>ACS Cent. Sci.</i> (1), <i>Chem. Sci.</i> (28) [as of July 4th, 2025]
被引用回数	30,000 回以上
H-index	97 (Web of Science, ResearcherID: B-5110-2011), 105 (Google Scholar)
特許・特許出願	101 件
市販化	23 化合物
受賞・栄誉	49 件

アカデミア人材 52 名 (国内 37 名、海外 17 名)
基調・招待講演 460 回

受賞・栄誉・レクチャーシップ (49 件)

2025 年 Ambassador in Chemical Sciences in France, CNRS, France
2025 年 Organic Chemistry Frontiers Outstanding Paper Awards 2014-2023
2023 年 Irvine Organic Synthesis Lecturer, University of California, Irvine, USA
2023 年 The Job Lecturer, Memorial University of Newfoundland, Canada
2023 年 The Paul G. Gassman Lecturer, University of Minnesota, USA
2022 年 Frontiers of EOC Lectureship, Nankai University, China
2022 年 The Reuben Benjamin Sandin Lecturer, University of Alberta, Canada
2022 年 ChemSoc Lecturer, University of New South Wales (UNSW) Sydney, Australia
2021 年 Highly Cited Researchers 2021, Clarivate Analytics
2020 年 Highly Cited Researchers 2020, Clarivate Analytics
2019 年 Highly Cited Researchers 2019, Clarivate Analytics
2018 年 オランダ超分子化学賞 The Netherlands Scholar Award for Supra-molecular Chemistry
2018 年 Highly Cited Researchers 2018, Clarivate Analytics
2018 年 The Guthikonda Lecturer, Stanford University
2018 年 The Roland K. Pettit Centennial Lecturer, University of Texas, Austin, USA
2018 年 日本化学会 学術賞
2017 年 Highly Cited Researchers 2017, Clarivate Analytics
2017 年 ICI Distinguished Lecturer, University of Calgary, Canada
2017 年 中日文化賞
2017 年 The Bristol-Myers Squibb Lecturer, University of California, Berkeley, USA
2017 年 読売テクノフォーラム ゴールドメダル賞
2017 年 The SYNLETT Best Paper Award 2016, Thieme
2016 年 The Holger Erdtman Lecturer, KTH, Sweden
2016 年 永瀬賞
2016 年 Treat B. Johnson Lecturer, Yale University, USA
2016 年 Ta-Shue Chou Lectureship Award, Academia Sinica, Taiwan
2015 年 R. C. Fuson Visiting Professor, University of Illinois at Urbana-Champaign, USA
2015 年 アメリカ化学会賞 Arthur C. Cope Scholar Award
2015 年 スイス化学会レクチャーシップ Swiss Chemical Society Lectureship Award
2014 年 Nankai University Lectureship Award, China
2014 年 The Aldrich Lectureship Award, Emory University, USA
2014 年 日本学術振興会賞
2013 年 Novartis Chemistry Lectureship Award
2013 年 Mukaiyama Award
2013 年 Asian Rising Star Award, Asian Chemical Congress
2012 年 英国王立化学協会フェロー Fellow of the Royal Society of Chemistry, UK
2012 年 ドイツイノベーションアワード German Innovation Award “Gottfried Wagener Prize”
2012 年 Novartis-MIT Lecturer in Organic Chemistry (MIT, USA)
2011 年 ACP Lectureship Award, China
2011 年 ACP Lectureship Award, Malaysia
2011 年 野副記念奨励賞
2011 年 Overseas Distinguished Professor of Wuhan University, China
2008 年 Merck-Banyu Lectureship Award

2007 年	Banyu Young Chemist Award
2006 年	文部科学大臣表彰 若手科学者賞
2005 年	Mitsui Chemicals Catalysis Science Award of Encouragement
2005 年	日本化学会 進歩賞
2004 年	Thieme Journals Award
2000 年	有機合成化学協会 研究企画賞

客員教授・非常勤講師

2007 年	九州大学先導物質化学研究所 非常勤講師
2008 年	東京工業大学資源化学研究所 非常勤講師
2008 年	京都大学大学院理学研究科 非常勤講師
2009 年	京都大学化学研究所 客員教授
2011 年	中国・武漢大学 海外特別栄誉教授
2012 年	大阪大学大学院工学研究科 非常勤講師
2014 年	静岡県立大学薬学部 非常勤講師
2013~15 年	東京大学大学院理学系研究科化学専攻 流動講座教授
2015 年	千葉大学大学院薬学研究院 非常勤講師
2015 年	岡山大学大学院自然科学研究科 非常勤講師
2015 年	岐阜薬科大学 非常勤講師
2016 年	北海道大学理学院 非常勤講師
2018 年	長崎大学大学院医歯薬学総合研究科 非常勤講師
2020 年	信州大学学術研究院農学系 非常勤講師
2020 年	千葉大学大学院医学薬学府 非常勤講師
2021 年	東京大学卓越大学院 非常勤講師
2025 年	関西学院大学 非常勤講師
2025 年	鳥取大学 非常勤講師

学術雑誌の編集長・編集委員・アドバイザー

2008~2011 年	<i>Canadian Journal of Chemistry</i> (Advisory Board)
2011~2017 年	<i>Organic & Biomolecular Chemistry</i> , RSC (Editorial Board)
2012~2022 年	<i>Beilstein Journal of Organic Chemistry</i> (Associate Editor)
2013~2016 年	<i>ChemCatChem</i> (International Advisory Board)
2013 年~現在	<i>Bulletin of the Chemical Society of Japan</i> (Senior Editor)
2014~2021 年	<i>Chemistry - An Asian Journal</i> (International Advisory Board)
2014 年~現在	<i>Advanced Synthesis & Catalysis</i> (Academic Advisory Board)
2015 年~現在	<i>The Chemical Record</i> (Editorial Board)
2015 年~現在	<i>Tetrahedron/Tetrahedron Letters</i> (Advisory Board)
2016~2018 年	<i>Accounts of Chemical Research</i> (Editorial Advisory Board)
2016~2023 年	<i>Chem, Cell Press</i> (Editorial Board)
2017~2020 年	<i>Angewandte Chemie</i> (International Advisory Board)
2019 年~現在	<i>ACS Central Science</i> (Editorial Advisory Board)
2021 年~現在	<i>Tetrahedron Chem</i> (Advisory Board)
2022 年~現在	<i>Precision Chemistry, ACS</i> (Associate Editor)

学術賞委員長・選考委員

2008~2014 年	Yoshimasa Hirata Memorial Lectureship 選考委員
2014~2024 年	Hirata Award 選考委員

2017~2019 年	Mukaiyama Award	選考委員
2008 ~2024 年	Nagoya Medal Prize of Organic Chemistry	選考委員
2014~2022 年	Nagoya Medal Prize of Organic Chemistry	選考委員長・組織委員長
2021 年	Tetrahedron Prize	選考委員

市販化された化合物 (23 化合物)

[15]Cycloparaphenylene, [\[15\]CPP](#) (Kanto Chemical)
 [12]Cycloparaphenylene, [\[12\]CPP](#) (TCI, Kanto Chemical)
 [11]Cycloparaphenylene, [\[11\]CPP](#) (TCI)
 [10]Cycloparaphenylene, [\[10\]CPP](#) (TCI)
 [9]Cycloparaphenylene, [\[9\]CPP](#) (TCI, Kanto Chemical)
 [8]Cycloparaphenylene, [\[8\]CPP](#) (TCI)
 [7]Cycloparaphenylene, [\[7\]CPP](#) (TCI)
 Methylene-bridged [6]cycloparaphenylene, [\[6\]MCPP](#) (TCI)
 (6,6)Carbon nanobelt bis(tetrahydrofuran) adduct, [\(6,6\)CNB](#) (TCI)
 Warped nanographene, [WNG](#) (Kanto Chemical)
 NanoPapillon ([HBT](#)) (Kishida Chemical, Taoka Chemical)
 [1,2-Bis(dicyclohexylphosphino)ethane]dicarbonylnickel(0), [Ni\(dcypt\)\(CO\)₂](#) (Kanto Chemical)
 3,4-Bis(dicyclohexylphosphino)thiophene, [dcypt](#) (Kanto Chemical)
 2,2'-Bis[bis(3,5-dimethylphenyl)phosphino]-1,1'-biphenyl, [Xyl-BIPHEP](#) (TCI)
 5-Adamantyl-IAA, [super-strong auxin](#) (TCI)
 Yoshimulactone Green, [YLG](#) (TCI)
 AMOR, [glyco-enhancer of plant fertilization](#) (TCI)
 Vinylboronic acid pinacol ester (TCI, Sigma-Aldrich)
 Bis[dimethyl(2-pyridyl)silyl]methane (TCI)
 2-(Allyldimethylsilyl)pyridine (Sigma-Aldrich)
 2-(Dimethylvinylsilyl)pyridine (TCI, Sigma-Aldrich)
 2-(Trimethylsilyl)pyridine (TCI, Sigma-Aldrich)
 2-(Dimethylsilyl)pyridine (Sigma-Aldrich)

主なインタビュー記事・公開講演・動画

[研究者の素顔 伊丹健一郎](#) (rikenchannel) (YouTube)
[上村大輔先生に導かれて](#) (理 philosophia)
[Chem-Station スポットライトリサーチ](#) (Chem-Station)
[スーパー分子が世界を変える](#) (東進ハイスクール・トップリーダーと学ぶワークショップ)
[フロンティアサロン Teacher Introduction](#) (フロンティアサロン財団)
[研究者の肖像](#) (テクノロジストマガジン)
[フロントランナー挑む](#) (日経サイエンス)
[ケムステ第1回バーチャルシンポジウム](#) (YouTube)
[化学と工業・論説](#) (何にも囚われない情熱ある研究を！)
[Introduction of ITbM](#) (YouTube)
[A conversation with Kenichiro Itami](#) (ACS Central Science)
[Carbon nanobelt commercialized from TCI](#) (YouTube)
[カーボンナノベルト TCI より市販化](#) (YouTube)
[世界初のカーボンナノベルト合成、構造確定の瞬間](#) (YouTube)
[Interview with Stuart L. Schreiber](#) (YouTube)

[Interview with Zhaomin Hou](#) (YouTube)
[WPI プログラム 10 周年記念講演会](#) (YouTube)
[WPI Science Talk Live 2013](#) (YouTube)
[MBLA 10th Anniversary Special Lectures](#) (YouTube)
[Angewandte Festsymposium](#) (ChemistryViews)
[2015 National Organic Chemistry Symposium](#) (American Chemical Society)
[伊丹健一郎教授 ー合成化学はひとつである](#) (Chem-Station)
[Author Profile](#) (*Angew. Chem. Int. Ed.*)

論文・著書 (436 報)

[Preprints, accepted or submitted]

- (436) A bioactive nanocarbon that targets cross-species protein–protein interactions
Hayato Yamada, Ryuto Kojo, Takafumi Shiraogawa, Daisuke Shimizu, Daiki Imoto, Nghia Minh Le, Ayato Sato, Atsushi Usami, Jun-ya Hasegawa, Lawrence T. Scott, Kazuma Amaike, Kenichiro Itami

ChemRxiv, DOI: [10.26434/chemrxiv-2025-x2xsw-v2](https://doi.org/10.26434/chemrxiv-2025-x2xsw-v2)

- (435) Synthesis, structures, and properties of polybenzo[*n*]spirenes with carbon-based polyspiroconjugation
Kumpei Hasebe, Kenichiro Itami, Hideto Ito

ChemRxiv, DOI: [10.26434/chemrxiv-2025-Ins30](https://doi.org/10.26434/chemrxiv-2025-Ins30)

- (434) TBA
Daiki Imoto, Hideya Kono, Akiko Yagi, Kenichiro Itami

Submitted.

- (433) Efficient nucleic acid delivery in mammalian and plant cells using precisely engineered cationic perylenes
Daisuke Shimizu, Erika Kato, Miu Fukatsu, Luca Hagemeyer, Dominik Zetschok, Atsushi Usami, Hayato Yamada, Seigo Kimura, Hiroshi Abe, Ayato Sato, Noriyoshi Yagi, Masayoshi Nakamura, Kazuma Amaike, Kenichiro Itami

ChemRxiv, DOI: [10.26434/chemrxiv-2025-d7zzq](https://doi.org/10.26434/chemrxiv-2025-d7zzq)

- (432) New metabolites of fairy chemicals in tea and coffee, methylated AHX and AOH
Takahiro Abe, Sota Ino, Jae-Hoon Choi, Jing Wu, Sae Yokobori, Hitoshi Ouchi, Ryo Takita, Kazuma Amaike, Kenichiro Itami, Michio Sato, Kenji Watanabe, Hirofumi Hirai, Hirokazu Kawagishi

Under revision.

- (431) Effect of nanocarbon molecules on the *Arabidopsis thaliana* transcriptome
Norihito Nakamichi, Ayato Sato, Yusuke Aihara, Toshinori Kinoshita, Yasutomo Segawa, Kazuma Amaike, Kenichiro Itami

bioRxiv, DOI: [10.1101/2020.05.22.110171v1](https://doi.org/10.1101/2020.05.22.110171v1)

[Published papers and accounts]

- (430) Making non-emissive [6]cycloparaphenylene fluorescent by simple multiple methyl substitution
Tomoki Kato, Daiki Imoto, Akiko Yagi, Kenichiro Itami

Chem. Sci. 2025, 16, Accepted Manuscript.
DOI: [10.1039/D5SC04694G](https://doi.org/10.1039/D5SC04694G)

- (429) In-insect nanocarbon synthesis
Kenichiro Itami, Atsushi Usami

Chemistry Today 2025, 654, 8.

- (428) C-H amination of arenes and heteroarenes through a dearomative (3+2) cycloaddition
Sajan Pradhan, Fahimeh Mohammadi, Rikuo Tanase, Kazuma Amaike, Kenichiro Itami, Jean Bouffard

J. Am. Chem. Soc. 2025, 147, 27731-27742.
DOI: [10.1021/jacs.5c06390](https://doi.org/10.1021/jacs.5c06390)

- (427) Twelvefold dearomative esterification of (6,6)carbon nanobelt
Tsubasa Okumura, Daiki Imoto, Yuri Arachi, Akiko Yagi, Takehisa Maekawa, Kenichiro Itami
Angew. Chem. Int. Ed. 2025, 64, e202510544.
DOI: [10.1002/anie.202510544](https://doi.org/10.1002/anie.202510544)
ChemRxiv, DOI: [10.26434/chemrxiv-2025-z8q3q](https://doi.org/10.26434/chemrxiv-2025-z8q3q)
- (426) Cycloparaazine, a full-azine carbon nanoring
Till Drennhaus, Daiki Imoto, Elena S. Horst, Lena Lezius, Hiroki Shudo, Tomoki Kato, Klaus Bergander, Constantin G. Daniliuc, Dirk Leifert, Akiko Yagi, Armido Studer, Kenichiro Itami
Nature Commun. 2025, 16, 4643.
DOI: [10.1038/s41467-025-59934-5](https://doi.org/10.1038/s41467-025-59934-5)
Highlighted in The Chemical Daily.
ChemRxiv, DOI: [10.26434/chemrxiv-2024-gg1d](https://doi.org/10.26434/chemrxiv-2024-gg1d)
- (425) In-insect synthesis of oxygen-doped molecular nanocarbons
Atsushi Usami, Hideya Kono, Vic Austen, Quan Manh Phung, Hiroki Shudo, Tomoki Kato, Hayato Yamada, Akiko Yagi, Kazuma Amaike, Kazuhiro J. Fujimoto, Takeshi Yanai, Kenichiro Itami
Science 2025, 388, 1055-1061.
DOI: [10.1126/science.adp9384](https://doi.org/10.1126/science.adp9384)
Highlighted in C&E News, Nature, Chemistry World, EurekAlert!, PhysOrg, Life Technology, The Chemical Daily, Yahoo News, Nikkei Shimbun, Nikkan Kougyou Shimbun, Scienze Notizie, Mirage, Scienmag, Interesting Engineering, Bioengineer, RIKEN Research, etc
ChemRxiv, DOI: [10.26434/chemrxiv-2024-1zd0b](https://doi.org/10.26434/chemrxiv-2024-1zd0b)
- (424) Birch reductive arylation by mechanochemical anionic activation of polycyclic aromatic compounds
Yoshifumi Toyama, Akiko Yagi, Kenichiro Itami, Hideto Ito
Nature Commun. 2025, 16, 5044.
DOI: [10.1038/s41467-025-60318-y](https://doi.org/10.1038/s41467-025-60318-y)
ChemRxiv, DOI: [10.26434/chemrxiv-2024-ts4vf](https://doi.org/10.26434/chemrxiv-2024-ts4vf)
- (423) Stable cationic nanobelts synthesized by chemical oxidation of methylene-bridged [6]cycloparaphenylene
Nobushige Kai, Hideya Kono, Timo Stünkel, Daiki Imoto, Riccardo Zanasi, Guglielmo Monaco, Francesco F. Summa, Lawrence T. Scott, Akiko Yagi, Kenichiro Itami
Chem. Sci. 2025, 16, 9195-9292.
DOI: [10.1039/D5SC01305D](https://doi.org/10.1039/D5SC01305D)
ChemRxiv, DOI: [10.26434/chemrxiv-2024-jh80w](https://doi.org/10.26434/chemrxiv-2024-jh80w)
- (422) Rh-catalyzed mechanochemical transfer hydrogenation for the synthesis of periphery-hydrogenated polycyclic aromatic compounds
Yoshifumi Toyama, Takumu Nakamura, Yushin Horikawa, Yuta Morinaka, Yohei Ono, Akiko Yagi, Kenichiro Itami, Hideto Ito
Chem. Sci. 2025, 16, 9117-9124.
DOI: [10.1039/D5SC01489A](https://doi.org/10.1039/D5SC01489A)
Selected as a cover. Highlighted in Synfacts and The Chemical Daily.
ChemRxiv, DOI: [10.26434/chemrxiv-2025-np2hv](https://doi.org/10.26434/chemrxiv-2025-np2hv)

- (421) Functionalization and solubilization of polycyclic aromatic compounds by sulfoniumization
Johannes E. Erchinger, Tsubasa Okumura, Kanami Nakata, Daisuke Shimizu, Constantin G. Daniliuc, Kazuma Amaike, Frank Glorius, Kenichiro Itami, Hideto Ito
Chem. Sci. 2025, 16, 8262-8267.
DOI: [10.1039/D5SC01415H](https://doi.org/10.1039/D5SC01415H)
Selected as a back cover.
Highlighted in The Chemical Daily.
- (420) Synthesis of chrysene-based nanographenes by a successive APEX reaction
Yuichi Nakashige, Hidefumi Nakatsuji, Kaho Matsushima, Kazuo Murakami, Hideto Ito, Kenichiro Itami
Precis. Chem. 2025, 3, ASAP.
DOI: [10.1021/prechem.5c00032](https://doi.org/10.1021/prechem.5c00032)
- (419) Chemistry and application of methylene-bridged cycloparaphenylenes (account in Japanese)
Akiko Yagi, Hideya Kono, Kazuma Amaike, Kenichiro Itami
J. Synth. Org. Chem. Jpn. 2025, 83, 446-454.
DOI: [10.5059/yukigoseikyokaishi.83.446](https://doi.org/10.5059/yukigoseikyokaishi.83.446)
- (418) Chemical genetics reveals cross-activation of plant developmental signaling by the immune peptide-receptor pathway
Arvid Herrmann, Krishna Mohan Sepuru, Pengfei Bai, Hitoshi Endo, Ayami Nakagawa, Shuhei Kusano, Asraa Ziadi, Hiroe Kato, Ayato Sato, Jun Liu, Libo Shan, Seisuke Kimura, Kenichiro Itami, Naoyuki Uchida, Shinya Hagihara, Keiko U. Torii
Sci. Adv. 2025, 11, eads3718.
DOI: [10.1126/sciadv.ads3718](https://doi.org/10.1126/sciadv.ads3718)
Selected as a cover.
bioRxiv, DOI: [10.1101/2024.07.29.605519](https://doi.org/10.1101/2024.07.29.605519)
- (417) Spiro-fused dibenzo[*g,p*]chrysene: annulative π -extension (APEX) synthesis and properties
Kanghui Song, Yuying Zhang, Shuai Wu, Sha Yang, Shengchen Wei, Songhua Chen, Hideto Ito, Kenichiro Itami, Yuanming Li
Org. Chem. Front. 2025, 12, 2225-2231.
DOI: [10.1039/D4QO02104E](https://doi.org/10.1039/D4QO02104E)
- (416) Thiophene-fused aromatic belts
Hiroki Shudo, Philipp Wiesener, Elena Kolodzeiski, Kiichi Mizukami, Daiki Imoto, Harry Mönig, Saeed Amirjalayer, Hirotoshi Sakamoto, Henning Klaasen, Bart Jan Ravoo, Nobuo Kimizuka, Akiko Yagi, Kenichiro Itami
Nature Commun. 2025, 16, 1074.
DOI: [10.1038/s41467-025-55896-w](https://doi.org/10.1038/s41467-025-55896-w)
Highlighted in ITmedia Business Online.
ChemRxiv, DOI: [10.26434/chemrxiv-2024-zllzl](https://doi.org/10.26434/chemrxiv-2024-zllzl)
- (415) Rapid access to functionalized nanographenes through a palladium-catalyzed multi-annulation sequence
Takehisa Maekawa, Kenichiro Itami

Chem. Sci. 2025, 16, 3092-3098.

DOI: [10.1039/D4SC07995G](https://doi.org/10.1039/D4SC07995G)

Highlighted in Nikkei Shimbun and Optronics online.

- (414) De novo generation of dual-target compounds using artificial intelligence

Kasumi Yasuda Francois Berenger, Kazuma Amaike, Ayaka Ueda, Tomoya Nakagomi, Genki Hamasaki, Chen Li, Noriko Yuyama Otani, Kazuma Kaitoh, Koji Tsuda, Kenichiro Itami, Yoshihiro Yamanishi

iScience 2025, 28, 11526.

DOI: [10.1016/j.isci.2024.111526](https://doi.org/10.1016/j.isci.2024.111526)

- (413) Carbon nanobelt history and chemistry

Hiroki Shudo, Daiki Imoto, Akiko Yagi, Kenichiro Itami

Molecular Nanographenes: Synthesis, Properties, and Applications

(Edited by Nazario Martin and Colin P. Nuckolls)

Chapter 6.

- (412) Water-soluble aromatic nanobelt with unique cellular internalization

Konstantin Günther, Hideya Kono, Hiroki Shudo, Daisuke Shimizu, Reika Isoda, Masayoshi Nakamura, Akiko Yagi, Kazuma Amaike, Kenichiro Itami

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Kenichiro Itami, Kazuma Amaike, Ayaka Ueda (伊丹健一郎、天池一真、上田彩果)
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US-18/050,713
Kenichiro Itami, Hideto Ito, Tsukasa Sawafuji, Tadashi Haketa, Yusuke Takahashi, Shota Tanaka, Takuto Fukami (伊丹健一郎、伊藤英人、澤藤司、瀬田敬太、羽毛田匡、高橋佑典、田中将太、深見拓人)
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JP-2023-034740 (特願 2023-034740)
Akiko Yagi, Takaku Yoshihara, Kenichiro Itami (八木亜樹子、吉原空駆、伊丹健一郎)
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Kenichiro Itami, Hideto Ito, Kaho Matsushima, Kazuo Murakami, Hidefumi Nakatsuji, Shunsuke Ishida (伊丹健一郎、伊藤英人、松島佳保、村上和夫、仲辻秀文、石田舜祐)
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JP-2022-148563 (特願 JP-2022-148563)
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Toshinori Kinoshita, Yusuke Aihara, Ayato Sato, Shigeo Toh, Yasuomi Tada, Yosuke Toda, Kenichiro Itami, Kei Murakami, Bumpei Maeda, Kanna Goto (木下俊則、相原悠介、佐藤綾人、藤茂雄、叶文秀、戸田陽介、伊丹健一郎、村上慧、前田文平、後藤栞奈)
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PCT/JP2022/003669
Kenichiro Itami, Hideto Ito, Kaho Matsushima, Hidefumi Nakatsuji, Shunsuke Ishida, Sachie Okuda (伊丹健一郎、伊藤英人、松島佳保、仲辻秀文、上野亮磨、石田舜祐、奥田幸恵)
- (86) TBA
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Kenichiro Itami, Yuta Morinaka, Yasuhiro Takahashi, Yohei Ono, Tsuyoshi Tanaka (伊丹健一郎、森中裕太、高橋泰裕、小野洋平、田中剛)
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Kenichiro Itami, Kazuma Amaike, Erika Kato, Ayato Sato, Masayoshi Nakamura (伊丹健一郎、天池一真、加藤江莉佳、佐藤綾人、中村匡良)
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Kenichiro Itami, Akiko Yagi, Ayato Sato, Keitaro Tanoi, Ryohei Sugita, Shinichi Yamashita (伊丹健一郎、八木亜樹子、佐藤綾人、田野井慶太朗、杉田亮平、山下真一)
- (82) Compound, material for organic electroluminescent elements, organic electroluminescent element, and electronic device
[US-2023085328-A1](#)
Masato Mitani, Keita Seda, Taro Yamaki, Shota Tanaka, Tsukasa Sawato, Masatoshi Saito, Hiroaki Itoi, Tasuku Haketa, Kei Yoshida, Sayaka Mizutani, Kenichiro Itami, Kei Murakami, Satoshi Matsubara, Yoshito Koga
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[JP-2023-67613 \(特開 2023-67613\)](#)
Tsukasa Sawato, Keita Seda, Tasuku Haketa, Yusuke Takahashi, Shota Tanaka, Takuto Fukami, Hideto Ito, Kenichiro Itami (澤藤司、瀬田敬太、羽毛田匡、高橋佑典、田中将太、深見拓人、伊藤英人、伊丹健一郎)
- (80) Compound, material for organic electroluminescent device, organic electroluminescent device and electronic apparatus (化合物、有機エレクトロルミネッセンス素子用材料、有機エレクトロルミネッセンス素子及び電子機器)
[JP-2023-011408 \(特開 2023-011408\)](#)
Masato Mitani, Keita Seda, Taro Yamaki, Shota Tanaka, Tsukasa Sawato, Masatoshi Saito, Hiroaki Itoi, Tasuku Haketa, Kei Yoshida, Sayaka Mizutani, Kenichiro Itami, Kei Murakami, Satoshi Matsubara, Yoshito Koga (三谷真人、瀬田敬太、八巻太郎、田中将太、澤藤司、齊藤雅俊、糸井裕亮、羽毛田匡、吉田圭、水谷清香、伊丹健一郎、村上慧、松原聡志、古賀義人)
- (79) Fused ring compound, preparation thereof, and material for organic electroluminescent element (縮合環化合物、その製法、及び有機電界発光素子用材料)
[JP-2022-080387 \(特開 2022-080387\)](#)
Yuta Morinaka, Tsuyoshi Tanaka, Kenichiro Itami, Takehisa Maekawa (森中裕太、田中剛、伊丹健一郎、前川健久)
- (78) Method for producing naphthylsilole, naphthylsilole containing heterocyclic group, and graphene nanoribbons containing heterocyclic group
[US-202300121865-A1](#)
Kenichiro Itami, Hideto Ito, Kaho Matsushima, Kazuo Murakami, Hidefumi Nakatsuji, Shunsuke Ishida
- (77) Naphthyl silole production method, naphthyl silole having heterocyclic group, and graphene nanoribbons having heterocyclic group
[EP-4116308-A1](#)
Kenichiro Itami, Hideto Ito, Kaho Matsushima, Kazuo Murakami, Hidefumi Nakatsuji, Shunsuke Ishida
- (76) Compound, material for organic electroluminescent device, organic electroluminescent device and electronic apparatus (化合物、有機エレクトロルミネッセンス素子用材料、有機エレクトロルミネッセンス素子及び電子機器)
[JP-2022-066695 \(特開 2022-066695\)](#)
Keita Seta, Masakazu Funahashi, Hiroshi Yamamoto, Kei Murakami, Kenichiro Itami (瀬田敬太、舟橋正和、山本弘志、村上慧、伊丹健一郎)

- (75) Naphthyl silole production method, naphthyl silole having heterocyclic group, and graphene nanoribbons having heterocyclic group
[EP-4116308-A1](#)
 Kenichiro Itami, Hideto Ito, Kaho Matsushima, Kazuo Murakami, Hidefumi Nakatsuji, Shunsuke Ishida
- (74) Plant growth regulator
[US-2021235697-A1](#)
 Naoyuki Uchida, Shinya Hagihara, Kenichiro Itami, Rie Iwasaki, Keiko Torii
- (73) Solid of naphthyl benzosilole compound and its manufacturing method (ナフチルベンゾシロール化合物の固体およびその製造方法)
[JP-2021-011471 \(特開 2021-011471\)](#)
 Kenichiro Itami, Hideto Ito, Hidefumi Nakatsuji (伊丹健一郎、伊藤英人、仲辻秀文)
- (72) Fused ring compound, preparation thereof, and material for organic electroluminescent element (縮合環化合物、その製法、及び有機エレクトロルミネッセンス素子用材料)
 JP-2020-557789 (再表 2020/111140)
 Yuta Morinaka, Tsuyoshi Tanaka, Kenichiro Itami, Takehisa Maekawa, Hideto Ito (森中裕太、田中剛、伊丹健一郎、前川健久、伊藤英人)
- (71) Curved aromatic compound and method for producing the same (湾曲芳香族化合物およびその製造方法)
[JP-2020-196682 \(特開 2020-196682\)](#)
 Kenichiro Itami, Yasutomo Segawa, Kenta Kato, Takuma Kawada, Taito Hatakeyama (伊丹健一郎、瀬川泰知、加藤健太、川田拓馬、畠山泰斗)
- (70) Method of producing condensed ring compound (縮合環化合物の製造方法)
[JP-2020-158411 \(特開 2020-158411\)](#)
 Yuta Morinaka, Tsuyoshi Tanaka, Kenichiro Itami, Takehisa Maekawa, Hideto Ito (森中裕太、田中剛、伊丹健一郎、前川健久、伊藤英人)
- (69) Pollen tube growth regulator (花粉管成長調節剤)
[JP-2020-147524 \(特開 2020-147524\)](#)
 Tetsuya Higashiyama, Kumi Tokita, Kenichiro Itami, Ayaka Ueda, Hiroyuki Kitano, Hideto Ito, Ayato Sato (東山哲也、時田公美、伊丹健一郎、上田彩果、北野浩之、伊藤英人、佐藤綾人)
- (68) Material for light-emitting element and light-emitting element (発光素子用材料及び発光素子)
[JP-2020-136358 \(特開 2020-136358\)](#)
 Kenichiro Itami, Yasutomo Segawa, Motoaki Usui, Yoshiaki Tsubata, Yoshihiko Akino (伊丹健一郎、瀬川泰知、臼井元章、津幡義昭、秋野喜彦)
- (67) Method for producing annular compound (輪状化合物の製造方法)
[JP-2020-132541 \(特開 2020-132541\)](#)
 Kenichiro Itami, Yasutomo Segawa, Motoaki Usui, Yoshiaki Tsubata (伊丹健一郎、瀬川泰知、臼井元章、津幡義昭)
- (66) Carbon nanobelt and production method therefor
[US-2019375692-A1](#)
 Kenichiro Itami, Yasutomo Segawa, Guillaume Povie, Yuhei Miyauchi, Taishi Nishihara
- (65) Flowering season regulators, agrochemical compositions, and methods of regulating the flowering season of plants (花成時期調節剤、農薬組成物及び植物の花成時期の調節方法)
 JP-2019-534010 (再表 2019/026575)
 Norihito Nakamichi, Takahiro Uehara, Junichiro Yamaguchi, Hiromi Matsuo, Ayato Sato, Kenichiro Itami, Toshinori Kinoshita, Katsuhiko Shiratake, Michitaka Notaguchi (中道範人、上原貴大、山口潤一郎、松尾宏美、佐藤綾人、伊丹健一郎、木下俊則、白武勝裕、野田口理孝)

- (64) Photothermal conversion element (熱光変換素子)
[JP-2019-193418 \(特開 2019-193418\)](#)
 Kenichiro Itami, Yuhei Miyauchi, Taishi Nishihara, Akira Takakura, Takahiro Yamamoto, Satoru Konabe (伊丹健一郎、宮内雄平、西原大志、高倉章、山本貴博、小鍋哲)
- (63) Plant growth regulator (植物成長調整剤)
 JP-2019-504659 (再表 2018/164214)
 Naoyuki Uchida, Shinya Hagihara, Kenichiro Itami, Rie Iwasaki, Keiko Torii (打田直行、萩原伸也、伊丹健一郎、岩崎理恵、鳥居啓子)
- (62) Organic electroluminescent devices containing dinaphthotetraphenylene compounds (ジナフトテトラフェニレン化合物を含む有機エレクトロルミネッセンス素子)
[JP-2019-091748 \(特開 2019-091748\)](#)
 Yuta Morinaka, Tsuyoshi Tanaka, Kenichiro Itami, Kei Murakami, Yoshito Koga (森中裕太、田中剛、伊丹健一郎、村上慧、古賀義人)
- (61) Organic electroluminescent device including polycyclic aromatic compound as component (多環性芳香族化合物を構成成分とする有機電界発光素子)
[JP-2019-004058 \(特開 2019-004058\)](#)
 Yuta Morinaka, Tsuyoshi Tanaka, Kenichiro Itami, Hideto Ito, Yasutomo Segawa, Yuta Yano (森中裕太、田中剛、伊丹健一郎、伊藤英人、瀬川泰知、矢野裕太)
- (60) Water-soluble warped nano graphene compound and use therefor (水溶性ワープドナノグラフェン化合物及びその用途)
[JP-2018-154577 \(特開 2018-154577\)](#)
 Kenichiro Itami, Yasutomo Segawa, Hsing-An Lin, Tetsuya Higashiyama, Yoshikatsu Sato, Keiko Kuwata, Kenta Kato (伊丹健一郎、瀬川泰知、林興安、東山哲也、佐藤良勝、桑田啓子、加藤健太)
- (59) Carbon nanobelt and production method therefor (カーボンナノベルト及びその製造方法)
[JP-2018-131441 \(特開 2018-131441\)](#)
 Kenichiro Itami, Yasutomo Segawa, Guillaume Povie, Yuhei Miyauchi, Taishi Nishihara (伊丹健一郎、瀬川泰知、ポビー・ギョム、宮内雄平、西原大志)
- (58) Material for resistance change element containing cycloparaphenylene-halogen molecular composite (シクロパラフェニレン-ハロゲン分子複合体を含む抵抗変化素子用材料)
[JP-2018-035083 \(特開 2018-035083\)](#)
 Kenichiro Itami, Hirotohi Sakamoto, Noriaki Ozaki (伊丹健一郎、坂本裕俊、尾崎仁亮)
- (57) Easily decomposable lignin generator (易分解性リグニン生成剤)
[JP-2018-008900 \(特開 2018-008900\)](#)
 Shinya Hagiwara, Naoyuki Uchida, Jumpei Suzuki, Kenichiro Itami (萩原伸也、打田直行、鈴木惇平、伊丹健一郎)
- (56) Plant growth regulator (植物成長調整剤)
 JP-2018-526434 (再表 2018/008717)
 Naoyuki Uchida, Shinya Hagihara, Asraa Ziadi, Hiroe Kato, Ayato Sato, Kenichiro Itami, Keiko Torii (打田直行、萩原伸也、ジアディ・アスラ、加藤弘恵、佐藤綾人、伊丹健一郎、鳥居啓子)
- (55) Triarylene compounds and their production methods (トリアリーレン化合物及びその製造方法)
 JP-2018-521145 (再表 2017/209297)
 Kenichiro Itami, Kei Murakami, Yoshito Koga, Takeshi Kaneda, Yutaro Saito (伊丹健一郎、村上慧、古賀義人、金田岳志、齋藤雄太郎)
- (54) Method for producing sulfonimidized aromatic compound (スルホンイミド化芳香族化合物の製造方法)
[JP-2017-218443 \(特開 2017-218443\)](#)

- Kenichiro Itami, Kei Murakami, Eri Ito, Takahiro Kawakami, Tomohiro Fukushima (伊丹健一郎、村上慧、伊藤江里、川上貴大、福島知宏)
- (53) Thiophene ring-condensed aromatic compound and manufacturing method therefor (チオフェン環縮合芳香族化合物及びその製造方法)
[JP-2017-218381 \(特開 2017-218381\)](#)
 Kenichiro Itami, Yasutomo Segawa, Lin Qui Meng (伊丹健一郎、瀬川泰知、メン・リンクイ)
- (52) Polysubstituted aromatic compounds and their production methods (多置換芳香族化合物及びその製造方法)
 JP-2017-520793 (再表 2016/190374)
 Junichiro Yamaguchi, Kenichiro Itami, Shin Suzuki (山口潤一郎、伊丹健一郎、鈴木真)
- (51) Compound having γ turn structure and LSD1 inhibitor using the same (γ ターン構造を有する化合物及びそれを用いた LSD1 阻害剤)
[JP-2017-178811 \(特開 2017-178811\)](#)
 Kenichiro Itami, Junichiro Yamaguchi, Misaho Araki, Takayoshi Suzuki, Yukihiro Ito, Yasusuke Ota, Toshiyuki Sakai, Yoshihiro Sowa, Shin Miyamura (伊丹健一郎、山口潤一郎、荒木未紗保、鈴木孝禎、伊藤幸裕、太田庸介、酒井敏行、曾和義広、宮村伸)
- (50) Palladium complex, coupling reaction using the palladium complex and method for producing organic alkyne compound using the coupling reaction (パラジウム錯体、該パラジウム錯体を用いたカップリング反応、及び該カップリング反応を用いた有機アルキン化合物の製造方法)
[JP-2017-160140 \(特開 2017-160140\)](#)
 Junichiro Yamaguchi, Kenichiro Itami, Ryosuke Takise, Kazumasa Kumazawa (山口潤一郎、伊丹健一郎、瀧瀬瞭介、熊澤一将)
- (49) Production method for bi(hetero)aryl(thio)ether compound (ビ(ヘテロ)アリール(チオ)エーテル化合物の製造方法)
[JP-2017-160139 \(特開 2017-160139\)](#)
 Junichiro Yamaguchi, Kenichiro Itami, Ryosuke Takise (山口潤一郎、伊丹健一郎、瀧瀬瞭介)
- (48) Cross-coupling method and method for producing organic compounds using the cross-coupling method (クロスカップリング方法、及び該クロスカップリング方法を用いた有機化合物の製造方法)
 JP-2016-573412 (再表 2016/125845)
 Kenichiro Itami, Kei Murakami, Takahiro Kawakami, Djamaladdin G. Musaev, Brandon E. Haines— (伊丹健一郎、村上慧、川上貴大、ムサエフ・ジャマラディン・ジー、ハynes・ブランドン・イ)
- (47) Manufacturing method of bipyridyl compound (ビピリジル化合物の製造方法)
[JP-2017-132738 \(特開 2017-132738\)](#)
 Kenichiro Itami, Kei Murakami, Takeshi Kaneda, Shuya Yamada (伊丹健一郎、村上慧、金田岳志、山田柊哉)
- (46) Cross-coupling method and method for producing organic compounds using the cross-coupling method (クロスカップリング方法、及び該クロスカップリング方法を用いた有機化合物の製造方法)
 JP-2016-544219 (再表 2016/027809)
 Kenichiro Itami, Junichiro Yamaguchi, Kei Muto (伊丹健一郎、山口潤一郎、武藤慶)
- (45) Fluorescent probe and screening method of striga germination adjustment material using the same (蛍光プローブ、及びそれを用いたストライガ発芽調節物質のスクリーニング方法)
[JP-2017-014152 \(特開 2017-014152\)](#)
 Shinya Hagiwara, Yuichiro Tsuchiya, Masahiko Yoshimura, Kenichiro Itami, Toshinori Kinoshita (萩原伸也、土屋雄一郎、吉村柁彦、伊丹健一郎、木下俊則)

- (44) Cyclopolyarylene compound and manufacturing method therefor (シクロポリアリーレン化合物及びその製造方法)
[JP-2017-001962 \(特開 2017-001962\)](#)
Kenichiro Itami, Yasutomo Segawa, Akiko Yagi, Keishu Okada (伊丹健一郎、瀬川泰知、八木亜樹子、岡田圭秀)
- (43) Cyclopolyarylene metal complex
[US-20160168179-A1](#)
Kenichiro Itami, Yasutomo Segawa, Natsumi Kubota
- (42) Polysubstituted aromatic compound and manufacturing method therefor (多置換芳香族化合物及びその製造方法)
[JP-2016-216421 \(特開 2016-216421\)](#)
Junichiro Yamaguchi, Kenichiro Itami, Shin Suzuki (山口潤一郎、伊丹健一郎、鈴木真)
- (41) Latent heat storage material (潜熱蓄熱材)
[JP-2016-190894 \(特開 2016-190894\)](#)
Ai Nishida, Nobutaka Honma, Takehiko Nakajima, Michihiro Mizoshita, Kenichiro Itami (西田愛、本間信孝、中島毅彦、溝下倫大、伊丹健一郎)
- (40) Organic photoelectric conversion element and organic thin film solar cell including same (有機光電変換素子及びそれを用いた有機薄膜太陽電池)
[JP-2016-162982 \(特開 2016-162982\)](#)
Atsushi Wakamiya, Kenichiro Itami, Yasutomo Segawa, Hidetaka Nishimura, Takao Fujikawa, Naoki Maruyama, Yasujiro Murata (若宮淳志、伊丹健一郎、瀬川泰知、西村秀隆、藤川鷹王、丸山直輝、村田靖次郎)
- (39) Cyclopolyarylene metal complex (シクロポリアリーレン金属錯体)
[JP-2016-113401 \(特開 2016-113401\)](#)
Kenichiro Itami, Yasutomo Segawa, Natsumi Kubota (伊丹健一郎、瀬川泰知、久保田夏実)
- (38) Compound having helix structure and organic nanotube using the same (らせん構造を有する化合物及びそれを用いた有機ナノチューブ)
[JP-2016-056247 \(特開 2016-056247\)](#)
Hideto Ito, Kenichiro Itami, Kaho Maeda (伊藤英人、伊丹健一郎、前田果歩)
- (37) Plant circadian rhythm regulating agent (植物概日リズム調整剤)
[JP-2016-040231 \(特開 2016-040231\)](#)
Norito Nakamichi, Junichiro Yamaguchi, Kenichiro Itami, Takahiro Uehara, Kyosuke Omatsu, Yukino Furukawa, Toshinori Kinoshita, Takashi Ooi, Ayato Sato (中道範人、山口潤一郎、伊丹健一郎、上原貴大、大松亨介、古川由季乃、木下俊則、大井貴史、佐藤綾人)
- (36) Cyclic compound containing functional group or containing no functional group, and method for producing same
[US-9266909-B2](#)
Kenichiro Itami, Yasutomo Segawa, Haruka Omachi, Sanae Matsuura, Yusuke Nakanishi, Yuuki Ishii
- (35) Carbon nanoring and method for producing a ring-shaped compound suitable as a starting material for production of the same
[EP-2546219-A4](#)
Kenichiro Itami, Yasutomo Segawa, Shinpei Miyamoto, Haruka Omachi, Sanae Matsuura, Petr Senel
- (34) Ligand, nickel complex comprising the ligand, and reaction using the nickel complex
[US-20160074853-A1](#)
Kenichiro Itami, Junichiro Yamaguchi, Ryosuke Takise, Eva Koch

- (33) Ligand, nickel complex comprising the ligand, and reaction using the nickel complex (配位子、該配位子を含むニッケル錯体、及び該ニッケル錯体を用いた反応)
[JP-2015-187092 \(特開 2015-187092\)](#)
 Kenichiro Itami, Junichiro Yamaguchi, Ryosuke Takise, Eva Koch (伊丹健一郎、山口潤一郎、瀧瀬瞭介、コッホ・エファ)
- (32) Carbon nanoring, method for producing same, compound suitable as starting material for producing the carbon nanoring, and method for producing the compound
[US-9029551-B2](#)
 Kenichiro Itami, Yasutomo Segawa, Haruka Omachi, Sanae Matsuura, Katsuma Matsui
- (31) Plant growth regulator comprising compound having bulky substituent (嵩高い置換基を有する化合物を用いた植物成長調整剤)
[JP-2015-089886 \(特開 2015-089886\)](#)
 Kenichiro Itami, Toshinori Kinoshita, Shinya Hagiwara, Koji Takahashi, Masahiko Yoshimura, Hua Zhang, Nils Schroeder (伊丹健一郎、木下俊則、萩原伸也、高橋宏二、吉村柁彦、張華、シュレーダー・ニルス)
- (30) Plant growth regulator comprising compound having substituent coordinating to zinc (亜鉛に配位する置換基を有する化合物を用いた植物成長調整剤)
[JP-2015-089885 \(特開 2015-089885\)](#)
 Kenichiro Itami, Toshinori Kinoshita, Shinya Hagiwara, Koji Takahashi, Masahiko Yoshimura (伊丹健一郎、木下俊則、萩原伸也、高橋宏二、吉村柁彦)
- (29) Carbon nanocages and intermediates thereof, and methods for their production (カーボンナノケージ及びその中間体、並びにこれらの製造方法)
 JP-2015-502708 (再表 2014/132467)
 Kenichiro Itami, Yasutomo Segawa, Katsuma Matsui (伊丹健一郎、瀧川泰知、松井克磨)
- (28) Coupling method and method for producing aromatic group substituted heterocyclic compounds using the coupling method (カップリング方法、及び該カップリング方法を用いた芳香族基置換複素環式化合物の製造方法)
 JP-2014-560631 (再表 2014/122811)
 Kenichiro Itami, Junichiro Yamaguchi, Kazuma Amaike, Kei Muto, Ryosuke Takise (伊丹健一郎、山口潤一郎、天池一真、武藤慶、瀧瀬瞭介)
- (27) Cyclic compounds containing or not containing functional groups and their production methods (官能基含有又は非含有環状化合物及びこれらの製造方法)
 JP-2014-503546 (再表 2013/133386)
 Kenichiro Itami, Yasutomo Segawa, Haruka Omachi, Sanae Matsuura, Yusuke Nakanishi, Yuuki Ishii (伊丹健一郎、瀧川泰知、大町遼、松浦沙奈枝、中西勇介、石井優貴)
- (26) Method for producing phenyl-substituted heterocyclic derivative
[EP-2774923-B1](#)
 Kenichiro Itami, Junichiro Yamaguchi, Kei Muto
- (25) Production method for phenyl-substituted heterocyclic derivatives (フェニル置換複素環誘導体の製造方法)
 JP-2013-541690 (再表 2013/065463)
 Kenichiro Itami, Junichiro Yamaguchi, Kei Muto (伊丹健一郎、山口潤一郎、武藤慶)
- (24) Method for producing polycyclic aromatic compound substituted by aryl group
[US-9056822-B2](#)
 Kenichiro Itami, Kenji Mochida, Katsuaki Kawasumi, Yasutomo Segawa, Tomonori Kajino
- (23) Production method for polycyclic aromatic compounds substituted with aryl groups (アリール基で置換された多環性芳香族化合物の製造方法)

- JP-2013-519551 (再表 2012/169635)
Kenichiro Itami, Kenji Mochida, Katsuaki Kawasumi, Yasutomo Segawa, Tomonori Kajino (伊丹健一郎、望田憲嗣、川澄克光、瀬川泰知、梶野智敬)
- (22) Cyclopolyarylene compound and method of manufacturing same
[US-2014066661-A1](#)
Kenichiro Itami, Yasutomo Segawa, Akiko Yagi
- (21) Cyclopolyarylene compound and method of manufacturing same (シクロポリアリーレン化合物及びそれらの製造方法)
JP-2013-503623 (再表 2012/121370)
Kenichiro Itami, Yasutomo Segawa, Akiko Yagi (伊丹健一郎、瀬川泰知、八木亜樹子)
- (20) Verfahren zur herstellung einer mit einer arylgruppe substituierten polycyclischen aromatischen verbindung
[EP-2730554-A4](#)
Kenichiro Itami, Kenji Mochida, Katsuaki Kawasumi, Yasutomo Segawa, Tomonori Kajino
- (19) Method for producing phenyl-substituted heterocyclic derivative
[EP-2774923-A1](#)
Kenichiro Itami, Junichiro Yamaguchi, Kei Muto
- (18) Carbon nanotube manufacturing method
[EP-2684844-A1](#)
Kenichiro Itami, Yasutomo Segawa, Hisanori Shinohara, Ryo Kitaura
- (17) Carbon nanotube manufacturing method
[US-9527737-B2](#)
- (16) Carbon nanotube manufacturing method (カーボンナノチューブの製造方法)
JP-2013-503617 (再表 2012/121354)
Kenichiro Itami, Yasutomo Segawa, Hisanori Shinohara, Ryo Kitaura (伊丹健一郎、瀬川泰知、篠原久典、北浦良)
- (15) Carbon nanoring and method for producing a ring-shaped compound suitable as a starting material for production of the same
[US-2013324768-A1](#)
Kenichiro Itami, Yasutomo Segawa, Shinpei Miyamoto, Haruka Omachi, Sanae Matsuura, Petr Senel
- (14) Carbon nanoring and method for producing a ring-shaped compound suitable as a starting material for production of the same (カーボンナノリング及びその製造原料として好適な輪状の化合物の製造方法)
JP-2012-504485 (再表 2011/111719)
Kenichiro Itami, Yasutomo Segawa, Shinpei Miyamoto, Haruka Omachi, Sanae Matsuura, Petr Senel (伊丹健一郎、瀬川泰知、宮本慎平、大町遼、松浦沙奈枝、セネル・ペトル)
- (13) Method of manufacturing phenyl substitution heterocyclic derivative by coupling process using nickel catalyst (ニッケル触媒を用いたカップリング法によるフェニル置換複素環誘導体の製造法)
[JP-2012-096999 \(特開 2012-096999\)](#)
Kenichiro Itami, Junichiro Yamaguchi, Jerome Canivet, Ikuya Ban (伊丹健一郎、山口潤一郎、カニベ・ジェロム、伴育哉)
- (12) Carbon nanoring and method for producing a ring-shaped compound suitable as a starting material for production of the same (カーボンナノリング及びその製造方法、並びに該カーボンナノリングの製造原料として好適な化合物及びその製造方法)
JP-2011-553904 (再表 2011/099588)

- Kenichiro Itami, Yasutomo Segawa, Haruka Omachi, Sanae Matsuura, Katsuma Matsui (伊丹健一郎、瀬川泰知、大町遼、松浦沙奈枝、松井克磨)
- (11) Nitrogen-containing heterocyclic compound and method for preparing the same (含窒素複素環化合物及びその製造方法)
[JP-2011-178752 \(特開 2011-178752\)](#)
 Kenichiro Itami, Junichiro Yamaguchi, Debashis Mandal, Atsushi Yamaguchi (伊丹健一郎、山口潤一郎、マンダル・デバシス・山口敦史)
- (10) Fullerene derivative, and process for producing the same (フラーレン誘導体及びその製造方法)
[JP-2011-051930 \(特開 2011-051930\)](#)
 Kenichiro Itami, Masakazu Nambo (伊丹健一郎、南保正和)
- (9) Compound containing a plurality of olefin bonds and method of selectively manufacturing it (オレフィン結合複数含有化合物及びその選択的製造方法)
[JP-2005-289987 \(特開 2005-289987\)](#)
 Junichi Yoshida, Kenichiro Itami (吉田潤一、伊丹健一郎)
- (8) Multi-substituted butadiene and selective method for producing the same (多置換ブタジエン及びその選択的製造方法)
[JP-2005-255562 \(特開 2005-255562\)](#)
 Junichi Yoshida, Kenichiro Itami (吉田潤一、伊丹健一郎)
- (7) Multi-substituted pyrimidine and method for selectively producing the same (多置換ピリミジン及びその選択的製造方法)
[JP-2005-255561 \(特開 2005-255561\)](#)
 Junichi Yoshida, Kenichiro Itami (吉田潤一、伊丹健一郎)
- (6) Polysubstituted olefin and method for selectively producing the same (多置換オレフィン及びその選択的製造方法)
[JP-2005-232036 \(特開 2005-232036\)](#)
 Junichi Yoshida, Kenichiro Itami (吉田潤一、伊丹健一郎)
- (5) Method for breaking carbon-silicon bond by supercritical fluid (超臨界流体による炭素-ケイ素結合の切断方法)
[JP-2004-323436 \(特開 2004-323436\)](#)
 Junichi Yoshida, Kenichiro Itami, Okitsugu Kajimoto (吉田潤一、伊丹健一郎、梶本興亜)
- (4) 2-pyridylsilane, its production and intermediate, and production of alcohol from 2-pyridylsilane
[US-6548673-B1](#)
 Junichi Yoshida, Kenichiro Itami, Seiji Suga
- (3) 2-pyridylsilane, processes for producing and using the same
[US-2003139600-A1](#)
 Junichi Yoshida, Kenichiro Itami, Seiji Suga
- (2) Production of 2-pyridylsilane derivative (2-ピリジルシラン誘導体の製造方法)
[JP-2000-256371 \(特開 2000-256371\)](#)
 Junichi Yoshida, Kenichiro Itami, Seiji Suga (吉田潤一、伊丹健一郎、菅誠治)
- (1) 2-pyridylsilane, its production and intermediate, and production of alcohol from 2-pyridylsilane (2-ピリジルシラン類、その製造方法と中間体および該2-ピリジルシラン類からアルコール類を製造する方法)
[JP-2000-256370 \(特開 2000-256370\)](#)
 Junichi Yoshida, Kenichiro Itami, Seiji Suga (吉田潤一、伊丹健一郎、菅誠治)

基調講演・招待講演 (460 件)

- (460) "Toward unexplored "carbon" functions", Special Lecture, Tosoh Cooperation, Ayase, Kanagawa, Japan, May 28th, 2025.
- (459) "Crafting super molecules: Creativity is just connecting things" The Public Lecture Series, The Carbon to Metal Coating Institute (C2MCI), Queen's University, Kingston Frontenac Public Library (public lecture), Kingston, Canada, May 21st, 2025.
- (458) "Toward unexplored "carbon" functions" The Annual General Meeting, The Carbon to Metal Coating Institute (C2MCI), Queen's University (keynote lecture), Kingston, Canada, May 21st, 2025.
- (457) "Toward unexplored "carbon" functions" JACS & JACS Au Summit: Global Trends in Chemistry and Materials Science (keynote lecture), Suzuki Umetaro Hall, RIKEN, Wako, April 22nd, 2025.
- (456) "Toward chemistry for space science" The 2nd Space Utilization Workshop, RIKEN, Wako, April 18th, 2025.
- (455) "Toward unexplored "carbon" functions" CSRS Research Report & Strategic Programs Kickoff Meeting, Suzuki Umetaro Hall, RIKEN, Wako, April 17th, 2025.
- (454) "Toward unexplored "carbon" functions" PRI Kickoff and CPR Farewell Symposium, RIKEN, March 26th, 2025.
- (453) "Connect-and-expand toward big unsolved" The Aida-Itami Brain-storming Meeting, The University of Tokyo, March 10th, 2025.
- (452) "Toward unexplored "carbon" functions" Institute of Chemistry, Academia Sinica, Taipei, Taiwan, November 13th, 2024.
- (451) "Toward unexplored "carbon" functions" The Chemistry Seminar, The University of Tokyo, Komaba, October 22nd, 2024.
- (450) "Toward unexplored "carbon" functions" The Tohoku-branch of the Society of Synthetic Organic Chemistry, Japan, Tohoku University, October 19th, 2024.
- (449) "Toward unexplored "carbon" functions" The Waseda Special Lecture, Waseda University, September 25th, 2024.
- (448) "Toward unexplored "carbon" functions" The 125th CEMS Colloquium, Center for Emergent Matter Science (CEMS), Okochi-Hall, RIKEN, Wako, July 31st, 2024.
- (447) "Passion-oriented and unplanned 19 years in Nagoya" The Farewell Lecture, Noyori Conference Hall, Nagoya University, February 19th, 2024.
- (446) "Molecular nanocarbon synthesis and beyond" The 15th International Kyoto Conference on New Aspects of Organic Chemistry (IKCOC-15), November 8-11th, 2023.
- (445) "Molecular nanocarbon science: Toward untapped fields with untapped molecules" Konika Minolta, Hachioji, Tokyo, November 14th, 2023.
- (444) "Molecular nanocarbon science: Toward untapped fields with untapped molecules" Advanced Materials Development Laboratory, Sumitomo Chemical, Tsukuba, November 13th, 2023.
- (443) "Molecular nanocarbon synthesis and beyond" Institute of Chemistry, Academia Sinica, Taiwan, November 7th, 2023.
- (442) "Catalyst-enabled molecular nanocarbon synthesis and nanocarbon biology" The Organic Synthesis Lecture, Department of Chemistry, University of California, Irvine, California, USA, October 19th, 2023.
- (441) "Synthesis of carbon nanorings and carbon nanobelts" The Organic Synthesis Lecture, Department of Chemistry, University of California, Irvine, California, USA, October 18th, 2023.
- (440) "Molecular nanocarbon synthesis and beyond" The Okamoto PRESTO Alumni Meeting, National Museum of Nature and Science, Ueno, Tokyo, Japan, October 6th, 2023.
- (439) "Catalyst-enabled molecular nanocarbon synthesis and nanocarbon biology" The Job Lecture, Department of Chemistry, Memorial University of Newfoundland, St. John's, NL, Canada, July 13th, 2023.

- (438) "Crafting super molecules: Creativity is just connecting things" The Job Lecture (public lecture), Department of Chemistry, Memorial University of Newfoundland, St. John's, NL, Canada, July 12th, 2023.
- (437) "Synthesis of carbon nanorings and carbon nanobelts" The Job Lecture, Department of Chemistry, Memorial University of Newfoundland, St. John's, NL, Canada, July 12th, 2023.
- (436) "Molecular nanocarbon synthesis and beyond" The 39th Biennial Meeting of the Spanish Royal Society of Chemistry (plenary lecture), The Auditorium – Palacio de Congresos de Zaragoza, Zaragoza, Spain, July 27th, 2023.
- (435) "Toward molecular nanocarbon biology" The Kawagishi specially promoted research project meeting, The Ocean, Hamanako, Shizuoka, Japan, June 1st, 2023.
- (434) "Molecular nanocarbon synthesis and beyond" The Kickoff Symposium of SKCM² (Hiroshima Univ WPI), International Institute for Sustainability with Knotted Chiral Meta Matter (SKCM²), Hiroshima International Conference Center, Hiroshima, Japan, March 21st, 2023.
- (433) "Toward molecular nanocarbon biology" The Paul G. Gassman Lecture, Department of Chemistry, University of Minnesota, Minneapolis, Minnesota, USA, March 16th, 2023.
- (432) "Catalyst-enabled molecular nanocarbon synthesis" The Paul G. Gassman Lecture, Department of Chemistry, University of Minnesota, Minneapolis, Minnesota, USA, March 15th, 2023.
- (431) "Synthesis of carbon nanorings and carbon nanobelts" The Paul G. Gassman Lecture, Department of Chemistry, University of Minnesota, Minneapolis, Minnesota, USA, March 14th, 2023.
- (430) "Molecular nanocarbon science: Toward unexplored fields with unexplored molecules" Special Seminar, Tosoh Corporation, Nanyo, Yamaguchi, Japan, December 16th, 2022.
- (429) "Synthesis of carbon nanorings and carbon nanobelts" Frontiers of EOC: Organic Conjugated Materials (celebrating the 60th anniversary of institute of elemento-organic chemistry), Nankai University, China, November 16th, 2022 (online).
- (428) "Molecular nanocarbon science: From precise synthesis to nanocarbon biology" Special Seminar, Takeda Pharmaceutical Company Limited, November 6th, 2022 (online).
- (427) "Catalyst-enabled molecular nanocarbon synthesis and nanocarbon biology" The Reben Benjamin Sandin Lecture (Lecture 2), Department of Chemistry, University of Alberta, Edmonton, Alberta, Canada, November 1st, 2022.
- (426) "Synthesis of carbon nanorings and carbon nanobelts" The Reben Benjamin Sandin Lecture (Lecture 1), Department of Chemistry, University of Alberta, Edmonton, Alberta, Canada, October 31st, 2022.
- (425) "Toward super molecules: Virtue-creating synthetic chemistry and the power of interdisciplinary research" Japan Society of Physics and Chemistry Education (Tokai Block), Shin-Sakae, Nagoya, October 19th, 2022.
- (424) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" Nagoya University - Jilin University Online Program, Summer Lecture Series, August 4th, 2022 (online).
- (423) "Molecular nanocarbons: Exploring new fields with new molecules" The GTR Lecture, Nagoya University, July 20th, 2022 (online).
- (422) "Molecular nanocarbon synthesis and beyond" The 19th International Symposium on Novel Aromatic Compounds (ISNA19) (plenary lecture), University of Warsaw, Poland, July 6th, 2022.
- (421) "Molecular nanocarbons: Diverse structures, diversity-oriented synthesis, and diverse applications" The 2nd IRTG Joint Symposium (University of Münster and Nagoya University), Münster University, Germany, July 1st, 2022.
- (420) "Virtue-creating synthetic chemistry and the power of interdisciplinary research" The SSH Special Lecture, Meiwa High School, Nagoya, June 21st, 2022.

- (419) "Molecular nanocarbons: Diverse structures, diversity-oriented synthesis, and diverse applications" The 105th Canadian Chemistry Conference and Exhibition, "Diversity and Innovation in Chemistry" (plenary lecture), Calgary TELUS Convention Centre, Calgary, Alberta, Canada, June 17th, 2022.
- (418) "Molecular nanocarbon synthesis and beyond" The 241st ECS Meeting, Nano Chemistry in Japan, Vancouver Convention Center, June 3rd, 2022 (online).
- (417) "Molecular nanocarbons: From precise synthesis to nanocarbon biology" Special Seminar, Department of Chemistry, Indian Institute of Technology Kanpur, India, May 26th, 2022 (online).
- (416) "A decade of ITbM 1.0" The ITbM Workshop (ITbM 2.0 Kickoff Meeting), Nagoya University, May 16th, 2022.
- (415) "Creation of new molecular nanocarbons and applications to materials and biology" The Fine Chemicals Japan 2022 (plenary lecture), Tokyo Big Site, April 20th, 2022.
- (414) "Molecular nanocarbon synthesis and beyond" The ChemSoc (Chemical Society) Lecture, School of Chemistry, University of New South Wales (UNSW) Sydney, Australia, April 7th, 2022 (online).
- (413) "Molecular nanocarbons: From precise synthesis to nanocarbon biology" The 142nd Annual Meeting of the Pharmaceutical Society of Japan (plenary lecture), March 26th, 2022 (online).
- (412) "Toward making unique bioactive molecules" The Chemical Society Meeting, Symposium in Memory of Daisuke Uemura, March 23rd, 2022 (online).
- (411) "Virtue-creating synthetic chemistry and the power of interdisciplinary research" The SSH Special Lecture, Asahigaoka High School, Nagoya, March 14th, 2022.
- (410) "Molecular nanocarbon synthesis and beyond" PNU BK4/BRL International Symposium on Polymer Chemistry, Department of Chemistry, Pusan National University, Korea, March 4th, 2022 (online).
- (409) "Nanocarbon biology" JST Workshop on Life Science and Nanotechnology, January 20th, 2022 (online).
- (408) "Molecular nanocarbon science powered by synthetic chemistry" IRTG 2678 Block Course, Functional pi-Systems: Activation, Interaction, Application (IRTG 2678), Münster University, Germany, January 13th, 2022 (online).
- (407) "Creation of new forms of nanocarbons enabled by C-H activation" The International Chemical Congress of Pacific Basin Societies 2021 (Pacifichem 2021), Recent Advances in C-H Functionalization, December 18th, 2021 (online).
- (406) "Molecular nanocarbon synthesis and beyond" 2021 Materials Research Society - Taiwan International Conference (2021 MRSTIC), November 13-17th, 2021 (virtual conference).
- (405) "Virtue-creating synthetic chemistry and the power of interdisciplinary research" The 80th Anniversary of Toyota-Nishi High School (plenary lecture), November 6th, 2021.
- (404) "Synthesis of new molecular nanocarbons toward nanocarbon-initiated breeding" The 38th Annual Meeting of the Japanese Society for Plant Biotechnology (online), September 9th, 2021.
- (403) "Molecular nanocarbon science powered by synthetic chemistry" EPK Symposium (celebrating E. Peter Kündig's 75th birthday), University of Geneva (online), September 3rd, 2021.
- (402) "Making transformative molecules by interdisciplinary approach" Nagoya University Executive Training Program, Nagoya University, July 28th, 2021.
- (401) "Molecular nanocarbon science powered by synthetic chemistry" ETN CHAIR - C-H Activation for Industrial Renewal - Summer School (online), June 23rd, 2021.
- (400) "Molecular nanocarbon science powered by synthetic chemistry" The Toray Seminar (online), April 16th, 2021.
- (399) "Molecular nanocarbon science powered by synthetic chemistry" The Organic Chemistry and Chemical Biology Colloquium, Department of Chemistry, University of Oxford, UK (online), January 28th, 2021.
- (398) "Making new forms of carbon" The University of Tokyo WISE Program (online), January 20th, 2021.

- (397) "Crazy molecular nanocarbon science including biology" ITbM Workshop, Nagoya University (online), January 18th, 2021.
- (396) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" Chiba University Leading Graduate Program (online), November 27th, 2020.
- (395) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The 111th Alumni Association of Nagoya University Medical School, Nagoya Kanko Hotel, November 7th, 2020.
- (394) "Precision synthesis of molecular nanocarbons" The 10th CSJ Chemistry Festa (online), October 22nd, 2020.
- (393) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The 39th Kanazawa Kidney Seminar (online), October 10th, 2020.
- (392) "Exploring chronobiology by synthetic chemistry" Nagoya University GTR Retreat (online), September 25th, 2020.
- (391) "Making beautiful and crazy molecules" Ina Chemical Biology Seminar, Shinshu University (online), July 29th, 2020.
- (390) "Toward making beautiful and crazy molecules" Radiation-driven Biotechnology Seminar (online), June 11th, 2020.
- (389) "Toward making beautiful and crazy molecules" Chem-Station Virtual Symposium (online), May 1st, 2020.
- (388) "Creating new value enabled by interdisciplinary team" Central Japan Quality Control Association, Wink Aichi, Nagoya, February 6th, 2020.
- (387) "Making transformative molecules by interdisciplinary approach" Nagoya University Executive Training Program, Nagoya University, February 5th, 2020.
- (386) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The Manager Forum, Nagoya Trade & Industry Center, Nagoya Castle Hotel, Nagoya, January 15th, 2020.
- (385) "Making new forms of nanocarbons" The 6th CSRS-ITbM Joint Workshop, Suzuki Umetaro Hall, RIKEN, Wako, Saitama, January 8th, 2020.
- (384) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The Mitsubishi Chemicals Special Lecture, Mitsubishi Chemicals, Yokohama, December 9th, 2019.
- (383) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The 130th Sci-tech Salon, Komaba Faculty House, The University of Tokyo, Komaba, Tokyo, October 6th, 2019.
- (382) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The Academic Night (Kickoff Lecture), Nagoya Innovators Garage, Nadia Park, Sakae, Nagoya, September 26th, 2019.
- (381) "Making new forms of nanocarbons" The 75th CEMS Colloquium, Center for Emergent Matter Science (CEMS), RIKEN, Wako, Saitama, September 18th, 2019.
- (380) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The Premium Lecture, Medical School, Nagoya University, September 5th, 2019.
- (379) "Combatting Striga: Return the pink field back to green by molecules and solve the food crisis in Africa" Africa-Japan Ministerial Dialogue Meeting on STI for SDGs, PACIFICO Yokohama, Yokohama, August 28th, 2019.
- (378) "Toward transformative bio-molecules" The 2nd Workshop on Tidal Power, Prime Central Tower, Nagoya, August 22nd, 2019.
- (377) "Making new forms of nanocarbons" The 18th International Symposium on Novel Aromatic Compounds (ISNA-18), Sapporo Convention Center, Hokkaido, July 22nd, 2019.

- (376) "Making new forms of nanocarbons" The 20th European Symposium in Organic Chemistry (ESOC), Vienna, Austria, July 15th, 2019.
- (375) "Creation of new forms of nanocarbons enabled by C-H activation" The 47th Naito Conference on C-H bond activation and transformation, CHÂTERAISÉ Gateaux Kingdom SAPPORO, Hokkaido, July 3rd, 2019.
- (374) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The 62nd Annual Meeting of the Japanese Society of Nephrology, Nagoya Congress Center, Aichi, June 22nd, 2019.
- (373) "Changing the world with molecules: Creativity is just connecting things" The Special Lecture, Kariya Highschool, Aichi, June 12th, 2019.
- (372) "Changing the world with molecules: Creativity is just connecting things" The Special Lecture at the Global Leader Program, Gifu Highschool, Gifu, June 11th, 2019.
- (371) "Making new forms of carbon: Creativity is just connecting things" The 29th Banyu Fukuoka Symposium, Kyushu University, Fukuoka, May 25th, 2019.
- (370) "Crafting super molecules: Creativity is just connecting things" The Public Lecture at the 70th Anniversary of Gifu University, Gifu University Satellite Campus, Gifu, May 10th, 2019.
- (369) "Crafting super molecules: Creativity is just connecting things" The Chunichi Cultural Center, April 14th, 2019.
- (368) "Unlimited possibility of molecular nanocarbons" The 7th International Symposium on π -System Figuration, Osaka University, Osaka, March 29th, 2019.
- (367) "Toward making transformative molecules: Creativity is just connecting things" The 1st ICRéDD International Symposium, Hokkaido University, Sapporo, March 12th, 2019.
- (366) "Unlimited possibility of molecular nanocarbons" JST President Lecture, Tokyo, January 23, 2019.
- (365) "Synthetic chemistry meets plant biology and chronobiology" The 1st International Symposium on Chemical Communication (ISCC2019), "Frontier Research on Chemical Communications", Hitotsubashi Hall, National Center of Sciences Building, Tokyo, January 10th, 2019.
- (364) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The 7th WPI Science Symposium, Nagoya University, December 27th, 2018.
- (363) "Synthetic chemistry meets plant biology and chronobiology" A*STAR, Singapore, December 18th, 2018.
- (362) "Controlled synthesis of molecular nanocarbons" The 10th Singapore International Chemistry Conference (SICC10), Singapore, December 17th, 2018.
- (361) "Making new forms of nanocarbons" The Netherlands Scholar Award for Supramolecular Chemistry 2018, Rijksuniversiteit Groningen, The Netherlands, December 7th, 2018.
- (360) "Making new forms of nanocarbons" The Netherlands Scholar Award for Supramolecular Chemistry 2018, Radboud University Nijmegen, The Netherlands, December 6th, 2018.
- (359) "Making new forms of nanocarbons" The Netherlands Scholar Award for Supramolecular Chemistry 2018, Eindhoven University of Technology, The Netherlands, December 5th, 2018.
- (358) "Synthetic chemistry meets plant biology and chronobiology" CHAIN Conference 'Chemistry for the future - Chemistry for Life', Hotel NH Eindhoven Conference Center, The Netherlands, December 3rd, 2018.
- (357) "Precise synthesis of graphene nanoribbons by living APEX polymerization" The 27th Polymer Materials Forum, The Society of Polymer Science, Funabori, November 21st, 2018.
- (356) "Molecules that change world" The 5th HIRAI Pitch, Cabinet Office, Government of Japan, Tokyo, November 14th, 2018.
- (355) "Exploring plant and animal biology by synthetic chemistry" Nagasaki University Special Lecture, Nagasaki University, October 31st, 2018.

- (354) "Molecular nanocarbon science" Nagasaki University Special Lecture, Nagasaki University, October 30th, 2018.
- (353) "Crafting super molecules: Unlimited possibility enabled by interdisciplinary approach" The 15th Highschool Chemistry Grand Contest, Nagoya City University, October 28th, 2018.
- (352) "Creating powerful molecules" Kobe University Special Lecture, Kobe University, Hyogo, October 18th, 2018.
- (351) "Making new forms of nanocarbons" 2018 International Institute for Nanotechnology Symposium, Hilton Orrington Hotel, Evanston, IL, USA, September 27th, 2018.
- (350) "Exploring molecular nanocarbon science" The Third International Symposium on the Synthesis and Application of Curved Organic π -Molecules & Materials (CURO- π^3), Oxford University, UK, September 5-7th, 2018.
- (349) "Molecular chronobiology enabled by synthetic chemistry" The 13th Annual Meeting of Japanese Society for Chemical Biology, M&D Tower, Tokyo Medical and Dental University, Tokyo, June 13th, 2018
- (348) "Exploring molecular nanocarbon science" The Fusion Conference: The 2nd From Carbon-Rich Molecules to Carbon-Based Materials Conference, Nassau, Bahamas, June 7-10th, 2018.
- (347) "Toward making molecules for future" NHK Cultural Center, NHK Nagoya Center, May 23rd, 2018.
- (346) "Change the world with molecules" Kansai Tachibanakai, Kyoto University, May 12th, 2018.
- (345) "Exploring molecular nanocarbon science" The Guthikonda Lecture, Department of Chemistry, Stanford University, April 25th, 2018.
- (344) "Exploring molecular nanocarbon science" The Rowland Pettit Centennial Visiting Professorship, Department of Chemistry, The University of Texas at Austin, April 20th, 2018.
- (343) "Recent progress of the Institute of Transformative Bio-Molecules" The Ariyama Symposium, The Noyori Conference Hall, Nagoya University, March 27th, 2018.
- (342) "Making a new form of carbon" The 3rd FoS Club Meeting, The Noyori Conference Hall, Nagoya University, March 24th, 2018.
- (341) "Synthesis, properties and applications of molecular nanocarbons" The CSJ Award for Creative Work (Chemical Society of Japan), The 98th Annual Meeting of the Chemical Society of Japan, Nippon University, Funabashi, March 21st, 2018.
- (340) "Exploring molecular nanocarbon science" The 54th Fullerenes-Nanotubes-Graphenes General Symposium, The University of Tokyo, March 12th, 2018.
- (339) "Food innovation (what are new crops?)" Nobel Prize Dialogue Tokyo 2018, Pacifico Yokohama, Yokohama, March 11th, 2018.
- (338) "Exploring molecular nanocarbon science" JSPS Core-to-Core Joint Symposium, University of Münster, Münster, Germany, February 2nd, 2018.
- (337) "Exploring molecular nanocarbon science" Jan-Erling Bäckvall 70th Anniversary Symposium, The Royal Swedish Academy of Sciences, Stockholm, Sweden, January 24th, 2018.
- (336) "Exploring molecular nanocarbon science" CEMS International Symposium on Supramolecular Chemistry and Functional Materials 2018, Ito International Research Center, The University of Tokyo, Tokyo, January 9-10th, 2018.
- (335) "Recent progress in molecular nanocarbon science" Tokai Conference in Shizuoka 2017, B-nest Shizuoka City Industry-University Exchange Center, Shizuoka, December 9th, 2017.
- (334) "Making game-changing molecules" Nagoya University Alumni Meeting, Nagoya University, December 5th, 2017.
- (333) "Exploring molecular nanocarbon science" ACS on Campus, Nagoya University, November 29th, 2017.

- (332) "Molecular nanocarbon science enabled by catalysis" Annual Academic Committee Meeting, State Key Lab of Organometallic Chemistry, Shanghai Institute of Organic Chemistry, Chinese Academy of Sciences, Shanghai, November 24th, 2017.
- (331) "Molecular nanocarbon science with carbon nanobelts, tubes, ribbons and saddles" The 5th International Symposium on Transformative Bio-Molecules (ISTbM-5), Institute of Transformative Bio-Molecules, Nagoya University, November 20-21st, 2017.
- (330) "Molecular nanocarbon science enabled by catalysis" Synthetic Organic Chemistry Workshop, The Society of Synthetic Organic Chemistry, Nagai Memorial Hall, Shibuya, November 15th, 2017.
- (329) "Changing the world with molecules" Jishukan Highschool, Aichi, October 27th, 2017.
- (328) "Changing the world with molecules" Handa Highschool, Handa, Aichi, October 26th, 2017.
- (327) "Changing the world with molecules" Takamatsu Daiichi Highschool, Takamatsu, October 25th, 2017.
- (326) "Making a new form of carbon: recent progress in molecular nanocarbon science" The 7th Chemistry Festa, The Chemical Society of Japan, Tower Hall Funabashi, October 17th, 2017.
- (325) "Synthesis of game-changing molecules at the interface of synthetic chemistry, nanocarbon science and life science" The Japan Neurosurgical Society Meeting, Nagoya Congress Center, Nagoya, October 13th, 2017.
- (324) "Synthesis of game-changing molecules at the interface of synthetic chemistry, nanocarbon science and life science" Toyota Technological Institute, Aichi, September 5th, 2017.
- (323) "Recent progress in molecular nanocarbon science" The 10th ChemBio Hybrid Lecture, Department of Chemistry & Biotechnology, The University of Tokyo, Takeda Hall, Tokyo, September 30th, 2017.
- (322) "Making the impossible possible by molecules" ITbM Consortium Workshop, Nagoya University, September 29th, 2017.
- (321) "Making structurally uniform nanocarbons and a new form of carbon" The 1st International Symposium on Catalysis for Sustainable Chemical Synthesis, Joint Symposium of FRAIS/Nagoya IAR, Albert-Ludwigs-Universitat Freiburg, Freiburg, Germany, September 25th, 2017.
- (320) "C-H activation meets plant biology and chronobiology" The ICI Distinguished Lecturer 2017, Department of Chemistry, University of Calgary, Canada, September 22nd, 2017.
- (319) "Making structurally uniform nanocarbons and a new form of carbon" The ICI Distinguished Lecturer 2017, Department of Chemistry, University of Calgary, Canada, September 20th, 2017.
- (318) "Making structurally uniform nanocarbons and a new form of carbon" The Angewandte Chemie Symposium at 150th Anniversary of the Gesellschaft Deutscher Chemiker (GDCh), September 11th, 2017.
- (317) "Synthetic chemistry meets plant biology and chronobiology" Universities of Freiburg-Strasbourg-Nagoya Interdisciplinary and International Summer School, Nagoya University, September 1, 2017.
- (316) "Making game-changing molecules" Asashi Kids Newspaper Forum, Nagoya University, August 26th, 2017.
- (315) "Merging synthetic chemistry, plant biology and animal biology" Mini-symposium of Scientific Research on Innovative Areas "Determining Principles in the Birth of New Plant Species", Nagoya University, August 22nd, 2017.
- (314) "Synthesis of game-changing molecules" Yomiuri Techno Forum Gold Medal Lecture, Yomiuri Shimbun Osaka Building, Osaka, August 5th, 2017.
- (313) "Molecular nanocarbon science enabled by rapid synthesis catalysts" Summer School of Coordination Chemistry, Nishiura Onsen, Aichi, August 2nd, 2017.

- (312) "Merging synthetic chemistry, plant biology and animal biology" IoC-IPMB-ITbM Joint Symposium on New Frontiers by Fusing Chemistry and Biology, Ta-shue Chou Memorial Hall, Institute of Chemistry, Academia Sinica, Taiwan, July 13-14th, 2017.
- (311) "Changing the world with molecules" Special Lecture for Nambu Junior Highschool, Nagoya University, July 10th, 2017.
- (310) "Carbon nanorings, belts, ribbons and saddles" The 12th International Symposium on Macrocyclic and Supramolecular Chemistry (ISMSC), Royal Society of Chemistry, Cambridge, UK, July 2-6th, 2017.
- (309) "Creation of molecular nanocarbons by metal catalysis" The 19th IUPAC International Symposium on Organometallic Chemistry Directed Towards Organic Synthesis (OMCOS-19), Jeju Convention Center, Korea, June 25-29th, 2017.
- (308) "Changing the world with molecules" Kanuma Highschool, Kanuma, Tochigi, June 19th, 2017.
- (307) "Synthesis of game-changing molecules at the interface of synthetic chemistry, nanocarbon science and life science" Sumitomo Dainippon Pharma, June 14th, 2017.
- (306) "Synthesis of game-changing molecules at the interface of synthetic chemistry, nanocarbon science and life science" Nippon Soda Co., Odawara, June 12th, 2017.
- (305) "Synthesis of game-changing molecules" Yomiuri Techno Forum Gold Medal Lecture, Japan Press Center, Tokyo, May 20th, 2017.
- (304) "Synthesis of game-changing molecules" Special Lecture, Gifu University, Gifu, May 15th, 2017.
- (303) "Making structurally uniform nanocarbons and a new form of carbon" Institute of Organic Chemistry and Biochemistry, Academy of Sciences of the Czech Republic, Prague, April 26th, 2017.
- (302) "Making structurally uniform nanocarbons and a new form of carbon" Institute of Organic Chemistry, Polish Academy of Sciences, Warsaw, Poland, April 24th, 2017.
- (301) "Exploring the power of molecules by rapid synthesis catalysts" University of California, Davis, April 21st, 2017.
- (300) "Exploring the power of molecules by rapid synthesis catalysts" Bristol-Myers Seminar, University of California, Berkeley, April 18th, 2017.
- (299) "Exploring the power of molecules by interdisciplinary research" Special Lecture for Freshman, Nagoya University, April 11th, 2017.
- (298) "Exploring molecular nanocarbon science by rapid synthesis catalysts" Hiratsuka Symposium, Kanagawa University, Hiratsuka, March 4th, 2017.
- (297) "Making game-changing molecules" Kyowa Kirin, Shizuoka, February 20th, 2017.
- (296) "Making game-changing molecules" Taisho Pharmaceutical, Saitama, February 6th, 2017.
- (295) "CPP and related carbon nanorings" Fuji Film S-Seminar, Center of Synthetic Organic Chemistry, Fuji Film, Kanagawa, January 17-18th, 2017.
- (294) "C-H coupling catalysts" Fuji Film S-Seminar, Center of Synthetic Organic Chemistry, Fuji Film, Kanagawa, January 17-18th, 2017.
- (293) "Making game-changing molecules" Fuji Film S-Seminar, Center of Synthetic Organic Chemistry, Fuji Film, Kanagawa, January 17-18th, 2017.
- (292) "Making game-changing molecules" WPI Open Lecture, Ministry of Education, Culture, Sports, Science, and Technology, Japan, December 17th, 2016.
- (291) "Exploring the power of molecules by rapid synthesis catalysts" Memorial Symposium on 25 Years of Banyu Symposia, The University of Tokyo, December 3rd, 2016.
- (290) "Synthetic chemistry meets plant biology and chronobiology" The 39th Annual Meeting of The Molecular Biology Society of Japan, Pacifico Yokohama, Kanagawa, November 30th – December 2nd, 2016.

- (289) "Rapid synthesis catalysts meet plant biology and chronobiology" Cold Spring Harbor Asia Conference: Latest Advances in Plant Development and Environmental Response, Awaji Yumebutai International Conference Center, Hyogo, November 29th – December 2nd, 2016.
- (288) "Functional molecules by rapid synthesis catalysts" The 1st ITbM-IoC Joint Workshop, Nagoya University, November 15-17th, 2016.
- (287) "Generation of nanocarbon molecules and biofunctional molecules by rapid synthesis catalysts" The JSPS 116 Committee Symposium on Functional Chemistry, Sakata-Hirata Hall, Nagoya University, November 15-17th, 2016.
- (286) "Synthetic chemistry meets plant biology and chronobiology" Japanese Society for Chronobiology, Nagoya University, Nagoya, November 12th, 2016.
- (285) "Making game-changing molecules" Tosoh Tokyo Research Center, Ayase, Kanagawa, November 7th, 2016.
- (284) "Exploring nanocarbon materials and plant biology by C-H activation" The Holger Erdtman Lecture, KTH, Sweden, October 31st, 2016.
- (283) "Exploring molecular nanocarbon science by rapid synthesis catalysts" Molecular Architectonics Meeting, Chikushi Hall, Chikushi Campus, Kyushu University, October 20-21st, 2016.
- (282) "The power of molecules" Organic Materials Research Center, Toyota Motor Corporation, Toyoda, September 30th, 2016.
- (281) "Exploring molecular nanocarbon science and new biofunctional molecules by rapid synthesis catalysts" Department of Chemistry, Graduate School of Science, Hokkaido University, September 27th, 2016.
- (280) "The power of molecules" The Nagase Prize, Toshin Frontier Sallon Science Seminar, Imperial Hotel Tokyo, Tokyo, September 23rd, 2016.
- (279) "APEX: A new way to rapidly synthesize nanographenes and a new form of carbon" The 2nd International Symposium on the Synthesis and Application of Curved Organic π -Molecules and Materials (CURO- π), University of Oregon, Eugene, Oregon, USA, September 12-14th, 2016.
- (278) "Exploring nanocarbon materials and plant biology by C-H activation" University of Nevada Seminar, Department of Chemistry, University of Nevada, Reno, USA, September 9th, 2016.
- (277) "Exploring nanocarbon materials and plant biology by C-H activation" Treat B. Johnson Lecture, Department of Chemistry, Yale University, USA, September 7th, 2016.
- (276) "Exploring molecular nanocarbon science enabled by rapid synthesis catalysts" Sumitomo Chemical, Advanced Materials Development Laboratory, Tsukuba, August 24th, 2016.
- (275) "Generation of new biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" Chugai Pharmaceutical Co. Ltd., Kamakura Research Center, Kanagawa, August 2nd, 2016.
- (274) "Generation of nanocarbon molecules and biofunctional molecules by rapid synthesis catalysts" Department of Chemistry, Tohoku University, Sendai, August 1st, 2016
- (273) "Creation of biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" Summer Symposium of the Japan Society for Process Chemistry, Nagoya Congress Center, Nagoya, July 28-29th, 2016.
- (272) "Making game-changing molecules" Science Colloquium, Graduate School of Science, Nagoya University, Nagoya, July 22nd, 2016.
- (271) "Creation of molecular nanocarbons by C-H functionalization" The 3rd EOC Symposium, Nankai University, Tianjin, China, July 15-17th, 2016.
- (270) "Creating game-changing molecules through merging synthetic chemistry, plant biology and chronobiology" Medicinal Chemistry Seminar, Yatsugatake Royal Hotel, Yamanashi, July 13-15th, 2016.

- (269) "Generation of new biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" Central Pharmaceutical Research Institute, Japan Tobacco Inc., Takatsuki, Osaka, July 4th, 2016.
- (268) "Plant and animal biology accelerated by C-H activation catalysts" Medicinal Chemistry Meeting, XIV Tateshina, Nagano, June 30th – July 1st, 2016.
- (267) "APEX: A new way to rapidly synthesize nanographenes and a new form of carbon" 2016 Japan-USA Seminar on Polymer Synthesis: Polymer Synthesis for a Sustainable Future, Hilton Niseko Village, Niseko, Hokkaido, June 24-28th, 2016.
- (266) "Accelerated discovery of functional molecules by C-H functionalization" The 1st CCHF-ITbM-IBS Joint Workshop on C-H Functionalization, Nagoya University, June 16-17th, 2016.
- (265) "The power of synthetic chemistry: Providing 'solutions' by molecules" Opening Ceremony of Integrated Research Consortium on Chemical Sciences, Nagoya University, June 22nd, 2016.
- (264) "C-H activation exploring nanocarbon materials and plant biology" College of Chemistry & Materials Science, Northwest University, Xi'an, China, June 15th, 2016.
- (263) "C-H activation exploring nanocarbon materials and plant biology" Frontier Institute of Science and Technology, Xi'an Jiaotong University, Xi'an, China, June 14th, 2016.
- (262) "C-H activation exploring nanocarbon materials and plant biology" School of Chemistry & Chemical Engineering, Shaanxi Normal University, Xi'an, China, June 13th, 2016.
- (261) "Exploring the power of molecules by interdisciplinary research" ITbM Lecture to High School Students, Nagoya University, Nagoya, May 28th, 2016.
- (260) "The power of synthetic chemistry" JCIA Symposium 2016, Japan Chemical Industry Association, Palace Hotel Tokyo, Tokyo, May 26th, 2016.
- (259) "Toward transformative molecules" Yomiuri Science-Technology Forum, Yomiuri Shimbun, Tokyo, May 25th, 2016.
- (258) "Exploring molecular nanocarbon science by rapid synthesis catalysts" Tosoh Corporation, Nanyo Center, Yamaguchi, May 20th, 2016.
- (257) "Creation of new biofunctional molecules by rapid synthesis catalysts" The 25th French-Japanese Symposium on Medicinal and Fine Chemistry, Keio Plaza Hotel Tama, Tama, Tokyo, May 15-18th, 2016.
- (256) "Be unique" G7 Science and Technology Symposium, International Congress Center, Tsukuba, May 15th, 2016.
- (255) "C-H activation exploring nanocarbon materials and plant biology" The 7th SFB Symposium in Münster, University of Münster, Germany, April 22nd, 2016.
- (254) "The power of C-H activation in plant biology" Syngenta Research Center, Stein, Switzerland, April 21st, 2016.
- (253) "Generation of new biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" Taoka Chemicals, Osaka, April 15th, 2016.
- (252) "Generation of new biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" Organic and Medicinal Chemistry Seminar, Tsukuba University, Tsukuba, April 13th, 2016.
- (251) "Rapid synthesis catalysts meet plant biology and chronobiology" IIS Seminar, International Institute for Integrative Sleep Science, Tsukuba University, Tsukuba, April 13th, 2016.
- (250) "The power of molecules" Institute for Advanced Research, Nagoya University, April 12th, 2016.
- (249) "Creation of biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" ICIQ Lecture, Institute of Chemical Research of Catalonia, Tarragona, Spain, April 7th, 2016.
- (248) "Generation of new bio-functional molecules and molecular nanocarbons by C-H activation" The 16th Bristol Synthesis Meeting, University of Bristol, Bristol, UK, April 5th, 2016.

- (247) "Single-molecule carbon nanotubes, nanoribbons, and a new form of carbon" Japan-US Joint Symposium "Nanocarbon Minisymposium in Honor of ACS President Donna Nelson" The 96th Chemical Society of Japan Annual Meeting, Doshisha University, Kyoto, March 26th, 2016.
- (246) "Creation of biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" The Ta-shue Chou Lectureship Award Symposium, Institute of Chemistry, Academia Sinica, Taiwan, March 18th, 2016.
- (245) "Creation of biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" National Chiao-Tung University, Hsinchu, Taiwan, March 16th, 2016.
- (244) "Synthesis of molecular nanocarbons powered by catalysis" Department of Chemistry, National Cheng Kung University, Tainan, Taiwan, March 15th, 2016.
- (243) "Single-molecule carbon nanotubes, nanoribbons, and a new form of carbon" MANA International Symposium 2016, Tsukuba International Congress Center, March 9th, 2016.
- (242) "New biofunctional molecules by rapid synthesis catalysts" The Symposium on Chemical Biology of Natural Products, Kyoto University, Kyoto, February 23rd, 2016.
- (241) "Single-molecule carbon nanotube, nanoribbon, and a new form of carbon" AIMR International Symposium 2016, Advanced Institute for Materials Science, Tohoku University, Sendai, February 21-24th, 2016.
- (240) "Single-molecule carbon nanotubes, nanoribbons, and a new form of carbon" The 5th International Conference on MEXT Project of Integrated Research on Chemical Synthesis, Nagoya University, January 30th, 2016.
- (239) "Creation of new carbon materials by C-H functionalization" The 3rd CCHF Virtual Symposium on C-H Functionalization, NSF Center for Selective C-H Functionalization, January 19th, 2016.
- (238) "Exploring biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" IMS Colloquium, Institute for Molecular Science, Okazaki, Aichi, January 15th, 2016.
- (237) "Exploring biofunctional molecules and nanocarbon molecules by rapid synthesis catalysts" Frontier Seminar, Hotel New Otani Tokyo, January 7th, 2016.
- (236) "Exciting progress of ITbM" The 2nd CSRS-ITbM Joint Workshop, RIKEN, Wako, January 7th, 2016.
- (235) "Materials- and biology-oriented C-H activation" Pacifichem Symposium on C-H Functionalization, Hawaii, USA, December 15-20th, 2015.
- (234) "Synthesis of 1D, 2D, 3D molecular nanocarbons" Pacifichem Symposium on Chemistry of Nanocarbons, Hawaii, USA, December 15-20th, 2015.
- (233) "Showing the power of molecules by interdisciplinary research" ITbM Lecture to High School Students, Nagoya University, Nagoya, December 12th, 2015.
- (232) "Maximizing the power of molecules by interdisciplinary research" SSH Special Lecture, Handa High School, Aichi, Japan, December 5th, 2015.
- (231) "Single-molecule carbon nanotubes, nanoribbons, and a new form of carbon" R. C. Fuson Visiting Professor Lecture, University of Illinois at Urbana-Champaign, Illinois, USA, November 16th, 2015.
- (230) "Synthesis and discovery of bio-functional molecules by C-H activation" R. C. Fuson Visiting Professor Lecture, University of Illinois at Urbana-Champaign, Illinois, USA, November 16th, 2015.
- (229) "Catalyst-enabling plant/animal biology and nanocarbon science" Special Lecture of Ajinomoto Institute for Innovation, Kawasaki, Kanagawa, October 22nd, 2015.
- (228) "Rapid discovery of functional molecules by C-H activation" The 5th Chemistry Festa, Tower Hall Funabashi, Tokyo, October 13th, 2015
- (227) "Synthesis of 1D, 2D, 3D molecular nanocarbons" The 3rd Erlangen Symposium on Synthetic Carbon Allotropes, Universität Erlangen-Nürnberg, Erlangen, Germany, October 4-7th, 2015.

- (226) "Making transformative bio-molecules by chemistry-biology Mix-Lab" Opening Lecture at Aichi Science Festival, Nagoya University, September 19th, 2015.
- (225) "Synthesis and discovery of bio-functional molecules by C-H activation" Kumiai Chemical Special Lecture, Kakegawa, Shizuoka, September 11th, 2015.
- (224) "Power of molecules: Merging synthetic chemistry and plant/animal biology" Kumiai Chemical Special Lecture, Kakegawa, Shizuoka, September 11th, 2015.
- (223) "Mix is the key! Maximizing the power of molecules by interdisciplinary research" Seminar of Interactive Materials Science Cadet Program, Osaka University, Shiga, August 30th, 2015.
- (222) "Power of molecules: Merging synthetic chemistry, biology, and materials science" The Chemistry Grand Prix Special Lecture, Nagoya University, August 22nd, 2015.
- (221) "Catalyst-enabling nanocarbon science & plant/animal biology" The Arthur C. Cope Scholar Award, Boston Convention & Exhibition Center, Boston, USA, August 18th, 2015.
- (220) "Single-molecule carbon nanotubes, nanoribbons, and a new form of carbon" CREATE Symposium on Chirality, Queen's University, Kingston, Canada, August 13-14th, 2015.
- (219) "Materials- and biology-oriented C-H activation" The 62nd Gordon Research Conference on Organic Reactions and Processes, Bates College, Maine, USA, July 19-24th, 2015.
- (218) "Synthesis of 1D, 2D, 3D molecular nanocarbons" The 16th International Symposium on Novel Aromatic Compounds (ISNA-16), Madrid, Spain, July 5- 9th, 2015.
- (217) "Materials- and biology-oriented C-H activation" National Organic Chemistry Symposium (NOS), University of Maryland, June 28th – July 2nd, 2015.
- (216) "Mix is the key! Maximizing the power of molecules by interdisciplinary research" Synthetic Organic Chemistry Seminar, Mie, Japan, June 19-20th, 2015.
- (215) "Power of molecules: Merging synthetic chemistry, biology, and materials science" Super Science Special Lecture, Okazaki High School, Okazaki, Aichi, June 15th, 2015.
- (214) "Catalysis for carbon materials and plant/animal biology" Gifu Pharmaceutical University, Gifu, Japan, June 12th, 2015.
- (213) "Catalysis for carbon materials and plant/animal biology" Organoelement Chemistry Seminar, Kyoto University, Uji, Japan, June 8th, 2015.
- (212) "Materials- and biology-oriented C-H activation" RSC Organic Chemistry Symposium, Kyoto, Japan, June 5th, 2015.
- (211) "Showing the power of molecules by interdisciplinary research" ITbM Lecture to High School Students, Nagoya University, Nagoya, May 30th, 2015.
- (210) "C-H activation catalysis for plant/animal biology and nanocarbon science" Ono Pharmaceutical, Minase, Osaka, May 15th, 2015.
- (209) "Catalysis for carbon materials and plant/animal biology" Okayama University, Okayama, Japan, May 13th, 2015.
- (208) "Catalysis for carbon materials and plant/animal biology" Chiba University, Chiba, Japan, May 8th, 2015.
- (207) "Nanocarbon science and plant/animal biology Enabled by Molecule-Connecting Catalysts" Seminar of Kyoto University Kokakai, Shinagawa, Japan, April 24th, 2015.
- (206) "C-H activation catalysis for carbon materials and plant/animal biology" The Swiss Chemical Society Lectureship, Université de Geneve, Switzerland, April 17th, 2015.
- (205) "C-H activation catalysis for carbon materials and plant/animal biology" The Swiss Chemical Society Lectureship, Ecole Polytechnique Fédérale de Lausanne, Switzerland, April 16th, 2015.
- (204) "C-H activation catalysis for carbon materials and plant/animal biology" The Swiss Chemical Society Lectureship, Universität Bern, Switzerland, April 15th, 2015.

- (203) "C-H activation catalysis for carbon materials and plant/animal biology" The Swiss Chemical Society Lectureship, Universität Basel, Switzerland, April 14th, 2015.
- (202) "C-H activation catalysis for carbon materials and plant/animal biology" The Swiss Chemical Society Lectureship, Université de Neuchâtel, Switzerland, April 13th, 2015.
- (201) "Materials- and biology-oriented C-H activation" ETH Zurich, Switzerland, April 10th, 2015.
- (200) "Catalysis for carbon materials and plant/animal biology" Princeton University, April 7th, 2015.
- (199) "Catalysis for carbon materials and plant/animal biology" Harvard University, April 6th, 2015.
- (198) "Catalysis for carbon materials and plant/animal biology" The MBLA 10th Anniversary Symposium, Funabashi, Chiba, March 29th, 2015.
- (197) "C-H activation for plant/animal biology and carbon materials" Wuhan University, Wuhan, China, March 18th, 2015.
- (196) "C-H activation catalysts accelerating plant/animal biology and materials science" Takeda Pharmaceutical, Osaka, Japan, March 11th, 2015.
- (195) "Catalysis for carbon materials and plant/animal biology" Department of Chemistry, Seoul National University, Korea, February 3rd, 2015.
- (194) "Catalysis for carbon materials and plant/animal biology" 2015 IBS-KAIST&ITbM Joint Symposium, KAIST, Korea, February 2nd, 2015.
- (193) "A new journey with ITbM" The 1st CSRS-ITbM Joint Workshop, Nagoya University, Nagoya, January 7th, 2015.
- (192) "C-H activation catalysts for plant/animal biology and nanocarbon science" The 5th Symposium of Integrated Research on Chemical Synthesis, Nagoya University, Nagoya, December 19th, 2014.
- (191) "Catalysis for carbon materials and plant/animal biology" Department of Chemistry, Graduate School of Science, The University of Tokyo, Japan, December 11-12th, 2014.
- (190) "Catalysis for materials science and advanced biology" University of Shizuoka, Shizuoka, December 5th, 2014.
- (189) "A new journey with ITbM" University of Shizuoka, Shizuoka, December 5th, 2014.
- (188) "Catalysis for carbon materials and plant/animal biology" The 18th IRTG Joint Symposium and Core-to-Core Seminar, Munster, November 27-29th, 2014.
- (187) "The power of molecules and making molecules" SSH Lecture, Suwa Seiryō High School, Nagano, November 22nd, 2014.
- (186) "Exploring nanocarbon materials science and advanced biology by C-H functionalization" The Murai Symposium, Nara, October 30-31st, 2014.
- (185) "Catalyst-enabling molecular nanocarbon chemistry" International Symposium on the Synthesis and Application of Curved Organic π -Molecules and Materials, Uji, Kyoto, October 19-21st, 2014.
- (184) "Future materials science" The 11th Science and Technology in Society Forum (STS forum), Kyoto, October 5-7th, 2014.
- (183) "Toward molecular nanocarbon science" The Fusion Conference "From Carbon-Rich Molecules to Carbon-Based Materials, Mazagan Beach Resort, Morocco, September 22-25th, 2014.
- (182) "Catalysis for materials science and advanced biology" The Otsuka Symposium, September 16-17th, 2014.
- (181) "Toward molecular nanocarbon science" The 4th Young Researcher Meeting of Fullerene-Nanotube-Graphene Society, Nagoya, September 2nd, 2014.
- (180) "C-H coupling for synthetic bio-molecules and nanocarbons" Astellas Pharma Inc., Ibaraki, Japan, June 17th, 2014.
- (179) "C-H coupling for advanced biology and materials" The 3rd Frontier Chemistry Center International Symposium, Hokkaido University, Sapporo, Japan, June 13-14th, 2014.

- (178) "C-H coupling: An emerging tool for discovering synthetic bio-molecules" The International Symposium on Chemical Biology of Natural Products: Target ID and Regulation of Bioactivity, Nagoya, Japan, May 28-29th, 2014.
- (177) "C-H coupling catalysts: Enabling tools for advanced biology and materials" The IGER International Symposium on Chemical Science in Asia: Facilitating Singapore-Japan Scientific Interchange, Nagoya, Japan, May 26-28th, 2014.
- (176) "Catalysis and C-H activation for advanced biology and materials science" The 49th EUCHEM Conference on Stereochemistry "Bürgenstock Conference", Seehotel Waldstätterhof Brunnen, Brunnen, Switzerland, May 4-9th, 2014.
- (175) "C-H coupling for synthetic bio-molecules and nanocarbons" Wuhan University Special Lecture, Wuhan University, Wuhan, China, April 21st, 2014.
- (174) "Catalyst-enabling chemistry toward transformative molecules" Nankai University Lectureship on Organic Chemistry, Nankai University, Tianjin, China, April 18th, 2014.
- (173) "Toward molecular nanocarbon science" The 94th Annual Meeting of the Chemistry Society of Japan, Nagoya, Japan, March 30th, 2014.
- (172) "Catalyst-enabling chemistry toward transformative molecules" Aldrich Lecture, Emory University, Atlanta, USA, March 22nd, 2014.
- (171) "C-H coupling for synthetic bio-molecules and nanocarbons" Advances in C-H Functionalization, The 247th ACS National Meeting, Dallas, Texas, USA, March 16-20th, 2014.
- (170) "ITbM: A merger of synthetic chemistry, plant/animal biology, and theoretical chemistry" The Ariyama Symposium, Nagoya University, Japan, March 11th, 2014
- (169) "A journey toward transformative molecules: Creating value by synthetic chemistry" SSH Special Lecture, Handa Space Science Museum, Aichi, Japan, February 8th, 2014.
- (168) "Synthetic chemistry: Connect molecules, create values" The Cutting-Edge Academic Forum, Chubu University, Nagoya, Japan, January 29th, 2014.
- (167) "Toward molecular nanocarbon science" The Japanese Research Association for Organic Electronics Materials, Shinjuku, Japan, January 23rd, 2014
- (166) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, Boston College, USA, January 15th, 2014.
- (165) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, Novartis Cambridge, USA, January 14th, 2014.
- (164) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, Harvard University, USA, January 13th, 2014.
- (163) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, Novartis Emeryville, USA, January 10th, 2014.
- (162) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, GNF, USA, January 8th, 2014.
- (161) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, The Scripps Research Institute, USA, January 7th, 2014.
- (160) "Toward innovative material ITAMIN" The 3rd WPI Joint Symposium, Sendai, Japan, December 14th, 2013.
- (159) "Catalyst-enabling chemistry toward transformative molecules" International Symposium on Catalysis and Fine Chemicals 2013, Keynote Lecture, Renmin University, Beijing, China, December 2nd, 2013.
- (158) "Catalyst-enabling chemistry toward transformative molecules" Cambridge Catalysis Symposium, University of Cambridge, UK, November 22nd, 2013.

- (157) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, Horsham, UK, November 21st, 2013.
- (156) "Catalyst-enabling chemistry toward transformative molecules" Novartis Chemistry Lecture, Basel, Switzerland, November 20th, 2013.
- (155) "A journey toward transformative molecules: Creating value by synthetic chemistry" Academic Lecture, Nagoya University Homecoming Day, Japan, October 19th, 2013.
- (154) "Controlled bottom-up synthesis of molecular nanocarbons" UK-Japan Workshop on Organic-Inorganic Framework Materials, Kyoto University iCeMS, Kyoto, Japan, October 10-11th, 2013.
- (153) "A journey toward transformative molecules: New challenges in ITbM" Special Lecture, RIKEN Center for Sustainable Resource Science Symposium, Iino Conference Center, Tokyo, Japan, October 10th, 2013.
- (152) "Catalyst-enabling chemistry toward transformative molecules" JCO-2013 Symposium (Plenary Lecture), French Chemical Society, Paris, France, September 24-26th, 2013.
- (151) "Catalyst-enabling chemistry toward transformative molecules" Mukaiyama Award, The 30th Synthetic Organic Chemistry Seminar, Kurashiki, Okayama, Japan, September 18-19th, 2013.
- (150) "Catalysis and synthesis for transformative molecules" ACP Award Lecture, Shanghai Institute of Organic Chemistry, China, September 2nd, 2013.
- (149) "Catalysis and synthesis for transformative molecules" ACP Award Lecture, Wuhan University, China, August 30th, 2013.
- (148) "Toward transformative arene-assembled molecules" Asian Rising Star Award Lecture, The 15th Asian Chemical Congress, Resorts World Sentosa Convention Centre, Singapore, August 20th, 2013.
- (147) "A journey toward transformative molecules: Breakthrough in arene-assembling chemistry" Special Lecture, Department of Chemistry, Faculty of Science, Kanagawa University, Japan, July 26th, 2013.
- (146) "Organic synthesis: Connect molecules, create values" Aichi Science and Mathematics Education Promotion Project "Seminar for the pursuit of knowledge", Aichi Prefecture Education Center, Japan, July 25th, 2013.
- (145) "A journey toward transformative molecules: Breakthrough in arene-assembling chemistry" I²CNER Seminar, WPI-I²CNER, Kyushu University, Japan, July 19th, 2013.
- (144) "A journey toward transformative molecules: Breakthrough in arene-assembling chemistry" Invited Lecture, The 46th Meeting for Young Organometallic Chemists Summer School, Miyagi Zao Royal Hotel, Japan, July 8-10th, 2013.
- (143) "Organic synthesis: Connect molecules, create values", Ichinomiya High School, Aichi, Japan, July 4th, 2013.
- (142) "Toward transformative arene-assembled molecules" The 14th Tetrahedron Symposium, Vienna, Austria, June 25-28th, 2013.
- (141) "A journey toward transformative molecules: Breakthrough in arene-assembling chemistry" Japan Association for Chemical Innovation, The Advanced Chemistry/Materials Technology Subcommittee, New Materials Symposium, Japan, June 17th, 2013.
- (140) "Nagoya University Institute of Transformative Bio-Molecules" RaQualia Pharma Seminar, RaQualia Pharma, Japan, June 12th, 2013.
- (139) "A journey toward transformative molecules: Breakthrough in arene-assembling chemistry" RaQualia Pharma Seminar, RaQualia Pharma, Japan, June 12th, 2013.
- (138) "Toward transformative molecules by C-H coupling" Canadian Chemistry Conference & Exhibition, Quebec, Canada, May 26-29th, 2013.

- (137) "Toward transformative arene-assembled molecules" Stockholm University Special Lecture, Stockholm, Sweden, May 22nd, 2013.
- (136) "Toward transformative arene-assembled molecules" International Symposium "Templates in Chemistry – Present and Future", Bonn, Germany, May 16-17th, 2013.
- (135) "Toward transformative molecules: Catalyst-enabling synthetic chemistry" Munster University Special Lecture, Munster, Germany, May 14th, 2013.
- (134) "Toward transformative molecules: Catalyst-enabling synthetic chemistry" The 1st International Symposium on Transformative Bio-Molecules, Nagoya, Japan, April 18-19th, 2013.
- (133) "Development and evolution of Nagoya University, Graduate School of Science, Department of Chemistry" The 7th Alumni Meeting of Department of Chemistry, Graduate School of Science, Nagoya University, Japan, April 6th, 2013.
- (132) "Connect molecules, create value: Toward transformative molecules" Special Program Lecture, The 93rd Annual Meeting of the Chemistry Society of Japan Special Program "A New Paradigm for "MONODUKURI": Initiated with Innovative Synthetic Transformations", Ritsumeikan University, Kusatsu, Shiga, Japan, March 22nd, 2013.
- (131) "A journey toward transformative molecules" Teijin 21st Century Forum, Fuji Institute of Education and Training, Shizuoka, Japan, January 26-27th, 2013.
- (130) "Toward controlled synthesis of carbon nanotubes and nanographenes" International Symposium on Frontiers of Macrocyclic and Supramolecular Chemistry, Tsinghua University, Beijing, China, December 20-22nd, 2012.
- (129) "Synthesis of cycloparaphenylenes directed towards controlled synthesis of carbon nanotubes" Tokuyama Foundation Results Presentation, Japan, December 13-14th, 2012.
- (128) "Toward controlled synthesis of carbon nanotubes and nanographenes" 2012 Japan-USA Seminar on Polymer Synthesis: Advances at the Interface of Sustainability and Polymer Synthesis, Santa Barbara, California, USA, December 1-5th, 2012.
- (127) "Organic synthesis: Connect molecules, create values" 2012 Synthetic Organic Chemistry Autumn Seminar of The Society of Synthetic Organic Chemistry, Japan, The Pharmaceutical Society of Japan Nagai Memorial Hall, Shibuya, Tokyo, Japan, November 20-21st, 2012.
- (126) "Chemistry of Nagoya University" Nagoya University Homecoming Day, Japan, October 20, 2012.
- (125) "Toward transformative molecules by C-H coupling" The 1st Symposium of C-H Activation, Peking University, Beijing, China, October 5-8th, 2012.
- (124) "Connect molecules and create values through coupling: New reactions, catalysts, bioactive compounds, and nanocarbons" Advanced Catalytic Transformation Symposium, Tokyo Institute of Technology, Ookayama, Tokyo, Japan, September 21st, 2012.
- (123) "Toward transformative arene-assembling chemistry" The 70th Anniversary Symposium of the Society of Synthetic Organic Chemistry, Japan, Shizuoka Convention & Art Center "GRANSHIP", Shimizu, Shizuoka, Japan, September 5-7th, 2012.
- (122) "Chemistry of Nagoya University" Nagoya University Open Campus, Japan, August 10th, 2012.
- (121) "Arene assembly through C-H coupling: New catalysts and applications" The 7th Asian European Symposium on Metal-Mediated Efficient Organic Synthesis, ICIQ, Tarragona, Spain, July 22-25th, 2012.
- (120) "Organic synthesis: Connect molecules, create values" Nagoya University's Lecture at Kawaijuku Educational Institution, Kawaijuku Chikusa School, Japan, July 15th, 2012.
- (119) "Organic synthesis: Connect molecules, create values" Koei Chemical Company Special Seminar, Koei Chemical Company Limited, Sodegaura, Chiba, Japan, June 20th, 2012.
- (118) "Challenges in arene-assembling chemistry" The 7th International Conference on Advancing the Chemical Sciences (ISACS 7), University of Edinburgh, UK, June 12-15th, 2012.

- (117) "Chemistry of Nagoya University" Nagoya University Graduate School Orientation Meeting, Nagoya University, Japan, June 9th, 2012.
- (116) "Organic synthesis: Connect molecules, create values" The 23rd Banyu Sendai Symposium, Sendai International Center, Sendai, Japan, June 2nd, 2012.
- (115) "Innovative arene-assembled materials through green chemical processes", German Innovation Award Presentation, Hotel New Otani, Tokyo, Japan, May 18th, 2012.
- (114) "Organic synthesis: Connect molecules, create values" Ministry of Finance Special Presentation, Nagoya University, Japan, May 15th, 2012.
- (113) "Recent advances in C-H functionalization" Wuhan University Special Lecture, Wuhan University, Wuhan, China, April 23rd, 2012.
- (112) "Organic synthesis: Connect molecules, create values" Shionogi Special Seminar, Shionogi & Co., Ltd., Osaka, Japan, March 16th, 2012.
- (111) "Challenges in arene-assembling chemistry" Ehime University, Matsuyama, Ehime, Japan, March 14th, 2012.
- (110) "Toward controlled synthesis of carbon nanotubes" Grant-in-Aid for Scientific Research on Innovative Areas, "Emergence of Highly Elaborated π -Space and Its Function" Open Symposium, Matsuyama, Japan, March 13-14th, 2012.
- (109) "Challenges in arene-assembling chemistry" Department of Applied Chemistry, School of Engineering, The University of Tokyo Symposium, Hongo, Tokyo, Japan, March 3rd, 2012.
- (108) "Challenges in arene-assembling chemistry" Harvard University, USA, February 3rd, 2012.
- (107) "Challenges in arene-assembling chemistry" Novartis-MIT Lecture in Organic Chemistry, Massachusetts Institute of Technology, USA, February 2nd, 2012.
- (106) "Challenges in arene-assembling chemistry" Boston College, USA, February 1st, 2012.
- (105) "Challenges in arene-assembling chemistry" Osaka University, Japan, January 26-27th, 2012.
- (104) "Chemistry of Nagoya University" Department of Chemistry Orientation Meeting, Nagoya University, Japan, December 21st, 2012.
- (103) "Catalytic C-H bond functionalization: Emerging tools for pharmaceuticals, natural products, and organic materials" The 6th International Conference on Cutting-Edge Organic Chemistry in Asia (ICCEOCA-6), The Chinese University of Hong Kong, December 11-15th, 2011.
- (102) "Toward controlled synthesis of carbon nanotubes and nanographenes" Japan Society for the Promotion of Science University-Industry Research Cooperation Committee (The 181st Committee on Multifunctional Molecular Electronics) Research Meeting, Museum & Centennial Hall, Tokyo Institute of Technology, Japan, December 7-8th, 2011.
- (101) "Direct arylation of polycyclic aromatic hydrocarbons" The 11th Tateshina Conference on Organic Chemistry, Japan, November 11-13th, 2011.
- (100) "New aspects in arene-assembling chemistry: New reactions, catalysts, pharmaceuticals, natural products, and nanocarbons" The 7th International BASF Boron Conference, Roppongi Academy Hills, Tokyo, Japan, November 9-10th, 2011.
- (99) "Organic synthesis: Connect molecules, create values; Architect on the Nano-scale" The Chemistry Society of Japan Tokai Branch "Invitation to Chemistry "super organic materials", Nagoya University Noyori Conference Hall, Japan, November 5th, 2011.
- (98) "Organic synthesis: Connect molecules, create values" Japan-Singapore Chemicals R&D Conference 2011 "Innovation for Sustainable Growth", A*Star, Biopolis, Singapore, October 20-21st, 2011.
- (97) "Challenges in arene-assembling chemistry" Toray Special Seminar, Toray Pharmaceutical Research Laboratory, Fujisawa, Japan, October 11th, 2011.

- (96) "Challenges in arene-assembling chemistry" ETH Seminar of Organic Chemistry, ETH Zurich, Switzerland, September 26th, 2011.
- (95) "Toward controlled synthesis of carbon nanotubes" Nozoe Memorial Award Lecture, The 22nd Symposium on Physical Organic Chemistry, International Congress Center, Tsukuba, Japan, September 22nd, 2011.
- (94) "Synthesis and properties of multisubstituted olefins and fullerenes" Wuhan University Special Lecture, Wuhan University, China, September 8th, 2011.
- (93) "Challenges in arene-assembling chemistry" Wuhan University Special Lecture, Wuhan University, China, September 5th, 2011.
- (92) "Toward controlled synthesis of carbon nanotubes and graphenes: New strategy and catalysts for arene assembly" The 1st Symposium on "New Frontiers in Organic Chemistry: Towards Cleaner, Greener Chemical Processes" Beijing Chateau Laffitte Hotel, Beijing, China, September 1-4th, 2011.
- (91) "Chemistry of Nagoya University" Nagoya University Open Campus, Japan, August 10th, 2011.
- (90) "Toward controlled synthesis of carbon nanotubes and graphenes" The 14th International Symposium on Novel Aromatic Compounds (ISNA-14), University of Oregon, Eugene, Oregon, USA, July 24-29th, 2011.
- (89) "Chemistry of Nagoya University" Nagoya University Graduate School Orientation Meeting, Nagoya University, Japan, June 18th, 2011.
- (88) "Toward controlled synthesis of nanocarbons" The 11th IRTG Munster-Nagoya Joint Symposium, University of Munster, Germany, May 9-10th, 2011.
- (87) "Challenges in arene-assembling chemistry" The 5th Mitsui Chemicals International Symposium on Catalysis Science (MICS2011), Kazusa Academia Hall, Kisarazu, Chiba, Japan, March 9-10th, 2011.
- (86) "Connect molecules, create values by cross-coupling: Architect on the nano-scale, Nobel Prize in Chemistry and the future" The 11th Science Cafe in Nagoya by the Science Council of Japan, Daitec Sakae, Nagoya, Japan, February 26th, 2011.
- (85) "Challenges in arene-assembling chemistry" The 1st International Conference on MEXT Project of Integrated Research on Chemical Synthesis "Advanced Chemical Methodology for Creating Materials", Catalysis Research Center, Hokkaido University, Japan, January 24-25th, 2011.
- (84) "C-H bond arylation of arenes through Rh, Ir, Cu, Pd, and Ni catalysis" The International Chemical Congress of Pacific Basin Societies (Pacifichem 2010), #1964, Honolulu, USA, December 19th, 2010.
- (83) "Molecular catalysis for nanocarbon chemistry" The International Chemical Congress of Pacific Basin Societies (Pacifichem 2010), #16, Honolulu, USA, December 15th, 2010.
- (82) "3D organic architectural chemistry" JST-PRESTO Structure Control and Function Final Symposium, Tokyo Garden Palace, Ochanomizu, Tokyo, Japan, December 9th, 2010.
- (81) "Cycloparaphenylenes: Synthesis, structures, and properties" The 10th IRTG Münster-Nagoya Joint Seminar, University of Münster, Germany, November 30th, 2010.
- (80) "Cycloparaphenylenes: Synthesis, structures, and properties" The 10th Tateshina Conference on Organic Chemistry, Tateshina Forum, Nagano, Japan, November 12-14th, 2010.
- (79) "Cycloparaphenylenes: Synthesis, structures, and properties" Hangzhou Symposium on Supramolecular Systems and Biomaterials, Zhejiang University, Hangzhou, China, October 31st, 2010.
- (78) "Challenges in arene-assembling chemistry" The 20th Symposium on Optically Active Compounds, Tokyo, Japan, October 29th, 2010.

- (77) "Cycloparaphenylenes: Synthesis, structures, and properties" International Symposium on Polyaromatics, National Taiwan University, Taiwan, October 9th, 2010.
- (76) "Challenges in arene-assembling chemistry" Sumitomo Chemicals Special Lecture, Sumitomo Chemical Company IT-Related Chemicals Research Laboratory, Osaka, Japan, September 30th, 2010.
- (75) "Challenges in arene-assembling chemistry" JAI Seminar in Aichi, Abo Hall, Nagoya, Japan, September 28th, 2010.
- (74) "Cycloparaphenylenes: Synthesis, structures, and properties" China-Japan Symposium on Catalytic Organic Synthesis, Nankai University, Tianjin, China, September 25th, 2010.
- (73) "Have we gone the right path in the last 10 years" Noyori Forum 10th Anniversary Lecture, Hotel Pacific Tokyo, Japan, September 4th, 2010.
- (72) "Cycloparaphenylenes: Synthesis, structures, and properties" New Directions for the Electron State Theory Symposium, Okazaki Conference Center, Aichi, Japan, August 10th, 2010.
- (71) "Challenges in arene-assembling chemistry" The 42nd Meeting for Young Structural Organic Chemists, Hotel Honnoji, Kyoto, Japan, August 6th, 2010.
- (70) "Chemical synthesis of aromatic carbon nanorings" Japan-China Joint Symposium on Functional Supramolecular Architectures, Jilin University, Changchun, China, July 25th, 2010.
- (69) "Challenges in arene-assembling chemistry" The 12th Belgian Organic Synthesis Symposium (BOSS-12), University of Namur, Namur, Belgium, July 14th, 2010.
- (68) "Benzene and me" Meiwa High School Special Lecture, Meiwa High School, Nagoya, Japan, June 21st, 2010.
- (67) "Challenges in arene-assembling chemistry" The 3rd Annual Symposium of Nagoya University Global COE in Chemistry 3rd Annual Symposium, R-04, Nagoya University, Japan, June 16th, 2010.
- (66) "Benzene and me" Okazaki North High School Special Lecture, Nagoya University, Japan, June 4th, 2010.
- (65) "Chemical synthesis of sidewall segments of carbon nanotubes" The 6th Asian-European Symposium on Metal Mediated Efficient Reactions, Nanyang Technological University, Singapore, June 8th, 2010.
- (64) "Chemical synthesis of sidewall segments of carbon nanotubes: Cycloparaphenylenes and related carbon nanorings" The 93rd Canadian Chemistry Conference and Exhibition, Toronto, Canada, May 31st, 2010.
- (63) "Challenges in arene-assembling chemistry" The 10th Convention on Pharmaceutical Ingredients (CPhI), Tokyo Bigsight, Japan, April 21st, 2010.
- (62) "Challenges in arene-assembling chemistry" Special Lecture in Peking University, China, April 9th, 2010.
- (61) "Challenges in arene-assembling chemistry" Special Lecture in Wuhan University, China, April 8th, 2010.
- (60) "Challenges in arene-assembling chemistry" Special Lecture in University of Sciences and Technology, China, April 7th, 2010.
- (59) "Benzene and me; Challenge to Become a Nano-scale Architect" SSH Natural Science Seminar, Nagoya University, Japan, December 19th, 2009.
- (58) "Molecular catalysis for nanocarbon chemistry" International Symposium on Catalysis and Fine Chemicals 2009, December 15th, 2009.
- (57) "Molecular catalysis for nanocarbon chemistry" China-Japan Symposium on Advanced Organic Chemistry, November 29th, 2009.

- (56) "Challenges in arene-assembling chemistry" The 6th Catalysis Sagami Seminar, Kanagawa, Japan, November 19th, 2009.
- (55) "New catalysis leading to privileged organic structures" IRTG Munster-Nagoya Meeting, Nagoya University, Japan, September 28th, 2009.
- (54) "Challenges in arene-assembling chemistry" Kyoto University Organic Chemistry Seminar, Kyoto, Japan, September 17th, 2009.
- (53) "Challenges in arene-assembling chemistry" Sumitomo Chemicals Special Seminar, Sumitomo Chemicals, Japan, September 14th, 2009.
- (52) "Challenges in arene-assembling chemistry" The 55th Organic Chemistry Research Meeting (Shirasagi Seminar), Japan, September 7th, 2009.
- (51) "Programmed synthesis of tetraarylthiophenes through sequential C-H bond arylation" Grant-in-Aid for Scientific Research on Priority Areas "Chemistry of Concerto Catalysis" International Symposium, Japan, August 28th, 2009.
- (50) "Challenges in arene-assembling chemistry" The 21st Banyu Sapporo Symposium, Sapporo, Japan, July 4th, 2009.
- (49) "Challenges in arene-assembling chemistry" Rising Organic Chemists in Catalysis Meeting (ROCCAT), Munster, Germany, June 18th, 2009.
- (48) "Challenges in arene-assembling chemistry" Kyoto University GCOE "Integrated Materials Science" Seminar, Kyoto University, Japan, May 30th, 2009.
- (47) "Challenges in arene-assembling chemistry" Teijin Pharma Special Seminar, Teijin Pharma, Japan, May 12th, 2009.
- (46) "Arene-assembly based on catalytic direct functionalization of C-H bonds" Division of Organometallic Chemistry, The Kinki Chemical Society Meeting, 4th Regular Meeting of 2007, Osaka Science & Technology Center, Japan, February 2nd, 2009.
- (45) "Catalytic direct functionalization of arene compounds and fullerene" Ministry of Education, Culture, Sports, Science and Technology Special Funds for Education and Research, Joint Project of Chemical Synthesis Core Research Institutions, The 4th Symposium on Materials Science "The Link Between Synthetic Chemistry and Nanochemistry", Nagoya University, Japan, January 24th, 2009.
- (44) "Catalytic direct functionalization of unsaturated organic molecules" 13th Symposium of High-tech Research Center Okayama University of Science, Japan, December 11th, 2008.
- (43) "Carbon-hydrogen bond functionalization through concerto molecular catalysis" Grant-in-Aid for Scientific Research on Priority Areas "Chemistry of Concerto Catalysis" International Symposium, Osaka University, Japan, December 3rd, 2008.
- (42) "Catalytic direct functionalization of unsaturated organic molecules" Organic Synthetic Chemistry Symposium of Autumn 2008, The Pharmaceutical Society of Japan Nagai Memorial Hall, Shibuya, Tokyo, Japan, November 19th, 2008.
- (41) "Catalytic direct functionalization of arene compounds and fullerene" Molecular Catalysis Seminar "Strategy for Dissecting Bonds Between Multiple-Bonds and New Approaches for Transformation Reactions", Tokyo University of Agriculture and Technology, Japan, November 15th, 2008.
- (40) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, University of Chicago, USA, October 27th, 2008.
- (39) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, The Scripps Research Institute, USA, October 24th, 2008.
- (38) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, Stanford University, USA, October 22nd, 2008.

- (37) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, University of California, Berkeley, USA, October 21st, 2008.
- (36) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, Harvard University, USA, October 17th, 2008.
- (35) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, MRL-Boston, Merck, USA, October 16th, 2008.
- (34) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, Princeton University, USA, October 14th, 2008.
- (33) "Functionalization of unsaturated organic molecules through metal catalysis: Alkenes, arenes, and fullerenes" Merck-Banyu Lecture, MRL-Rahway, Merck, USA, October 13th, 2008.
- (32) "Arene-assembly based on C-H bond functionalization" The 102nd Catalysis Meeting of the Catalysis Society of Japan, Nagoya University, Japan, September 25th, 2008.
- (31) "Catalytic direct functionalization of unsaturated organic molecules" Kwansei Gakuin University, Japan, August 26th, 2008.
- (30) "Catalytic direct functionalization of aromatics and nanocarbons" The 91st Canadian Chemistry Conference and Exhibition, Shaw Conference Centre, Edmonton, Canada, May 24th, 2008.
- (29) "Catalytic direct functionalization of unsaturated organic molecules" Kyoto University, Japan, May 13th, 2008.
- (28) "Catalytic direct functionalization of unsaturated organic molecules" The 18th Banyu Fukuoka Symposium, Centennial Hall Kyushu University School of Medicine, Japan, May 10th, 2008.
- (27) "Innovation of synthetic chemistry towards new creation" Nagoya University Open Seminar, Japan, March 24th, 2008.
- (26) "Catalytic direct functionalization of unsaturated organic molecules" Grant-in-Aid for Scientific Research on Priority Areas "Synergistic Effects for Creation of Functional Molecules" The 3rd Young Colloquium, Osaka University, Osaka University Nakanoshima Center, Japan, March 15th, 2008.
- (25) "Catalytic direct functionalization of unsaturated organic molecules: To become an irreplaceable craftsman in "monodukuri" Tokyo Institute of Technology, Japan, January 15th, 2008.
- (24) "Catalytic direct functionalization of aromatics" 2007 Workshop on Organometallic Chemistry, RIKEN, Wako, Japan, November 8-9th, 2007.
- (23) "Catalytic direct functionalization of unsaturated organic molecules" The 2nd Forum for Inter-University Research, Nagoya University, Japan, November 2-3rd, 2007.
- (22) "Creation of privileged structures based on catalytic direct functionalization of olefins and aromatics" National Taiwan University, Taiwan, September 21st, 2007.
- (21) "Creation of privileged structures based on catalytic direct functionalization of olefins and aromatics" National Tsing-Hua University, Taiwan, September 20th, 2007.
- (20) "Creation of privileged structures based on catalytic direct functionalization of olefins and aromatics" National Taiwan Normal University, Taiwan, September 19th, 2007.
- (19) "Catalytic direct functionalization of aromatics: Arenes, heteroarenes, and fullerenes" The 4th IRTG Münster-Nagoya Joint Seminar, University of Münster, Germany, September 6th, 2007.
- (18) "Creation of functional materials based on catalytic direct C-H bond functionalization" Nagoya University Global COE Kick-off Meeting, Japan, August 24th, 2007.
- (17) "Catalytic direct C-H bond functionalization: To become an irreplaceable craftsman in "monodukuri" The 42nd Meeting for Young Organic Chemists, Gifu, Japan, July 12-14th, 2007.
- (16) "Creation of privileged organic structures based on catalytic C-H bond functionalization" McGill University, Canada, June 22nd, 2007.

- (15) "Creation of privileged organic structures based on catalytic C-H bond functionalization" Universite de Montreal, Canada, June 21st, 2007.
- (14) "Creation of privileged organic structures based on catalytic C-H bond functionalization" University of Ottawa, Canada, June 20th, 2007.
- (13) "Creation of privileged organic structures based on catalytic C-H bond functionalization" Queen's University, Canada, June 18th, 2007.
- (12) "Creation of privileged organic structures based on catalytic C-H bond functionalization" University of Toronto, Canada, June 15th, 2007.
- (11) "Catalytic direct C-H bond functionalization: To become an irreplaceable craftsman in "monodukuri" Japan Advanced Institute of Science and Technology, Japan, June 1st, 2007.
- (10) "Creation of functional materials based on catalytic C-H bond functionalization" The 3rd IRTG Münster-Nagoya Joint Seminar, Nagoya University, Japan, April 19-20th, 2007.
- (9) "Catalytic direct C-H bond functionalization" Kyushu University Special Seminar, February 16th, 2007.
- (8) "Creation of functional materials based on catalytic direct C-H bond functionalization" Takasago Special Seminar, Takasago International Corporation, Japan, January 31st, 2007.
- (7) "Development of molecular catalyst directed towards organic architectural chemistry" The 2nd Kyoto University Organic Chemistry COE Joint Symposium, "Diversity and Prospects of Precision Organic Synthesis", Kyoto University, Japan, December 15th, 2006.
- (6) "Direct C-H arylation of heteroarenes and arenes via metal catalysis" The 10th International Kyoto Conference on New Aspects of Organic Chemistry (IKCOC-10), Kyoto, Japan, November 13-17th, 2006.
- (5) "Creation of functional materials based on molecular catalytic chemistry" Forum of Inter-University Research, Kyoto, Japan, September 1st, 2006.
- (4) "Programmed molecular construction methods based on precision molecular catalysts" Mitsui Chemicals Special Seminar, Mitsui Chemicals, Inc. Catalysis Science Laboratory, Sodegaura, Chiba, Japan, August 28th, 2006.
- (3) "Targeting olefins, arenes, and their assemblies" International Conference on Biodiversity and Natural Products, Kyoto, Japan, July 24th, 2006.
- (2) "Creation of functional materials based on catalytic C-H functionalization" Nagoya University 21COE Results Report Meeting, Nagoya University, Japan, July 7th, 2006.
- (1) "Programmed molecular construction methods based on precision molecular Catalysts" Nagoya University Chemistry Seminar, Nagoya University, Japan, May 26th, 2006.

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(1) 光藤 耕一	岡山大学 助教（現在：岡山大学 准教授）

