Poster Program

PA-Odd number Day 2: December 4 (Tue), 13:40-14:40
PA-Even number Day 3: December 5 (Wed), 13:10-14:10
PB-Odd number Day 4: December 6 (Thu), 13:40-14:40
PB-Even number Day 5: December 7 (Fri), 13:40-14:40

Peptides in Diseases

PA-001 An Integrin αvβ3 Antagonistic Modified Peptide Inhibits Tumor Growth Through Inhibition of the ERK and AKT Signaling Pathways

Ying Wang[1], Lirong Hu[1], Jingjing Wang[1], Hanmei Xu[1,2]
[1]*The Engineering Research Center of Peptide Drug Discovery and Development, China Pharmaceutical University, Nanjing, China,*
[2]*State Key Laboratory of Natural Medicines, China Pharmaceutical University, Nanjing 210009, China*

PA-002 Two Different Types of Anti-angiogenic Drugs with a Similar Dose-efficacy Relationship: Coincidence or Correlative?

Jialiang Hu, Wenjing Wang, Mengwei Li, Yan Yuan, Hanmei Xu
The Engineering Research Center of Peptide Drug Discovery and Development, China Pharmaceutical University

PA-003 Combination Therapy of PEG-HM-3 Peptide and Methotrexate Retards Adjuvant-Induced Arthritis

Hanmei Xu[1,2]
[1]*The Engineering Research Center of Peptide Drug Discovery and Development,*
[2]*State Key Laboratory of Natural Medicines, Ministry of Education*

PA-004 Canceled

PA-005 KSL-W: A New Lead for the Development of Agents to Control Plant Diseases

Marta Planas[1], Cristina Camó[1], Anna Bonaterra[2], Esther Badosa[2], Aina Baró[2], Laura Montesinos[2], Emilio Montesinos[2], Lidia Feliu[1]
[1]*LIPPSO, Department of Chemistry, University of Girona,*
[2]*Institute of Food and Agricultural Technology-CIDSAV-XaRTA, University of Girona*

PA-006 Toxin peptide synthesis, optimization for ion channel modulation studies

Changlin Tian
School of Life Sciences, University of Science and Technology of China

PA-007 Therapeutic Evaluation of Fetal Osteo-Progenitor Stem Cells in Bone Regeneration in Osteopenic Rat Model

Deepshikha Tewari[1], Naibedya Chattopadhyay[2], Sandeep Verma[3]
[1]*Center for Nanoscience, Indian Institute of Technology (IIT), Kanpur, India,*
[2]*Division of Endocrinology, Central Drug Research Institute (CDRI), Lucknow, India,*
[3]*Department of Chemistry, Indian Institute of Technology (IIT), Kanpur, India*

PA-008 Antitumor Efficacy of a Novel Cyclic Pentadepsipeptide, Neo-N-Methylsansalvamide, against Bladder Cancer

Juhee Park[1], Sung Lyea Park[2], Sung-Kwon Moon[2], Chan Lee[1]
[1]*Advanced Food Safety Research Group, BrainKorea21 Plus, Department of Food Science and Technology, Chung-Ang University,*
[2]*Department of Food and Nutrition, Chung-Ang University*

PA-009 In Silico Approaches in Selecting Unique Immunogenic Peptides of Dengue, Japanese Encephalitis and Zika Virus

Leonardo Jr A. Guevarra[1,2], Leslie Michelle M. Dalmacio[2]
[1]*Department of Biochemistry, Faculty of Pharmacy, University of Santo Tomas,*
[2]*Department of Biochemistry and Molecular Biology, College of Medicine, University of the Philippines Manila*

PA-010 Peptide-Based Platform for Differentiation of Antigenic Variations within Influenza Virus Subtypes (FluType)

Henry Memczak[1], Marc Hovestaedt[1], Bernhard Ay[1], Sandra Saenger[2], Jan Grzegorzewski[1], Matthias Koenig[3], Thorsten Wolff[2], Frank F. Bier[1]
[1]*University of Potsdam,* [2]*Robert Koch-Institute,* [3]*Humboldt-University Berlin*

PA-011 Unique and innovative biodetection technologies using structured and labeled peptide microarrays in combination with imaging and multivalent analyses towards diagnostics not dependent on bio-markers

Kiyoshi Nokihara[1,2,3], Yuki Tominaga[1], Kenji Usui[4], Takayuki Kondo[5], Masaya Ikegawa[6], Mu-Xin Wei[3], Haruyuki Fujino[1], Atsushi Kitagawa[1], Shun Nokihara[1], Hiro-O Ito[7], Hisakazu Mihara[8], Christian Schoenbach[9]
[1]*HiPep Laboratories,* [2]*College of Clinical Medicine,* [3]*Nanjing Medical University,*
[4]*Faculty of Frontiers of Innovative Research in Science and Technology, Konan University,*
[5]*Department of Neurology, Kansai Medical University Medical Center,*
[6]*Faculty of Life and Medical Sciences, Doshisha University,*
[7]*Department of Preventive Dentistry, Tokushima University,*
[8]*Department of Life Science and Technology, Tokyo Institute of Technology,*
[9]*Department of Biology, School of Science and Technology, Nazarbayev University*

PA-012 Anticancer Properties of the Host Defence Peptide Tachyplesin I and Its Cyclic Analogues

Felicitas Vernen, Nicole Lawrence, David J. Craik, Sónia T. Henriques
Institute for Molecular Bioscience

PA-013 Multibioactivity of Peptides Derived from Gouda Cheese with Modified Content of β-Casein

Malgorzata Darewicz[1], Anna Iwaniak[1], Damir Mogut[1], Justyna Zulewska[2]
[1]*University of Warmia and Mazury in Olsztyn, Faculty of Food Science, Chair of Food Biochemistry, Pl. Cieszynski 1, 10-726 Olsztyn-Kortowo, Poland,*
[2]*University of Warmia and Mazury in Olsztyn, Faculty of Food Science, Department of Dairy Science and Quality Management, ul. M. Oczapowskiego 7, 10-719 Olsztyn*

PA-014 Triazine based Anti-bacterial agents with potent Anti-inflammatory and Anti-atopic Dermatitis Properties

Jeong Kyu Bang
Division of Magnetic Resonance, Korea Basic Science Institute (KBSI), Ochang, Chung-Buk, 28119, Republic of Korea

PA-015 Design and Synthesis of Triazine Based Inhibitors Targeting Polo-box Domain of Polo-like Kinase-1

Jieun Lee[1,2], Young Ho Jeon[3], Ji Hyung Seo[3], Jeong Kyu Bang[1,2]
[1]Protein Structure research group, Korea Basic Science Institute, 162 Yeongudanji-ro, Ochang-eup Cheongwon-gu, Cheongju-si, Chungcheongbuk-do 28119, Korea,
[2]Bio-Analytical Science, University of Science and Technology, 217 Gajeong-ro, Yuseong-gu, Daejeon 34113, Korea,
[3]College of Pharmacy, Korea University, 2511 Sejong-ro, Sejong 30019, Korea

PA-016 Evaluation of cell permeable peptide with vitamin E targeting Polo-box domain of Polo-like kinase 1 in vivo

Eun Kyoung Ryu[1,2], Min Su Yim[1,2], Jeong Kyu Bang[1,2]
[1]Korea Basic Science Institute, [2]Bio-Analytical Science, University of Science and Technology

PA-017 Investigation of Structure Activity Relationship of Derivatives of Antimicrobial Peptide Lacrain

Keiko Okimura, Keiko Matsubara, Yumi Iha, Yui Shimada
Faculty of Pharmaceutical Sciences, Hokuriku University

PA-018 Structural Analyses of an N-terminal Extracellular Domain of the Amyloid Precursor Protein

Mizuho Imamura[1], Shingo Kanemura[2], Masaki Okumura[3], Hiroshi Yamaguchi[2], Shigeru Shimamoto[1], Yuji Hidaka[1]
[1]Graduate School of Science and Engineering Research, Kindai University, Higashi-Osaka, Osaka 577-8502, Japan,
[2]School of Science and Technology, Kwansei Gakuin University, Sanda, Hyogo 699-1337, Japan,
[3]Frontier Research Institute for Interdisciplinary Sciences, Tohoku University, Sendai, Miyagi 980-8578, Japan

PA-019 Characterization of Apolipoprotein A-IV as a Novel Diagnostic Biomarker for Liver Fibrosis

Tai-Long Pan
School of Traditional Chinese Medicine, Chang Gung University

PA-020 Protein Phosphatase PPM1D Function on Neutrophil Development and Identifying its Novel Substrate

Fuki Kudoh, Rui Kamada, Kazuyasu Sakaguchi
Laboratory of Biological Chemistry, Faculty of Science, Hokkaido University

PA-021 Effect of Nucleophosmin Phosphorylation and Oligomerization on Abnormal Nucleolar Formation in PPM1D-hyperactivated Tumors

Shogo Ito, Yuhei Kiyota, Junya Furuta, Rui Kamada, Kazuyasu Sakaguchi
Laboratory of Biological Chemistry, Department of Chemistry, Faculty of Science, Hokkaido University

PA-022 Effect of Substrate Regioselectivity on Dephosphorylation of D-Amino Acids Containing Peptides for Metal-dependent Ser/Thr Phosphatase PPM1 Family

Itsumi Tani, Yukiko Shirahata, Nanase Tsukahara, Kei Kawamura, Shogo Ito, Rui Kamada, Kazuyasu Sakaguchi
Laboratory of Biological Chemistry, Department of Chemistry, Faculty of Science, Hokkaido University

PA-023 Measurements of Natriuretic Peptides in Amniotic Fluid and Umbilical Cord Plasma Provide Valuable Diagnostic Information on Fetal Heart Diseases

Naoto Minamino[1], Takekazu Miyoshi[2], Takashi Umekawa[3], Isao Shiraishi[4], Kunihiro Nishimura[5], Mikiya Miyazato[6], Kenji Kangawa[6], Tomoaki Ikeda[3], Jun Yoshimatsu[2], Hiroshi Hosoda[7]
[1]*Omics Research Center, National Cerebral and Cardiovascular Center,*
[2]*Department of Perinatology and Gynecology, National Cerebral and Cardiovascular Center,*
[3]*Department of Obstetrics and Gynecology, Mie University,*
[4]*Department of Pediatric Cardiology, National Cerebral and Cardiovascular Center,*
[5]*Center for Cerebral and Cardiovascular Disease Information, National Cerebral and Cardiovascular Center,*
[6]*Department of Biochemistry, National Cerebral and Cardiovascular Center,*
[7]*Department of Regenerative Medicine and Tissue Engineering, National Cerebral and Cardiovascular Center*

PA-024 A rationally designed bicyclic peptide blocks Aβ42 amyloid fibril formation *in vitro* and *in vivo*

Tatsuya Ikenoue, Francesco A. Aprile, Pietro Sormanni, Michele Vendruscolo
Department of Chemistry, University of Cambridge

PA-025 Production of peptides inhibiting the G697C mutant but not wild type of FGFR3

*Presentation day is changed to Dec 5 (Wed).

Atsushi Iwanaga[1], Masato Tsuyuguchi[1], Masaaki Sawa[2], Takayoshi Kinoshita[1]
[1]*Department of Biological Science, Graduate School of Science, Osaka Prefecture University,*
[2]*Carna Biosciences, Inc.*

PA-026 Functional characterization of the C-terminal peptide of MAP2K7

*Presentation day is changed to Dec 4 (Tue).

Yuka Murakawa[1], Takuma Hashimoto[1], Yuri Sogabe[1], Masaaki Sawa[2], Takayoshi Kinoshita[1]
[1]*Department of Biological Sciences, Graduate School of Science, Osaka Prefecture University,*
[2]*Carna Biosciences, Inc.*

PA-027 Total synthesis of the death cap toxin Phalloidin

Guiyang Yao, Andi Mainz, Roderich D. Süßmuth
Department of Chemistry, Technische Universität Berlin

PA-028 Canceled

PA-029 Decoding the Function and Structure of Three Peptides Derived from a Pyrobaculum aerophilum Ribosomal Protein

Marlon Henrique Cardoso[1,2,3,4], Elizabete Souza Candido[3], Lai Y. Chan[4], Karen G. N. Oshiro[1,3], Marcelo T. Torres[5,6], Cesar de la Fuente-Nunez[5], William Farias Porto[3], Timothy K. Lu[5], David James Craik[4], Octávio Luiz Franco[1,2,3]
[1]*Department of Molecular Pathology, Faculty of Medicine, University of Brasília, Brazil,*
[2]*Centro de Análises Proteômicas e Bioquímicas, Pós-Graduação em Ciências Genômicas e Biotecnologia, Universidade Católica de Brasília, Brazil,*
[3]*S-inova, Programa de Pós-Graduação em Biotecnologia, Universidade Católica Dom Bosco, Brazil,*
[4]*The University of Queensland, Institute for Molecular Biosciences, Brisbane, Queensland, Australia,*
[5]*Synthetic Biology Group, Massachusetts Institute of Technology (MIT), Cambridge, Massachusetts, USA,*
[6]*Centro de Ciências Naturais e Humanas, Universidade Federal do ABC, Santo André, SP, Brazil*

PA-030 Optimizing Cationic Antimicrobial Peptide Sequences to Enhance Their Anticancer Activity Against Gastric Cancer Cell Line AGS and Evaluation of Their Combinatorial Effects with Chemotherapeutic Drugs

Pin-Yu Ke, Wei-Chun Liu, Wei-Jung Chen
Department of Biotechnology and Animal Science, National Ilan University

PA-031 Antibacterial Efficacy of Cationic Antimicrobial Peptide Q4-15a-1 against Multidrug-Resistant Enterotoxigenic *Escherichia coli* K88

Kang-Chi Wu, Wei-Jung Chen
Department of Biotechnology and Animal Science, National Ilan University, Taiwan

PA-032 Significance of Measurement of Endogenous Molecular Forms of A-Type and B-Type Natriuretic Peptides in Heart Failure Patients

Mitsuhiro Nishigori[1], Ayaka Matsuo[1], Chiaki Nagai-Okatani[2], Hiroyuki Takahama[3], Seiji Takashio[3], Toshihisa Anzai[3], Chisato Izumi[3], Kenji Kangawa[4], Naoto Minamino[1]
[1]*Omics Research Center, National Cerebral and Cardiovascular Center,*
[2]*Biotechnology Research Institute for Drug Discovery, National Institute of Advanced Industrial Science and Technology,*
[3]*Department of Cardiovascular Medicine, National Cerebral and Cardiovascular Center,*
[4]*Research Institute, National Cerebral and Cardiovascular Center*

PA-033 Improve the Stability of Antimicrobial Peptide Q4a and Evaluate Its Anticancer Activity Against 5-FU-, and Oxaliplatin-Resistant Colorectal Cancer Cell Line HCT116

Yi-Jie Liao[1], Hsing-Chun Kuo[2], Wei-Jung Chen[1]
[1]*Department of Biotechnology and Animal Science, National Ilan University, Taiwan,*
[2]*Department of Nursing, Chang Gung University of Science and Technology, Chiayi, Taiwan*

PA-034 Exploration of the Amyloidogenic Region in Serum amyloid A for Structure-Based Drug Design

Tomomi Ueda[1], Takayasu Kawasaki[2], Shinji Hashimoto[1], Masatoshi Saiki[1]
[1]*Department of Applied Chemistry, Sanyo-Onoda City University,*
[2]*IR-FEL Research Center, Tokyo University of Science*

PA-035 iTRAQ based Quantitative Phosphoproteomic Analysis of Alzheimer's Disease Patients Blood Plasma Samples reveals Phosphopeptide Biomarkers for Early Disease Diagnosis

Se-Hwan Jang, You-Rim Kim, Gwangrog Lee, Zee-Yong Park
School of Life Sciences, Gwangju Institute of Science & Technology

PA-036 *in vitro* and *in vivo* Antibacterial Efficacy Against *Vibrio* spp. by Cationic Antimicrobial Peptide

Yen-Ting Yu, Zhi-Jie Zhuang, Wei-Jung Chen
Department of Biotechnology and Animal Science, National Ilan University

PA-037 Structural Analysis and Discovery of Bioactive Functions of Cartilage Components from Artificial Breeding Chinese Giant Salamanders

Wenming Zhu, Yang Ji, Dong He, Yi Wang, Chong Zhang, Xinhui Xing
Department of Chemical Engineering, Tsinghua University

PA-038 Cyclophilin A Inhibitor Screening Using a Cyclic Peptoid Library

Namjoon Park[1], Soonsil Hyun[1], Hyun-Suk Lim[2], Jaehoon Yu[1]
[1]*Department of Chemistry & Education, Seoul National University,*
[2]*Department of Chemistry, Pohang University of Science and Technology (POSTECH)*

PA-039 Synthesis of Bioactive Peptides on Soluble Supports.

Babita Bisht, Nandita Madhavan
IIT Bombay Department of Chemistry

PA-040 Canceled

PA-041 Alcohol Soluble Components of Wheat Germ-Apple-Milk mixtures Fermented by Lactobacillus Improves Murine Inflammatory Bowel Diseases

Dong He, Wenming Zhu, Yi Wang, Yang Ji, Xinhui Xing, Chong Zhang, Wen Zeng
Department of chemical engineering,Tsinghua University

PA-042 Development of Polymyxin B_3 Analogs with Hydroxy Amino Acids Substituting for its Diamino Butyric Acid Residues

Yuki Sato[1], Naoki Sakura[2], Tatsuo Takahashi[1], Keiko Okimura[1], Masakazu Miura[1], Keiichi Hatakeyama[2], Keiichi Ohshima[2], Toru Mochizuki[2]
[1]*Faculty of Pharmaceutical Sciences, Hokuriku University,*
[2]*Medical Genetics Division, Shizuoka Cancer Center Research Institute*

PA-043 Potentiator peptide, 15-N strongly potentiate linezolid and its derivative to overcome A. baumannii in vivo

Soeun Bae, Yunhwa Choi, Jaehoon Yu
Department of Chemistry and Education, Seoul National University

PA-044 Analysis of Substrate Recognition Mechanism of Metal-dependent Ser/Thr Phosphatases

Kei Kawamura, Yukiko Shirahata, Itumi Tani, Rui Kamada, Kazuyasu Sakaguchi
Laboratory of Biological Chemistry, Department of Chemistry, Faculty of Science, Hokkaido University

PA-045 Surugamide A, A Cyclic Octapeptide from *Streptomyces* sp. Isolated from *Truncatella* sp.

Arthur Conrad IV L. Diosana[1], Bailey Miller[2], Noel Lacerna[1], Iris Diana Uy[1], Myra Picart[1], Gisela P. Concepcion[1]
[1]*Marine Sciene Institute, College of Science, University of the Philippines - Diliman,*
[2]*Department of Medicinal Chemistry, University of Utah*

PA-046 Role of RNase 7 in Oral Squamous Cell Carcinoma

Puja Neopane, Koki Yoshida, Bhoj Raj Adhikari, Durga Paudel, Tetsuro Morikawa, Aya Onishi, Daichi Hiraki, June Sato, Michiko Nishimura, Yoshihiro Abiko
Division of Oral Medicine and Pathology, Department of Human Biology and Pathophysiology, Graduate School of Dentistry, Health Sciences University of Hokkaido

PA-047 Identification of Cyclic Peptoid Inhibitors of Skp2 Using a Vast DNA-Encoded One-Bead One-Compound Library

Min Hyeon Shin[1], Hyun-Suk Lim[1,2]
[1]*Department of chemistry, POSTECH,* [2]*Division of Advanced Materials Science, POSTECH*

PA-048 New Antimicrobial peptides derived from Ovalbumin

Ao Tan, Shigekazu Yano, Hiroyuki Konno
Department of Biochemical Engineering, Graduate School of Science and Engineering, Yamagata University, Yonezawa, Yamagata 992-8510, Japan

PA-049 Isolation, Purification, and Characterization of Bioactive Peptides from Conus sugillatus

Lester Arvin Serafica Pascua[1], Ansyl Marie B. Naraga[2], Oliver John V. Belleza[2], Vicenzo Paolo M. Torreno[2], Aaron Joseph L. Villaraza[2], Eizadora T. Yu[2], Gisela P. Concepcion[1]
[1]*Marine Science Institute, University of the Philippines Diliman,*
[2]*Institute of Chemistry, University of the Philippines Diliman*

PA-050 Development of the Inhibitor Tageting NCOA1/STAT6 Interation Based on the Structure-Activity Relationship (SAR) Study

Hyunsoo Lee[1], Yeongju Lee[1], Hyun-Suk Lim[1,2]
[1]Department of Chemistry, POSTECH, [2]Division of Advanced Materials Sience, POSTECH

PA-051 A novel engineered 12-meric peptide displays increased antibacterial and antiseptic activity

Jieun Kim, Mihee Jang, Kkabi Son, Yangmee Kim
Konkuk University

PA-052 Pseudin-derived peptides with efficacy against gram-negative pathogen via a dual mode of action through antibacterial and immunomodulatory effects

Mihee Jang, Jieun Kim, Kkabi Son, Yangmee Kim
Konkuk University

PA-053 Geniposidic Acid Induces Natriuretic Effect by Upregulate Atrial Natriuretic Peptide in Spontaneously Hypertensive Rats

Ryuto Takahashi[1], Nao Sugiman[3], Shingo Hosoo[3], Hiroo Yamasaki[3], Tetsuya Hirata[3], Yasuyo Yamaguchi[3], Shohei Yamaguchi[1], Naoto Minamino[4], Kozo Nakamura[1,2]
[1]Department of Bioscience and Biotechnology, Graduate School of Agriculture, Shinshu University,
[2]Institute of Agriculture, Academic Assembly, Shinshu University,
[3]R&D Center, Kobayashi Pharmaceutical Co., Ltd.,
[4]Omics Research Center, National Cerebral and Cardiovascular Center

PA-054 Geniposidic Acid Can Induce Secretion of Atrial Natriuretic Peptide via Glucagon-like Peptide-1 Receptor on Spontaneously Hypertensive Rats

Shohei Yamaguchi[1], Shingo Hosoo[3], Yusuke Takahashi[1], Ryo Yamazaki[1], Ryuto Takahashi[1], Tetsuya Hirata[3], Yasuyo Yamaguchi[3], Hiroo Yamasaki[3], Naoto Minamino[4], Kozo Nakamura[1,2]
[1]Department of Agricultural and Life Science, Graduate School of Science and Technology, Shinshu University,
[2]Institute of Agriculture, Academic Assembly, Shinshu University,
[3]R&D Center, Kobayashi Pharmaceutical Co., Ltd.,
[4]Omics Research Center, National Cerebral and Cardiovascular Center

PA-055 Targeted Protein Degradation Using N-End Rule Pathway

Yeongju Lee, Eun-Kyoung Jee, Hyun-Suk Lim
Department of Chemistry and Division of Advanced Material Science, Pohang University of Science and Technology (POSTECH)

PA-056 Structural Determination and Activity Characterisation of HSTX-I, A Leech Toxin Targeting Voltage-Gated Sodium Channels

Kirsten L. McMahon[1], Bryan Tay[1], Jennifer R. Deuis[1], Olivier Cheneval[1], David Craik[1], Irina Vetter[1,2], Christina I. Schroeder[1]
[1]Institute for Molecular Bioscience, University of Queensland, Australia,
[2]The School of Pharmacy, The University of Queensland, Australia

PA-057 RaPID Selection of Macrocyclic Peptide Inhibitors of Membrane-Type 1 Matrix Metalloproteinase-Induced Neoplastic Cell Migration

Manuel Otero Ramirez[1], Toby Passioura[1], Daisuke Hoshino[2], Naohiko Koshikawa[2], Hiroaki Suga[1]
[1]Department of Chemistry, Graduate School of Science, The University of Tokyo, Japan,
[2]Division of Cancer Cell Research, Kanagawa Cancer Center Research Institute, Japan

PA-058 Mitochondria-targeting Peptoids

Ho Yeon Nam[1], Jong-Ah Hong[3], Jieun Choi[1], Seungheon Shin[2], Steve K. Cho[2], Jiwon Seo[1], Jiyoun Lee[3]
[1]*Gwangju Institute of Science and Technology, Department of Chemistry,*
[2]*Gwangju Institute of Science and Technology, Department of Biomedical Science and Engineering,*
[3]*Sungshin University, Department of Global Medical Science*

Peptides in the Brain and CNS

PA-059 Difference between orexins A and B in modulating synaptic transmission in adult rat spinal substantia gelatinosa neurons

Chong Wang, Eiichi Kumamoto, Tsugumi Fujita
Department of Physiology, Saga Medical School

PA-060 Target Promiscuity of a μ-Conopeptide from Conus striolatus

Abe Ernest Johann E. Isagan[1], Iris Bea L. Ramiro[1], Ansyl Marie B. Naraga[2], Oliver John V. Belleza[2], Julita S. Imperial[3], Baldomero M. Olivera[3], Aaron Joseph L. Villaraza[2], Gisela P. Concepcion[1]
[1]*Marine Science Institute, University of the Philippines-Diliman,*
[2]*Institute of Chemistry, University of the Philippines - Diliman,* [3]*Department of Biology, University of Utah*

PA-061 Peptide-Based Carriers for Brain Delivery That Efficiently Translocate Through Blood-Brain Barrier

Toshihide Takeuchi[1,2,3], Shinsuke Nakagawa[4], Shinya Dohgu[5], Keiji Wada[2], Shiroh Futaki[3], Yasunori Kataoka[5], Masami Niwa[4], Yoshitaka Nagai[1,2]
[1]*Graduate School of Medicine, Osaka University,*
[2]*National Institute of Neuroscience, National Center of Neurology and Psychiatry,*
[3]*Institute for Chemical Research, Kyoto University,* [4]*Graduate School of Biomedical Sciences, Nagasaki University,*
[5]*Faculty of Pharmaceutical Sciences, Fukuoka University*

PA-062 Bioactive Peptides from the Turrid Clavus exasperatus

Victor M. Chua[1], Oliver V. Belleza[2], Maren Watkins[3], Helena Safavi-Hemami[3], Julita S. Imperial[3], Baldomero M. Olivera[3], Aaron Joseph L. Villaraza[2], Gisela P. Concepcion[1]
[1]*The Marine Science Institute, University of the Philippines Diliman, Quezon City, Philippines,*
[2]*Institute of Chemistry, University of the Philippines Diliman, Quezon City, Philippines,*
[3]*Department of Biology, University of Utah, 257 South 1400 East, Salt Lake City, Utah, USA*

PA-063 DRG-active compounds, including a novel depsipeptide, from the bacterial symbiont of a marine gastropod, Terebralia sulcata

Zildjian Gonzales Acyatan, Noel Moaje Lacerna, Jose Miguel Dela Paz Robes, Gisela Padilla Concepcion
Marine Science Institute, University of the Philippines-Diliman

PA-064 Polychaete worm-targeting conopeptides from Conus eburneus

Charmaine B. Mendoza[1], Dan Jethro Masacupan[1], Dessa Camille Batoctoy[2], Eizadora T. Yu[2], Arturo O. Lluisma[1], Lilibeth A. Salvador-Reyes[1]
[1]*The Marine Science Institute University of the Philippines Diliman,*
[2]*Institute of Chemistry University of the Philippines Diliman*

Peptides in Biosignaling

PA-065 Regulate Hippo Signaling via Assembly of Lipid-raft-targeted Synthetic Peptides for Ovarian Cancer Treatment

Guanying Li, Dingze Mang, Xunwu Hu, Yujie Zhou, Sachie Yukawa, Toshiaki Mochizuki, Ye Zhang
Okinawa Institute of Science and Technology Graduate University

PA-066 Screening of macrocyclic peptide against CD44s

Nohara Goto[1,2], Yizhen Yin[3], Christopher John Hipolito[2], Hiroyuki Suzuki[1], Hiroaki Suga[3], Mitsuyasu Kato[1], Paraskevi Heldin[4], Constantinos Kolliopoulos[4], Theodoros Karalis[5]

[1]Department of Experimental Pathology, Faculty of Medicine, University of Tsukuba,
[2]Department of Cancer Signaling, Faculty of Medicine, University of Tsukuba,
[3]Department of Chemistry, Graduate School of Science, The University of Tokyo,
[4]Department of Medical Biochemistry and Microbiology, Uppsala University,
[5]Department of Chemistry, Graduate School of Biochemistry, University of Patras

PA-067 Preparation of the silkmoth prothoracicotropic hormone receptor, Torso, which is a receptor tyrosine kinase with novel dimer structure

Airi Uechi, Shoko Nakamichi, Yuma Yamabana, Mayumi Sunagawa, Yuri Ishigaki, Kazuhide Miyamoto, Kazuki Saito

Department of Pharmaceutical Health Care, Faculty of Pharmaceutical Sciences, Himeji Dokkyo University

PA-068 Identification of Protein Phosphatase Involved in Dephosphorylation of Phosphoserines in Human Grb14 BPS Domain

Keisuke Yoshida, Junichi Taira, Hideyuki Komatsu, Hiroshi Sakamoto

Graduate School of Computer Science and Systems Engineering, Kyushu Institute of Technology

PA-069 Response of human cells against peptide type hemolysin Streptolysin S derived from *Streptococcus anginosus* subsp. *anginosus*

Takuya Yamada[1], Atsushi Tabata[1,2], Toshifumi Tomoyasu[1,2], Hideaki Nagamune[1,2]

[1]Life and Materials Systems Engineering, Graduate School of Advanced Technology and Science, Tokushima University,
[2]Bioscience and Bioindustry, Graduate School of Technology, Industrial and Social Sciences, Tokushima University

PA-070 Mitocryptide-3: Investigation of Signaling Mechanisms Induced by a Novel Neutrophil-Activating Peptide Derived from a Mitochondrial Transit Sequence

Takayuki Marutani, Shinichiro Tamura, Kenta Nakashima, Kodai Nishino, Hiroki Morikawa, Tatsuya Hattori, Yoshiaki Kiso, Hidehito Mukai

Laboratory of Peptide Science, Graduate School of Bio-Science, Nagahama Institute of Bio-Science and Technology

PA-071 Expression, Purification, Crystallization and Preliminary X-ray Crystallographic Studies of FsrC, the Cell Surface Receptor of the Cyclic Peptide Quormone GBAP

Keiichi Hasegawa[1], Mimin Zhang[1], Peng Lu[1], Kou Hayakawa[1], Yukie Katayama[1], Hidekazu Katayama[2], Jiro Nakayama[3], Kenji Sonomoto[3], Masaru Tanokura[1,3], Koji Nagata[1]

[1]Department of Applied Biological Chemistry, Graduate School of Agricultural and Life Sciences, The University of Tokyo,
[2]Department of Applied Biochemistry, School of Engineering, Tokai University,
[3]Department of Bioscience and Biotechnology, Graduate School of Agriculture, Kyushu University

PA-072 Mitocryptides as a novel family of regulatory factors in innate immunity

Hidehito Mukai, Yoshiaki Kiso

Laboratory of Peptide Science, Graduate School of Bio-Science, Nagahama Institute of Bio-Science and Technology

Therapeutic Design

PA-073 An Antiangiogenesis Peptide Combined with Salmonella VNP20009 to Enhance Therapeutic Effect on Lung Cancer Stem Cells through Sox2 Function

Mengwei Li[1,2], Changhong Zhao[1,2], Hanmei Xu[1,2]

[1]China Pharmaceutical University, [2]The Engineering Research Center of Peptide Drug Discovery and Development

PA-074 Design and functional studies on analgesic peptides

Chen Liu, Pengxiang Wu, Weiyan Qi, Hanmei Xu
China Pharmaceutical University

PA-075 Antifungal and Potential Immunomodulatory Activity of A Novel Conjugated Peptide against Oral Candidiasis

Thibaut L.C. Thery[1], Yvonne C. O'Callaghan[1], Nora M. O'Brien[1], Kieran M. Lynch[1], Elke K. Arendt[1,2]
[1]*School of Food and Nutritional Sciences, University College Cork,*
[2]*APC Microbiome Ireland, University College Cork, Cork, Ireland*

PA-076 Combinatorially Screened Peptide as Targeted Covalent Binder

Masumi Taki
UEC

PA-077 Artificial Chemical Transformation of Amyloid Peptide by Catalytic Photo-Oxygenation

Youhei Sohma[1], Jizhi Ni[1], Atsuhiko Taniguchi[1,2], Shuta Ozawa[1], Yukiko Hori[1], Taisuke Tomita[1], Motomu Kanai[1]
[1]*Graduate School of Pharmaceutical Sciences, The University of Tokyo,*
[2]*Tokyo University of Pharmaceutical and Life Sciences*

PA-078 Synthesis and immunological evaluation of self-adjuvanting anticancer vaccine candidate

Yoshiyuki Manabe[1,2], Tsung-Che Chang[1], Qi Feng[1], Yukari Fujimoto[3], Shino Ohshima[4], Yoshie Kametani[4], Kazuya Kabayama[1,2], Yuka Nimura[1], Chun-Cheng Lin[5], Koichi Fukase[1,2]
[1]*Graduate School of Science, Osaka University,*
[2]*Project Research Center for Fundamental Science, Osaka University,*
[3]*Faculty of Science and Technology, Keio University,* [4]*School of Medicine, Tokai University,*
[5]*Department of Chemistry, National Tsing Hua University*

PA-079 Canceled

PA-080 A Synthetic Peptide BcDef1 Based on a Plant Defensin of *Brungmansia* x *candida* Showed Its Antibacterial Ability

Ratchaneewan Aunpad[1], Siriporn Kaewklom[1], Sawang Petvises[2], Warunee Hanpithakphong[3]
[1]*Graduate Program in Biomedical Sciences, Faculty of Allied Health Sciences, Thammasat University,*
[2]*Department of Medical Technology, Faculty of Allied Health Sciences, Thammasat University, Pathum Thani, Thailand,*
[3]*Mahidol-Oxford Tropical Medicine Research Unit, Faculty of Tropical Medicine, Mahidol University, Bangkok, Thailand*

PA-081 Antioxidant and Neuroproliferative Activities of Peptidic Analogs of Hydramacin-1

Ping-Chien Lee, Ching-Chun Lin, Feng-Di T. Lung
Department of Chemistry, Tunghai University, Taiwan

PA-082 Potent Antibacterial Activity of Peptides Designed from Salusin-β and HIV-1 Tat (49-57)

Masahiro Kimura[1], Kumiko Kosuge[1], Yui Ko[1], Noriko Tagawa[2], Ikuo Kato[2], Yoshiki Uchida[1]
[1]*Department of Health and Nutrition, Osaka Shoin Women's University,*
[2]*Department of Medical Biochemistry, Kobe Pharmaceutical University*

PA-083 A tumour selective nano-pill for two cisplatin: Peptidic and peptidomimetic modified metallacages for integrin targeted delivery

Andreas F. B. Räder[1], Florian Reichart[1], Jiaying Han[2], Brech Aikman[3], Margot N. Wenzel[3], Benjamin Woods[3], Michael Weinmüller[1], Peter Horvatovich[2], Angela Casini[3], Horst Kessler[1]

[1]Institute for Advanced Study and Center of Integrated Protein Science München (CIPSM), TU München, Department Chemie, Lichtenbergstr. 4, 85747 Garching, Germany,

[2]Groningen Research Institute of Pharmacy, University of Groningen, Antonius Deusinglaan 1, 9713 AV Groningen, The Netherlands,

[3]School of Chemistry, Cardiff University, Main Building, Park Place, CF10 3AT Cardiff, United Kingdom

PA-084 Discovery of Antibody Light Chains Capable of Hydrolyzing Tau Protein Using Fluorescence-Quenched Substrate

Hiroaki Taguchi[1], Yuki Iida[1], Mao Oba[1], Yoshio Fujita[1], Emi Hifumi[2], Taizo Uda[3,4]

[1]Faculty of Pharmaceuticals Sciences, Suzuka University of Medical Science, Suzuka, Japan,

[2]Research Promotion Institute, Oita University, Oita, Japan, [3]Faculty of Engineering, Oita University, Japan,

[4]Institute of Systems, Information Technologies and Nanotechnologies, Japan

PA-085 Histone H3 Peptide-Based Lysine-Specific Demethylase 1 Inhibitors That Incorporate Unnatural Amino Acids

Yosuke Ota[1], Taeko Kakizawa[2], Yukihiro Itoh[1], Takayoshi Suzuki[1,3]

[1]Department of Chemistry, Graduate School of Medical Science, Kyoto Prefectural University of Medicine,

[2]College of Science and Engineering, Kanto Gakuin University,

[3]Core Research for Evolutional Science and Technology (CREST), Japan Science and Technology Agency (JST)

PA-086 Variabody: A Novel Bispecific Antibody Format Enables One-pot Synthesis of Wide Variety of Fab-dimer Library for Agonist Screening

Yasuhisa Shiraishi[1], Akifumi Kato[1], Kaname Kimura[1], Shigeyuki Yokoyama[2], Kensaku Sakamoto[3]

[1]Antibody & Biologics Research Labs, Research Functions Unit, R&D Division, Kyowa Hakko Kirin Co., Ltd.,

[2]RIKEN Cluster for Science, Technology and Innovation Hub,

[3]Laboratory for Nonnatural Amino Acid Technology, RIKEN Center for Biosystems Dynamics Research

PA-087 Development of Medium-Chain Alkyl Sulfoniododecaborate Containing L-Amino Acids for Boron Neutron Capture Therapy

Yoshihide Hattori[1], Ayumi Nagasawa[2], Miki Ishimura[1], Joe Kaun-Hsuan Chen[1], Youichirou Ohta[1], Hiroshi Takenaka[1,3], Kouichi Matsumoto[2], Kouki Uehara[3], Tomoyuki Asano[3], Mitsunori Kirihata[1]

[1]Research Center of BNCT, Osaka Prefecture University, [2]Faculty of Science and Engineering, Kindai University,

[3]Stella Pharma Corporation

PA-088 Structure Activity Relationship Study of the Helix-Inducible Motif in a Measles Virus Fusion Inhibitor

Aoi Takahara[1], Kumi Kawaji[2], Haruka Sekiguchi[1], Shinsuke Inuki[1], Hiroaki Ohno[1], Nobutaka Fujii[1], Eiichi Kodama[2], Shinya Oishi[1]

[1]Graduate School of Pharmaceutical Sciences, Kyoto University,

[2]Division of Infectious Diseases, Tohoku University International Research Institute of Disaster Science

PA-089 PNA Oligomers Possessing PreQ$_1$ as a Cationic Analogue of Guanine

Toru Sugiyama[1], Hatsune Shibasaki[1], Shun-suke Moriya[1], Keiko Kuwata[2], Yasutada Imamura[3], Yosuke Demizu[4], Masaaki Kurihara[5], Atsushi Kittaka[1]
[1]Faculty of Pharmaceutical Sciences, Teikyo University,
[2]Institute of Transformative Bio-Molecules (WPI-ITbM), Nagoya University,
[3]Faculty of Engineering, Kogakuin University,
[4]Division of Organic Chemistry, National Institute of Health Sciences, Ministry of Health and Welfare,
[5]International University of Health and Welfare

PA-090 Synthesis and Evaluation of EGF Receptor Dimerization Inhibitors Containing a N-Methylated Amino Acid or a Photoreactive Group

Kazuya Kobayashi[1], Minami Takata[1], Yusuke Morioka[1], Mika Miyazaki[1], Masahiko Hosomi[1], Kaho Morikawa[1], Sayaka Yoneda[1], Honami Ooe[1], Yukako Yamazaki[1], Takaaki Mizuguchi[2], Yasunao Hattori[3], Kenichi Akaji[1]
[1]Department of Medicinal Chemistry, Kyoto Pharmaceutical University, [2]School of Pharmacy, Kitasato University,
[3]Center for Instrumental Analysis, Kyoto Pharmaceutical University

PA-091 Design and Synthesis of Peptide-Based Macrocyclic BACE1 Inhibitors with Optimal Cross-Linking Structure for Hydrophobic Interaction

Takuya Otani[1], Kazuya Kobayashi[1], Yasunao Hattori[2], Kenichi Akaji[1]
[1]Department of Medicinal Chemistry, Kyoto Pharmaceutical University, Japan,
[2]Center for Instrumental Analysis, Kyoto Pharmaceutical University, Japan

PA-092 Design and Synthesis of Piperidine Derivatives as Small Molecule Inhibitors of the SARS Corona Virus 3CL Protease

Takumi Onuma[1], Masaki Wakabayashi[1], Shigekazu Yano[1], Kenichi Akaji[2], Hiroyuki Konno[1]
[1]Department of Biochemical Engineering, Graduate School of Science and Technology, Yamagata University, Yonezawa, Yamagata 992-8510, Japan,
[2]Department of Medicinal Chemistry, Kyoto Pharmaceutical University, Yamashina-ku, Kyoto 607-8412, Japan

PA-093 Ribosomal expression of cyclic peptides bearing L-boronophenylalanine and L-carboranylalanine to discover peptide ligands for boron neutron capture therapy

Yizhen Yin[1], Nobuaki Ochi[2], Nagio Takigawa[2], Hiroaki Suga[1]
[1]Department of Chemistry, Graduate School of Science, The University of Tokyo,
[2]Department of General Internal Medicine 4, Kawasaki Medical School

PA-094 Development of Antimicrobial Peptide that Inhibits Bacterial Transcription Initiation

Kim Phuong Huynh Nhat, Shunsuke Tagami
RIKEN Center for Biosystems Dynamics Research (BDR)

PA-095 Development of anti-cancer peptide based on prohibitin 2

Keitaro Anyoji[1], Keisuke Aihara[1], Teturo Yoshimaru[2], Akira Shigenaga[1], Toyomasa Katagiri[2], Akira Otaka[1]
[1]Institute of Biomedical Sciences and Graduate School of Pharmaceutical Sciences, Tokushima University, Tokushima, Tokushima, 770-8505, Japan,
[2]Division of Genome Medicine, Institute for Genome Research, Tokushima University, Tokushima, Tokushima, 770-8503, Japan

PA-096 Evaluation of the Effect of Amide-to-ester Substitution on Membrane Permeability and Tertiary Structure of Peptides

Yuki Hosono, Yui Sakurai, Jumpei Morimoto, Shinsuke Sando
Department of Chemistry and Biotechnology, Graduate School of Engineering, The University of Tokyo

PA-097 Development of CCAP method enabling IgG-Fc site specific modification and design of bispecific antibody using VHH antibody

Satoshi Kishimoto, Md Abdur Rafique, Nobuyuki Nagamizo, Yu Orikono, Haruka Morimitsu, Dai-ichiro Kato, Yuji Ito
Graduate School of Science and Engineering, Kagoshima University

PA-098 Design of Potent And Selective Cathepsin G Inhibitors Based on the Sunflower Trypsin Inhibitor-1 Scaffold

Choi Yi Li, Simon de Veer, Joakim Swedberg, David Craik
Institute for Molecular Bioscience. University of Queensland

PA-099 New Tripeptide for Antipruritic Agent

Soichiro Ishida[1], Shinobu Sakurada[2], Hirokazu Mizoguchi[2], Chigusa Seki[1], Koji Uwai[1], Yuko Okuyama[2], Hiroto Nakano[1]
[1]*Graduate School of Engineering Muroran Institute of Technology,*
[2]*Department of Physiology and Anatomy, Faculty of Pharmaceutical Sciences, Tohoku Medical and Pharmaceutical University*

PA-100 Structure-Activity Relationship Study of an Antibody-Binding Peptide for the Preparation of Antibody-Drug Conjugate

Kyohei Muguruma[1], Konomi Fujita[1], Akane Fukuda[1], Satoshi Kishimoto[2], Risako Arima[1], Akihiro Taguchi[1], Kentaro Takayama[1], Atsuhiko Taniguchi[1], Yuji Ito[2], Yoshio Hayashi[1]
[1]*Department of Medicinal Chemistry, Tokyo University of Pharmacy and Life Sciences,*
[2]*Department of Chemistry and Bioscience, Graduate School of Science and Engineering, Kagoshima University*

PA-101 Synthesis and structure-activity relationship study of an antibody-binding peptide focused on the C-terminal histidine residue

Mayu Ito[1], Kyohei Muguruma[1], Akane Fukuda[1], Satoshi Kishimoto[2], Akihiro Taguchi[1], Kentaro Takayama[1], Atsuhiko Taniguchi[1], Yuji Ito[2], Yoshio Hayashi[1]
[1]*Department of Medicinal Chemistry, Tokyo University of Pharmacy and Life Sciences,*
[2]*Department of Chemistry and Bioscience, Graduate School of Science and Engineering, Kagoshima University*

PA-102 Canceled

PA-103 CM-10K, A Novel Peptide Analogue Designed from Cecropin A-Melittin Hybrid Peptide, Showed A Promising Antibacterial Activity, Antibiofilm and Stability

Natthaporn Klubthawee, Ratchaneewan Aunpad
Graduate Program in Biomedical Sciences, Faculty of Allied Health Sciences, Thammasat University, Pathum Thani, Thailand

PA-104 Antimicrobial and Antibiofilm Activities of CM-10K14K, A Novel Modified Peptide Analogue, against *Staphylococcus epidermidis*

Mathira Wongchai, Ratchaneewan Aunpad
Graduate Program in Biomedical Sciences, Faculty of Allied Health Sciences, Thammasat University, Pathum Thani, Thailand

PA-105 Generation of Helix-Loop-Helix Peptide Inhibitor of the Interaction between Human CTLA-4 and B7

Tharanga Madhushani Ramanayake[1], Daisuke Fujiwara[2], Masataka Michigami[2], Kikuya Sugiura[1], Ikuo Fujii[2]
[1]*Department of Veterinary Science, Graduate School of Life and Environmental Sciences, Osaka Prefecture University, 1-58 Rinku-oraikita, Izumisano, Osaka 598-8531, Japan,*
[2]*Department of Biological Science, Graduate School of Science, Osaka Prefecture University, 1-1 Gakuen-cho, Naka-ku, Sakai, Osaka 599-8531, Japan*

PA-106 Development and Biological Evaluation of Echinomycin Analogues for Antitumor Drug

Kota Koike[1], Masahiro Ebihara[2], Tasuku Hirayama[1], Mieko Tsuji[1], Hideko Nagasawa[1]
[1]*Department of Pharmaceutical Science, Graduate School of Gifu Pharmaceutical University,*
[2]*Faculty of Engineering, Gifu University*

PA-107 Epinecidin-1 protects mice from LPS-induced endotoxemia and cecal ligation and puncture-induced polymicrobial sepsis

Bor-Chyuan Su[1], Han-Ning Huang[1], Tai-Wen Lin[2], Chwan-Deng Hsiao[2], Jyh-Yih Chen[1]
[1]*Marine Research Station, Institute of Cellular and Organismic Biology, Academia Sinica,*
[2]*Institute of Molecular Biology, Academia Sinica*

PA-108 Low Nano-Molar Concentration of Colistin Can Potentiate and Reposition Gram-Positive Antibiotics against Gram-Negative Bacteria In Vitro and In Vivo

Doyeon Jo
Department of Chemistry Education, Graduate School of Science Education, Seoul National University

PA-109 Dietary Peptide IRW Activates Mitochondrial Biogenesis Complex

Khushwant Singh Bhullar[1,2], Basil P. Hubbard[2], Jianping Wu[1]
[1]*Department of Agricultural, Food & Nutritional Science, University of Alberta, Edmonton, Alberta, Canada,*
[2]*Department of Pharmacology, University of Alberta, Edmonton, Alberta, Canada*

PA-110 Chemical Synthesis of Albumin Binding Helix-loop-helix Peptide-Insulin Conjugates for Long-acting Insulin

Yuto Nakatani, Shohei Ashida, Zhengmao Ye, Masataka Michigami, Ikuo Fujii
Department of Biological Science, Graduate School of Science, Osaka Prefecture University

PA-111 Sansanmycin Natural Product Analogues as Potent and Selective Anti-Mycobacterials that Inhibit Lipid I Biosynthesis

Jason Johansen-Leete[1], Anh T. Tran[1], Emma E. Watson[1], Wendy Tran[1], Venugopal Pujari[2], Trent Conroy[1], Luke J. Dowman[1], Andrew M. Giltrap[1], Angel Pang[1], Weng R. Wong[4], Roger G. Linington[5], Sebabrata Mahapatra[2], Jessica Saunders[1], Susan A. Charman[6], Nicholas P. West[7], Timothy D.H. Bugg[8], Dean C. Crick[2], Warwick J. Britton[3], Richard J. Payne[1]
[1]*School of Chemistry, The University of Sydney,*
[2]*Mycobacteria Research Laboratories, Department of Microbiology, Immunology and Pathology, Colorado State University,*
[3]*Centenary Institute and Sydney Medical School, The University of Sydney,*
[4]*Department of Chemistry and Biochemistry, University of California, Santa Cruz, California,*
[5]*Department of Chemistry, Simon Fraser University, Burnaby, British Columbia, Canada,*
[6]*Centre for Drug Candidate Optimisation, Monash University, Melbourne, Victoria 3052, Australia,*
[7]*School of Chemistry and Molecular Biosciences, University of Queensland, Brisbane, Queensland 4067, Australia,*
[8]*Department of Chemistry, University of Warwick, Coventry CV4 7AL, UK*

PA-112 Screening of KRAS-Binding peptides from Positional-Scanning Library using IDNCL-ER Detection System

Meiko Fujioka, Tsuyoshi Takahashi
Graduate School of Science and Technology, Gunma University

PA-113 Disruption of tetramerization of BCR-ABL1 kinase by cell-permeable macrocyclic peptides

Yen-Hua Huang[1], Toby Passioura[2], Hayden Peacock[1,2], Conan K. Wang[1], Quentin Kaas[1], Hiroaki Suga[2], David J. Craik[1]
[1]*Institute for Molecular Bioscience, The University of Queensland,*
[2]*Department of Chemistry, Graduate School of Science, The University of Tokyo, 7-3-1 Bunkyo-ku, Tokyo 113-0033, Japan*

PA-114 HIV-1 Fusion Inhibitors Based on gp41-C34 dimers

Kento Ebihara[1], Yuzuna Honda[1], Takuya Kobayakawa[1], Tsutomu Murakami[2], Hirokazu Tamamura[1]
[1]*Institute of Biomaterials and Bioengineering, Tokyo Medical and Dental University,*
[2]*AIDS Research Center, National Institute of Infectious Diseases*

PA-115 Discovery and Characterization of Novel Cyclotides from Hybanthus Enneaspermus

Qingdan Du, Lai Yue Chan, Yen-Hua Huang, Quentin Kaas, Edward K. Gilding, David J. Craik
Institute for Molecular Bioscience

PA-116 Canceled

Cell-Penetrating Peptides and Drug Delivery

PA-117 Development of Cell-Penetrating Peptide Foldamers for siRNA Delivery

Takashi Misawa[1], Nobumichi Ohoka[2], Makoto Oba[3], Masakazu Tanaka[3], Mikihiko Naito[2], Yosuke Demizu[1]
[1]*Division of Organic Chemistry, National Institute of Health Sciences, 3-25-26, Tonomachi, Kawasaki-ku, Kawasaki-shi, Kanagawa 210-9501, Japan,*
[2]*Division of Molecular Target and Gene Therapy Products, National Institute of Health Sciences, 3-25-26, Tonomachi, Kawasaki-ku, Kawasaki-shi, Kanagawa 210-9501, Japan,*
[3]*Graduate School of Biomedical Sciences, Nagasaki University, Bunkyo-machi, Nagasaki 852-8521, Japan*

PA-118 Fractional laser ablation promotes cutaneous absorption of peptides in inflamed skin

Jia-You Fang[1], Pei-Ying Liu[1], Woan-Ruoh Lee[2], Shing-Chuan Shen[2]
[1]*Graduate Institute of Natural Products, Chang Gung University,*
[2]*Graduate Institute of Medical Sciences, Taipei Medical University*

PA-119 Pharmacokinetic Control of Cyclosporine A by Flash Nanoprecipitation Method for the Treatment of Inflammatory Bowel Diseases

Kohei Yamada[1], Yuki Kaneko[1], Hoang D. Lu[2], Yoshiki Seto[1], Hideyuki Sato[1], Robert K. Prud'homme[2], Satomi Onoue[1]
[1]*Department of Pharmacokinetics and Pharmacodynamics, School of Pharmaceutical Sciences, University of Shizuoka,*
[2]*Department of Chemical & Biological Engineering, Princeton University*

PA-120 Complexation of Nucleic Acids and Carrier Peptide to Improve Nucleic Acids Release Activity for Intracellular Drug Delivery

Yuta Uematsu[1], Shunsuke Kataoka[1], Masayuki Yamasaki[2], Jun Hayashida[3], Kin-ya Tomizaki[1]
[1]Department of Materials Chemistry, Ryukoku University,
[2]Department of Food Science and Human Nutrition, Ryukoku University, [3]Sogo Pharmacentical Co.

PA-121 Design of Organelle-Specific Cell Penetrating Peptides

Shining Loo, Antony Kam, Clarence Tsun Ting Wong, James P. Tam
School of Biological Sciences, Nanyang Technological University, Singapore 637551

PA-122 Cytosolic delivery of monobody inhibitors using bacterial toxin subunits

Nadine Eliane Schmit[1], Katyayanee Neopane[1], Tim Kükenshöner[1], Oliver Hantschel[1], Shohei Koide[2]
[1]Swiss Institute for Experimental Cancer Research, Ecole Polytechnique Fédérale de Lausanne, Switzerland,
[2]Perlmutter Cancer Center, New York University Langone Medical Center, New York, USA

PA-123 Delivery of siRNA and microRNA into Cells by Aib-containing Amphipathic Helical Peptides

Shun-ichi Wada[1], Kohei Taniguchi[2], Hiroaki Hamazaki[1], Azusa Yamada[1], Junsuke Hayashi[1], Kazuhisa Uchiyama[2], Hidehito Urata[1]
[1]Department of Bio-Organic Chemistry, Osaka University of Pharmaceutical Sciences,
[2]Department of General and Gastroenterological Surgery, Osaka Medical College

PA-124 Identified Macropinocytosis-inducing Peptide and Its Mode-of-Action

Jan Vincent V. Arafiles, Kenichi Kawano, Shiroh Futaki
Institute for Chemical Research, Kyoto University, Uji City, Japan 611-0011

PA-125 Construction of a Library of Isoprenylated Macrocyclic Peptides Using FIT

Ata Abbas, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PA-126 Positioning of Glutamates in the Design of Endosomolytic Peptides

Naoki Tamemoto, Misao Akishiba, Kentarou Sakamoto, Shiroh Futaki
Biofunctional design chemistry, Institute for Chemical Research, Kyoto University

PA-127 Selective Carborane-Peptide Conjugates as Potential Boron Delivery Agents

Paul Hoppenz[1], Sylvia Els-Heindl[1], Evamarie Hey-Hawkins[2], Annette G. Beck-Sickinger[1]
[1]Institute of Biochemistry, Leipzig University, Brüderstrasse 34, 04103 Leipzig, Germany,
[2]Institute of Inorganic Chemistry, Leipzig University, Johannisallee 29, 04103 Leipzig, Germany

PA-128 Water-soluble prodrug of ritonavir

Yoshio Hamada, Kenji Usui
Konan University

PA-129 Development of Apoptosis-Inducing Peptides Activated by External Stimuli

Mizuki Kitamatsu[1], Takashi Ohtsuki[2]
[1]Department of Applied Chemistry, Faculty of Science and Engineering, Kindai University,
[2]Department of Applied Chemistry and Biotechnology, Faculty of Engineering, Okayama University

PA-130 Efficient Intracellular Delivery of Cyclized Helix-Loop-Helix Peptides by Conjugation of Cell-Penetrating Peptides

Shunsuke Inaura, Hidekazu Kitada, Kazunori Zikihara, Masataka Michigami, Daisuke Fujiwara, Ikuhiko Nakase, Ikuo Fujii
Department of Biological Science, Graduate School of Science, Osaka Prefecture University

PA-131 Analysis of Cellular Uptake Property of Negatively Charged Amphiphilic α-Helix Peptides

Reina Hiroshige, Takayuki Miki, Hiroshi Tsutsumi, Hisakazu Mihara
School of Life Science and Technology, Tokyo Institute of Technology

PA-132 Molecular Simulation on Permeability of Middle-Sized Molecules across Lipid Bilayer Membranes

Kanade Shimizu[1], Sundaram Arulmozhiraja[1,2], Yuta Yamamoto[1], Katsumi Maenaka[2,3], Satoshi Ichikawa[2,3], Hiroaki Tokiwa[1,2]
[1]Department of Chemistry, Rikkyo University,
[2]AMED-CREST, Japan Agency for Medical Research and Development (AMED),
[3]Faculty of Pharmaceutical Science, Hokkaido University

PA-133 Optimization of Dimeric Bundle Type Amphipathic Cell Penetrating Peptide

Jane Cho, Jihyun Hong, Soonsil Hyun, Jaehoon Yu
Department of Chemistry and Education, Seoul National University

PA-134 Targeting Mitochondria of Malaria Gametocyte as a Novel Approach for Antimalarial Therapy

Sangdao Somsri[1], Mathirut Mungthin[2], Warunee Hanpithakpong[3], Poom Adisakwattana[4], Rachanee Udomsangpetch[5], Markus Winterberg[3], Ratchaneewan Aunpad[1]
[1]Graduate Program in Biomedical Sciences, Faculty of Allied Health Sciences, Thammasat University, Pathum Thani, Thailand,
[2]Department of Parasitology, Phramongkutklao College of Medicine, Ratchathewi, Bangkok, Thailand,
[3]Mahidol-Oxford Tropical Medicine Research Unit, Faculty of Tropical Medicine, Mahidol University, Bangkok, Thailand,
[4]Department of Helminthology, Faculty of Tropical Medicine, Mahidol University, Bangkok, Thailand,
[5]Center for Research and Innovation, Faculty of Medical Technology, Mahidol University, Bangkok, Thailand

PA-135 Development of a T Cell Selective Penetrating Peptide Modified from the Amphiphatic Cell Penetrating Peptide

Dongwoo Kim[1], Minkyoung Kim[2], Joonkyu Lee[2], Jaehoon Yu[1]
[1]Department of Chemistry & Education, Seoul National University,
[2]Department of Biology & Education, Seoul National University

PA-136 Oligomer Formation of Dimeric Bundle Peptide Leads to Cell Penetration

Soonsil Hyun[1], Yuno Lee[2], Sun Mi Jin[1], Jane Cho[1], Jeemin Park[3], Changbong Hyeon[2], Key-Sun Kim[3], Yan Lee[4], Jaehoon Yu[1]
[1]Department of Chemistry & Education, Seoul National University, [2]Korea Institute for Advanced Study,
[3]Neuroscience, Research Animal Resource Center, Korea Institute of Science and Technology,
[4]Department of Chemistry, Seoul National University

PA-137 Design and Synthesis of Cyclic Disubstituted Amino Acids for Development of Cell Penetrating Peptide

Takuma Kato[1], Akiko Asano[1], Makoto Oba[2], Masakazu Tanaka[2], Mitsunobu Doi[1]
[1]Osaka University of Pharmaceutical Sciences, [2]Graduate School of Biomedical Sciences, Nagasaki University

PA-138 Improvement of Membrane Permeability of Cyclic Peptides by Conformational Restriction Using Cyclopropane

Mizuki Watanabe, Yukina Sato, Mai Uemura, Nanami Kato, Kouhei Matsui, Hayato Fukuda, Yoh Takekuma, Mitsuru Sugawara, Satoshi Shuto
Faculty of Pharmaceutical Sciences, Hokkaido University

PA-139 Combination of the Amphipathic Short AMP $(RW)_3$ with the CPP R_4: Addition and Conjugation to Enhance Anticandidal Activity

Nancy M. Okuda-Shinagawa, M. Teresa Machini
Department of Biochemistry, Institute of Chemistry, University of Sao Paulo

PA-140 Development of Lysosomal Enzyme Replacement Therapy Using the H16 Peptide

Taiki Hayashi[1], Matsumi Shinagawa[2], Riku Okamoto[2], Tsuyoshi Kawano[1,2], Takashi Iwasaki[1,2]
[1]Graduate School of Sustainability Science, Tottori University, [2]Faculty of Agriculture, Tottori University

PA-141 Sustained-release Particles of Salmon Calcitonin Prepared with Fine Droplet Drying Process for Inhalation

Hideyuki Sato[1], Aiko Tabata[1], Shizuka Sambuissho[1], Tatsuru Moritani[2], Tadahiko Morinaga[2], Takahiro Mizumoto[3], Yoshiki Seto[1], Satomi Onoue[1]
[1]Department of Pharmacokinetics and Pharmacodynamics, School of Pharmaceutical Sciences, University of Shizuoka,
[2]RICOH Company, Ltd., [3]ILS Inc.

PA-142 Analysis of Direct penetration Activity of Cell-penetrating Peptides using the Membrane Current Measurements in Microfablicated Devices

Naoki Saigo[1], Keisuke Shimizu[1], Kayano Izumi[1], Ryuji Kawano[1], Akira Ishiguro[2], Yukihito Ishizaka[2]
[1]Department of Life Science and Biotechnology, Tokyo University of Agriculture and Technology,
[2]Department of Intractable Diseases, National Center for Global Health and Medicine

PA-143 Cyclisation of Cell-Penetrating Peptides: Impact on Direct Translocation and Glycosaminoglycan-Dependent Endocytosis

Mehdi Amoura[1], Françoise Illien[1], John Offer[2], Sandrine Sagan[1], Fabienne Burlina[1]
[1]Laboratoire des Biomolécules, UMR 7203, Sorbonne Université - CNRS - ENS, Paris, France,
[2]The Francis Crick Institute, London, UK

PA-144 Influence of the side chain structure on the anti-leishmanial effect of methotrexate conjugates with polymeric branched chain polypeptides

Rita Szabó[1], Mónika Sebestyén[1], György Kóczán[1], Maria Ángeles Abengózar[2], Montserrat Nacher Vazquez[2], Luis Rivas[2], István Kucsera[3], Erika Orosz[3], Ferenc Hudecz[1,4]
[1]MTA-ELTE Research Group of peptide Chemistry, Budapest, Hungary,
[2]Centro de Investigaciones Biologicas (CIB-CSIC), Physico-Chemical Biology Department, Madrid, Spain,
[3]Department of Parasitology, National Institute of Environmental Health, Budapest, Hungary,
[4]Department of Organic Chemistry, Eötvös L. University, Budapest, Hungary

Peptide-Membrane Interaction

PA-145 Bactericidal Efficiency, Cell Selectivity, Mechanism and LPS-neutralizing Activity of Antimicrobial Peptides Derived from the C-terminal Region of Human Chemokine CXCL14

Sukumar Dinesh Kumar, Ganesan Rajasekaran, Song Yub Shin
Department of Medical Science, Graduate School and Department of Cellular and Molecular Medicine, Chosun University, Gwangju, 61452, Republic of Korea

PA-146 Antimicrobial Activity, Cell Selectivity, Action Mechanism and Endotoxin-neutralizing Activity of LL-37-derived 12-meric Antimicrobial Peptide and its D-amino Acid Substituted Analogs

Eun Young Kim, Song Yub Shin
Department of Medical Science, Graduate School and Department of Cellular and Molecular Medicine, Chosun University, Gwangju, 61452, Republic of Korea

PA-147 Pyrazole-derived Peptidomimetics with Antimicrobial and Anti-inflammatory Activities

Ajish Chelladurai[1], Jeong Kyu Bang[2], Song Yub Shin[1]
[1]Department of Medical Science, Graduate School and Department of Cellular and Molecular Medicine, Chosun University, Gwangju, 61452, Republic of Korea,
[2]Division of Magnetic Resonance, Korea Basic Science Institute, Ochang, Chung-Buk, 363-883, Republic of Korea

PA-148 Membrane-Active Properties of an Amphitropic Peptide from the CyaA Toxin

Alexis Voegele[1,2], Orso Subrini[3], Nicolas Sapay[4], Daniel Ladant[1], Alexandre Chenal[1]
[1]Unité Biochimie des Interactions Macromoléculaires, Département de Biologie Structurale et Chimie, Institut Pasteur, 75015 Paris, France,
[2]Université Paris Diderot Paris VII, 75013 Paris, France,
[3]Institut de Biologie Structurale, 38044 Grenoble, France, [4]Bioaster Technology Research Institute Lyon, France

PA-149 Structural Determinants of Membrane Curature Inducing Peptide

Motoki Nishimura, Toshihiro Masuda, Kenichi Kawano, Shiroh Futaki
Biofunctional Design Chemistry, Institute for Chemical Research, Kyoto University, Japan

PA-150 Single-pair FRET measurement of GXXXG-mediated transmembrane helix associations –the effect of surrounding residues–

Takayuki Morise, Yoshiaki Yano, Katsumi Matsuzaki
Kyoto University

PA-151 Promoting Accumulation of Curvature-inducing Peptides on Cell Membranes

Takayuki Sakai, Kenichi Kawano, Shiroh Futaki
Institute for Chemical Research, Kyoto University

PA-152 Membrane-bound structure and membrane selectivity of cationic antimicrobial peptide Hymenochirin-1Pa as studied by circular dichroism, solid-state NMR and molecular dynamics simulation

Akifumi Ohyama[1], Batsaikhan Mijiddorj[2,3], Kazuyoshi Ueda[2], Izuru Kawamura[1,2]
[1]Graduate School of Engineering and Science, Yokohama National University, Yokohama, Japan,
[2]Graduate School of Engineering, Yokohama National University, Yokohama, Japan,
[3]School of Engineering and Applied Sciences, National University of Mongolia, Ulaanbaatar, Mongolia

PA-153 Peptide to Modulate Membrane Tension: The Effect on Actin Organization, Cell Structure and the Movement

Toshihiro Masuda[1], Kentarou Baba[2], Tomo Murayama[1], Naoyuki Inagaki[2], Shiroh Futaki[1]
[1]Department of Biofunctional Chemistry, Graduate School of Pharmaceutical Sciences, Kyoto University,
[2]Division of Biological Science, Nara Institute of Science and Technology

PA-154 Structural Requirements of Signal Peptide for Secretion of Lysozyme in Eukaryotes

Yoshinori Tsuchiya[1], Hiroshi Iseki[1], Mitsutaka Ikezawa[1], Asami Nishimori[1], Kanae Hiramatsu[2], Satoko Watanabe[1], Takako Suzuki[1], Masato Ohta[1], Masaji Mase[1]

[1]Division of Viral Diseases & Epidemiology Research, National Institute of Animal Health,

[2]Oita Livestock Hygiene Service Center

PA-155 Ion-Pair···π Interactions in GAG-Dependent Cell Penetration of Arg/Trp-Rich Peptides

Sandrine Sagan[1], Astrid Walrant[1], Antonio Bauzá[2], Isabel D. Alves[3], Sophie Lecomte[3], Françoise Illien[1], Sébastien Cardon[1], Fabienne Burlina[1], Antonio Frontera[2]

[1]Sorbonne Université, École normale supérieure, PSL University, CNRS, Laboratoire des Biomolécules, LBM, 75005 Paris, France,

[2]Department de Química, Universitat de les Illes Balears, Palma de Mallorca, Baleares, Spain,

[3]Université de Bordeaux, Institut de Chimie et Biologie des Membranes et des Nano-objets, CNRS UMR 5248, Pessac, France

PA-156 Scaffolds for Ion Binding, Halide and Divalent Cation Transport

Parichita Saha, Nandita Madhavan

Department of Chemistry, Indian Institute of Technology Bombay, India

PA-157 Detecting Highly Curved Membranes by Amphipathic Peptides

Masaya Ogushi, Toshihiro Masuda, Kenichi Kawano, Shiroh Futaki

Institute for Chemical Research, Kyoto University

PA-158 De Novo Design of Nanopore-Forming Transmembrane Peptide with β-sheet Structure

Keisuke Shimizu[1], Naoki Saigo[1], Shungo Sakashita[2], Yoshio Hamada[2], Kenji Usui[2], Batsaikhan Mijiddorj[3], Izuru Kawamura[3], Ryuji Kawano[1]

[1]Department of Life Science and Biotechnology, Tokyo University of Agriculture and Technology, Japan,

[2]Faculty of Frontiers of Innovative Research in Science and Technology, Konan University, Japan,

[3]Department of Materials Science and Engineering, Yokohama National University, Japan

PA-159 Synthesis, conformational analysis and antibacterial activity of amphiphilic diphenylacetylene-based peptidomimetics

Hayden Peacock[1], Sónia Troeira Henriques[2], Aurélie H. Benfield[2], James Luccarelli[3], Alysha G. Elliott[2], Jinghui Luo[4], David Craik[2], Andrew D. Hamilton[5]

[1]Department of Chemistry, Graduate School of Science, The University of Tokyo, Japan,

[2]Institute for Molecular Bioscience, The University of Queensland, Australia,

[3]Dana-Farber Cancer Institute, USA, [4]Paul Scherrer Institut, Switzerland,

[5]Department of Chemistry, New York University, USA

PA-160 Analysis of Electrostatic Interaction of Transmembrane Peptide of Insulin Receptor with Ganglioside GM3

Yuka Nimura[1], Kazuya Kabayama[1,3], Yuya Asahina[2], Shinya Hanashima[1], Hironobu Hojo[2], Michio Murata[1], Koichi Fukase[1,3]

[1]Grad. Sch. of Sci., Osaka Univ., [2]Inst. for Protein Research, Osaka Univ.,

[3]MS-CORE, PRC, Grad. Sch. of Sci., Osaka Univ.

PA-161 Evaluation of channel formation of Aβ42 in the planar lipid bilayer in microfabricated devices

Yuri Numaguchi, Keisuke Shimizu, Kaori Tsukakoshi, Kazunori Ikebukuro, Ryuji Kawano
Department of Biotechnology and Life Science, Tokyo University of Agriculture and Technology

PA-162 Membrane interactions of a D-amino acid containing antimicrobial peptides as revealed by experimental and theoretical methods

Batsaikhan Mijiddorj[1,2], Shiho Kaneda[1], Hisako Sato[3], Yuta Matsuo[1], Namsrai Javkhlantugs[2], Akira Naito[1], Kazuyoshi Ueda[1], Izuru Kawamura[1]
[1]*Graduate School of Engineering, Yokohama National University, Yokohama, Japan,*
[2]*School of Engineering and Applied Sciences, National University of Mongolia, Ulaanbaatar, Mongolia,*
[3]*Graduate School of Science and Engineering, Ehime University, Matsuyama, Japan*

PA-163 Roles of Lipid Rafts in HIV Membrane Fusion

Sungtae Yang
Department of Microbiology, School of Medicine, Chosun University, South Korea

PA-164 Self-assembly-directed Cancer Cell Membrane Insertion

Enming Du[1], Xunwu Hu[1], Guanying Li[1], Dingze Mang[1], Sona Roy[1], Toshio Sasaki[2], Ye Zhang[1]
[1]*Bioinspired Soft Matter Unit, Okinawa Institute of Science and Technology,*
[2]*Imaging Section, Okinawa Institute of Science and Technology*

PA-165 Computational Design of Transmembrane Peptides: Self-Assembly at Atomic Accuracy and "Antibody-like" Inhibitors of Cell Signaling Membrane Proteins

Marco Mravic[1], Li He[2], Daniel DiMaio[2], William F. DeGrado[1]
[1]*Department of Pharmaceutical Chemistry, University of California San Francisco,*
[2]*Department of Genetics, Yale University*

Peptide Biophysics and Analytical Methods

PA-166 Identification of Binding Peptides Targeting Active Center for Ser/Thr Protein Phosphatases

Takuya Yoshida, Kazuki Yamazaki, Kodai Otsubo, Takashi Yoneda, Atsushi Kaneko, Hiroto Tashiro, Yoshiro Chuman
Department of Chemistry, Faculty of Science, Niigata University

PA-167 The role of tyrosine oxidation in structures and properties of neurodegenerative peptides and proteins

Petr Niederhafner[1,2], Eva Brichtova[1], Martin Safarik[1], Timothy A. Keiderling[3], Jaroslav Sebestik[1]
[1]*Department of Biomolecular Spectroscopy, Institute of Organic Chemistry and Biochemistry, Academy of Sciences of the Czech Republic, Flemingovo nam 2, 166 10 Prague, Czech Republic,*
[2]*Department of Chemistry of Natural Compounds, Faculty of Food and Biochemical Technology, University of Chemistry and Technology, Prague, Technická 5, 166 28 Prague 6, Czech Republic,*
[3]*Department of Chemistry, University of Illinois at Chicago, 845 W. Taylor St., Chicago, IL 60607-7061 (USA)*

PA-168 Predicting Connectivities and Conformations of Disulfide Bonds Using Chemical Shifts

K. Johan Rosengren[1], David A. Armstrong[1], Quentin Kaas[2]
[1]*University of Queensland, School of Biomedical Sciences,*
[2]*University of Queensland, Institute for Molecular Bioscience*

PA-169 Design of Bile Acid Binding Peptides for Inhibition of Intestinal Cholesterol Absorption Using Principal Component Analysis

Masako Ito, Kazunori Shimizu, Hiroyuki Honda
Department of Biomolecular Engineering, Graduate School of Engineering, Nagoya University

PA-170 Molecular simulation of short peptides using the SAAP force field : Effects of a distance-dependent dielectric constant

Koji Yoshida, Taku Shimosato, Michio Iwaoka
Department of Chemistry, School of Science, Tokai University

PA-171 Mechanisms of self-association of amyloid precursor protein and C99 in living cells

Toru Kosaka, Yoshiaki Yano, Katsumi Matsuzaki
Department of Biophysical Chemistry, Graduate School of Pharmaceutical Sciences, Kyoto University

PA-172 Binding Mechanism of Glycopeptide Derived from HSV-1 with Human Immune Receptor PILRα

Takao Nomura[1], Mikihiro Ishizuka[3], Kosuke Kakita[2], Atsushi Furukawa[3], Masahiro Anada[2], Shunichi Hashimoto[2], Shigeki Matsunaga[2], Takashi Saitoh[4], Katsumi Maenaka[1,3]
[1]*CRED, Faculty of Pharmaceutical Sciences, Hokkaido University,*
[2]*Laboratory of Synthetic and Industrial Chemistry, Faculty of Pharmaceutical Sciences, Hokkaido University,*
[3]*Laboratory of Biomolecular Science, Faculty of Pharmaceutical Sciences, Hokkaido University,*
[4]*School of Pharmacy, Hokkaido University of Science*

PA-173 Development of peptide-anchored planar lipid bilayers

Yusuke Higashi, Yoshiaki Yano, Katsumi Matsuzaki
Graduate School of Pharmaceutical Sciences, Kyoto University

PA-174 Detection of ubiquitination activities of artificial RING fingers in human breast cancer cells

Kazuhide Miyamoto, Arisa Nakatani, Mayumi Sunagawa, Kazuki Saito
Department of Pharmaceutical Health Care, Faculty of Pharmaceutical Sciences, Himeji Dokkyo University

PA-175 Exploring amino acid residues for regulating E2 specificity of artificial RING fingers

Ayumi Yamashita, Kazuki Saito, Kazuhide Miyamoto
Division of Bioanalytical Chemistry, Faculty of Pharmaceutical Sciences, Himeji Dokkyo University

PA-176 Reversible Control of DNA Binding of GAL4 Transcription Factor by a Cyclodextrin-porphyrin Supramolecular Complex

Shigeru Negi[1], Takuya Ogasawara[1], Haruka Iede[1], Nobuyuki Kawamura[1], Hiroaki Kitagishi[2], Koji Kano[2], Yukio Sugiura[1]
[1]*Faculty of Pharmaceutical Sciences, Doshisha Women's University,*
[2]*Facutly of Science and Engineering, Doshisha University*

PA-177 Polyion Complexation between Oligoarginine and Genomic DNA Depends on the Oligoarginine Chain Length

Amon Kamiya, Yukio Sugiura, Shigeru Negi
Doshisha Women's University

PA-178 Coexistence of a Metal Ion Effect on Reduction Reactions by Mono Thiol Reagents with an Oxidized GAGA Zinc Finger Protein

Rina Hashimoto[1], Kana Okita[1], Yuka Nakagawa[2], Yukio Sugiura[1], Shigeru Negi[1]
[1]Doshisha Women's University, [2]Graduate School of Life Science University of Hyogo

PA-179 Secondary Structure Evaluation of Helical Model Peptides Containing Aromatic Amino Acids

Keita Shigedomi[1], Satoshi Osada[1], Masoud Jelokhani-Niaraki[2], Hiroaki Kodama[1]
[1]Department of Chemistry and Applied Chemistry, Faculty of School and Engineering, Saga University, [2]Department of Chemistry and Biochemistry, Wilfrid Laurier University

PA-180 Separation Study of Synthetic Peptides by High-Performance Cation Exchange Chromatography

Toshito Kamichika[1], Fumiya Nakata[1], Mitsuhiro Inui[2], Kazuaki Muranaka[2], Akira Kobayashi[1]
[1]Customer Support Center, Tokyo Research Center, TOSOH Corporation, [2]R&D, TOSOH Corporation

PA-181 Structure and Function of the Elastin-like Short Peptide Analogs with Shuffled Sequences Based on $(FPGVG)_5$

Daiki Tatsubo[1], Keitaro Suyama[2], Iori Maeda[3], Takeru Nose[1,2]
[1]Department of Chemistry, Graduate School of Science, Kyushu University,
[2]Faculty of Arts and Science, Kyushu University,
[3]Department of Bioscience and Bioinformatics, Graduate School of Computer Science and Systems Engineering, Kyushu Institute of Technology

PA-182 Analysis of Proteins in Bombyx batryticatus and Their Quality Control

Yaya Yang, Yufei Chen, Xiaobin Jia
School of Pharmacy, Jiangsu University

PA-183 Conformational Shifts in Titin PEVK Peptides upon Various pH Environments

Sudarshi Premawardhana, MJ Gage
Department of Chemistry, University of Massachusetts Lowell, United States

PA-184 Ca^{2+}-bound coordination structural analysis of tobacco K^+ channel (NtTPK1) by infrared spectroscopy in combination with synthetic peptide analogues

Masayuki Nara[1], Wataru Hirachi[1], Hisayuki Morii[1], Nobuyuki Uozumi[2], Takuya Miyakawa[3], Masaru Tanokura[3]
[1]College of Liberal Arts and Sciences, Tokyo Medical and Dental University,
[2]Graduate School of Engineering, Tohoku University,
[3]Graduate School of Agricultural and Life Sciences, The University of Japan

PA-185 Adding Mass Detection to LC/UV Based Workflows for Routine Analysis and Monitoring of Biologics in Development and Quality Control Laboratories

Yusuke Asahi[1], Shunya Sasaki[1], Hiroko Iwasaki[1], Mariko Matsumoto[1], Brooke M. Koshel[2], Ximo Zhang[2], Robert Birdsall[2], Ying Qing Yu[2]
[1]Nihon Waters K.K., [2]Waters Corporation

Frontier of Industrial Applications

PA-186 Bitter Bioactive Peptides Derived from Food Proteins - In silico and In vitro Approach

Anna Iwaniak, Monika Hrynkiewicz, Justyna Bucholska, Malgorzata Darewicz, Piotr Minkiewicz
University of Warmia and Mazury in Olsztyn, Faculty of Food Science, Chair of Food Biochemistry, Pl. Cieszynski 1, 10-726 Olsztyn-Kortowo, Poland

PA-187 Evaluation of recrystallization inhibiting on oligo-tyrosine peptide-modified glass surface

Yoshiaki Hirano[1,2], Syoki Nagatomo[1], Kaya Ichikawa[1], Sachiro Kakinoki[1]
[1]Faculty of Chemistry, Materials and Bioengineering, Kansai University, [2]ORDIST, Kansai University

PA-188 Intestinal Delivery of Functional Peptides with Silica-gel for Application to Food Materials

Kento Imai[1], Kazunori Shimizu[1], Mitsuhiro Kamimura[2], Mitsuteru Ogawa[2], Hiroyuki Honda[1,3]
[1]Department of Biomolecular Engineering, Graduate School of Engineering, Nagoya University,
[2]Fuji Silysia Chemical LTD.,
[3]Innovative Research Center for Preventive Research Medical Engineering, Nagoya University

PA-189 Miniaturization of a Peptide Structure Potential for Selective Gold Ion Reduction from Mixtures of Noble Metal Ions

Tatsuki Tonoda[1], Takahito Imai[1], Masahiro Asano[2], Kin-ya Tomizaki[1]
[1]Department of Materials Chemistry, Ryukoku University,
[2]Department of Environmental Solution Technology, Ryukoku University

PA-190 Purification of peptides by twin-column countercurrent chromatography

Masatoshi Taniguchi[1], Thomas Müller-Späth[2], Michel Bavand[2], Noritaka Kuroda[1], Naohiro Kuriyama[1]
[1]YMC CO., LTD., Japan, [2]ChromaCon AG, Switzerland

PA-191 Convenient Preparation of Sagittatoside B, A Rare Secondary Flavonol Glycoside, by Recyclable and Integrated Biphase Enzymatic Hydrolysis

Changjie Yu, Man Wang, Mengru Wu
School of Pharmacy, Jiangsu University

PA-192 Cutting-Edge Peptide Synthesis Method

Daisuke Kubo[1], Rino Araki[1], Natsumi Iwanaga[1], Kousuke Suzuki[1], Ichiro Shima[1], Takashi Yamasaki[1], Yu Ito[1], Masayo Endo[1], Yohei Okada[2], Kazuhiro Chiba[3]
[1]JITSUBO Co.,Ltd.,
[2]Graduate School of Bio-Applications and Systems Engineering, Tokyo University of Agriculture and Technology,
[3]Department of Applied Biological Science, Tokyo University of Agriculture and Technology

PA-193 Site-selective Modification of Antibody Using Fc-binding Peptide

Sang J. Chung
School of Pharmacy, Sungkyunkwan University

PA-194 The Possibility of Creating a Novel Catalytide in PC

Rina Nakamura[1,2], Yusuke Hatakawa[3], Motomi Konishi[4], Motoaki Saito[2], Toshifumi Akizawa[1,2]
[1]O-Force Co., Ltd., [2]Medical School of Kochi University, [3]Kobe Pharmaceutical University,
[4]Faculty of Pharmaceutical Sciences, Setsunan University

PA-195 High Concentration of Peptides without Heating and High Pressure by Novel Membrane System

Fumiyoshi Inoue, Mitsuru Fujita, Masahiko Kawashima, Masato Mikawa, Noboru Kubota
R&D Center, Corporate Research & Development, ASAHI KASEI CORPORATION

PA-196 Development Towards Powdered Dipeptide Derivatives Including α,α-Disubstituted Amino Acids

Sayoko Murakami[1], Kenichiro Yamamoto[1], Keisuke Matsuyama[2]
[1]Life & Healthcare Products Department, NAGASE & CO., LTD., [2]NAGASE R&D Center, NAGASE & CO., LTD.

PA-197 Novel Method for a Practical and Scalable Solid Phase Peptide Synthesis under Centrifugal Stirring

Ayaka Deguchi, Yuta Hiroyama, Fumitoshi Sumino, Rui Ono, Teruhiko Kanno, Hiroyuki Moriwaki
Hamari Chemicals, Ltd. Osaka, Japan

PA-198 Stepwise and Selective Reduction of Noble metal Precursors with combining self-assembly of Aromatic Ring Containing-Peptides and light irradiation

Takahiro Uchiyama[1], Takahito Imai[1], Masahiro Asano[2], Kin-ya Tomizaki[1]
[1]*Department of Materials Chemistry, Ryukoku University,*
[2]*Department of Environmental Solution Technology, Ryukoku University*

PA-199 Anti-wrinkle Effect of the Derivatives of Copper Tripeptide Complex

Mi Young Lee[1], Ga-Hee Hur[1], Ye Eun Jeong[1], A-Reum Ryu[1], Sand-Cheol Han[2]
[1]*SoonChunHyang University,* [2]*Dermafirm Co., Ltd.*

PA-200 *De Novo* Design of a Glucose Binding Peptide for Pharmaceutical Applications

Andres E. Castillo, Juan C. Duarte, Pedro Retamal, Fabian Gonzalez, Mitzi B. Sandoval, Francia Navarrete, Richard B. Rubin, Leonardo A. Alvarez
Protein Engineering Laboratory, Protera Biosciences

PA-201 A potent antibacterial activity of new short D-enantiomeric lipopeptide against multi drug resistant bacteria

Shanghyeon Kim[1], Jaeho Lee[1], Ji-Yeong Sim[1], Daeun Lee[1], Jae-Sam Hwang[2], Dong-Gun Lee[3], Young-Joon Kim[1], Zee-Yong Park[1], Jae-Il Kim[1]
[1]*School of Life Sciences, Gwangju Institute of Science and Technology, 123, Cheomdangwagi-ro, Buk-gu, Gwangju, 61005, Republic of Korea,*
[2]*Department of Agricultural Biology, National Academy of Agricultural Science, RDA, 166, Nongsaengmyeong-ro, Iseo-myeon, Wanju_Gun, Jeollabuk-do, 55365, Republic of Korea,*
[3]*School of Life Sciences, BK21 Plus KNU Creative BioResearch Group, College of National Sciences, Kyungpook National University, 80 Daehakro, Bukgu, Daegu 41566, Republic of Korea*

PA-202 Ahp-Cyclodepsipetides based HTRA1 Inhibitor

Steffen Köcher[1], Markus Kaiser[1], Michael Ehrmann[2], Juliana Rey[2]
[1]*University of Duisburg-Essen, Center of Medical Biotechnology, Chemical Biology,*
[2]*University of Duisburg-Essen, Center of Medical Biotechnology, Microbiology II*

Novel Synthetic Methodology

PB-001 Peptide–Hyaluronan Conjugates: Promising Scaffold for Biology and Medicine

Sergej Karel[1,2], Jana Sogorkova[1], Kristina Nesporova[1], Lukas Kubala[3], Martina Hermannova[1], Lucie Marholdova[1], Martin Flegel[2], Vladimir Velebny[1]
[1]*Contipro a.s., Dolni Dobrouc, Czech Republic,*
[2]*Department of Chemistry of Natural Compounds, University of Chemistry and Technology, Prague, Czech Republic,*
[3]*Institute of Experimental Biology, Faculty of Science, Masaryk University, Brno, Czech Republic*

PB-002 Development of Silylated Tag (STag) to Enhance Solubility of Peptides in Green Solvent

Shinya Yano, Toshihiro Mori, Hideki Kubota
Sekisui Medical Co., Ltd.

PB-003 Synthesis of histone H2A carrying *O*-(*N*-acetylglucosamine) by using novel GlcNAc-Ser unit and one-pot ligation method

Yuya Asahina, Toru Kawakami, Hironobu Hojo
Institute for Protein Research, Osaka University

PB-004 Total Solid-Phase Synthesis of Dehydroxy Fengycin Derivatives

Lidia Feliu, Cristina Rosés, Cristina Camó, Àngel Oliveras, Lluis Moll, Kristy Vogels, Nerea López, Marta Planas
LIPPSO, Department of Chemistry, University of Girona

PB-005 Bringing $\beta^{2,2}$-Amino Acids to Peptides by the Power of Asymmetric Catalysis

Hidetoshi Noda, Jin-Sheng Yu, Fuyuki Amemiya, Masakatsu Shibasaki
Institute of Microbial Chemistry

PB-006 Most Efficient Method For Synthesis and Purification of Peptides

Hossain Saneii, Farshad Karimi, William Bennett, Mandar Maduskar, Mostafa Hatam
aapptec LLC

PB-007 Playing with the Coupling Cocktails: Application of Amide Coupling Reagents for Ester Formation

Fayna Garcia Martin[1,2], Risa Takayama[1], Shun Hayakawa[1], Hiroshi Hinou[1,2], Fernando Albericio[3,4]
[1]*Graduate School of Life Science, Hokkaido University, Japan,*
[2]*Faculty of Advanced Life Science, Hokkaido University, Japan,*
[3]*Department of Organic Chemistry and CIBER-BBN, Networking Centre on Bioengineering, Biomaterials and Nanomedicine, University of Barcelona, Spain,*
[4]*School of Chemistry and Physics, University of KwaZulu-Natal, South Africa*

PB-008 Total Synthesis and Structural Revision of Cyclotetrapeptide Asperterrestide A

Kosuke Ohsawa[1], Masato Sugai[1], Linnan Zhang[1], Yuichi Masuda[2], Masahito Yoshida[1], Takayuki Doi[1]
[1]*Graduate School of Pharmaceutical Sciences, Tohoku University,*
[2]*Graduate School of Bioresources, Mie University*

PB-009 Macrocyclization of Small Peptides Enabled by Oxetane Incorporation

Ina Karina Tanja Wilkening, Stefan Roesner, George J. Saunders, Eleanor Jayawant, Joanna V. Geden, Paul Kerby, Ann M. Dixon, Rebecca Notman, Michael Shipman
University of Warwick

PB-010 Chemical Thioesterification of Unprotected Peptides based on *N-S* Acyl Transfer Reaction

Yoko Amazaki, Ryo Okamoto, Yuta Maki, Yasuhiro Kajihara
Department of Chemistry, Graduate School of Science, Osaka University

PB-011 Facile Synthesis of Cyclic Depsipeptides via *De Novo* Acyl-Transfer Motif

Masanobu Nagano[1], Hiroaki Suga[1,2]
[1]The University of Tokyo, [2]JST-CREST

PB-012 Site-specific PEGylation of Proteins by Endo-β-N-acetylglucosaminidase

Mamoru Mizuno, Kohtaro Goto, Takayuki Nakano, Takashi Sugie, Masako Mori, Masaki Kurogochi, Wataru Tsukimura, Akio Matsuda
The Noguchi Institute

PB-013 31P NMR Spectral Evidence for the Hexacoordinated Phosphorus Intermediated in the Reaction of Oxyphosphorochloridate with Amino Acid

Zhaolong Li
Department of Chemistry, Tsinghua University

PB-014 Elucidating ATP Binding to P2X Receptors Using Split-Intein-Based Protein Engineering

Iacopo Galleano, Keith Khoo, Stephan A. Pless
Department of Drug Design and Pharmacology, Center for Biopharmaceuticals, University of Copenhagen, Denmark

PB-015 Synthesis of RGD Peptides Inducing Multicellular Spheroids Formation

Thomas Christof Bruckdorfer[1], Markus Weishaupt[1], Maria Leko[2], Anna Pokhvoshcheva[2], Marina Dorosh[2], Roman Akasov[3], Elena Markvicheva[3], Sergey Burov[2]
[1]Iris Biotech GmbH, Marktredwitz, Germany,
[2]Medico-Biological Research-Industrial Complex "Cytomed", St-Petersburg, Russia,
[3]Shemyakin-Ovchinnikov Institute of Bioorganic Chemistry, Russian Academy of Sciences, Moscow, Russia

PB-016 Development of Efficient LPPS with Simple Protecting Group and Condition. The Application to Exenatide

Takahiko Murata, Shohei Yamamoto, Akira Nishiyama
Pharma & Supplemental Nutrition Solutions Vehicle, KANEKA CORPORATION

PB-017 Development of Method for Deprotection of N-Terminal Thiazolidine Derivative Using Copper Salt for Chemical Protein Synthesis

Naoto Naruse, Kiyoka Matsumoto, Akira Shigenaga, Akira Otaka
Institute of Biomedical Sciences and Graduate School of Pharmaceutical Sciences, Tokushima University, Tokushima 770-8505, Japan.

PB-018 In Vitro Selection of Anti-gliadin Single-domain Antibodies from an Alpaca-Derived VHH Library with cDNA Display

Chathuni Jayathilake[1], Shigefumi Kumachi[2], Maiko Motohashi[2], Kazuichi Murakami[3], Naoto Nemoto[1,2]
[1]Graduate School of Science and Engineering, Saitama University, 255 Shimo-Okubo, Sakura-ku, Saitama 338-8570, Japan,
[2]Epsilon Molecular Engineering, Inc., 255 Shimo-Okubo, Sakura-ku, Saitama 338-8570, Japan,
[3]Graduate School of medicine, University of the Ryukyus, 207 Uehara, Nishihara-cho, Okinawa, 903-0215, Japan

PB-019 Synthetic Study of TIGIT Protein for Mirror-Image Screening

Jumpei Sasaki, Shinsuke Inuki, Hiroaki Ohno, Shinya Oishi
Graduate School of Pharmaceutical Sciences, Kyoto University

PB-020 Development of Methodology for Cyclic Peptide Synthesis Using a Thiol-incorporated DMAP Catalyst

Kento Ohkawachi[1], Kyohei Morimoto[1], Naoto Naruse[1], Kenzo Yamatsugu[2], Akira Shigenaga[1], Motomu Kanai[2], Akira Otaka[1]
[1]Institute of Biomedical Sciences and Graduate School of Pharmaceutical Sciences, Tokushima University, Tokushima 770-8505, Japan,
[2]Graduate School of Pharmaceutical Sciences, The University of Tokyo, 7-3-1 Hongo, Bunkyo-ku, Tokyo 113-0033, Japan

PB-021 Second-Order Asymmetric Transformation and its Application for the Practical Synthesis of α-Amino Acids

Ryosuke Takeda[1], Akie Kawamura[1], Aki Kawashima[1], Junya Yamamoto[1], Tatsunori Sato[1], Hiroki Moriwaki[1], Kunisuke Izawa[1], Hidenori Abe[1], Vadim A. Soloshonok[2,3]
[1]Hamari Chemicals, Ltd. Osaka, Japan,
[2]Department of Organic Chemistry I, Faculty of Chemistry, University of the Basque Country UPV/EHU, San Sebastián, Spain,
[3]IKERBASQUE, Basque Foundation for Science, Bilbao, Spain

PB-022 Unified Solid-Phase Total Synthesis of Yaku'amide B and its Analogues

Koichi Kamiya, Tomoya Yamashita, Kensuke Miura, Hiroaki Itoh, Masayuki Inoue
Graduate School of Pharmaceutical Sciences, The University of Tokyo

PB-023 One-pot Regioselective Disulfide/thioether Formation of Cell-free Translated Peptides

Yichao Huang, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PB-024 Conformational Studies of Oligo(*N*-substituted alanines) by X-ray Crystallographic Analysis

Yasuhiro Fukuda, Jumpei Morimoto, Shinsuke Sando
Department of Chemistry and Biotechnology, Graduate School of Engineering, The University of Tokyo

PB-025 Efficient Synthesis of Intramolecular Cyclized Peptide by the Aid of Solubilizing Tag

Sayuri Yamagami[1], Naoki Shida[1], Yohei Okada[2], Yoshikazu Kitano[1], Kazuhiro Chiba[1]
[1]Department of Applied Life Science, The United Graduate School of Agricultural Science, Tokyo University of Agriculture and Technology, 3-5-8 Saiwai-cho, Fuchu-shi, Tokyo 183-8509, Japan,
[2]Department of Chemical Engineering, Graduate School of Bio-Applications and Systems Engineering, Tokyo University of Agriculture and Technology, 2-24-16 Nakamachi, Koganei-shi, Tokyo 184-8588, Japan

PB-026 Facile Fmoc-based Solid-Phase Synthesis of Coibamide A

Takashi Kitamura, Shinsaku Kawaguchi, Shinsuke Inuki, Hiroaki Ohno, Shinya Oishi
Graduate School of Pharmaceutical Sciences, Kyoto University

PB-027 Design and Antimicrobial Activity of Short Peptide Analogs Derived from Rattusin, an α-Defensin Related Peptide Isolated from Rat Intestine

Gwansik Park, Chul Won Lee
Department of Chemistry, Chonnam National University, Gwangju 61181, South Korea

PB-028 Synthesis of Phosphinodehydropeptides and Phosphinopeptides, Prediction of Their Interactions in the Active Centres of Selected Metalloaminopeptidases and Enzymatic Inhibitory Assays

Michal Talma, Artur Mucha
Department of Bioorganic Chemistry, Faculty of Chemistry, Wroclaw University of Science and Technology

PB-029 Peptide Synthesis Using *N, N'*-Isopropylidene Dipeptide

Ryohsuke Morita, Toshiyuki Inazu
Department of Applied Chemistry, School of Engineering, Tokai University

PB-030 Asymmetric Synthesis of α,α-dichloro-β-amino acids: Process Optimization, Scale-up, and Application to the Preparation of Chloroalkene dipeptide Isosteres

Saki Imai[1], Yuki Kodama[2], Kohei Sato[2], Nobuyuki Mase[2], Tetsuo Narumi[2]
[1]*Faculty of Engineering, Shizuoka University,*
[2]*Graduate School of Integrated Science and Technology, Shizuoka University*

PB-031 Water-soluble Npys-OMe Derivatives for Organic Solvent Free Disulfide-Bond Formation

Akihiro Taguchi, Saeka Kuraishi, Kiyotaka Kobayashi, Yan Cui, Kentaro Takayama, Atsuhiko Taniguchi, Yoshio Hayashi
Department of Medicinal Chemistry, School of Pharmacy, Tokyo University of Pharmacy and Life Sciences

PB-032 Development of A Methodology for Displaying Head-To-Tail Macrocyclic Peptides by Means of mRNA Display

Koki Shinbara, Ryo Takatsuji, Takayuki Katoh, Hiroaki Suga
Department of Chemistry, Graduate School of Science,The University of Tokyo

PB-033 Solid-phase chemical ligation using peptide hydrazide as traceless linker

Kenya Ishikawa[1], Kohei Sato[1], Shugo Tsuda[2], Tetsuo Narumi[1], Taku Yoshiya[2], Nobuyuki Mase[1]
[1]*Department of Engineering, Graduate School of Integrated Science and Technology, Shizuoka University,*
[2]*Peptide Institute, Inc.*

PB-034 Consise Glycopeptide Synthesis Using O-Boc Protected Glycoamino Acids

Tomohiro Tanaka, Mika Shiraishi, Reiko Sugihara, Akio Matsuda, Mamoru Mizuno
The noguchi Institute

PB-035 2*H*-Azirines as Novel His-Selective Orthogonal Linkers and Peptidomimetics

Toru Oba[1], Shintaro Anju[1], Shingo Tamesue[1], Satoshi Ito[1], Yuki Tezuka[2], Tomohiro Suzuki[2]
[1]*Department of Material and Environmental Chemistry, Graduate School of Engineering, Utsunomiya University,*
[2]*Center for Bioscience Research and Education, Utsunomiya University*

PB-036 Various Manufacturing Approaches to Poorly Soluble Peptides

Go Shiino, Aiko Hasegawa, Takaharu Matsuura, Shunsuke Ochi, Yoshinori Murata
Shinogi & CO., LTD.

PB-037 Synthesis of Novel Boron-containing Mimetics of Amino Acids and Peptides

Toru Oba, Airi Narita, Yuka Yoshizawa, Kota Miyata, Rino Iwakami, Ayumi Otani, Shingo Tamesue, Satoshi Ito
Department of Material and Environment Chemistry, Graduate School of Engineering, Utsunomiya University

PB-038 Aqueous microwave-assisted solid phase peptide synthesis without hydroxy side chain protection

Keiko Hojo[1,2], Tatsuya Hashimoto[1], Koushi Hidaka[1,2], Yuko Tsuda[1,2]
[1]*Faculty of Pharmaceutical Sciences, Kobe Gakuin University,*
[2]*Cooperative Research Center of Life Sciences, Kobe Gakuin University*

PB-039 Cysteinyl Prolyl Imides as Crypto-Thioesters for Chemical Protein Synthesis

Masafumi Yanase[1], Charlane Joy Cardos[1], Gosuke Hayashi[1], Akimitsu Okamoto[1,2]
[1]*Department of Chemistry and Biotechnology, School of Engineering, The University of Tokyo,*
[2]*Research Center for Advanced Science and Technology, The University of Tokyo*

PB-040 Peptide Production from mg to kg with Automation and Microwave Assisted Heating

Keith A. Porter[2], Jonathan M. Collins[2], Sandeep K. Singh[2], Michael J. Karney[2], Kaoru Murayama[1]
[1]*CEM Japan K.K.,* [2]*CEM Corporation*

PB-041 Macrocyclic Peptide Probes for Site-selective Protein Modification

Alexander Vinogradov, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PB-042 Minimizing Aspartimide Formation in Fmoc SPPS: Fmoc-ASP(OBno)-OH

Peter White[1], Raymond Behrendt[2]
[1]*Merck Chemicals Ltd., Nottingham, UK,* [2]*Merck & Cie, Schauffhausen, Switzerland*

PB-043 Quality Peptide Versus Speed: Conventional Synthesis Versus Microwave

Mostafa Hatam, Hossain Saneii, Farshad Karimi, William Bennett, Mandar Maduskar
AAPPTec, LLC

Advances in Protein Synthesis

PB-044 Chemical Reconstitution of Membrane Proteins: Mirror-Image Influenza A Virus Proton Channel M2 with Channel Activity

Ji-Shen Zheng
School of Life Sciences, University of Science and Technology of China

PB-045 One-pot Multiple Peptide Ligation Strategies Harnessing Palladium Complex or DNA Scaffold

Gosuke Hayashi[1], Naoki Kamo[1], Masafumi Yanase[1], Akimitsu Okamoto[1,2]
[1]*Department of Chemistry and Biotechnology, Graduate School of Engineering, The University of Tokyo,*
[2]*Research Center for Advanced Science and Technology, The University of Tokyo*

PB-046 Expanding the Utility of Peptide Hydrazide for Chemical Synthesis of Protein

Kohei Sato, Shoko Tanaka, Kazuki Yamamoto, Yosuke Tashiro, Tetsuo Narumi, Nobuyuki Mase
Graduate School of Integrated Science and Technology, Shizuoka University

PB-047 Application of the novel thiazolidine ring opening reaction to glycoprotein synthesis

Hidekazu Katayama
Department of Applied Biochemistry, School of Engineering, Tokai University

PB-048 Approaching Homogeneous Glycoprotein via Chemical Synthesis

Yuankun Dao, Lin Han, Hanxuan Wang, Suwei Dong
Department of Chemical Biology, School of Pharmaceutical Sciences, Peking University

PB-049 Synthesis of a Hepatitis B Virus Capsid Protein Using Trityl-Type Solubilizing Tag

Shugo Tsuda[1], Masayoshi Mochizuki[1], Hiroyuki Ishiba[2], Kumiko Yoshizawa-Kumagaye[1], Hideki Nishio[1], Shinya Oishi[2], Taku Yoshiya[1]
[1]Peptide Institute, Inc., [2]Graduate School of Pharmaceutical Sciences, Kyoto University

PB-050 Chemical Synthesis of Ubiquitinated Histone H3

Toru Kawakami[1], Masaya Takazawa[1], Yuichi Mishima[1], Hironobu Hojo[1], Isao Suetake[1,2]
[1]Institute for Protein Research, Osaka University, [2]College of Nutrition, Koshien University

PB-051 Chemical Synthesis of Glutamate Racemase MurI by Native Chemical Ligation

Takumi Ohara, Taro Noguchi, Shinsuke Inuki, Hiroaki Ohno, Shinya Oishi
Graduate School of Pharmaceutical Sciences, Kyoto University

PB-052 Synthesis of Pollen Tube Attractant Protein, LUREs by KAHA Ligation

Shunsuke Oishi[1], Damodara Reddy Nandarapu[1], Subramanian Govindan[1], Masahiro Kanaoka[2], Tetsuya Higashiyama[1,2], Jeffrey W. Bode[1,3]
[1]Institute of Transformative Bio-Molecules (ITbM), Nagoya University,
[2]Graduate School of Science, Nagoya University,
[3]Laboratorium für Organische Chemie, Department of Chemistry and Applied Biosciences, ETH Zürich

PB-053 Chemical Synthesis of Histone Proteins through Palladium-Mediated One-Pot Multiple Peptide Ligation

Naoki Kamo[1], Gosuke Hayashi[1], Akimitsu Okamoto[1,2]
[1]Department of Chemistry and Biotechnology, The University of Tokyo,
[2]Research Center for Advanced Science and Technology, The University of Tokyo

PB-054 Thiol-containing Compounds for Acceleration of Protein Folding

Shunsuke Okada[1], Motonori Matsusaki[2], Kenta Arai[4], Kenji Inaba[3], Masaki Okumura[2], Takahiro Muraoka[1]
[1]Graduate School of Engineering, Tokyo University of Agriculture and Technology,
[2]Frontier Research Institute for Interdisciplinary Sciences, Tohoku University,
[3]Institute of Multidisciplinary Research for Advanced Materials, Tohoku University,
[4]Department of Chemistry, School of Science, Tokai University

PB-055 Thioamides: Improved Incorporation Methods and Effects on Protein Stability

D. Miklos Szantai-Kis[1], Christopher R. Walters[2], Yanxin J. Wang[2], Kristen E. Fiore[2], Taylor M. Barrett[2], Eileen M. Hoang[3], E. James Petersson[1,2]
[1]Department of Biochemistry and Molecular Biophysics, University of Pennsylvania,
[2]Department of Chemistry, University of Pennsylvania, [3]Swarthmore College

PB-056 Synthetic Study of GM2 Activator Protein and its Analogs by Using Peptide Hydrazide

Shoko Tanaka[1], Kohei Sato[1], Tetsuo Narumi[1], Kohji Itoh[2], Akira Otaka[2], Nobuyuki Mase[1]
[1]Department of Engineering, Graduate School of Integrated Science and Technology, Shizuoka University,
[2]Institute of Biomedical Sciences and Graduate School of Pharmaceutical Sciences, Tokushima University

PB-057 Native Chemical Ligation-Photodesulfurization in Flow

Timothy Stewart Chisholm, Daniel Clayton, Luke James Dowman, Jessica Sayers, Richard J. Payne
School of Chemistry, Faculty of Science, University of Sydney

PB-058 Cysteine-mediated Introduction of Methyllysine and Acetyllysine Analogues to Helix-loop-helix Peptide

Sojiro Higashi, Daisuke Fujiwara, Ikuo Fujii
Department of Biological Science, Graduate School of Science, Osaka Prefecture University

Structurally Constrained Peptides

PB-059 Targeting Anti-apoptotic BCL2 Proteins with Re-engineered Scorpion Toxins

Justin M. Holub
Ohio Univeristy

PB-060 Oligo(*N*-substituted alanines) as a Peptoid with Defined Shape in Water: Synthesis and Conformational Studies

Jumpei Morimoto, Yasuhiro Fukuda, Takumu Watanabe, Shinsuke Sando
Department of Chemistry and Biotechnology, Graduate School of Engineering, The University of Tokyo

PB-061 A Design Strategy for Creating Practical Middle-Molecular-Mass Antibody Mimetics Having Structurally Constrained HER2-Binding Peptides

Tetsuya Kadonosono[1], Wanaporn Yimchuen[1], Kyra See[1], Yumi Ota[1], Marina Katsumi[1], Takahiro Kuchimaru[2], Shinae Kizaka-Kondoh[1]
[1]School of Life Science & Technology, Tokyo Tech, [2]Center for Molecular Medicine, Jichi Medical University

PB-062 Chain Length-dependent Acceleration of Rotation of Tertiary Amide Lactams

Yuko Otani[1], Xin Liu[1], Hisashi Ohno[1], Siyuan Wang[1], Luhan Zhai[1], Aoze Su[1], Seok-Hwi Park[1], Masatoshi Kawahata[2], Kentaro Yamaguchi[2], Tomohiko Ohwada[1]
[1]Graduate School of Pharmaceutical Sciences, The University of Tokyo,
[2]Department of Pharmaceutical Sciences at Kagawa Campus, Tokushima Bunri University

PB-063 Display Selection of Low-Polarity Cyclic Peptide Ligands Expressed Under a Radically Reprogrammed Genetic Code

Toby Passioura, Wenyu Liu, Daniel Dunkelmann, Takashi Higuchi, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PB-064 Screening and Characterization of Allosteric Modulators for nAChR α7 from Structurally Constrained Peptide Libraries

Tai Kubo[1], Hiroyuki Ito[1,2], Sumiko Ohashi[1], Mitsuyoshi L. Saito[3]
[1]Natl. Inst. Advanced Ind. Sci. Tech. (AIST), [2]Nitto Denko Co., [3]Ion Chat Research Corp.

PB-065 Helical peptide-catalyzed asymmetric Michael addition reactions of malonates to cyclic enones

Tomohiro Umeno[1], Atsushi Ueda[1], Takuma Kato[2], Mitsunobu Doi[2], Masakazu Tanaka[1]
[1]Graduate School of Biomedical Sciences, Nagasaki University, [2]Osaka University of Pharmaceutical Sciences

PB-066 Development of platform for generating antibody mimetics harboring constrained CDR peptides

Marina Katsumi[1], Tetsuya Kadonosono[1], Kyra See[1], Takahiro Kuchimaru[2], Shinae Kondoh[1]
[1]School of Life Science and Technology, Tokyo Institute of Technology,
[2]Center for Molecular Medicine, Jichi Medical University

PB-067 Development of High Affinity HER2-targeting Small Protein Harboring a Structurally Constrained Peptide

Yumi Ota[1], Tetsuya Kadonosono[1], Takahiro Kuchimaru[2], Masumi Taki[3], Yuji Ito[4], Shinae Kondoh[1]
[1]School of Life Science and Technology, Tokyo Institute of Technology,
[2]Center for Molecular Medicine, Jichi Medical University,
[3]Department of Engineering Science, the Graduate School of Informatics and Engineering, The University of Electro-Communications (UEC),
[4]Department of Chemistry and Bioscience, Graduate School of Science and Engineering, Kagoshima University

PB-068 Synthesis of a Chiral Three-Membered Ring α,α-Disubstituted α-Amino Acid Having Two Methyl Groups and Conformational Analysis of its Peptides

Hikaru Ikeda[1], Atsushi Ueda[1], Makoto Oba[1], Takuma Kato[2], Mitsunobu Doi[2], Masakazu Tanaka[1]
[1]Nagasaki University, [2]Osaka University of Pharmaceutical Sciences

PB-069 Structural Control and Functional Analysis of the Precursor Protein of Atrial Natriuretic Peptide

Hayato Ueda, Shigeru Shimamoto, Yuji Hidaka
Graduate School of Science and Engineering Research, Kindai University

PB-070 Production of a Small and High-Affinity HER2-Binding Protein by Double-CDR Grafting

Kyra Chantal T. See[1], Tetsuya Kadonosono[1], Wanaporn Yimchuen[1], Takahiro Kuchimaru[2], Shinae Kondoh[1]
[1]Department of Life Science and Technology, School of Life Science and Technology, Tokyo Institute of Technology,
[2]Center for Molecular Medicine, Jichi Medical University

PB-071 Creation of a Small Antibody Mimetic Immunoprobe with Structurally Constrained Anti-HER2 CDR Peptides

Wanaporn Yimchuen[1], Tetsuya Kadonosono[1], Shinichi Sato[2], Kyra See[1], Takahiro Kuchimaru[3], Hiroyuki Nakamura[2], Shinae Kondoh[1]
[1]School of Life Science and Technology, Tokyo Institute of Technology,
[2]Institute of Innovative Research, Tokyo Institute of Technology,
[3]Center for Molecular Medicine, Jichi Medical University

PB-072 Precisely-Directed and Regio-Selective Crosslinking towards Isomerically-Pure Multicyclic Peptides

Weidong Liu, Chuanliu Wu
Department of Chemistry, College of Chemistry and Chemical Engineering, The MOE Key Laboratory of Spectrochemical Analysis and Instrumentation, Xiamen University

PB-073 Facile Development of Peptide-Based Covalent Protein Modifiers by In Vitro Selection

Naoya Ozawa, Yuki Goto, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PB-074 Tryptophan Cage Assisted Tight Binding of Rev Peptide toward RRE RNA

Ryusuke Tsuchie, Yuki Watanabe, Daisuke Watanabe, Keita Hamasaki
Department of Applied Chemistry, Graduate School of Science and Engineering, Shibaura Institute of Technology

PB-075 TAR RNA Regulates the Enzymatic Activity of GFP Labeled BioH with Tat Peptide as a Linker

Ririka Matsumura, Shougo Yokota, Takaaki Higuchi, Keita Hamasaki
Department of Applied Chemistry, Graduate School of Engineering and Science, Shibaura Institute of Technology

PB-076 RRE RNA Regulates the Enzymatic Activity of GFP Labeled BioH with Rev Peptide as a Linker

Mayuko Tonosaki, Shogo Yokota, Taka-aki Higuchi, Yusuke Ito, Keita Hamasaki
Department of Applied Chemistry, Graduate School of Science and Engineering, Shibaura Institute of Technology

PB-077 Design and Synthesis of Crosslink-Dense Peptides Tolerant to Sequence Manipulation

Huilei Dong, Chuanliu Wu
Department of Chemistry, College of Chemistry and Chemical Engineering, Xiamen University

PB-078 RGG-box peptide fused GFP folds and enhances its emission on the binding with SC-1 RNA

Mai Nawate
Shibaura Institute of Technology

PB-079 Structural-based Design of a Stapled Modified α-Helix Peptide Library for Selective Ligands to Proteins by a Chemical Phage Display Method

Teerapat Anananuchatkul, Hiroshi Tsutsumi, Hisakazu Mihara
Department of Life Science and Technology, School of Life Science and Technology, Tokyo Institute of Technology

PB-080 An Orally Active Ligand for Integrin αvβ3: Achieving Bioavailability of Cyclic RGD Hexapeptides by Lipophilic Prodrug Charge Masking

Michael Weinmueller[1], Florian Rechenmacher[1], Adi Schumacher-Klinger[2], Florian Reichart[1], José M. Muñoz-Félix[4], Andreas F. B. Räder[1], Joseph Fanous[2], Shira Merzbach[2], Agata Gitlin-Domagalska[3], Kairbaan Hodivala-Dilke[4], Chaim Gilon[3], Amnon Hoffman[2], Horst Kessler[1]
[1]*Institute for Advanced Study (IAS) and Center of Integrated Protein Science Munich (CIPSM), Department Chemie, TU Munich,*
[2]*Institute for Drug Research, School of Pharmacy, Faculty of Medicine, The Hebrew University of Jerusalem,*
[3]*Institute of Chemistry, Edmond Safra Campus, Givat Ram Campus, The Hebrew University,*
[4]*Centre for Tumour Biology, Barts Cancer Institute - Queen Mary University of London, John Vane Science Centre*

PB-081 Total Synthesis of Cyclic Lipopeptide Antibiotic A54145

Delin Chen[1], Hoi Yee Chow[1], Kathy Hiu Laam Po[2], Wenjie Ma[1], Zhenquan Sun[1], Emily Lok Yee Leung[1], Sheng Chen[2], Xuechen Li[1]
[1]*Department of Chemistry, The University of Hong Kong,*
[2]*Department of Applied Biology and Chemical Technology, The Hong Kong Polytechnic University*

PB-082 NMR structure and functional site for antimicrobial activity of sheep myeloid antimicrobial peptide-18

Yeonje Cho[1], Bomi Jung[1], Chulwon Lee[1], Songyub Shin[2]
[1]*Department of Chmistry, Chonnam National University, Gwangju 61186, South Korea,*
[2]*Department of Medical Science, Chosun University, Gwangju 61452, South Korea*

PB-083 Binding Mode Analysis of PD-1 Targeting Small Protein Having Structurally Constrained Peptide

Kazuki Aida[1], Tetsuya Kadonosono[1], Takahiro Kuchimaru[2], Masumi Taki [3], Yuji Ito[4], Shinae Kondoh[1]
[1]*School of Life Science and Technology, Tokyo Institute of Technology,*
[2]*Center for Molecular Medicine, Jichi Medical University,*
[3]*Department of Engineering Science, the Graduate School of Informatics and Engineering, The University of Electro-Communications,*
[4]*Department of Chemistry and Bioscience, Graduate School of Science and Engineering, Kagoshima University*

PB-084 Identification of Cyclotide-Like Human Factor XIIa Ligands Through mRNA-Display

Wenyu Liu[1], Joakim Swedberg[2], Toby Passioura[1], David Craik[2], Hiroaki Suga[1]
[1]*Department of Chemistry, Graduate School of Science, The University of Tokyo,*
[2]*Institute of Molecular Bioscience, The University of Queensland*

PB-085 Structural Analysis of Nylonlike Oligomers for Synthesis of Fibered Polymer Using Cyclic Compound

Sunglim Choi, Soo Hyuk Choi
Department of Chemistry, Yonsei University, Republic of Korea

PB-086 The Helical Propensity Owing to Introduction of an α-Amino Acid into the Oligopeptide Containing *cis*-2-Aminocyclohexanecarboxylic Acid

Seung Chan Yoo, Soo Hyuk Choi, Moon-Gun Choi, Younghun Kim
Department of Chemistry, Yonsei University, Republic of Korea

PB-087 Handedness Control of 12/10-Helical β-peptides with cis-2-amino-5-methyl-cyclohexanecarboxylic Acid

Sojung Kim, Younghun Kim, Moon-Gun Choi, Soo Hyuk Choi
Department of Chemistry, Yonsei University, Republic of Korea

PB-088 Characterization of β-peptides Consisting of Cyclic β-amino Acids with an Eight-membered Ring Constraint

Min Kyung Kim, Sooyong Jung, Younghun Kim, Moon-Gun Choi, Soo Hyuk Choi
Department of Chemistry, Yonsei University, Republic of Korea

PB-089 Characterization of β-Peptide Oligomers Containing cis-2-Aminocycloheptanecarboxylic Acid

Hoyang Son, Nuri Seo, Younghun Kim, Moon-Gun Choi, Soo Hyuk Choi
Department of Chemistry, Yonsei University, Republic of Korea

PB-090 Solvent-dependent Helix Inversion of Unnatural Peptides

Yujin Kim[1], Jihyun Shim[1], Ilia A. Guzei[2], Minkyung Kim[1], Geunhyuk Jang[1], Sunglim Choi[1], Soo Hyuk Choi[1]
[1]*Department of Chemistry, Yonsei University, Republic of Korea,* [2]*University of Wisconsin-Madison, USA*

PB-091 Foldameric Mini-proteins – Structure and Catalytic Activity

Lukasz Berlicki, Magda Drewniak, Katarzyna Ożga, Pawel Morawiak, Barbara Barycza, Paulina Fortuna, Ewa Rudzinska-Szostak
Department of Bioorganic Chemistry, Wroclaw University of Science and Technology

PB-092 Peptidic Foldamers as Promising Scaffolds for Incorporation of Enzymatic Activity

Katarzyna Ożga, Lukasz Berlicki
Department of Bioorganic Chemistry, Wroclaw University of Science and Technology

PB-093 Foldameric Mini-protein Built of Three 9/12/9/10-Helices

Magda Drewniak, Joanna Krzciuk-Gula, Łukasz Berlicki
Department of Bioorganic Chemistry, Wroclaw University of Science and Technology

PB-094 Discovery and Characterization of Cysteine-Rich Peptides with Unusual Disulfide Connectivity from Potentilla anserina

Lili Xu, Man Wang, Yuping Shen
School of Pharmacy, Jiangsu University

PB-095 A novel strategy for the discrimination of gelatinous Chinese medicines based on enzymatic digestion followed by nano-flow liquid chromatography in tandem with orbitrap mass spectrum detection

Liqun Chen, Yuli Zhang, Huan Yang
School of Pharmacy, Jiangsu University

PB-096 Comparative proteomic analysis of three gelatinous chinese medicines and their authentications by trypticdigested peptides profiling using MALDI-TOF-MS

Zhaoqun Jiao, Yan Li, Guohua Xia
School of Pharmacy, Jiangsu University

PB-097 Reversible folding of the short peptides having dual hydrophobic side chains, regulated with inclusion phenomena performed by cyclodextrin

Tokio Morita, Natsumi Sakurai, Honoka Fujiyama, Mayu Shimosato, Takahiro Ishii, Yoshiki Higuchi, Daisuke Wakayama, Manami Watarai, Keita Hamasaki
Department of Applied Chemistry, Graduate School of Engineering and Science, Shibaura Institute of Technology

PB-098 Global systematic sampling using NMR for identification of cyclic peptide structures

Mikhail Ignatov[1,2], Evangelos Coutsias[1], Mark Lukin[3], Dima Kozakov[1,2]
[1]*Laufer Center for Physical and Quantitative Biology, Stony Brook University,*
[2]*Institute for Advanced Computational Science, Stony Brook University,*
[3]*Pharmacological Sciences, Stony Brook University*

PB-099 Isolation, Characterization and Conformational Analysis of Cyclotides, a Class of Macrocyclic Disulfide Bonded Plant Peptides

Neha Kalmankar[1,2], Padmanabhan Balaram[1], Sowdhamini Ramanathan[1], Radhika Venkatesan[1]
[1]*National Centre for Biological Sciences (TIFR), Bengaluru, India,*
[2]*The University of Trans-Disciplinary Health Sciences and Technology (TDU), Bengaluru, India*

PB-100 Pyrrole-mediated peptide cyclization identified through genetically reprogrammed peptide synthesis

Klaas W. Decoene[1], Toby Passioura[2], Willem Vannecke[1,2], Hiroaki Suga[2], Annemieke Madder[1]
[1]*Ghent University,* [2]*The University of Tokyo*

PB-101 The Interaction between Core71 and Proteasome Activator 28 Gamma

Yang Zheng
Osaka University of Pharmaceutical Sciences

PB-102 In Vitro Translated Peptide-Foldamer Hybrid Macrocycles

Christos Tsiamantas[1], Sunbum Kwon[2], Joseph M. Rogers[1], Sebastian Dengler[2], Céline Douat[2], Ivan Huc[2], Hiroaki Suga[1]
[1]*Department of Chemistry, Graduate School of Science, The University of Tokyo,*
[2]*Department of Pharmacy, Ludwig-Maximilians-Universität, München, Germany*

PB-103 Generation of VEGF Inhibitor from Structure-constrained Helix-loop-helix Peptide Library

Masataka Michigami, Miho Suzuki, Hirotsugu Ishizako, Ikuo Fujii
Department of Biological Science, Graduate School of Science, Osaka Prefecture University

PB-104 Design of a Coiled-coil interface in Human IgG Fc Binding Helix-loop-helix Peptide

Masataka Michigami, Yuka Tokami, Kumiko Kawabata, Ikuo Fujii
Department of Biological Science, Graduate School of Science, Osaka Prefecture University

PB-105 Design, Synthesis and Circular Dichrosism Studies of a New Class of Heterogeneous Foldamers: β3-Peptide/α-ABpeptoid Hybrid Oligomers

Kang Ju Lee, Min-Kyung Shin, Hyun-Suk Lim
Department of Chemistry and Division of Advanced Material Science, Pohang University of Science and Technology (POSTECH), Pohang 37673, South Korea

PB-106 Development of Cell-permeable Macrocycles through mRNA Display

Emel Adaligil, Wayne Fairbrother
Genentech, Early Discovery Biochemistry

PB-107 Enzymes that Prepare Cyclotides for Cyclization

Fabian B. H. Rehm, Mark A. Jackson, Ewout De Geyter, Kuok Yap, Edward K. Gilding, Thomas Durek, David J. Craik
Institute for Molecular Bioscience, The University of Queensland

PB-108 Synthesis and Structural Investigation of Cyclosporin O Derivatives

Dongjae Lee, Jiwon Seo
Department of chemistry and physics, Gwangju Institute of Science and Technology

PB-109 Discovery, applications, natural functions and structure-activity relationships of cyclotides

Meng-Wei Kan, David J. Craik
Institute for Molecular Bioscience, The University of Queensland, Brisbane, QLD 4072, Australia

Chemical Biology and Bioimaging

PB-110 Graftable Rhenium Carbonyl Complexes for the Labeling and X-Ray Fluorescence Imaging of Proteins

Nicolas Delsuc[1], Sarah Hostachy[1], Marie Masuda[2], Takayuki Miki[2], Itaru Hamachi[2], Sandrine Sagan[3], Olivier Lequin[3], Kadda Medjoubi[4], Andrea Somogyi[4], Clotilde Policar[1]
[1]Laboratoire des Biomolécules, LBM, Département de chimie, École normale supérieure, PSL University, Sorbonne Université, CNRS,
[2]Department of Synthetic Chemistry and Biological Chemistry, Graduate School of Engineering, Kyoto University,
[3]Sorbonne Université, École normale supérieure, PSL University, CNRS, Laboratoire des Biomolécules, LBM,
[4]Nanoscopium, Synchrotron SOLEIL

PB-111 Biosynthetic gene cluster of a D-Tryptophan-Containing Lasso Peptide, MS-271

Yasushi Ogasawara, Zhi Feng, Satoshi Nomura, Tohru Dairi
Graduate School of Engineering, Hokkaido University

PB-112 A Green Leaf-Derived Peptide Suppresses Ghrelin Secretion

Junya Nakato[1], Yuki Tokuyama[1], Hiroshi Iwakura[2], Atsushi Kurabayashi[3], Masaru Sato[3], Hideyuki Suzuki[3], Kousaku Ohinata[1]

[1]Division of Food Science and Biotechnology, Graduate School of Agriculture, Kyoto University,
[2]Medical Innovation Center, Graduate School of Medicine, Kyoto University,
[3]Department of Research & Development, Kazusa DNA Research Institutes

PB-113 Amide-to-Alkene Isosteric Switch Strategy for Probing Interstrand and Intraresidue Hydrogen Bonding Interactions of Amyloid Fibril Formation

Yuki Kodama, Kohei Sato, Nobuyuki Mase, Tetsuo Narumi

Graduate School of Integrated Science and Technology, Shizuoka University

PB-114 Generation of Reporter Enzymes Triggered by Protein Trans-Splicing Employing Engineered Split Intein and Synthetic Peptide

Tsuyoshi Takahashi[1], Misaki Kawase[2]

[1]Graduate School of Science and Technology, Gunma University, [2]Faculty of Engineering, Gunma University

PB-115 Canceled

PB-116 Peptide Bond Mimicry of Chloroalkene-type Amide Bond Isosteres: H-bonding Ability and β-turn Structural Isosterism

Yuki Kodama, Takuma Nishizawa, Takuya Chiba, Kohei Sato, Nobuyuki Mase, Tetsuo Narumi

Graduate School of Integrated Science and Technology, Shizuoka University

PB-117 Removable peptidomimetic inhibitors for controlling activity of proteases

Koushi Hidaka[1,2], Keiko Hojo[1,2], Yuko Tsuda[1,2]

[1]Faculty of Pharmaceutical Sciences, Kobe Gakuin University,
[2]Cooperative Research Center for Life Sciences, Kobe Gakuin University

PB-118 Exploration of Active Site-Directed Plasmin Inhibitors

Yuko Tsuda[1,2], Koushi Hidaka[1,2], Keiko Hojo[1,2], Keigo Gohda[3], Naoki Teno[4], Keiko Wanaka[5]

[1]Faculty of Pharmaceutical Sciences, Kobe Gakuin University,
[2]Cooperative Research Center for Life Science, Kobe Gakuin University,
[3]Computer-Aided Molecular Modeling Research Center, Kansai,
[4]Faculty of Clinical Nutrition, Hiroshima International University,
[5]Research Projects on Thrombosis and Haemostasis

PB-119 Matrix metalloproteinase-2-Activatable Peptide Probe-Modified Dendrimer for Tumor Cell Detection

Yutaka Nishimoto, Shu Nagashima, Chie Kojima

Department of Applied Chemistry, Graduate School of Engineering, Osaka Prefecture University, Osaka, Japan

PB-120 Development of Peptide-Catalyst Conjugate for Photooxygenation of Myostatin

Hideyuki Okamoto, Atsuhiko Taniguchi, Shoya Usami, Akihiro Taguchi, Kentaro Takayama, Yoshio Hayashi

Department of Medicinal Chemistry, School of Pharmacy, Tokyo University of Pharmacy and Life Sciences

PB-121 Discovery of Cell-type Specific and Disease-related Enzymatic Activity Changes via Global Evaluation of Peptide Metabolism

Toru Komatsu[1], Yuki Ichihashi[1], Jun Onagi[1], Tetsuo Nagano[3], Yasuteru Urano[1,2,4]

[1]Graduate School of Pharmaceutical Sciences, The University of Tokyo,
[2]Graduate School of Medicine, The University of Tokyo, [3]Drug Discovery Initiative, The University of Tokyo,
[4]AMED-CREST

PB-122 Optimization of Ion-responsive DNA Aptamer for Oncogenic Phosphatase PPM1D

Atsushi Kaneko[1], Miyuu Watari[1], Kazuhiro Furukawa[2], Yoshiro Chuman[1]
[1]*Laboratory of Biological Chemistry, Department of Chemistry, Faculty of Science, Niigata University,*
[2]*Cell Regulation Laboratory in Biochemistry, Department of Chemistry, Faculty of Science, Niigata University*

PB-123 Developing novel photo-click reaction for chemical biology study of miRNA

Jinbo Li
School of Chemistry and Chemical Engineering, Nanjing University

PB-124 Cloning and Functional Analysis of Digestive Enzyme Derived from *Nephila Clavata*

Tsubasa Tagawa, Teruki Hagiwara, Shigeru Shimamoto, Yuji Hidaka
Graduate Schoole of Science and Engineering Research, Kindai University

PB-125 OB2^{n}P Display, an Efficient Screening System for Obtaining Heterochiral Peptide Ligands

Hinako Udagawa, Takaki Koide
Department of Chemistry and Biochemistry, School of Advanced Science and Engineering, Waseda University

PB-126 Site-specific Regulation of RNA Demethylation Based on Sequence-specific RNA Binding Proteins

Kouki Shinoda, Miki Imanishi, Shiroh Futaki
Institute for Chemical Research, Kyoto University

PB-127 Development of Phenolphthalein Binding Peptide Aptamers Using cDNA Display

Hiroki Anzai, Riku Yamada, Takuya Terai, Naoto Nemoto
Graduate School of Science and Engineering, Saitama University

PB-128 Development of Substrate Identification Method for Oncogenic PPM1D Phosphatase

Seiya Yagi[1], Hiroto Tashiro[1], Kazuhiro Furukawa[2], Yoshiro Chuman[1]
[1]*Laboratory of Biological Chemistry, Department of Chemistry, Faculty of Science,*
[2]*Cell Regulation Laboratory in Biochemistry, Department of Chemistry, Faculty of Science*

PB-129 Comprehensive Elucidation of Effect of Nascent Peptide Sequences and EF-G Concentration on Incorporation of Prolines in Translation

Kenya Tajima[1], Takayuki Katoh[1,2], Hiroaki Suga[1]
[1]*Department of Chemistry, Graduate School of Science, The University of Tokyo,* [2]*JST PRESTO*

PB-130 Development and Application of Novel Protein Labeling Reagent "SEAL"

Taiki Kohiki[1], Yusuke Kato[2], Masaya Denda[1], Yusuke Nishikawa[1], Kazuko Yorita[2], Ikuko Sagawa[3], Tsubasa Inokuma[1], Akira Shigenaga[1], Kiyoshi Fukui[2], Akira Otaka[1]
[1]*Institute of Biomedical Sciences and Graduate school of Pharmaceutical Sciences, Tokushima University, Shomachi, Tokushima 770-8505, Japan,*
[2]*Division of Enzyme Pathophysiology, The Institute for Enzyme Research (KOSOKEN), Tokushima University, 3-18-15 Kuramoto, Tokushima 770-8503, Japan,*
[3]*Support Center for Advanced Medical Sciences, Tokushima University Graduate school of Biomedical Sciences, 3-18-15 Kuramoto, Tokushima 770-8503, Japan*

PB-131 Investigation of substrate scope of *Aspergillus oryzae* acid protease and development of its chromogenic substrate

Shun Masuda[1], Shugo Tsuda[1], Koushou Oohigashi[2], Nobuo Yamashita[2], Takafumi Kubodera[2], Takahiro Akashi[2], Taku Yoshiya[1]
[1]Peptide Institute, Inc., [2]Research Department, Hakutsuru Sake Brewing Co. Ltd.

PB-132 Development of Novel PCSK9-binding Cyclic Peptides for Hyperlipidemia Treatment

Mizuki Yamamoto[1], Takehiro Ando[1], Rina Iwamoto[1], Keita Tsukamoto[1], Takashi Kawakami[1,2,3]
[1]Department of Biotechnology, Faculty of Life and Environmental Sciences, University of Yamanashi, [2]JST, PRESTO, [3]MEXT, LEADER

PB-133 Improving Endosomolytic Activity of L17E

Kentarou Sakamoto, Misao Akishiba, Kenichi Kawano, Shiroh Futaki
Institute for Chemical Research, Kyoto University

PB-134 Improved design of angiogenic peptides focusing on clinical applications

Yuki Tominaga[1], Atsushi Kitagawa[1], Kiyoshi Nokihara[1,2]
[1]HiPep Laboratories,
[2]College of Clinical Medicine, the First Affiliated Hospital with Nanjing Medical University, China

PB-135 Chemical Synthesis of an Antimicrobial Peptide LaCT1 Isolated from the Venom of the Scorpion *Liocheles australasiae* Using Native Chemical Ligation

Ryota Okabe, Masahiro Miyashita, Yoshiaki Nakagawa, Hisashi Miyagawa
Graduate School of Agriculture, Kyoto University

PB-136 Isolation and Characterization of Insecticidal Toxins from the Venom of the North African Scorpion, *Buthacus leptochelys*

Yusuke Yoshimoto[1], Mohammed Abdel Wahab[2], Mousrafa Sarhan[2], Masahiro Miyashita[1], Yoshiaki Nakagawa[1], Hisashi Miyagawa[1]
[1]Graduate School of Agriculture, Kyoto University, Kyoto 606-8502, Japan,
[2]Department of Zoology, Al-Azhar University, Assuit, Egypt

PB-137 Chemical Synthesis of the N-terminal Domain Peptide Cleaved from the Insecticidal Toxin LalT3 Using Native Chemical Ligation

Shoichi Sakai, Masahiro Miyashita, Yoshiaki Nakagawa, Hisashi Miyagawa
Division of Applied Life Science, Graduate School of Agriculture, Kyoto University

PB-138 Ultra-high-throughput Screening of Cyclic N-alkyl Peptides Useful for Maintaining Pluripotency and Growth of Induced Pluripotent Stem Cells

Yu Shimizu[1], Masashi Sato[1], Yoshitsugu Onuki[1], Takashi Kawakami[1,2,3], Hiroshi Kurosawa[1]
[1]Department of Biotechnology, Faculty of Life and Environmental Sciences, University of Yamanashi, [2]JST, PRESTO, [3]MEXT, LEADER

PB-139 Mechanistic Characterization of α-Chymotrypsin Inhibitors by DMSO-Perturbing Assay

Keisuke Tomohara[1], Isao Adachi[2], Hitoshi Kesamaru[3], Takeru Nose[1,3]
[1]Faculty of Arts and Science, Kyushu University, [2]Department of Hospital Pharmacy, University of Toyama, [3]Graduate School of Science, Kyushu University

PB-140 Identification of SUMO E3 Ligase with SUMO E2-based Probe

Yinfeng Zhang[1], Shunsuke Oishi[1], Keiko Kuwata[1], Tsuyoshi Hirota[1], Jeffrey W. Bode[1,2]
[1]*Institute of Transformative Bio-Molecules (ITbM), Nagoya University,*
[2]*Lab. für Organische Chemie, ETH-Zürich, Zürich, Switzerland*

PB-141 Bifunctional OPA-Alkyne linkers for Protein Modification

Yue Zhang, Xuechen Li
Department of Chemistry, The State Key Laboratory of Synthetic Chemistry, The University of Hong Kong, Hong Kong, China

PB-142 Chemical Biology Study on High Mobility Group A Protein (HMGA) Post-translational Modifications

Heng Liu, Tongyao Wei, Xuechen Li
Department of chemistry, faculty of science, The University of Hong Kong

PB-143 Selection of Bioactive Peptides from a Random Triple-helical Peptide Library in Yeast Cells

Ryo Masuda[1], Tetsuya Kadonosono[2], Takaki Koide[1]
[1]*Department of Chemistry and Biochemistry, School of Advanced Science and Engineering, Waseda University,*
[2]*Department of Biomolecular Engineering, Graduate School of Bioscience and Biotechnology, Tokyo Institute of Technology*

PB-144 Thermodynamic Evaluation of H-Bonding Ability of Chloroalkene Dipeptide Isostere in an Amide-to-Alkene Peptidomimetic Catalyst

Takuma Nishizawa, Takuya Chiba, Yuki Kodama, Kohei Sato, Nobuyuki Mase, Tetsuo Narumi
Graduate School of Integrated Science and Technology, Shizuoka University

PB-145 Development of G-Quadruplex Binding Peptidomimetics by Amide-to-Alkene Isosteric Switch Strategy

Yuna Kato, Ryota Yagi, Kenya Nomoto, Kohei Sato, Nobuyuki Mase, Takanori Oyoshi, Tetsuo Narumi
Graduate School of Integrated Science and Technology, Shizuoka University

PB-146 Dynamic Interaction between an Enzyme and its Substrate Determines Overall Enzymatic Activity During Degradation Reaction of Nucleic Acids

***Presentation day is changed to Dec 5 (Wed). Next to PA-202's panel**

Jungmin Yoo, Young-Joon Kim, Zee-Yong Park, Jae Il Kim, Gwangrog Lee
Gwangju Institute of Science and Technology

PB-147 Light-induced Dipeptide Repeats Aggregates Impaired Nucleocytoplasmic Trafficking in Neurons

Hung-Ming Chien[1,2], Ruei-Yu He[1], Chu-Yi Yu[1], Yung-An Huang[3], Jen-Tse Huang[1]
[1]*Institute of Chemistry, Academia Sinica,* [2]*Department of Chemistry, National Taiwan University,*
[3]*Department of Biological Science and Technology, National Chiao Tung University*

PB-148 Effects of Non-Covalent Interactions in Isosteric Switching of Amide-to-Alkene on the Conformational Preference of the Amide Bond

Kohsuke Arai[1], Takuma Nishizawa[2], Yuna Kato[2], Kohei Sato[2], Nobuyuki Mase[2], Tetsuo Narumi[2]
[1]*Faculty of Engineering, Shizuoka University,*
[2]*Graduate School of Integrated Science and Technology, Shizuoka University*

PB-149 Development of post-translational acyl transfer reactions for generation of γ/δ-peptide linkages in ribosomally synthesized peptides

Tomohiro Kuroda, Yuki Goto, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PB-150 Development of peptide-based fluorescent probe for detection of cellular S-adenosylmethionine (SAM) levels

Shusuke Ogihara[1], Toru Komatsu[1], Yasuteru Urano[1,2,3]
[1]Graduate School of Pharmaceutical Sciences, The University of Tokyo,
[2]Graduate School of Medicine, The University of Tokyo, [3]AMED-CREST

PB-151 Synthesis of *Helicobacter pylori* Peptidoglycan Fragments

Ruofang Hu, Atsushi Shimoyama, Koichi Fukase
Department of Chemistry, Graduate School of Science, Osaka University

PB-152 Fluorogenic and genetically encodable tag-probe system for in-cell imaging of protein synthesis

Wataru Nomura, Takumi Kamimura, Daisuke Matsumoto, Takuya Kobayakawa, Hirokazu Tamamura
Institute of Biomaterials and Bioengineering, Tokyo Medical and Dental University

PB-153 Discovery of Macrocyclic Peptides Inhibiting β-galactosidase toward Development of a Peptide Drug Internalized to Lysosome

Kyohei Miyairi, Yuki Goto, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PB-154 Toward the discovery of heterodimeric-macrocylic peptides that induce IL28RA activation

Satoshi Ishida, Takayuki Katoh, Hiroaki Suga
Department of Chemistry, Graduate School of Science, The University of Tokyo

PB-155 The Short Peptide Anchor Moored the Fluorescence Protein at the Hetero Hairpin RNA Dock

Kouichi Harada, Yutaro Shirasaka, Takashi Harada, Daisuke Watanabe, Keita Hamasaki
Department of Applied Chemistry, Graduate School of Engineering and Science, Shibaura Institute of Technology

PB-156 Substrate Selectivity of L-Type Amino Acid Transporters LAT1~4

Kota Miyata[1], Yuka Yoshizawa[1], Rino Iwakami[1], Promsuk Jutabha[2], Naohiko Anzai[2,3], Toru Oba[1]
[1]Department of Material and Environmental Chemistry, Graduate School of Engineering, Utsunomiya University,
[2]Department of Pharmacology and Toxicology, Dokkyo Medical University School of Medicine,
[3]Department of Pharmacology, Chiba University Graduate School of Medicine

PB-157 Exploring Novel Compounds Targeting the Amino Acid Transporter LAT3

Toru Oba[1], Yuka Yoshizawa[1], Kota Miyata[1], Rino Iwakami[1], Promsuk Jutabha[2], Naohiko Anzai[3]
[1]Department of Material and Environmental Chemistry, Graduate School of Engineering, Utsunomiya University,
[2]Department of Pharmacology and Toxicology, Dokkyo Medical University School of Medicine,
[3]Department of Pharmacology, Chiba University Graduate School of Medicine

PB-158 Identification and Expression of Novel Chemokine-Inhibitory Evasin Proteins

Charlotte K. M. Franck[1], Jenni Hayward[2], Julie Sanchez[2], Martin J. Stone[2], Richard J. Payne[1]
[1]School of Chemistry, The University of Sydney,
[2]Department of Biochemistry and Molecular Biology, Monash University

PB-159 Development of General Method to Obtain Targeted Fluorescent Covalent Binder

Kazuto Mochizuki[1], Tetsuya Kadonosono[2], Yuji Ito[3], Masumi Taki[1]
[1]Department of Engineering Science, Graduate School of Informatics and Engineering, The University of Electro-Communications (UEC), Japan,
[2]School of Life Science and Technology, Tokyo Institute of Technology, Japan,
[3]Department of Chemistry and Bioscience, Graduate School of Science and Engineering, Kagoshima University, Japan

PB-160 Using Peptidomimetics as a Tool to Modulate Protein-Protein Interactions

Kevon D. Stanford[1,2], Phoenix Williams[1,2], Anna K. Mapp[1,2]
[1]Chemistry, University of Michigan, Ann Arbor USA,
[2]Life Sciences Institute, University of Michigan, Ann Arbor USA

PB-161 Development of peptidase-targeted fluorescence probes with improved cellular retention

Rui Obara[1], Mako Kamiya[1,3], Yasuteru Urano[1,2,4]
[1]Graduate School of Medicine, The University of Tokyo,
[2]Graduate School of Pharmaceutical Sciences, The University of Tokyo, [3]JST PRESTO, [4]AMED CREST

PB-162 Evaluation of the Binding Ability of an Orphan Nuclear Receptor Nurr1 and Synthetic Peptides

Takahiro Masuya, Yusuke Tada, Xiaohui Liu, Ayami Matsushima
Department of Chemistry, Faculty and Graduate School of Science, Kyushu University

PB-163 Exploring the Links between Structure and Function in Sunflower Trypsin Inhibitor-1 to Guide the Design of New Protease Inhibitors

Simon de Veer[1], Joakim Swedberg[1], Choi Yi Li[1], Sixin Tian[1], Jonathan Harris[2], David Craik[1]
[1]The University of Queensland, [2]Queensland University of Technology

PB-164 Regulation of gene expression by photocontrolling formation of G-quadruplex structure using PNA peptide

Shungo Sakashita[1], Tamaki Endoh[2], Arisa Okada[1], Kenji Usui[1]
[1]Department of Life Chemistry, Graduate School of Frontiers of Innovative Research in Science and Technology(FIRST), Konan University,
[2]Department of Frontier Institute for Biomolecular Engineering Research (FIBER), Konan University,

PB-165 Developing Novel Ligands for mETV5 via DNA-encoded Cyclic Peptide/Peptoid Hybrid Library

Soobin Lee, Hyun-Suk Lim
Department of Chemistry, POSTECH

PB-166 Reprogramming aryl acid adenylating enzymes for non-native building blocks

Fumihiro Ishikawa, Hinano Kitayama, Genzoh Tanabe
Faculty of Parmacy, Kindai University

Peptide Biomaterials and Nanotechnology

PB-167 Canceled

PB-168 A novel nano-inhibitor to migration and invasion of tumor cells

Jianpeng Xue, Zeqing Li, Yanzhen Han, Nanxing Du, Yingfeng Li, Hanmei Xu
China Pharmaceutical University

PB-169 Canceled

PB-170 Peptide Coatings for Human Pluripotent Stem Cell Maintenance

Yuji Yamada[1,2], Joel P. Schneider[2]
[1]*Department of Clinical Biochemistry, School of Pharmacy, Tokyo University of Pharmacy and Life Sciences,*
[2]*Chemical Biology Laboratory, Center for Cancer Research, National Cancer Institute-Frederick, National Institutes of Health*

PB-171 Toward Biofunctional Material: Self-assembly of coherently dynamic, auxetic, two-dimensional protein crystals

Yuta Suzuki[1], Giovanni Cardone[1], David Restrepo[2], Pablo D. Zavattieri[2], Timothy S. Baker[1], F. Akif Tezcan[1]
[1]*Department of Chemistry and Biochemistry, University of California, San Diego,*
[2]*School of Civil Engineering, Purdue University*

PB-172 Artificial Metal-Peptide Conjugates for Photocatalytic CO_2 Reduction

Hitoshi Ishida, Atsushi Ohtsuka, Chiaki Kojima, Jun Itabashi, Masaya Kamiya
Department of Chemistry, Graduate School of Science, Kitasato University

PB-173 Synthesis of Fatty Acid-containing Peptides and the Effect of Peptide Concentration in Template-directed Gold Nanocrystal Synthesis

Naoyuki Tsukamoto, Takahito Imai, Kin-ya Tomizaki
Department of Materials Chemistry, Ryukoku University

PB-174 High-order construction of cell scaffold by two self-sorted assemblies

Sachie Yukawa[1], Sijin Zhang[1], Shogo Onomura[2], Toshio Sasaki[3], Kun'ichi Miyazawa[3], Ye Zhang[1]
[1]*Bioinspired Soft Matter Unit, Okinawa Institute of Science and Technology,* [2]*Shimadzu Techno-Research Co. Ltd.,*
[3]*Imaging Section, Okinawa Institute of Science and Technology Graduate School*

PB-175 Synthesis of titania nanostructures via silica mineralization by peptide nanofibers and silica etching with titanium fluoride

Makoto Kasuga, Takahito Imai, Kin-ya Tomizaki
Department of Materials Chemistry, Ryukoku University

PB-176 Identification of α-Dystroglycan Binding Sequence in the Laminin α2 Chain LG4-5 Moudules Using the Peptide-Chitosan Matrix

Zhang Guangrui, Keisuke Hamada, Jun Kumai, Fumihiko Katagiri, Kentaro Hozumi, Yamato Kikkawa, Motoyoshi Nomizu
Department of Clinical Chemistry, Tokyo University of Pharmacy and Life Science

PB-177 Spontaneous Formation of Gating Lipid-Domain in Uniform-Size Peptide Vesicle for Control Release

Motoki Ueda[1,2], Mofizur Md Rahman[2,3], Takuji Hirose[3], Yoshihiro Ito[1,2]
[1]*RIKEN Cluster of Pioneering Research,* [2]*RIKEN Center for Emergent Matter Science,*
[3]*Graduate School of Science and Engineering, Saitama University*

PB-178 Evaluation of Cell Aggregation Induced Sequential Peptide for 3D Culture

Shinnosuke Takashiro[1], Sachiro Kakinoki[1,2], Yoshiaki Hirano[1,2]
[1]*Faculty of Chemistry, Materials and Bioengineering, Kansai University,* [2]*ORDIST, Kansai University*

PB-179 Engineering Peptide-Based Sealants to Facilitate Faster Blood-Clotting

Snehasish Ghosh[1], Sanchita Mukherjee[3], Chiranjit Dutta[1], Kasturee Chakraborty[2], Paramita Gayen[2], Somnath Jan[2], Dhananjay Bhattacharyya[3], Rituparna Sinha Roy[2]
[1]Department of Chemical Sciences, Indian Institute of Science Education and Research-Kolkata, India,
[2]2Department of Biological Sciences, Indian Institute of Science Education and Research Kolkata, India,
[3]3Computational Science Division, Saha Institute of Nuclear Physics, Kolkata, India

PB-180 Challenge to efficient titanium-cell adhesion by peptide nanofiber with HKH and RGD sequences

Koji Kawamoto[1], Masayuki Yamasaki[2], Kin-ya Tomizaki[1]
[1]Department of Materials Chemistry, Ryukoku University,
[2]Department of Food Sciences and Human Nutrition, Ryukoku University

PB-181 Effect of osteoblasts adhesion onto hydroxyapatite modified with collagen model peptides

Takumi Yamamoto[1], Masayuki Yamasaki[2], Manshi Ohyanagi[1], Kin-ya Tomizaki[1]
[1]Department of Materials Chemistry, Ryukoku University,
[2]Department of Food Science and Human Nutrition, Ryukoku University

PB-182 Preparation of Peptide Nanoparticle at the Size of 10 nm for Cancer Theranostics

Mizuki Sugiura, Shunsaku Kimura
Department of Material Chemistry, Graduate School of Engineering, Kyoto University

PB-183 Construction and Characterization of Functionalized Self-assembling Peptide Materials with a Urea Bond for Three Dimensional Cancer Cell Culture

Jyh Yea Chia, Iori Kodama, Takayuki Miki, Hisakazu Mihara, Hiroshi Tsutsumi
School of Life Science and Technology, Tokyo Institute of Technology

PB-184 Electronic Properties of Peptide Nanotubes Displaying One-dimensional Array of Flavin

Yusuke Kamano, Yuki Tabata, Hirotaka Uji, Shunsaku Kimura
Department of Material Chemistry, Graduate School of Engineering, Kyoto University

PB-185 Development of Self-assembling Short Elastin-derived Peptide Analogs: Linear and Nonlinear (FPGVG)n Analogs

Keitaro Suyama[1], Daiki Tatsubo[2], Suguru Taniguchi[3], Iori Maeda[3], Takeru Nose[1,2]
[1]Faculty of Arts and Science, Kyushu University,
[2]Department of Chemistry, Graduate School of Science, Kyushu University,
[3]Department of Bioscience and Bioinformatics, Graduate School of Computer Science and Systems Engineering, Kyushu Institute of Technology

PB-186 Identification of chain-specific cell adhesive sequences in the short arm region of laminin β chain

Keisuke Hamada, Yingzi Gu, Jun Kumai, Kyotaro Nakamura, Fumihiko Katagiri, Kentaro Hozumi, Yamato Kikkawa, Motoyoshi Nomizu
Department of Clinical Biochemistry, Tokyo University of Pharmacy and Life Sciences

PB-187 Dual Conversion System of Photocurrent Generation and Electroluminescence by D-π-A Chromophore with Help of Helical Peptide Scaffold

Takuya Uotani, Hirotaka Uji, Shunsaku Kimura
Department of Material Chemistry, Graduate School of Engineering, Kyoto University

PB-188 Development of Self-Assembling Peptide Materials Recruiting Growth Factors via Heparin Binding

Hiroaki Oe, Hiroshi Tsutsumi, Takayuki Miki, Hisakazu Mihara
School of Life Science and Technology, Tokyo Institute of Technology

PB-189 Esterase Triggered Disassembly of Coumarin Derivatives Leading to Fluorescent Responses

Shijin Zhang, Ye Zhang
Bioinspired Soft Matter Unit / Okinawa Institute of Science and Technology Graduate University

PB-190 Control of the Tumorigenic Signaling Pathways via Assembly of Integrin-targeted Synthetic Peptides

Sona Roy, Ye Zhang
Bioinspired Soft Matter Unit, OIST Graduate University

PB-191 Enzyme-Sorted-Assembly of Chiral Peptides Kills Cancer Cell via Multi-Subcellular Targeting

Dingze Mang, Shijin Zhang, Xia Wu, Yunhui Zheng, Ye Zhang
Bioinspired Soft Matter Unit, Okinawa Institute of Science and Technology Graduate University

PB-192 Dipeptide Motifs that Utilize Side-Chain for Anion-Binding

Rajesh J. Rao, Nandita Madhavan
Department of Chemistry, Indian Institute of Technology Bombay, Bombay

PB-193 Thermolysin Supported on MNP: Preparation and Characterization of a New Thermostable Biocatalyst Suitable for Peptides Production

Vitor A. Ungaro[1], João P. S. Fairbank[1], Liane M. Rossi[2], M. Teresa Machini[1]
[1]*Department of Biochemistry, Institute of Chemistry, University of São Paulo, Brazil,*
[2]*Department of Fundamental Chemistry, Institute of Chemistry, University of São Paulo, Brazil*

PB-194 Organic crystal-binding peptides: morphology control and one-pot formation of protein-displaying organic crystals

Teppei Niide[1], Kyohei Ozawa[1], Hikaru Nakazawa[1], Hitoshi Kasai[2], Mitsuo Umetsu[1]
[1]*Department of Biomolecular Engineering, Graduate School of Engineering, Tohoku University,*
[2]*Institute of Multidisciplinary Research for Advanced Materials, Tohoku University*

PB-195 Photocatalytic Gold-Titania Nanoarchitecture by Mineralization Using Designed Peptides and DNA

Makoto Ozaki[1], Takaaki Tsuruoka[1], Kin-ya Tomizaki[2], Kenji Usui[1]
[1]*Fuculty of Frontiers of Innovative Research in Science and Technology (FIRST), Konan University,*
[2]*Department of Materials Chemistry, Ryukoku Univeristy*

PB-196 Cell culture substrate using digested Amyloid beta (1-40) fibril by proteases

Shinichiro Yokota[1], Yasumasa Mashimo[2], Eita Tatsumi[1], Yoshio Hamada[1], Youji Harada[3], Masayasu Mie[2], Eiry Kobatake[2], Kenji Usui[1]
[1]*Graduate of School Frontiers of Innovative Research in Science and Technology, Konan University,*
[2]*Department of Life Science and Technology, School of Life Science and Technology, Tokyo Institute of Technology,*
[3]*Clean Chemical Co., Ltd.*

PB-197 Honeycomb Structure Composed of Peptide Nanotubes via Directionally Orthogonal Hydrogen Bond Networks

Ryota Sasaki, Shunsaku Kimura
Department of Material Chemistry, Graduate School of Engineering, Kyoto University

PB-198 Assessment of antifungal mechanism of porcine myeloid antimicrobial peptide in Candida albicans

Suhyun Kim, Dong Gun Lee
School of Life Sciences, BK21 Plus KNU Creative BioResearch Group, Kyungpook National University, Daegu 41566, Korea