

# Poster Schedule

**M = Monday, T = Tuesday, W = Wednesday**

- P1 (W) **Apical Golgi Localization of *N,N'*-Diacetyllactosedi-amine Synthase,  $\beta$ 4GalNAc-T3, Is Responsible for LacdiNAc Expression on Gastric Mucosa**  
Yuzuru Ikehara, Takashi Sato, Toru Niwa, Sachiko Nakamura, Masanori Gotoh, Sanae Kabata Ikehara, Katsue Kiyohara, Toshie Iwai, Jun Hirabayashi, Hayao Nakanishi, Masae Tatematsu and Hisashi Narimatsu
- P2 (M) **Analysis of Mice Lacking  $\beta$ -1,3-*N*-Acetylglucosaminyltransferase 2 which Synthesizes Polylactosamine Chain.**  
Akira Togayachi, Hiroyasu Ishida, Yuko Kozono, Sumie Abe, Nami Suzuki, Nobuo Sato, Takashi Ohkura, Takashi Sato, Kouichi Tachibana, and Hisashi Narimatsu
- P3 (T) **Study of Subcellular Localization and Transcriptional Regulation of hST6Gal II.**  
Marie-Ange Krzewinski-Recchi, Sophie Groux-Degroote, Sylvain Lehoux, & Philippe Delannoy.
- P4 (W) **Synthetic Substrate for an Endoplasmic Reticulum Protein-Folding Sensor, UDP-Glucose: Glycoprotein Glucosyltransferase**  
I. Matsuo, K. Totani, Y. Ihara, and Y. Ito
- P5 (M) **Quantitative Analysis of UDP-Glucose : Glycoprotein Glucosyltransferase**  
K. Totani, I. Matsuo, Y. Ihara and Y. Ito
- P6 (T) **Glycosidases of *Caenorhabditis elegans* Involved in *N*-glycan Processing**  
M. Gutternigg, D. Lubich, M. Hackl, K. Paschinger, U. Stemmer, V. Jantsch, G. Lochnit, R. Ranftl, P. Geier and I. B. H. Wilson
- P7 (W) **Control of Complex *N*-glycan Biosynthesis in Plants: Sequence Motifs Required for Golgi Localisation of *N*-Glycan Processing Enzymes**  
R. Strasser, J. Schoberer, L. Mach, F. Altmann, J. Glössl and H. Steinkellner
- P8 (T) **The Anti-Horseradish Peroxidase Epitope in Insects**  
D. Rendic, U. Stemmer, M. Sharrow, M. Perlman, R. Sen, B. Overcarsh, M. Tiemeyer, I.B.H. Wilson
- P9 (W) **Identification of Linear and Branched Extended Type 1 Glycan Chains on Glycosphingolipids from Human Colonic Adenocarcinomas.**  
Yao-Yun Fan, Shin-Yi Yu and Kay-Hooi Khoo
- P10 (T) **Transcriptional Regulation of the Human GD3 Synthase Gene Expression by Transcription Factor of NF- $\kappa$ B in Fas-Induced Jurkat T Cells**  
Cheorl-Ho Kim, Nam-Young Kang, Hee-Jeong Choi, Yun-Jung Kang, Young-Choon Lee
- P11 (M) **Involvement of Src Family Kinases in the Increased Cell Proliferation and Invasion of Human Melanomas with GD3 Expression**  
M. Tsuji, K. Hamamura, H. Nakashima, K. Furukawa, S. Miyazaki, T. Urano and K. Furukawa
- P12 (W) **Roles of the Complement system for Neurodegeneration in GM3 Only Mice**  
Y. Ohmi, O. Tajima, K. Furukawa, T. Urano, K. Furukawa
- P13 (M) **Molecular mechanisms for the Neurodegeneration in Double Knock-Out Mice**

**of the GM2/GD2 Synthase and the GD3 Synthase Genes**

O. Tajima, Y. Ohmi, M. Yoshihara, K. Furukawa, Y. Sugiura, K. Furukawa

- P14 (T) **Ligand Binding to Lewis (Le)<sup>X</sup> and Sialyl-Le<sup>X</sup> Moieties of EGFR Promotes EGFR Signaling and Is Blocked by Ganglioside GM3**  
X.Q. Wang, Q. Yan, P Sun, and A.S. Paller
- P15 (W) **Mucins Facilitate Tumor Progression Through Overproduction of PGE<sub>2</sub>**  
I. Sugihara, M. Yoshida, T. Shigenobu, H. Takagi, K. Maruyama, N. Takeuchi, M. Toda, M. Inoue and H. Nakada
- P16 (T) **Protective roles of a Galactose-Type C-Type Lectin CD301a/MGL1 Revealed by Pathogenic Models Applied to the Gene Deficient Mice**  
Kayoko Sato, Hiroshi Yuita, Kengo Saba, Kaori Denda-Nagai, Yosuke Kumamoto, Nobuaki Higashi, and Tatsuro Irimura
- P17 (W) **A Unique Set of Genes is Up-Regulated During the Inflammation-Carcinoma Sequence in Mouse Stomach Infected by *helicobacter felis***  
M. Kobayashi, H. Lee, T. Gilmartin, L. Schaffer, S. Head, S. Takaishi, T. C. Wang, J. Nakayama, and M. Fukuda
- P18 (T) **Therapeutic Potential of Gene Transfer of a Glycosyltransferase Using Adenoviral Vector to Prevent Cancer Metastasis**  
Yuki I. Kawamura, Yasuo Adachi, Norihiro Nishimoto, David T. Curiel, Reiji Kannagi, and Taeko Dohi
- P19 (M) **Mechanism of Transcriptional Activation of the Human  $\beta$ -1,4-Galactosyltransferase V Gene by ETS-1**  
Takeshi Sato and Kiyoshi Furukawa
- P20 (T) **Biosynthesis of the Sd<sup>a</sup> Determinant by  $\beta$ 1,4-N-Acetylgalactosaminyltransferase in Normal and Cancer Colon: Relationship with Sialyl Lewis x Expression**  
Nadia Malagolini, Mariella Chiricolo, and Fabio Dall'Olio
- P21 (W) **Regulatory Mechanism of Selectin-Ligand Expression Level in Human Pre-B Lymphoid Cells: Possible Involvement of Selectin-Ligand on a Sialomucin gp135 in Tissue Infiltration of B-Cell Precursor Leukemia Cells**  
Chizu Nonomura, Jiro Kikuchi, Hidenori Ozaki, Hirotaka Shinohara, Hidenobu Ando, Sota Iguchi, Hisao Nojiri, and Mitsuru Nakamura
- P22 (T) **Inhibition of EGF Receptor Signaling by Expression of GnT-Va-Specific siRNA in Human Breast Carcinoma Cells**  
Hua-bei Guo, Matthew Randolph, and J. Michael Pierce
- P23 (W) **Down Regulation of Trypsinogen Expression Is Associated with Growth Retardation in  $\alpha$ 1,6-Fucosyltransferase-Deficient Mice: Attenuation of Proteinase-Activated Receptor 2 Activity**  
Wenzhe Li, Takatoshi Nakagawa, Nobuto Koyama, Jianguo Gu, Eiji Miyoshi, Naoyuki Taniguchi, and Akihiro Kondo
- P24 (T) **Cell-cell Interaction-dependent Regulation of N-acetylglucosaminyltransferase III and The Bisected N-Glycans in Gell Epithelial Cells: Involvement of E-cadherin-Mediated Cell Adhesion**  
Junko Iijima, Yanyang Zhao, Tomoya Isaji, Akihiko Kameyama, Shuuichi Nakaya, Xiangchun Wang, Hideyuki Ihara, Xinyao Cheng, Takatoshi Nakagawa, Eiji Miyoshi, Akihiro Kondo, Hisashi Narimatsu, Naoyuki Taniguchi and Jianguo Gu
- P25 (M) **Function of Galectin-1 in Neurogenesis of the Adult Hippocampus**  
Yoichi Imaizumi, Masanori Sakaguchi, Tetsuro Shingo, Jun Hirabayashi, Tsuyoshi Morishita<sup>5</sup>, Françoise Poirier, Kazunobu Sawamoto, Hideyuki Okano

- P26 (T) **Identification of a UDP-Glucose Glucosyltransferase That Modifies Fucosylated Thrombospondin Type 1 Repeats**  
K. Kozma, D. Klein, D. Hess, J. Keusch, J. Hofsteenge
- P27 (W) **O-Mannosyltransferase Genes in Zebra fish**  
Y. Tamaru, M. Watanabe
- P28 (T) **Molecular Cloning and Characterization of a Novel Human  $\beta$ 1,3-Glucosyltransferase,  $\beta$ 3Glc-T, Which is Localized at the Endoplasmic Reticulum and Glucosylates O-linked Fucosylglycan on Thrombospondin Type 1 Repeat Domain**  
Takashi Sato, Maiko Sato, Katsue Kiyohara, Maki Sogabe, Toshihide Shikanai, Norihiro Kikuchi, Akira Togayachi, Hiroyasu Ishida, Hiromi Ito, Akihiko Kameyama, Masanori Gotoh, and Hisashi Narimatsu
- P29 (M) **The Expression of Galectin-3 in Activated Monocyte-Like Cells is Affected by Non-Steroidal Anti-Inflammatory Drugs (NSAIDs)**  
J. Dumic, S. Dabelic And M. Flögel
- P30 (T) **The Mechanisms of Galectin-1 in Promoting Proliferation of Adult Neural Stem Cells**  
Masanori Sakaguchi, Yoichi Imaizumi, Tetsuro Shingo, Satoru Ishibashi, Ko Hayama, Eiji Miyoshi, Jun Hirabayashi, Toshihiko Kuroiwa, Hidehiro Mizusawa, Nozomu Nishi, Françoise Poirier, Hisashi Narimatsu, Naoyuki Taniguchi, Kazunobu Sawamoto, and Hideyuki Okano
- P31 (W) **Drosophila Proteoglycan Galactosyltransferase II Contributes to Synthesis of Glycosaminoglycan**  
Morio Ueyama, Hitoshi Takemae, Yoshiko Ohmae, Hideki Yoshida, Ryu Ueda, and Shoko Nishihara
- P32 (M) **Modulation of Glycosaminoglycan Biosynthesis by Silencing Glycosyltransferase Genes**  
Emi Honda, Masahiro Asada, Rika Sugimoto, Junko Oki and Toru Imamura
- P33 (T) **Study on the Function and Transcription Regulation of  $\beta$ 1,4-Galactosyltransferase (GalT) V in Glioma**  
Gu, Jianxin
- P34 (W) **Seeking for Mutations in *Pmm2* and *Alg6* Genes in Croatian Population**  
S. Supraha, G. Lauc and J. Dumic
- P35 (M) **Influence of Inflammation on the Glycosylation and Sulfation of Human Bronchial Mucins**  
Sophie Groux-Degroote, Marie-Ange Krzewinski-Recchi, Aurélie Cazet, Jean-Jacques Lafitt<sup>2</sup>, and Philippe Delannoy
- P36 (T) **Purification of  $\beta$ 3 Galactosyltransferase for Proteomics and Enzyme Activity Study**  
Chi-Hung Lin, Chia-Wei Lin, Kay-Hooi Khoo
- P37 (W) **Post-Translational Modification of Proteins by O-Linked N-Acetylglucosamine is Elevated in the Pancreas of Diabetic Goto-Kakizaki Rats**  
Y. Akimoto, G.W. Hart, L. Wells, K. Vosseller, K. Yamamoto, E. Munetomo, M. Ohara-Imaizumi, C. Nishiwaki, S. Nagamatsu, H. Hirano, and H. Kawakami
- P38 (T) **FGF23 Secretion Requires O-Glycosylation: Role of Polypeptide GalNAc-transferase T3 in Familial Tumoral Calcinosis**  
Kentaro Kato, Charlotte Jeanneau, Mads Agervig Tarp, Anna Benet-Pagès, Bettina

Lorenz-Depiereux, Eric Paul Bennett, Ulla Mandel, Tim M. Strom, and Henrik Clausen

- P39 (W) **Structure and Function Studies on  $\beta$ 1,4-Galactosyltransferase-I Reveal Role of Two Flexible Loops in the Catalytic Function of the Enzyme and its Structural and Functional Similarities to Polypeptide  $\alpha$ -N-Acetylgalactosaminyltransferase**  
Boopathy Ramakrishnan, Elizabeth Boeggeman and Pradman K. Qasba
- P40 (M) **Structure-Activity Relationships of the Human ST3Gal-I and Modelling of the Nucleotide Binding Domain**  
M. Audry, C. Jeanneau, A. Imberty and C. Breton
- P41 (T) **Benzyl 2-Thio- $\beta$ -D-Fructofuranoside 1-Phosphate – A Precursor of the Potential Inhibitors of Glycosyltransferases**  
B. Csúsz, J. Hirsch, M. Koóš and I. Tvaroška
- P42 (W) **Structure and Substrate Specificity of Human pp-GalNAc-T10**  
Tomomi Kubota, Tomoo Shiba, Shigemi Sugioka, Sanae Furukawa, Hiromichi Sawaki, Ryuich Kato, Soichi Wakatsuki & Hisashi Narimatsu
- P43 (M) **Carboxyl Terminus of *Helicobacter pylori* 1,3-Fucosyltransferase Determines the Structure and Stability**  
Sheng-Wei Lin, Da-Wei Liu, and Chun-Hung Lin
- P44 (T) **Structural Basis for Acceptor Substrate Recognition of Human Glucuronyltransferases, GlcAT-S and GlcAT-P**  
Tomoo Shiba, Shinako Kakuda, Ippei Morita, Masaji Ishiguro, Shogo Oka, Toshisuke Kawasaki, Soichi Wakatsuki, Ryuichi Kato
- P45 (W) **Toward an Understanding of the Catalytic Mechanism of GnT-I. Molecular Modelling Approach Using the Hybrid QM/MM Method**  
Stanislav Kozmon and Igor Tvaroška
- P46 (M) **Finding and Characterising the First UDP-GlcNAc Glycosyltransferase in *T. brucei***  
L. Izquierdo, M. Nakanishi, G. Machray, A. Mehlert, G. Barton and M. Ferguson
- P47 (T) **Characterization of a Novel  $\beta$ (1 $\rightarrow$ 3) Galactosidase from *Streptococcus pneumoniae* R6**  
Jae Kap Jeong, Seonghun Kim, Ohsuk Kwon, Doo-Byoung Oh, Hyun-Ah Kang
- P48 (W) **A System for Intelligent Identification of Oligosaccharides Using Observed and Simulated MS<sup>n</sup> Spectral Libraries**  
A. Kameyama, N. Kikuchi, S. Nakaya, H. Ito, M. Sukegawa, Y. Takahashi, H-K, Ishida, S. Nomura, S. Funatsu, and H. Narimatsu
- P49 (T) **Recombinant I-Branching  $\beta$ 6-N-Acetylglucosaminyltransferases (*IGnT1*, *IGnT2*, *IGnT3*) Presenting Different Activities in Vitro**  
Shin-Yi Yu, Hiromi Ito, Takashi Sato, Yao-Yun Fan, Akihiko Kameyama, Hisashi Narimatsu, and Kay-Hooi Khoo
- P50 (W) **The Animal Sialyltransferases and Sialyltransferase-Related Genes: a Phylogenetic Approach.**  
Harduin-Lepers, A., Mollicone, R. , Delannoy, P. and Oriol, R.
- P51 (M) **Extention of the Glycoconjugate Data Bank: Structures, a Database of Three-Dimensional Structures of Carbohydrates in the Protein Data Bank.**  
Taku Nakahara and Shin-ichiro Nishimura
- P52 (T) **Cloning and Expression of Novel Mannosyltransferase-Like Gene *Hmat-Xa***

**Homologous to *Drosophila* Gene *GC15914*.**

Y. Nishikawa, Y. Nishimura, N. Shimono, T. Takahashi, and A. Saitoh

- P53 (M) **Identification of a Novel Arabinofuranosyl Transferase (AftA) Involved in Cell Wall Arabinan Biosynthesis in *Mycobacterium Tuberculosis***  
Luke J. Alderwick, Mathias Seidel, Hermann Sahm, Gurdyal S. Besra and Lothar Eggeling
- P54 (W) **Construction of Human Glycosyltransferase Library as Immobilized Enzyme in Yeast Cell Wall**  
Y. Shimma, F. Saito, F. Oosawa, T. Ishii, And Y. Jigami
- P55 (M) **Production of Mucin-Type Glycopeptide in Yeast.**  
Koh Amano, Yasunori Chiba, Atsushi Kuno, Jun Hirabayashi, and Yoshifumi Jigami
- P56 (T) **Engineering of an Artificial *O*-glycosylation Pathway in the Yeast *Saccharomyces cerevisiae*: Production of *O*-glycosylated Epidermal Growth Factor-Like Domains**  
Yuko Chigira, Takuji Oka and Yoshifumi Jigami
- P57 (W) **Modification of *O*-glycan Biosynthesis in Human T Cell Line, Jurkat Cell, Transfected with Glycosyltransferase Genes.**  
T. Ohkura, K. Tachibana and H. Narimatsu
- P58 (M) **Structural Analysis of the  $\alpha$ -2,3-Sialyltransferase Cst-I from *Campylobacter Jejuni* in Both the Apo and Substrate-Analogue Bound Forms**  
Cecilia P. C. Chiu, Luke L. Lairson Michel Gilbert, Warren W. Wakarchuk, Stephen G. Withers, Natalie C. J. Strynadka
- P59 (T) **New Sialylation Tools:  $\alpha$ -2,3-Sialyltransferases Produced by Marine Bacteria That were Classified in the Genera *Photobacterium* and *Vibrio*.**  
Yoshimitsu Takakura, Hiroshi Tsukamoto and Takeshi Yamamoto
- P60 (W) **Analysis of Plant Sialyltransferase-Like Proteins**  
S. Takashima, T. Abe, S. Yoshida, and M. Tsujimoto
- P61 (M) **Insight into Activation Mechanism of CMP-Neu5Ac by Sialyltransferase**  
Y. Kajihara, S. Nishigaki, K. Hirano, N. Yamamoto, M. Sugahara, and M. Miyano
- P62 (T) **Application of the Multi-Dimensional HPLC Mapping Method to the Branch Specificities of Sunfotransferase and Glycosyltrabsferases**  
Hirokazu Yagi, Kenzo Yamada, Yoshiaki Yamaguchi, Noriko Takahashi, Shogo Oka, Toshisuke Kawasaki, Kenji Uchimura, Reiji Kannagi and Koich Kato
- P63 (W) **Modified Sugar Donor Moieties, Transferred by Glycosyltransferase mutants to Glycoconjugates, Allow Their Cross-Linking via Glycan Chains**  
Elizabeth Boeggeman, Boopathy Ramakrishnan, Charlton Kilgore and Pradman K. Qasba
- P64 (T) **Ganglioside GM3 Synthase Gene Is a Novel Biomarker for Evaluation of Histological Classification and Anticancer Drug Sensitivity against Platinum Agents and Epidermal Growth Factor Receptor Tyrosine Kinase Inhibitors in Non-Small Cell Lung Cancer**  
Mariko Noguchi, Tomoko Suzuki, Kazuya Kabayama, Hiroki Takahashi, Masaaki Satoh, Atsushi Watanabe, Kazutaka Nakajima, Masanori Shiratori, Hirofumi Chiba, Shosaku Abe, Seiichi Tagami, Atsushi Ishii, Masaki Saitoh, Masanori Kaneko, Ken Iseki, Yasuyuki Igarashi, and Jin-ichi Inokuchi
- P65 (M) **Plasma Sialyltransferase: Its Formation Mechanism and Application to**

### **Hepatitis Diagnosis**

Shinobu Kitazume, Ritsuko Oka, Kazuko Ogawa, Yosiaki Hagiwara, Noriaki Kinoshita, Hajime Takigawa, Yasuhiro Hashimoto

- P66 (W) **Essential Role of Peripheral Lymph Node Addressin in Lymphocyte Recruitment to Nasal-Associated Lymphoid Tissues**  
Yukari Ohmichi, Naomi Ohyama, Yasuyuki Imai, Minoru Fukuda, and Hiroto Kawashima
- P67 (M) **Functional Expression and Binding Activity of the Catalytic Subunit of *Cordyceps militaris*  $\beta$ -1,3-Glucan Synthase**  
Minoru Ujita, Ryosuke Inoue, Yusuke Makino, and Akira Hara
- P68 (T) **Cloning and Characterization of Siglec-14, a Novel Sialic Acid Receptor Expressed on Immune Cells**  
M. Yamanaka, T. Hayakawa, T. Angata, A. Varki, and M. Nakamura
- P69 (M) **Discovery of Polysialic Acid in Microglia. Expression Changes of  $\alpha$ 2,8-Sialyltransferases During Activation of a Mouse Microglia Cell Line**  
Chihiro Sato, Uichiro Yabe, Makoto Sawada, and Ken Kitajima
- P70 (W) **Transcriptional Regulation of FucT-VII Expression in Leukocytes**  
Dimitrios G. Zisoulis and Geoffrey S. Kansas
- P71 (T) **Uncovering Alternative C-Mannosylation Pathways**  
Jeremy Keusch, E. Jacoby, P. Fuerst, and J. Hofsteenge
- P72 (M) **Expression and Regulation of FUT7 on sLeX Synthesis and Implantation in Endometrium of Mouse**  
Ya-li Li, Yuan-Yuan Zhang, Shuai Liu, Hua-min Qin, Jin-Yao Zhao, Zheng-Mei Zhu, Qiu Yan
- P73 (W) **Introducing  $\alpha$  (1, 2)-Linked Fucose in Hepatocarcinoma Cells Inhibits Vasculogenesis and Tumor Growth**  
Mathieu Sylvie, Gerolami René, Luis José, Carmona Sylvie, Kol Ossarath, Garcia Stéphane, Borentain Patrick, and El-Battari Assou
- P74 (T) **Profiling of Human Monocytes and Dendritic Cells by Plant Lectins: Jacalin-High and Low Populations**  
Kunimitsu Komatsu, Keisuke Maenuma, and Tatsuro Irimura
- P75 (M) **Differential Glycan Profiling by Means of Lectin Microarray**  
A. Kuno, N. Uchiyama, S. Koseki-Kuno, Y. Ebe, K. Horio, M. Yamada, J. Hirabayashi

Your poster should be put up 18:00 - 20:00 pm Sunday or 8:00 - 11:00 am Monday, and removed 15:00 - 17:00 pm Wednesday. The presenting author must be present in poster session hours on the assigned day.

Poster session hours: 11:50 - 12:50 Monday  
11:10 - 12:10 Tuesday  
11:45 - 12:45 Wednesday