

# CANCER GENOMICS & PROTEOMICS

[www.cgpiiarjournals.org](http://www.cgpiiarjournals.org)

Print ISSN (2004-2012): 1109-6535  
Online ISSN: 1790-6245  
VOL. 1 (2004) - VOL. 9 (2012) (print and online)  
From VOL. 10 (2013) online – only and open access



International Online Open Access Journal

**General Policy.** CANCER GENOMICS & PROTEOMICS (CGP) welcomes submissions of original high quality articles and reviews on all aspects of the application of genomic and proteomic technologies to experimental and clinical cancer research. The journal's scientific spectrum includes: (a) molecular causes of carcinogenesis, cancer progression and metastasis; (b) structural and functional aspects of genes in the cancer cell; (c) advances in genomic and proteomic technologies applicable to cancer research; (d) anticancer drug design and drug development.

A main aim of CGP is to ensure the prompt and confidential review, and rapid publication of original works and reviews, generally within 1-3 months from submission or 1-2 months from acceptance.

CGP is published bimonthly by the **International Institute of Anticancer Research (IIAR)** and is available online with **Stanford University HighWire Press**. The IIAR is a member of UICC. For more information please visit our website [www.cgpiiarjournals.org](http://www.cgpiiarjournals.org).

**Editorial Office:** International Institute of Anticancer Research, 1st km Kapandritou-Kalamou Rd., P.O. Box 22, Kapandriti, Attiki 19014, Greece. Tel: +30 22950 52945, Fax: +30 22950 53389.

U.S. Branch: Anticancer Research Inc., USA, 111 Bay Avenue, Highlands, NJ, USA.

E-mail: [journals@iilar-anticancer.org](mailto:journals@iilar-anticancer.org); IIAR websites: [www.iilar-anticancer.org](http://www.iilar-anticancer.org) and [www.iilarjournals.org](http://www.iilarjournals.org)

## A Selection of Recent Articles

Differential Expression of Wisp1 (Ccn4) and Other Genes Between Metastatic and Non-metastatic EL4 Mouse Lymphoma Cells. M.S. CHAHAL, H.T. KU, Z. ZHANG, C.M. LEGASPI, A. LUO, M.M. HOPKINS, K.E. MEIER (*Spokane, WA; Duarte, CA, USA*)

Novel Prognostic and Therapeutic Mutations in Acute Myeloid Leukemia. M. MEDINGER, C. LENGERKE, J. PASSWEG (*Basel, Switzerland*)

EPHA7 and EPHA10 Physically Interact and Differentially Co-localize in Normal Breast and Breast Carcinoma Cell Lines, and the Co-localization Pattern Is Altered in EPHB6 Expressing MDA-MB-231 Cells. C. JOHNSON, B. SEGOVIA, R.P. KANDPAL (*Pomona, CA, USA*)

Phospho-Network Analysis Identifies and Quantifies Hepatitis C Virus (HCV)-induced Hepatocellular Carcinoma (HCC) Proteins Regulating Viral Mediated Tumor Growth. N.T. LU, N.M. LIU, J.Q. VU, D. PATEL, W. COHN, J. CAPRI, M. ZIEGLER, N. PATEL, A. TRAMONTANO, R. WILLIAMS, J. COX, J. WHITELEGGE, S.W. FRENCH (*Los Angeles, CA; Boston, MA, USA; London, UK*)

The Multiple Roles of Exosomes in Metastasis. U.H. WEIDLE, F. BIRZELE, G. KOLLMORGEN, R. RÜGER (*Basel, Switzerland*)

Association of BIM Deletion Polymorphism and BIM- $\gamma$  RNA Expression in NSCLC with EGFR Mutation. K. ISOBE, A. KAKIMOTO, T. MIKAMI, K. KABURAKI, H. KOBAYASHI, T. YOSHIZAWA, T. MAKINO, H. OTSUKA, G. SANO, K. SUGINO, S. SAKAMOTO, Y. TAKAI, N. TOCHIGI, A. IYODA, S. HOMMA (*Tokyo, Japan*)

High Throughput Screening of Nutraceuticals for Evidence of Human Histone Deacetylase Inhibition and Analysis of HDACis on Tumor-suppressing miRNAs by Trichostatin A and Grapeseed Extract (*Vitis vinifera*) in HeLa cells. E.A. MAZZIO, K.F.A. SOLIMAN (*Tallahassee, FL, USA*)

A Comparative Study of the Molecular Characteristics of Familial Gliomas and Other Cancers. J. LU, M.G. BURNETT, M. SHPAK (*Austin, TX; Cambridge, MA, USA*)

The Impact of HRNPM and SLC1A5 in Pathogenesis and Prognosis in Epithelial Ovarian Cancer. K. BJERSAND, T. SEIDAL, I. SUNDSTRÖM POROMAA, H. ÅKERUD, I. SKIRNISDOTTIR (*Uppsala; Halmstad, Sweden*)

Characterization of Heparan Sulfate Proteoglycan-positive Recycling Endosomes Isolated from Glioma Cells. K.A. PODYMA-INOUE, T. MORIWAKI, A.R. RAJAPAKSHE, K. TERASAWA, M. HARA-YOKOYAMA (*Tokyo, Japan*)

Overexpression of HPV16 E6\* Alters  $\beta$ -Integrin and Mitochondrial Dysfunction Pathways in Cervical Cancer Cells. W. EVANS, M. FILIPPOVA, V. FILIPPOV, S. BASHKIROVA, G. ZHANG, M.E. REEVES, P. DUERKSEN-HUGHES (*Loma Linda, CA, USA*)

# ANTICANCER RESEARCH

International Journal of Cancer Research and Treatment

ISSN (print): 0250-7005; ISSN (online): 1791-7530

● **ANTICANCER RESEARCH** is an independent international forum devoted to the rapid publication of original high quality articles and reviews on all aspects of experimental and clinical oncology. Prompt evaluation of all submitted articles in confidence and rapid publication within 1-2 months from acceptance are guaranteed.

● **ANTICANCER RESEARCH** is published monthly by the International Institute of Anticancer Research and is available online with Stanford University HighWire Press. The IIAR is a member of UICC.

● **Editorial Office:** International Institute of Anticancer Research, 1st km Kapandritiou-Kalamou Rd., P.O. Box 22, Kapandriti, Attiki 19014, Greece. Tel: +30 22950 52945, Fax: +30 22950 53389.

U.S. Branch: Anticancer Research Inc., USA, 111 Bay Avenue, Highlands, NJ, USA.

E-mail: [journals@iilar-anticancer.org](mailto:journals@iilar-anticancer.org); IIAR websites: [www.iilar-anticancer.org](http://www.iilar-anticancer.org) and [www.iiarjournals.org](http://www.iiarjournals.org)

## ● Selection of Recent Articles

Inhibition of Galectin-1 Sensitizes HRAS-driven Tumor Growth to Rapamycin Treatment. J.V. MICHAEL, J.G.T. WURTZEL, L.E. GOLDFINGER (*Philadelphia, PA, USA*)

*In Vivo* Selection of Intermediately and Highly Malignant Variants of Triple-negative Breast Cancer in Orthotopic Nude Mouse Models. S. YANO, K. TAKEHARA, H. KISHIMOTO, H. TAZAWA, Y. URATA, S. KAGAWA, M. BOUVET, T. FUJIWARA, R.M. HOFFMAN (*San Diego, CA, USA; Okayama; Tokyo, Japan*)

A Single Intravesical Instillation of VAX014 Inhibits Orthotopic Superficial Bladder Tumor Implantation to Increase Survival. B.M. HANCOCK, K.L. MCGUIRE, S. TSUJI, K. REIL, V. HERNANDEZ, M.J. GIACALONE, W.T. GODBEY (*San Diego, CA; New Orleans, LA, USA*)

Bevacizumab Combined with Docetaxel or Paclitaxel as First-line treatment of HER2-negative Metastatic Breast Cancer. L. TIAINEN, M. TANNER, O. LAHDENPERÄ, P. VIHINEN, A. JUKKOLA, P. KARIHTALA, N. PAUNU, T. HUTTUNEN, P.-L. KELLOKUMPU-LEHTINEN (*Tampere; Turku; Oulu, Finland*)

Plasma Adiponectin and Hepatocellular Carcinoma Survival among Patients without Liver Transplantation. J. SHEN, C.-C. YEH, Q. WANG, I. GURVICH, A.B. SIEGEL, R.M. SANTELLA (*New York, NY, USA; Taipei, Taiwan, ROC*)

Y-box-binding Protein 1 is Involved in Regulating the G2/M Phase of the Cell Cycle. Y. KOTAKE, N. ARIKAWA, K. TAHARA, H. MARU, M. NAEMURA (*Iizuka, Japan*)

Cervical Cancer Patient-Derived Orthotopic Xenograft (PDOX) is Sensitive to Cisplatin and Resistant to Nab-paclitaxel. T. MURAKAMI, T. MURATA, K. KAWAGUCHI, T. KIYUNA, K. IGARASHI, H.K. HWANG, Y. HIROSHIMA, C. HOZUMI, S. KOMATSU, T. KIKUCHI, T.M. LWIN, J.C. DELONG, K. MIYAKE, Y. ZHANG, K. TANAKA, M. BOUVET, I. ENDO, R.M. HOFFMAN (*San Diego, CA, USA; Yokohama; Okayama; Sendai; Okinawa; Kanazawa; Tokyo, Japan; Seoul, Republic of Korea*)

Different Expression Patterns of CXCR4, CCR7, Maspin and FOXP3 in Luminal Breast Cancers and Their Sentinel Node Metastases. L. STRIEN, K. JOENSUU, P. HEIKKILÄ, M.H. LEIDENIUS (*Helsinki, Finland*)

KIF11 Is Required for Spheroid Formation by Oesophageal and Colorectal Cancer Cells. T. IMAI, N. OUE, K. SENTANI, N. SAKAMOTO, N. URAOKA, H. EGI, T. HINOI, H. OHDAN, K. YOSHIDA, W. YASUI (*Hiroshima; Gifu; Kure, Japan*)

11C-Acetate-PET/CT Compared to 99mTc-HDP Bone Scintigraphy in Primary Staging of High-risk Prostate Cancer. S. STRANDBERG, C. THELLENBERG KARLSSON, M. OGREN, J. AXELSSON, K. RIKLUND (*Umea, Sweden*)

Lung Adenocarcinoma in Never Smokers: Problems of Primary Prevention from Aspects of Susceptible Genes and Carcinogens. I. OKAZAKI, S. ISHIKAWA, W. ANDO, Y. SOHARA (*Tokyo; Otawara; Okegawa, Japan*)

Epithelial–Mesenchymal Expression Phenotype of Primary Melanoma and Matched Metastases and Relationship with Overall Survival. S. YAN, B.M. HOLDERNESS, Z. LI, G.D. SEIDEL, J. GUI, J.L. FISHER, M.S. ERNSTOFF (*Lebanon, NH; Buffalo, NY, USA*)

Kinomics Screen Identifies Aberrant Phosphorylation of CDC25C in FLT3-ITD-positive AML. F. PERNER, T.M. SCHNÖDER, T. FISCHER, F.H. HEIDEL (*Magdeburg; Jena, Germany*)

Ectopic Myoglobin Expression is Associated with a Favourable Outcome in Head and Neck Squamous Cell Carcinoma Patients. S. MELLER, A. VAN ELLEN, H. GEVENTSLEBEN, A. BICKER, T. HANKELN, T.A. GORR, V. SAILER, F. DRÖGE, F. SCHRÖCK, F. BOOTZ, A. SCHRÖCK, S. PERNER, D. DIETRICH, G. KRISTIANSEN (*Mainz; Bonn; Essen; Luebeck and Borstel, Germany; Zurich, Switzerland; New York, NY, USA*)

**FREE SPECIMEN COPIES OF ANTICANCER RESEARCH ARE AVAILABLE ON REQUEST**

Prevalence of Congenital Cytomegalovirus Infection Assessed Through Viral Genome Detection in Dried Blood Spots in Children with Autism Spectrum Disorders. I. GENTILE, E. ZAPPULO, M.P. RICCIO, S. BINDA, L. BUBBA, L. PELLEGRINELLI, D. SCOGNAMIGLIO, F. OPERTO, L. MARGARI, G. BORGIA, C. BRAVACCIO ( <i>Naples; Milan; Bari, Italy</i> ) .....	467
Rebiopsy of Histological Samples in Pretreated Non-small Cell Lung Cancer: Comparison Among Rebiopsy Procedures. A. HATA, N. KATAKAMI, S. NANJO, C. OKUDA, R. KAJI, Y. IMAI ( <i>Kobe, Japan</i> ).....	475
Ewing's Sarcoma Family Tumors in the Jaws: Case Report, Immunohistochemical Analysis and Literature Review. A.R. CASAROTO, M.B. DA SILVA SAMPIERI, C.T. SOARES, P.S. DA SILVA SANTOS, R.Y. FARIA YAEDU, J.H. DAMANTE, V.S. LARA ( <i>Bauru, SP, Brazil</i> ) .....	481
Safety Evaluation of Trastuzumab Emtansine in Japanese Patients with HER2-Positive Advanced Breast Cancer. J. WATANABE, Y. ITO, T. SAEKI, N. MASUDA, T. TAKANO, S. TAKAO, K. NAKAGAMI, K. TSUGAWA, S. NAKAGAWA, K. KANATANI, T. NAKAYAMA ( <i>Shizuoka; Tokyo; Saitama; Osaka; Hyogo; Kanagawa, Japan</i> ).....	493

Clinical Implication of the Width of Subserosal Invasion in T3N0 Gastric Cancer. K. NAKAMURA, M. TOMIOKU, K. NABESHIMA, E. NOMURA ( <i>Isehara; Hachioji, Japan</i> ) .....	409
Multiparametric MRI Apparent Diffusion Coefficient (ADC) Accuracy in Diagnosing Clinically Significant Prostate Cancer. P. PEPE, D. D'URSO, A. GARUFI, G. PRIOLO, M. PENNISI, G. RUSSO, M.G. SABINI, L.M. VALASTRO, A. GALIA, F. FRAGGETTA ( <i>Catania; Cefalù; Catania, Italy</i> ) .....	415
Maximum Diameter and Number of Tumors as a New Prognostic Indicator of Colorectal Liver Metastases. T. YOSHIMOTO, Y. MORINE, S. IMURA, T. IKEMOTO, S. IWASHI, Y. SAITO, S. YAMADA, D. ISHIKAWA, H. TERAOKU, M. YOSHIKAWA, J. HIGASHIJIMA, C. TAKASU, M. SHIMADA ( <i>Tokushima, Japan</i> ) .....	419
Angiotensin-converting Enzyme Inhibition Improves the Effectiveness of Transcutaneous Carbon Dioxide Treatment. B. NEMETH, I. KISS, T. JENCSIK, I. PETER, Z. KRESKA, T. KOSZEGI, A. MISETA, P. KUSTAN, I. BONCZ, A. LACZO, Z. AJTAY ( <i>Pecs; Harkany, Hungary</i> ) .....	425
Partial Cystectomy for Atypical Isolated Recurrence of Ovarian Adenocarcinoma – A Case Report and Literature Review. N. BACALBASA, I. BALESCU ( <i>Bucharest, Romania</i> ) .....	429
A New Prognostic Instrument Specifically Designed for Patients Irradiated for Recurrent Carcinoma of the Bladder. L. MANIG, S. JANSSEN, S.E. SCHILD, D. RADES ( <i>Lübeck, Germany; Scottsdale, AZ, USA</i> ) .....	435
Thrombotic Microangiopathy Following Chemotherapy with S-1 and Cisplatin in a Patient with Gastric Cancer: A Case Report. J. MUTO, H. KISHIMOTO, Y. KAIZUKA, M. KINJO, H. HIGASHI, F. KISHIHARA ( <i>Kitakyushu, Japan</i> ) .....	439
IT-based Psychosocial Distress Screening in Patients with Sarcoma and Parental Caregivers via Disease-specific Online Social Media Communities. F. POHLIG, U. LENZE, H.M.L. MUHLHOFER, F.W. LENZE, J. SCHAUWECKER, C. KNEBEL, T. ZIMMERMANN, P. HERSCHBACH ( <i>Munich; Traunstein; Hannover, Germany</i> ) .....	443
Surgical Management of Non-small Cell Lung Cancer with Solitary Hematogenous Metastases. G. KARAGKIOUZIS, E. SPARTALIS, D. MORIS, D. PATSOURAS, A. ATHANASIOU, I. KARATHANASIS, A. VERVENIOTIS, F. KONSTANTINOU, I.A. KOUERINIS, K. POTARIS, D. DIMITROULIS, P. TOMOS ( <i>Athens, Greece; Columbus, OH, USA</i> ) .....	451
Definitive Intensity-modulated Radiation Therapy in Elderly Patients with Locally Advanced Oropharyngeal Cancer. F. DE FELICE, A. GALDIERI, G. ABATE, N. BULZONETTI, D. MUSIO, V. TOMBOLINI ( <i>Rome, Italy</i> ) .....	455
Testicular Dose During Prophylaxis of Heterotopic Ossification with Radiation Therapy. W.F. MOURAD, J.K. MA, S. PACKIANATHAN, W. YAN, S.G. SHAABAN, E.M. MARCHAN, L.E. ABDALLAH, R. HE, P.N. MOBIT, C. YANG, S. VIJAYAKUMAR ( <i>Jackson, MS; Augusta, GA; Mobile, AL, USA</i> ) .....	461

Functional Roles of Netrin-1 in Osteoblast Differentiation. T. SATO, S. KOKABU, Y. ENOKI, N. HAYASHI, M. MATSUMOTO, M. NAKAHIRA, M. SUGASAWA, T. YODA ( <i>Saitama; Kitakyushu, Japan</i> ) .....	321
Automated Multichamber Time-lapse Videography for Long-term <i>In Vivo</i> Observation of Migrating Cells. H. BUHLER, R. ADAMIETZ, T. ABELN, D. DIAZ-CARBALLO, P. NGUEMGO-KOUAM, T. HERO, I.A. ADAMIETZ ( <i>Herne; Bochum, Germany</i> ) .....	329
Bone Regeneration of Hydroxyapatite with Granular Form or Porous Scaffold in Canine Alveolar Sockets. S.J. JANG, S.E. KIM, T.S. HAN, J.S. SON, S.S. KANG, S.H. CHOI ( <i>Cheongju; Gwangju; Daegu, Republic of Korea</i> ) .....	335
Vitamin C Improves Therapeutic Effects of Adipose-derived Stem Cell Transplantation in Mouse Tendonitis Model. K.-K. KANG, E.-J. LEE, Y.-D. KIM, M.-J. CHUNG, J.-Y. KIM, S.-Y. KIM, S.-K. HWANG, K.-S. JEONG ( <i>Daegu, Republic of Korea</i> ) .....	343
Anti-inflammatory Effects of Oct4/Sox2-overexpressing Human Adipose Tissue-derived Mesenchymal Stem Cells. Q. LI, S.-M. HAN, W.-J. SONG, S.-C. PARK, M.-O. RYU, H.-Y. YOUN ( <i>Seoul, Republic of Korea</i> ) ..	349
The Role of p16 and MDM2 Gene Polymorphisms in Prolactinoma: MDM2 Gene Polymorphisms May Be Associated with Tumor Shrinkage. S. TURGUT, M. ILHAN, S. TURAN, O. KARAMAN, I. YAYLIM, O. KUCUKHUSEYIN, E. TASAN ( <i>Istanbul, Turkey</i> ) .....	357
Partial Deletions of Y-Chromosome in Infertile Men with Non-obstructive Azoospermia and Oligoasthenoteratozoospermia in a Turkish Population. C.C. BEYAZ, S. GUNES, K. ONEM, T. KULAC, R. ASCI ( <i>Samsun, Turkey</i> ) .....	365
Effect of Hydrogen Dioxide Treatment on the Osteogenic Potential of Duck-beak Bone-derived Natural Bioceramic Microparticles. J.-H. KIM, M.-H. PARK, S.J. JANG, S.J. SON, J.Y. LEE, J.S. SON, S.E. KIM, S.S. KANG, S.H. CHOI ( <i>Jeonju; Cheongju; Daegu; Gwangju, Republic of Korea</i> ) .....	373
<b>Clinical Studies</b>	
Soluble Urokinase-type Plasminogen Activator Receptor Predicts All-cause 5-Year Mortality in Ischemic Stroke and TIA. J. ONATSU, M. TAINA, P. MUSTONEN, M. HEDMAN, A. MUURONEN, O. ARPONEN, M. KORHONEN, P. JÄKÄLÄ, R. VANNINEN, K. PULKKI ( <i>Kuopio; Jyväskylä, Finland</i> ) .....	381
Magnetic Resonance Imaging Assessment of Lipomatous Soft-tissue Tumors. A. CORAN, P. ORTOLAN, S. ATTAR, E. ALBERIOLI, E. PERISSINOTTO, A.L. TOSI, M.C. MONTESCO, C.R. ROSSI, S. TROPEA, M. RASTRELLI, R. STRAMARE ( <i>Padua, Italy</i> ) .....	387
Survival and Predictors of Death for Patients with Bronchopulmonary Carcinoid at a Danish Tertiary NET Centre. L.S. KORNERUP, G. DAM, H. GRONBAEK ( <i>Aarhus, Denmark</i> ) .....	397
Correlation Between Expression of the Cancer/Testis Antigen KKLC-1 and <i>Helicobacter pylori</i> Infection in Gastric Cancer. T. FUKUYAMA, N. FUTAWATARI, Y. ICHIKI, A. SHIDA, T. YAMAZAKI, Y. NISHI, H. NONOGUCHI, Y. TAKAHASHI, H. YAMAZAKI, N. KOBAYASHI ( <i>Kitamoto; Sagamihara; Kitakyushu, Japan</i> ) .....	403