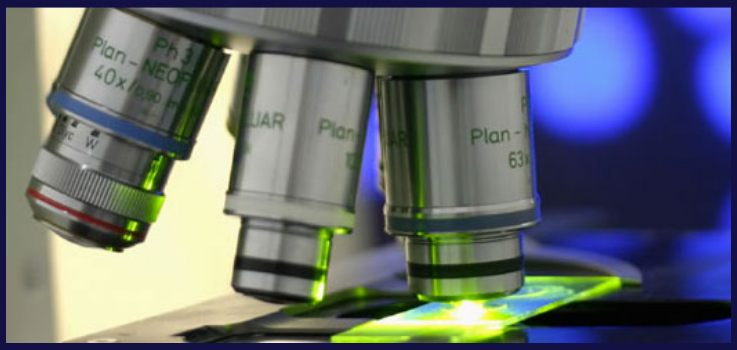
Miami VA R&D eNewsletter
Bruce W. Carter Department of Veterans Affairs Medical Center

Issue 19 August 2014



In this issue:

In the News
Research Spotlight
Presentations
Awards & Honors
Publications
Research Trials
Funding
Events

IN THE NEWS

SFVAFRE expands research support to Orlando area

Founded in May 1990, the South Florida Veterans Affairs Foundation for Research and Education, Inc. (SFVAFRE) is a non-profit corporation (NPC) that supports research and education activities at the Miami VA Healthcare System. It is one of a network of VA NPCs established under Public Law 100-322 to provide more efficient mechanism for private and non-VA public funding for VA research and education programs.

Allowing SFVAFRE to expand its support services to the Orlando VA Medical Center is the formation of a multi non-profit corporation approved by VISN8 Director Joleen Clark, MBS, FACHE in December 2913. SFVAFRE is the third VA NPC in the nation to receive approval to serve multiple VA medical centers under regulations released in December 2010.

Current collaborations between Miami and Orlando have strengthened communication between facilities. VA leadership from both sites continues to work closely on many issues related to veteran services. The availability of industry and non-VA federal funds will benefit the Miami VA programs and will facilitate the growth of research and education services for veterans in the Orlando VA.

From bench to bedside- MIAMI cell set to launch

Orthopedic surgeons at the University of Miami's Miller School of Medicine are increasingly focused on biological solutions, rather than prosthetic implants, as a way to repair defects in joints. According to Emeritus Professor of Orthopaedics, Dr. Theodore I. Malinin, artificial devices often become problematic over time, primarily because they are fundamentally incompatible with human tissue and bone.

Malinin and his colleagues developed a procedure, now used under the brand name BioCartilage, which consists of shavings of cartilage from cadavers that are dried and pulverized into tiny particles to form a powder. The powder is mixed with saline and fibrin — a protein formed during the clotting of blood which acts like glue — and the resulting paste is injected into defects or injuries in cartilage.

MIAMI Cell Set to Launch

A newer technology for biological solutions known as the MIAMI (Marrow-Isolated Adult Multilineage Inducible) cell is set to launch this summer. The MIAMI cell was developed over 15 years, primarily by Dr. Paul C. Schiller, research chemist at the Miami VA Medical Center and professor of orthopaedics, biochemistry and molecular biology at UM. His research focuses on hormonal regulation of mature and developing skeletal cells, and the stem cell biology of marrow-derived human pluripotent cells during aging and their reparative medicine applications.

As described in the recent Miami Herald article entitled From new toes to new cartilage—innovations for fixing our aching joints, the procedure under which the MIAMI cell is used acts much like BioCartilage, but with the addition of stem cells, which stimulate cell growth in laboratory conditions. This technology aims to repair various parts of the body without using any artificial components. The MIAMI cells, which originate in bone marrow and have a unique signature, share many of the genes found in embryonic stem cells. (Click here to read full article)

Paul C. Schiller, PhD, Research Chemist, Veterans Affairs Medical Center and Associate Research Professor, Departments of Medicine and Biochemistry & Molecular Biology

RESEARCH SPOTLIGHT

Bal Lokeshwar, PhD was an ad-hoc reviewer for NIH/National Cancer Institute's Special Emphasis Panel titled: *Cancer health disparities/disparity in basic cancer research*. He participated in the review at the meeting held on April 16 and 17 at Chevy Chase, MD.

Dr. Lokeshwar presented a distinguished lecture at the Winship Cancer Center, Emory University, Atlanta, GA. As The Elkin Lecture his talk,
Exploring a Less Traveled Path for Prevention and Treatment of Prostate and Breast Cancer was held May 7, 2014.

Dr. Lokeshwar's laboratory presented 7 research posters on various aspects of prostate and breast cancer at the Annual Sylvester Cancer Center Poster Session on May 17, 2014 held at the Sylvester Comprehensive Cancer Center, Miller School of Medicine in Miami FL.

Dr. Lokeshwar gave the talk entitled *Dysregulation of chemokine and chemokine receptor signaling in prostate cancer progression* at the 2nd Annual Wake Forest

University Baptist Medical Center Prostate Cancer Symposium in Winston-Salem, NC on June 6-7, 2014.

He also attended the June study section meeting of the NIH/Center for Scientific Review Meeting on Cancer chemo-Dietary Prevention (CDP) in Washington DC on June 12, 2014.

Priyamvada Rai, PhD, GRECC Investigator is a grant reviewer for the Hong Kong Health and Medical Research Fund (HMRF). She has been on their board of reviewers since 2013.

Guy A. Howard, PhD, GRECC Research Director, participated as an *ad hoc* member of the NIH Skeletal Biology Development and Disease (SBDD) study section that took place in Washington, DC, April 2014

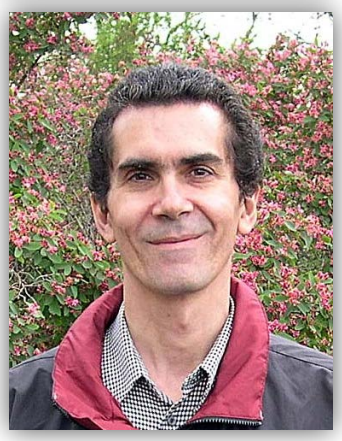
Carlton S. Gass, PhD accepted invitations to serve as a consulting editor for the *Archives of Assessment Psychology* and as a standing reviewer for the Buros Center for Testing (*Buros Mental Measurements Yearbook).*

PRESENTATIONS

Eva Widerström-Noga, DDS, PhD gave a talk entitled *Clinical sensory pain phenotypes after spinal cord injury* at the American Spinal Injury Associations Annual meeting in San Antonio, TX on May 15. She won the first prize for Best Oral Presentation.

Geriatric Research, Education, and Clinical Center- GRECC

Gaëtan Delcroix, PhD, GRECC Investigator, working together with Paul C. Schiller, PhD, GRECC investigator, made a presentation on his work at the 2014 MIAMI Winter Symposium in Miami, FL entitled: *Enhancement of Parkinson's disease MIAMI cell therapy by pharmacologically active microcarriers: an in vivo and ex-vivo organotypic culture study*. Other authors on the presentation were Garbayo E, Daviaud N, Sindji L, Thomas O, Vanpouille-Box C, Montero-Menei CN, and Schiller PC.



Carlos Perez-Stable, PhD, GRECC Investigator, presented the results of his work at the 105th annual meeting of the American Association Cancer Research in San Diego, CA on April 2014 entitled *Mcl-1 protects prostate cancer cells from chemotherapy-induced DNA damage*. Other authors on the presentation were Reiner T, Parrondo R, and de las Pozas A.

Priyamvada Rai, PhD was invited to present a seminar on her work at the Mayo Clinic Cancer Center, in Jacksonville, FL on January 17, 2014. Her seminar was titled: *MTH1: A novel modulator of oncogenic RAS-induced malignancy*.

She was also invited to participate in the NIH/NCI New Grantee Workshop in

Rockville, MD in March. 2014.

Dr. Rai presented a poster entitled *MTH1 as a novel facilitator of KRAS driven lung cancer* at the AACR RAS Oncogenes: From Biology to Therapy conference in Buena Vista, FL on Feb 24-27, 2014. She also presented a short talk/poster entitled *Modulation of redox-protective pathways as a means to enhance androgen deprivation-induced tumor suppression* at the Florida Prostate Cancer Research Symposium on March 21-22, 2014 in Lake Buena Vista, FL.

Laurin Pacheco, graduate student, University of Miami Department of Biochemistry & Molecular Biology, and mentor, Dr. Paul Schiller, GRECC Investigator, presented both an oral and a poster presentation entitled *Effects of Progerin Expression and Farnesyltransferase Inhibitor on Critical Adult Stem Cell Functions* at the GTCBio Stem Cell Summit in Boston MA, April 2014. Full authorship on these presentations was: Pacheco L, Gomez A, Dias J, Ziebarth N, Schiller P.

Endocrine, Polypeptide and Cancer Institute

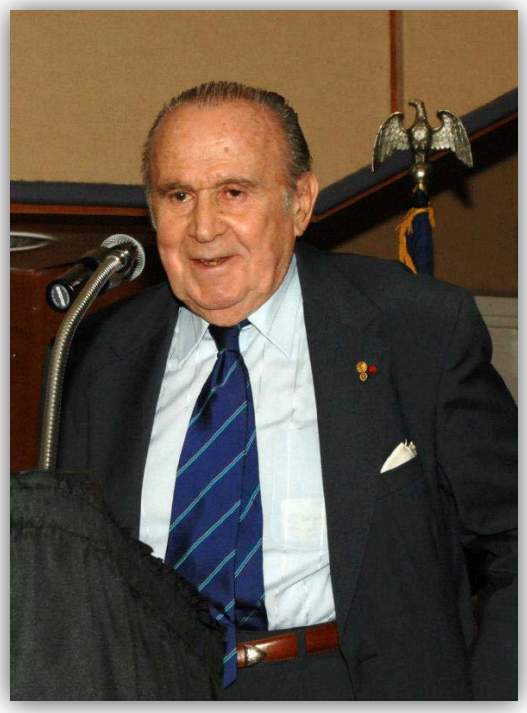
Dr. Schally's research group presented the following abstracts:

Phase 1 trial of zoptarelin doxorubicin (Zop-Dox) in advanced unresectable or metastatic urothelial carcinoma (UC) patients who failed platinum-based chemotherapy at the ASCO 50th Annual Meeting in Chicago, IL on May 30, 2014.

Cytoprotective effect of growth hormone releasing hormone agonists in cardiac stem cells at the Basic Cardiovascular Sciences (BCVS) 2014 Conference, American Heart National Meeting in Las Vegas, NV on July 14-17, 2014.

Reduction of scar tissue after GhRH-A treatment in a swine model of sub-acute ischemic cardiomyopathy at the 35th International Society for Heart Research in Miami Beach, FL on May 12-15, 2014 and at the Basic Cardiovascular Sciences 2014 in Las Vegas, NV on July, 2014.

New therapeutic approach to heart failure due to myocardial infarction based on targeting growth hormone-releasing hormone receptor was submitted to the BioMed Research International.



Dr. Andrew V. Schally presented the opening plenary lecture at the 35th International Society for Heart Research (ISHR) North American Section Meeting held in Miami Beach, FL on May 12-15, 2014. He discussed the clinical applications of his recent discoveries regarding growth hormone-releasing hormone (GHRH).
http://www.reuters.com/article/2014/05/14/fl-biscayneishrmtg-idUSnPn3fmk0x+80+PRN20140514

Dr. Schally also presented the talk entitled *New Therapies for Relapsed Androgen Independent Prostate Cancer Based on Peptide Analogs of Hypothalamic Hormones* at the American Urological Association Annual Meeting, International Prostate Forum in Orlando FL on May 18, 2014.

HONORS & AWARDS

Maria (Rose) van Zuilen, PhD, GRECC Education Specialist, was promoted to Associate Professor in the Educator track at the University of Miami.

Carlos Perez-Stable, PhD, GRECC Investigator received an AACR Minority-Serving Institution (MSI) Faculty Scholar in Cancer Research Award.

Cheung named Faculty Mentor of the Year

Congratulations to Dr. Herman Cheung for receiving the Faculty Mentor of the Year award at the University of Miami Graduate School Awards Celebration held in April.

The following are students mentored by Dr. Cheung in the past three years:

Charles Huang, PhD, Assistant Professor, Department of Biomedical Engineering, University of Miami (2008-present).

Michael Ng, PhD, Postdoctoral fellow (2012-2013), Currently Assistant Professor, Department of Vision Science, Chinese University of Hong Kong.

Daniel Pelaez, PhD, PhD student (2006-2011) and Postdoctoral Fellow (2011-2013), Currently Assistant Professor, Bascom Palmer Eye Institute, University of Miami Miller School of Medicine.

Agnes Huang, PhD, Student, Currently Postdoctoral Fellow, Chinese University of Hong Kong.

Veronica Fortino, PhD student, NIH Pre-doctoral F31Fellow, one of 66 US delegates to the 64th meeting of Nobel Laureates in Lindau, Germany in 2014. Only 600 students worldwide are selected. Ms Fortino is the first University of Miami College of Engineering student to be selected to the program.

Zenith Acosta, PhD student, Whitaker Foundation International Fellowship, 2011-2012.

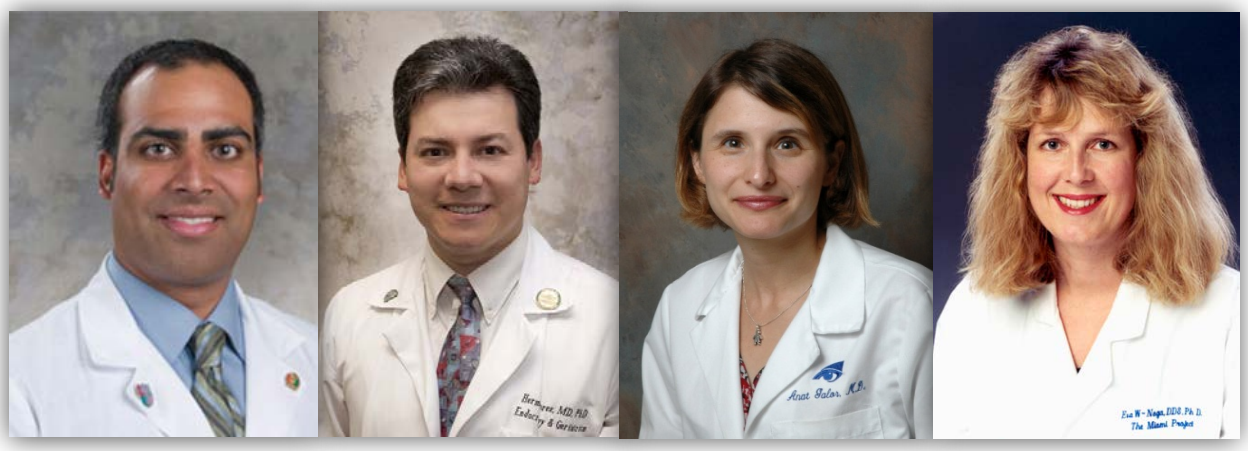
Juan Ruiz, BMES , 1st student from University of Miami to receive the 2011 Barry Goldwater Undergraduate Scholar, Howard Hughes Extra-ordinary Research Opportunity Summer Research Fellowship (2012); Howard Hughes Gilliam's Graduate Award (2013), NIH/Oxford. Cambridge Fellowship (2013) and Fulbright Fellowship (2013). Currently spending a year as a Fulbright Fellow at Tanzania, Africa before doing his PhD at Oxford University, England.

Juan Kochen, undergraduate biomedical engineering student selected as one of 25 students from over 1,000 applicants for the AMGEN Scholars Program for the summer of 2014 at MIT. He was also accepted into the Initiative for Maximizing Student Development (IMSD) program at University of Miami, which will expose Juan to research experiences with the expectation that he will pursue a PhD or MD/Ph.D.

Matthew Penna, undergraduate biomedical engineering student awarded the highly prestigious Leadership Alliance Scholar Award for summer research at Stanford University Medicine Engineering Institute. He was one of the 20 students selected from over 1,000 applicants in the country.

VA Research Investigators receive P&T Award

Congratulations to the following VA Research investigators on their Promotion and Tenure awards effective June 1, 2014 from the University of Miami Miller School of Medicine:



Amar Deshpande, MD
Associate Professor
of Clinical Medicine

Hermes Florez MD, MPH, PhD
Professor

Anat Galor, MD
Associate Professor
of Clinical Medicine

Eva Widerstrom-Noga DDS, PhD
Research Professor

O'Leary named chief research and development officer

Timothy J. O'Leary, MD, PhD was named chief research and development officer (CRADO) for VA, effective June 2014. He had been serving as acting CRADO since June 2013. As CRADO, O'Leary will oversee a nationwide research program based at more than 100 VA medical centers that addresses the full range of health concerns affecting America's Veterans, from post-deployment health to chronic diseases and aging. The program, dating back to 1925, includes biomedical, clinical, rehabilitation, and health services research. It has resulted in three Nobel prizes, seven Lasker awards, and numerous other national and international honors for its investigators.

O'Leary holds a doctorate in physical chemistry from Stanford University and a medical degree from the University of Michigan. He is certified in anatomic pathology by the American Board of Pathology and in molecular genetic pathology by the American Board of Pathology and the American Board of Medical Genetics.

Perez-Stable's student receives prestigious award

Persis Bhadha, summer student research volunteer from Dr. Carlos Perez-Stable's lab, received the Silver Knight Award in General Scholarship.

As a sophomore at Cooper City High School, Persis started her own school effort to feed hungry children. She enlisted the help of three major school clubs to unite with Feeding Children Everywhere, and has raised $10,000 to provide 40,000 meals.

Over the past two summers, Persis served as a research intern at the University of Florida and at a VA hospital where she studied genetic engineering and prostate cancer cells. She also volunteered at Memorial West Hospital and has tutored students through Peer Counseling, the Math and Science clubs, Key Club, DECA and Student Government Association. Persis was named a National Merit Semi-finalist, a National AP Scholar, a Carson a Scholar and Rensselaer Medal Award winner.

When asked about her future plans, Persis said "As far as college goes, I was offered the Robertson Scholarship at the University of North Carolina- Chapel Hill and I decided to go there."

As a Robertson Scholar, Persis will receive a full four-year scholarship to UNC, three paid summers of travel and research, and the ability to take classes and pursue majors at Duke. She was also offered admission to the Chancellor's Science Scholars program, a program specifically for students aspiring to earn a PhD or MD/PhD.

PUBLICATIONS

Kressler J, Thomas CK, Field-Fote EC, Sanchez J, **Widerström-Noga E**, Cilien DC, Gant K, Ginnety K, Gonzalez H, Martinez A, Anderson KD, Nash MS. *Understanding therapeutic benefits of overground bionic ambulation: Exploratory case series in persons with chronic, complete spinal cord injury*. Arch Phys Med Rehabil. 2014 May 17.

Fillingim RB, Bruehl S, Dworkin RH, Dworkin SF, Loeser JD, Turk DC, **Widerstrom-Noga E**, Arnold L, Bennett R, Edwards RR, Freeman R, Gewandter J, Hertz S, Hochberg M, Krane E, Mantyh PW, Markman J, Neogi T, Ohrbach R, Paice JA, Porreca F, Rappaport BA, Smith SM, Smith TJ, Sullivan MD, Verne GN, Wasan AD, Wesselmann U. *The ACTTION-American Pain Society Pain Taxonomy (AAPT): an evidence-based and multidimensional approach to*

classifying chronic pain conditions. J Pain. 2014 Mar;15(3):241-9.

Widerström-Noga E, Biering-Sørensen F, Bryce TN, Cardenas DD, Finnerup NB, Jensen MP, Richards JS, Siddall PJ. *The International Spinal Cord Injury Pain Basic Data Set* (version 2.0). Spinal Cord. 2014 Apr;52(4):282-6.

GRECC

Patel A, Burton DG, Halvorsen K, Balkan W, Reiner T, Perez-Stable C, Cohen A, Munoz A, Giribaldi MG, Singh S, Robbins DJ, Nguyen DM, Rai P. *MutT Homolog 1 (MTH1) maintains multiple KRAS-driven pro-malignant pathways.* Accepted/in press, Oncogene 2014.

Delcroix GJ-R, Monterol RB, Vazques-Padron RI, Pham SM, D'Ippolito G, Andreopoulos FM. *Electrospun Gelatin Constructs with Tunable Fiber Orientation Promote Directed Angiogenesis*. Open J Regen Med 3:2014.Published Online March 2014 in SciRes.

Tran MK, Hassani LN, Calvignac B, Beuvier T, Tewes F, Delcroix GJ-R, Hindré F, Boury F. *Lysozyme encapsulation within PLGA and $CaCO_3$ microparticles using supercritical CO_2 medium*. J Supercritical Fluids 88:142, 2014.

Nguewa P, Manrique I, Díaz R, Redrado M, Parrondo R, Perez-Stable C, Calvo A. *Id-1B, an Alternatively Spliced Isoform of the Inhibitor of Differentiation-1, Impairs Cancer Cell Malignancy Through Inhibition of Proliferation and Angiogenesis*. Current Mol Med, 14:151-162, 2014.

Zahn A, Eranki AK, Patenaude AM, Methot SP, Fifield H, Cortizas EM, Foster P, Imai K, Durandy A, Larijani M, Verdun RE, Di Noia JM. *Activation induced deaminase C-terminal domain links DNA breaks to end protection and repair during class switch recombination*. Proc Natl Acad Sci U S A. 111(11):E988-97. doi: 10.1073/pnas.1320486111. Epub 2014 Mar 3.

Curtis KM, Aenlle KK, Roos BA, Howard GA. *24R,25-dihydroxyvitamin D3 promotes the osteoblastic differentiation of human mesenchymal stem cells*. Mol Endocrinol 28:644-658, 2014.

Aenlle KK, Curtis KM, Roos BA, Howard GA. *Hepatocyte growth factor and p38 promote osteogenic differentiation of human mesenchymal stem cells*. Mol Endocrinol 28:722-730, 2014.

Endocrine, Polypeptide and Cancer Institute

Mezey G, Treszl A, Schally AV, Block NL, Vizkeleti L, Juhasz A, Klekner A, Nagy J, Balazs M, Bognar L, and Halmos G. *Prognosis in human glioblstoma based on expression of ligand growth hormone-releasing hormone, pituitary-type growth hormone-releasing hormone receptor, its splicing variant receptors, EGF receptor and PTEN genes*. J Cancer Res Clin Oncol: Online 01 June, 2014.

Peters MN, Moscona JC, Schally AV, Delafontaine P, Irimpen AM. *The effects of a growth hormone-releasing hormone antagonist and a Gastrin-Releasing peptide antagonist on intimal hyperplasia of the carotid artery after balloon injury in a*

diabetic rat model. Submitted: American J of Medical Sciences.

Azcarate PM, Venincasa VD, Galor A, Feuer W, Stanczyk F, and Schally AV. *Androgen deficiency and dry eye syndrome in the aging male*. Submitted: Investigative Ophthalmology & Visual Science (IOVS).

Hohla F, Winder T, Greil R, Rick FC, Block NL, and Schally AV. *Targeted therapy in advanced metastatic colorectal cancer; current concepts and perspectives*. World Journal of Gastroenterology. 2014 May 28:20(20):6102-6112.

Schally AV. *Foreword in Lost in Translation,* Ed by Srivastava R, Maksymowicz W, and Lopaczynski W. published by World Scientific 2014.

Czikora I, Sridhar S, Gorshkov B, Alieva IB, Kasa A, Gonzales J, Potapenko O, Umapathy NS, , Pillich H, Rick F, Block NL, Verin AD, Chakraborty T, Matthay MA, Schally AV, and Lucas R. *Protective effect of growth hormone-releasing hormone agonist in bacterial toxin-induced pulmonary barrier dysfunction*. Front. Physiol: [published on-line June 19, 2014].

Szalontay L, Schally AV, Popovics P, Vidaurre I, Krishan A, Zarandi M, Cai RZ, Klukovits A, Block NL, and Rick FG. *Novel GHRH antagonists suppress the growth of human malignant melanoma by restoring nuclear p27 function*. Cell Cycle: Accepted for publication.

Popovics P, Schally AV, Szalontay L, Block NL, and Rick FG. *Targeted cytotoxic analog of luteinizing hormone-releasing hormone (LHRH), AEZS-108 (AN-152), inhibits the growth of DU-145 human castration-resistant prostate cancer in vivo and in vitro through elevating p21 and ROS levels*. Oncotarget: Accepted for publication.

Qin YJ, Chan SO, Chong KKL, Li BFL, Yip YWY, Tam POS, Ng TK, Chen H, Zhang M, Block NL, Cheung HS, Schally AV, and Pang CP. *Alleviation of ocular inflammation in experimentally induced acute uveitis by an antagonist of growth hormone-releasing hormone receptors*. Nature: Submitted.

RESEARCH TRIALS

The Genetics of Functional Disability in Schizophrenia and Bipolar Illness: Methods and Initial Results for VA Cooperative Study #572

Philip D. Harvey, Larry J. Siever, Grant D. Huang, Sumitra Muralidhar, Hongyu Zhao,Perry Miller, Mihaela Aslan, Shrikant Mane, Margaret McNamara, Theresa Gleason, Mary Brophy, Ronald Przygodszki, Timothy J. O'Leary, Michael Gaziano, and John Concato.

Am J Med Genet B Neuropsychiatr Genet. 2014 Jun;165(4):381-9. doi: 10.1002/ajmg.b.32242. Epub 2014 May 5.

Philip D. Harvey, PhD, Director, Division of Psychiatry & Behavioral Sciences,
University of Miami Miller School of Medicine
Health Research Scientist, Veterans Affairs Medical Center

The study proposes to identify the genetic basis of veterans developing either of two major psychiatric (or "mental health") diseases: schizophrenia and bipolar disorder. The study will also examine the genetic basis of disability in everyday functions (such as employment, independent living, and self-care) among the same patients. "Genetic basis," means how a person's genes might be a risk for developing these illnesses or being affected by them. The study will compare information gathered from veterans with these illnesses to "psychiatrically healthy" veterans. Participants will be recruited from multiple Veterans Health Administration medical centers; the analysis of blood samples will be done in designated and approved laboratories.

Both schizophrenia and bipolar disorder are chronic psychiatric diseases associated with considerable lifelong disability; in particular, these illnesses are common in veterans served by the Veterans Health Administration. Both of these conditions are also known to be caused in part by genes or so-called heredity; studies of the entire set of human genes (referred to as the genome) can be a tool to identify specific reasons why certain people develop certain conditions. In addition, patients with schizophrenia or bipolar disorder often have difficulty functioning in the real-world-including problems in attention and memory, or the ability to perform tasks of everyday living or have normal emotional experiences-and these "functional impairments" may also be inherited genetically. The current study is designed to help identify who is at higher risk for these diseases and related problems, so that better methods to diagnose and treat the conditions can be developed in the future.

Among other aspects of schizophrenia and bipolar disorder, suicide stands out as a very important issue to veterans, their families, and the Veterans Health Administration. Suicide attempts and completed suicides are more common in veterans with schizophrenia and bipolar illness (compared to veterans without these illnesses), and this tendency may be inherited as well. Part of this study will involve determining whether specific genes might be associated with suicidal behavior. Similarly, the study will look at the genetic basis of side effects related to taking medications for these diseases.

For this research, participants will be recruited from VA sites that have extensive experience in conducting projects involving

psychiatric disorders. Information will be collected about the genes of these veterans from a blood sample, and questions will be asked about health and related factors. The study will also establish a repository which allows for future genomic studies related to SZ, BP, and related disorders or sequelae. The total study duration is indefinite in the setting of creating a SZ and BP repository, although the required time period for addressing the primary aims is 3.5 years. Data for a comparison ("reference") group of veterans with medical, but not psychiatric illnesses will be obtained from a research initiative entitled the *VA Million Veteran Program" (VA-MVP)*.

Ultimately, this study attempts to advance the state of the art regarding our understanding and treatment for two common mental health disorders affecting veterans and will also serve as part of a major initiative to support "personalized" healthcare. It represents a major effort to link specific genes to illnesses, and eventually to treatments intended to relieve suffering.

Kutcher heads new multi-site study in Miami

Post-traumatic stress disorder (PTSD) affects more than 600,000 US Veterans and is the most common psychiatric condition for which veterans seek VA disability benefits. PTSD is a chronic illness that often results in occupational dysfunction and unemployment in a disproportionate number of veterans.

Gary S. Kutcher, PhD, Staff Psychologist
Veterans Affairs Medical Center

The Cooperative Studies Program #589, *Veterans Individual Placement and Support Towards Advancing Recovery* (VIP-STAR), is a multi-center, randomized trial coordinated by the West Haven Cooperative Study Program Coordinating Center.

There are a total of 12 to 15 VA clinical sites with participants being recruited from predominantly outpatient settings as well as from residential and domiciliary clinical settings.

The Miami VA Healthcare system is one of the CSP 589 research sites, being managed by Gary Kutcher, PhD, local site investigator, and Drs. Julie Malphurs, PhD and Daniella David, MD, co-investigators. The research team includes Becky Martinez, RN, study

coordinator, Ernest Allen, IPS vocational rehab specialist, and Rodney Harper, supervisory vocational rehab specialist.

The primary objective of the CSP 589 study is to determine which work program, TWP (Transitional Work Program) or IPS (Individual Placement and Support Program) will more effectively promote an unemployed veteran with PTSD to become a "steady worker" defined as a veteran holding a competitive job for at least 50% of the 18-month follow-up period.

The secondary objective is to evaluate the effectiveness of the IPS program with respect to income, PTSD symptoms, self-esteem, PTSD-related functional outcomes, and the quality of life.

The exploratory objective is to evaluate the IPS program with respect to crisis events such as emergency room visits, contacts with the legal system, homelessness, psychiatric inpatient utilization, addiction relapse, and suicidal behaviors.

Veterans with PTSD represent a substantial proportion of the VHA patient population, consume a great deal of VHA health care resources and disability payments, and are disproportionally unemployed.

FUNDING

Li Ka Shing Foundation Funds Research Study

Andrew V. Schally, PhD, MDhc (Multi), D.Sc,hc
Chief of the Endocrine, Polypeptide and Cancer Institute, Veterans Affairs Medical Center and Distinguished Miller Professor of Pathology and Professor Division of Hematology/Oncology, University of Miami Miller School of Medicine.

Herman S. Cheung, PhD
Senior VA Research Career Scientist, Veterans Affairs Medical Center and James L. Knight Professor of Biomedical Engineering and Professor of Medicine and Orthopedic Surgery, University of Miami Miller School of Medicine

The Li Ka Shing Foundation has provided a $1.25 million grant to fund a research program on developing treatments for eye diseases and eye tumors that will be a collaborative effort between the Interdisciplinary Stem Cell Institute at the University of Miami Miller School of Medicine and the Chinese University of Hong Kong and Shantou University in China. The research efforts will be headed by Drs. Andrew V. Schally and Herman S. Cheung.

GRECC

Damien D. Pearse, PhD, received a notification of funding letter for his project entitled *Enhancing the Reparative Efficacy of Schwann Cells following Chronic SCI*, for the period of July 1, 2014 to June 30, 2018.

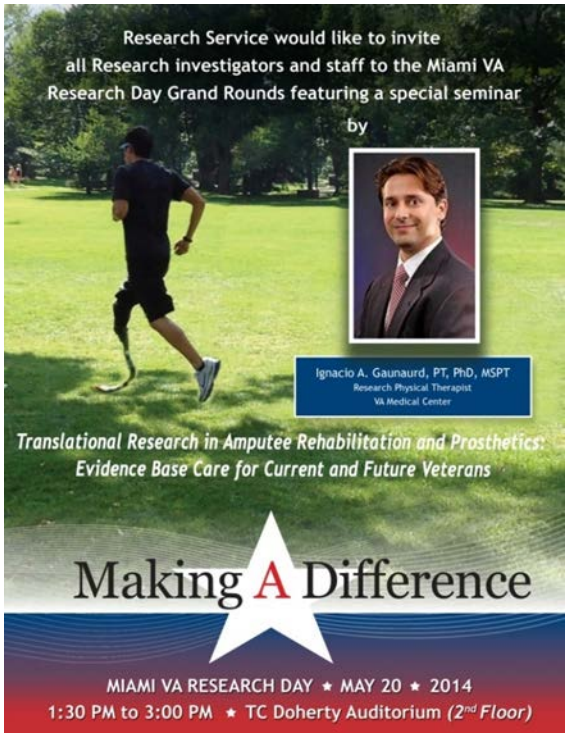
Gianluca D'Ippolito, PhD, GRECC Investigator, recently received an NIH R-21 award for his research project entitled MIAMI cellular-based constructs for vessel regeneration in an aged mouse model. The award duration is for two years, 2014-2016.

Ramiro Verdun, PhD, GRECC Investigator, received a University of Miami Miller School of Medicine CFAR (Center for AIDS Res) award to support his project entitled Telomere stability in B-cells infected with Kaposi's Sarcoma Associated Herpes virus. The award is for one year, 2014-15.

EVENTS

Miami Celebrates 7th Annual VA National Research Week

As part of the VA National Research Week, Miami VA hosted a special presentation on May 20. The keynote speaker was Dr. Ignacio Gaunaurd, PT, PhD, MSPT, Research Physical Therapist, who presented an informative talk entitled *Translational Research in amputee rehabilitation and prosthetics: Evidence base care for current and future veterans*. Dr. Gaunaurd specializes in the treatment of people with amputations, specifically veterans. His current research efforts include developing outcome measures, innovative rehabilitation protocols, and virtual educational modules for people with lower limb loss.



Dr. Gaunaurd presented an overview of "mobility" research which he conducted with

his team at the joint Miami VAHS and University of Miami Functional Outcomes Research and Evaluation (FORE) Center. He discussed their work in the development of the *Comprehensive High Activity Mobility Predictor (CHAMP)* for tactical athletes and service members from OEF/OIF who suffered traumatic lower limb loss and who seek to return to high-level activity and active duty. Dr. Gaunaurd reviewed how his research has translated the CHAMP into the return-to-play measure for student athletes at the University of Miami following a lower limb injury. His presentation discussed the innovative work of quantifying symmetry of motion with basic mobility such as going from sitting to standing to walking up and down ramps for veterans who have lost limbs due to diabetes and peripheral vascular disease. Dr. Gaunaurd discussed the recently funded DoD/VA Joint Incentive Fund project called the Mobile Device Outcomes Based Rehabilitation Program (MDORP). This collaborative VA and DoD partnership will improve the quality of rehabilitative care at a decreased cost to the healthcare system and a reduced burden for service members and veterans with lower limb loss through use of web-based mobile computing devices designed to assess mobility, enable remote prescription of targeted exercise program, and provide continual measureable outcomes to document the continuum of care.

Miami VA R&D Newsletter
is a service of the Research Service Office at the
Miami VA Healthcare System.
To view past issues, visit http://sfvafre.org/newsletter.php

Submissions
Faculty and staff submissions can be e-mailed to the
Office of Research Communications at
iperez4@med.miami.edu or Isabel.Perez1@va.gov.

Editor
Isabel Perez
Published quarterly by the Miami VA Research Service Office.