

# DAY 1

Keynote Forum



11<sup>th</sup> International Conference on

## Endocrinology and Diabetology

August 09-10, 2018 | Madrid, Spain

August 09-10, 2018  
Madrid, Spain

Alaa Abdelkarim, J Clin Mol Endocrinol 2018, Volume 3  
DOI: 10.21767/2572-5432-C2-004

## INTEGRATION BETWEEN THE BIO HORMONAL THERAPY AND THE BIOLOGICAL THERAPY TO RESTORE OUR ENDOGENOUS HORMONES: REGENERATE YOUR ENDOCRINE SYSTEM

**Alaa Abdelkarim**

ACE Cells Lab Limited, UK

**T**he importance of endocrinology was augmented after the discovery of the molecular medicine and finding out that all the vital functions in the body are controlled by the hormones extra and intra cellular. Many diseases cannot be repaired without administration of exogenous hormones. The exogenous hormones take away from the body the privilege of the negative feedback mechanism which is a mechanism in our body to control the release of hormones from any gland whenever it reaches certain level in the blood. This level is different from one patient to the other, this is the cause for which we read in the laboratory investigation reports the normal reference has lower limit and upper limit. Here is the value of the negative feedback that once the level reaches the needed dose by the body the negative feedback makes the gland stop releasing more. Administering exogenous hormone with specific does make the body use some of this dose and the rest hyper stimulate the receptors leading to variety of diseases including malignancy. Using the bio hormonal catalysts help the body to produce the endogenous hormone and does not take away the privilege of the negative feedback. Let us discuss together how we can reach this by using the bio hormonal catalysts and the biological products.



### Biography

Dr. Alaa Abdelkarim, graduated from Cairo University medical school. He is Founder and Chief Medical Officer of ACE Cells Lab Limited, UK. He is a Consultant- endocrinology and stem cells therapy. He has more than 28 years of experience and served in more than 8 countries. He received Fellowship of Royal Society of Medicine, Royal Collage of Chemistry, Fellowship of the Malaysian Association of Endocrinology and the International association for stem cells research. He has been the head of department of endocrinology and diabetes for more than 8 years treating complications of diabetes by cellular applications. He has worked in the cell therapy since 2002 and headed the research department of cell therapy in many international labs. He is an international Lecturer in more than 20 countries. He has registered 20 patents in the field of cell therapy and the protocols to extract the bioactive materials from live cells either autologous or from external sources (animal source). He is leading 2 multi-centre clinical trials in neurodegenerative disease, controlling the complications of diabetes mellitus type II by cellular applications. He is the Founder of ACE Factor deficiency theory which is considered as the new trend in regenerating tissues. With many publications and lectures in treating Multiple Sclerosis, Cerebral palsy and Amyotrophic lateral Sclerosis in different parts of the world he has supervised many master and PhD researches.

[draalaakarim@gmail.com](mailto:draalaakarim@gmail.com)

August 09-10, 2018  
Madrid, Spain

Edward M. Lichten, J Clin Mol Endocrinol 2018, Volume 3  
DOI: 10.21767/2572-5432-C2-004

## ANABOLIC STEROIDS IN THE TREATMENT OF DIABETES IN MEN

**Edward M. Lichten**

Fellow, American College of Surgeons, Fellow, American College OB-GYN



**D**iabetes, the scourge of mankind is an epigenetic, progressive, inflammatory disease that affects 10 percent of the population. Although there are genetic factors, they are minor considering the incidence of diabetes has increased 1000 percent since 1950. What is the key, today, are the unknown (epi-) environmental aspects. Linking xenoestrogens in the environment to both Crohn's Disease and Endometriosis, the author hypothesizes the correlation exists also in adult onset diabetes in men. The cascade is xenoestrogens cause hormonal disruption of the Hypothalamic-Pituitary-Gonadal Axis resulting in decrease in total testosterone (TT) production. Xenoestrogens increase Sex-hormone-binding globulin (SHBG) further reducing the bioavailable testosterone, measured as the Free Androgen Index (FAI). There are three unique discoveries: Type I and Type II diabetic men were observed; worsened disease associated with lower FAI. Increased morbidity in the aging population correlates inversely with FAI. All diabetic men are hypogonadal, parenteral testosterone (not topical testosterone) has only moderate effects on improving glycogenated hemoglobin. Adding androlone deconate was superior to testosterone alone: reducing glycogenated hemoglobin and areas under the curve for

glucose and insulin. Addition of a third anabolic steroid further improved all parameters. Hypoglycemia was not a problem even with serum glucose levels under 50mg/dl. In conclusion, diabetic men are hypogonadal: FAI is the best biomarker measurement. Select anabolic steroids increase FAI, testosterone, decrease SHBG, insulin requirements and maximize glucose homeostasis.. Should physicians measure the FAI, it will serve as a starting point for prescribing anabolic treatments, which can reverse previously unrecognized aspects of adult onset diabetes.

### Biography

Dr. Edward Mark Lichten, M.D. has graduated from Ohio State College of Medicine as a Medical Doctor, with the specialty of Obstetrics and Gynecology in 1972. Later he was accepted to the Fellowship of the College of Surgeons. He entered private practice in 1976; from there he continues his clinical practice, medical journal publications and his clinical research. He has presented his research at more than 100 groups of physicians, internationally.

edwardlichten@gmail.com

August 09-10, 2018  
Madrid, Spain

Yasuo Imanishi, J Clin Mol Endocrinol 2018, Volume 3  
DOI: 10.21767/2572-5432-C2-004

## HYPOPHOSPHATEMIC RICKETS AND OSTEOMALACIA: PATHOGENESIS, DIAGNOSIS AND TREATMENTS

**Yasuo Imanishi**

Osaka City University, Japan



**C**hronic hypophosphatemia develops rickets and osteomalacia characterized by impaired mineralization of bone matrix. Rickets, such as X-linked hypophosphatemic rickets (XLH), occurs in childhood before the closure of epiphyseal plate and results in growth retardation and bone deformities. On the other hand, osteomalacia occurs in adulthood with severe muscle weakness and bone pain. Tumor-induced osteomalacia (TIO) is an underrecognized paraneoplastic syndrome presenting with hypophosphatemic osteomalacia, which is one of causes of adult onset osteomalacia. Recently elevated circulated levels of fibroblast growth factor 23 (FGF23) was identified as a cause of hypophosphatemic rickets/osteomalacia such as XLH and TIO. FGF23 is a bone-derived hormone, which regulate phosphate and vitamin D metabolism. Chronic elevation of circulated FGF23 causes hypophosphatemia by urinary phosphate wasting and attenuate activation of vitamin D, resulted in rickets and osteomalacia. Circulating FGF23 measurement is required to obtain proper diagnosis in rickets and osteomalacia. In familial rickets, genetic testing such as PHEX gene is recommended. In TIO, it is difficult to identify the causative tumor, which secrete FGF23. Recently, somatostatin receptor scintigraphy

was reported to be useful for the diagnosis and localization of causative tumors. Conventional therapies for these FGF23-induced rickets and osteomalacia are active vitamin D and/or inorganic phosphate, however, the clinical efficacy of these therapies are limited. Burosumab, a monoclonal antibody that targets FGF-23, improved renal tubular phosphate reabsorption, serum phosphate levels, linear growth, physical function and reduced pain in children with XLH. This new antibody is promising treatments not only for XLH but also for TIO.

### Biography

Yasuo Imanishi graduated from Kagawa Medical School (MD), Japan. He has completed his PhD from Osaka City University, and Postdoctoral Fellowships from Massachusetts General Hospital in Harvard Medical School and University of Connecticut Health Center. He is an Associate Professor of Osaka City University Graduate School of Medicine. His major interests are calcium and phosphate homeostasis in the clinical field of osteoporosis, rickets & osteomalacia, and chronic kidney disease-mineral and bone disorder (CKD-MBD). He has been working as an Endocrinologist/Nephrologist at Osaka City University Graduate School of Medicine from 2000.

imanishi@med.osaka-cu.ac.jp

# DAY 2

Keynote Forum



11<sup>th</sup> International Conference on

## Endocrinology and Diabetology

August 09-10, 2018 | Madrid, Spain

August 09-10, 2018  
Madrid, Spain

Paloma Collado, J Clin Mol Endocrinol 2018, Volume 3  
DOI: 10.21767/2572-5432-C2-004

## MODULATORY ACTION OF ESTRADIOL DURING DEVELOPMENT ON THE EFFECTS OF UNDER AND OVERNUTRITION IN MALE AND FEMALE RATS

**Paloma Collado**

National University of Distance Education, Madrid, Spain

**D**uring development organisms are more vulnerable to adverse effects that occur both in the internal and external environments, and among the latter, nutrition is a determining factor. It has been widely demonstrated that malnutrition or overnutrition produce long-term alterations generating imbalances in the neurohormonal system that regulates energy metabolism. It is known that estradiol has an inhibitory effect on food intake and that this hormone also has organizing effects on some neural networks during the first stages of life. Recent experiments in rats have shown that estradiol during the first two weeks of life exerts a modulatory function on the alterations produced by malnutrition and overnutrition, and what is more important, that this modulation has differential effects in males and in females in the case of overnutrition. Specifically, a high fat diet seems to alter mainly physiological parameters in males, whereas in females the alterations can be detected in the hypothalamic peptidergic system, concretely in the anorexigenic peptide proopiomelanocortina (POMC). Taking into account the modulatory role of estradiol in the first weeks of life, and that its

influence on food intake occurs through the same transcription factor pathway (STAT3) through which leptin exerts its anorexigenic actions on food intake, and also in its neurotrophic function over hypothalamic circuits during development, it will be of great importance to investigate the possible participation of estradiol in the programming of the hypothalamic circuits that regulate energy metabolism.

### Biography

Paloma Collado graduated from National University of Distance Education of Spain (UNED) in Psychology, and obtained her PhD in Psychobiology in 1990. She is a Professor of Psychobiology at the same university since 1990. Her research has been focused in the field of physiological psychology, and for the last fifteen years, on the mechanisms involved in the development of the cerebral circuits that control food intake in rodents. She has developed this research as Principal Investigator of different grants in collaboration with international researchers.

pcollado@psi.uned.es



August 09-10, 2018  
Madrid, Spain

Harvey Aaron Schwartz, J Clin Mol Endocrinol 2018, Volume 3  
DOI: 10.21767/2572-5432-C2-004

## THE SWEET & SOUR DISEASE: EMOTIONALLY MANAGING DIABETES

**Harvey Aaron Schwartz**

Author, Patient Advocate



**D**iabetes is an emotional condition as much as it is a physical disease. If more attention was focused on the emotional component, there would be a great global opportunity to reduce daily difficulties in the lives of diabetics, that may reduce the complications and other hardships of the disease. By teaching patients Positivity and Motivation Techniques on a 1:1 basis, they would move in a greater way than today, toward self-direction "ownership" of the disease. My recommendation is that a solutions-focused motivational ownership technique be adopted by the medical community, which is incorporated into the care and management of the diabetic population when they are not in a physician's office. In one word: Empowerment. It is my request there be a global discussion toward a variety of therapeutic techniques combined with physical procedures to maintain health and a quality of life. I offer the one that has worked for me, which I refer to as The Diabetes Detour: The first stage is called Alarming, when a situation arises regarding a sudden change by the person with diabetes. A discovery of something that has gone wrong, such as recognizing an extremely elevated blood sugar. The second stage is called Moping—best described as where did I or my treatment plan go wrong? The third stage is called Coping—where the patient is being proactive, transitioning to a solutions-focus mind-set. Asking themselves: What should I do? What are my options? The fourth stage is called Hoping-

where the patient begins to assess whether they have the tools to utilize the remedy they feel will solve the critical issue. The fifth stage is Doing—where the patient has determined their course of action and begin implementation. The sixth stage is called Aligning. They are generating confidence and self-reliance on managing the issue. They are going on with their life. This sequence of events describes where the patient learns a variety of pathways to navigating their daily night and days of thriving with diabetes.

### Biography

Author, The Sweet & Sour Disease: Emotionally Managing Diabetes (official launch Madrid, August, 2018). Diabetes Motivational Speaker and Workshop Facilitator (current). Medical Consultant, Harvey Schwartz Medical (current). Rainmaker, Harvey's Focused Giving Initiatives & Harvey-The Mission Matchmaker, LLC (current). Chief Operating Officer, American Cancer Society (Ohio). Executive Director, Secretary of the Board, the Ohio University Heritage College of Osteopathic Medicine Graduate Medical Education Consortium. Adjunct instructor at numerous universities, including The Ohio State University. Numerous board membership positions for a variety of Health, wellness and community service organizations. Certificate, Northwestern University Kellogg School of Nonprofit Management. MBA, The University of Toledo. BA, Communications, The University of Toledo.

[schwartz.harvey@gmail.com](mailto:schwartz.harvey@gmail.com)

August 09-10, 2018  
Madrid, Spain

Irina Kurnikova, J Clin Mol Endocrinol 2018, Volume 3  
DOI: 10.21767/2572-5432-C2-004

## HEART RATE VARIABILITY AT THE STAGES OF CARBOHYDRATE METABOLISM DISTURBANCE

**Irina Kurnikova**

RUDN University, Russia

**Statement of the Problem:** The formation of a systemic disease such as diabetes, in which the vascular and nervous system is involved in the pathological process, accompanied by disturbances in the processes of vegetative regulation. At which stages of carbohydrate metabolism disturbance (CMD) these disorders begin is a matter requiring further study.

**Purpose:** The purpose of this study is to state of mechanisms of autonomic regulation at the stages of disorders of carbohydrate metabolism (metabolic syndrome, carb tolerance, diabetes type 2- DT2).

**Methodology & Theoretical Orientation:** 112 patients were examined. 1<sup>st</sup> group - patients with metabolic syndrome (MS) without carb tolerance (CT) (28 people); 2<sup>nd</sup> group - MS with CT (13 people) and 3<sup>rd</sup> group - patients with DT2 (71 people). Autonomic regulation was studied by using spectral analysis of daily variability of the heart rhythm (HR) power spectrum of oscillation in three frequency bands: 0.004-0.08 Hz (very low frequency – VLF), 0,09-0,16 Hz (low frequency – LF), 0,17-0,5 Hz (high frequency – HF). In addition, Index of vegetative balanced (IVB), IC (index of centralization) were analyzed.

**Findings:** A decrease IVB (LF/HF) was observed in patients with MS (0.6±0.1). At the same time, a significant difference in groups 2 and 3 (p<0.05) was found, which underlines the importance of the stages of CMD. Evaluation of spectral analysis revealed a significant increase of ULF% (Ultra low frequency) in the 3<sup>rd</sup> group which indicates disruption in adaptation and violation of autonomic regulation of HR. The revealed significant difference in the analysis of the IC in groups with MS and DT2 emphasizes the

importance of the stages of CMD. The increase in IC (4.1±0.9) in the 3<sup>rd</sup> group confirmed the high activity of the central regulation loop in relation to the autonomic. And this in the prognostic attitude testified to depletion of regulatory mechanisms and a high risk of development of “vascular accidents” (OR=2.7, p=0.001).

**Conclusion & Significance:** The revealed significant difference of the CI in groups MS and DT2 emphasizes the importance of the stages of CMD. Changing the IC towards the increase at the stages of progression of CMD testifies to the activation of the central contour of regulation and the gradual transition from the control level to the administering level. The obtained data allow considering this mechanism to be sufficient to increase the risk of cardiovascular complications and defeat of target organs in patients with MS and DT2.

### Biography

Irina Kurnikova is a Professor of Medicine, Curator of the Scientific Direction of Endocrinology at RUDN University (Peoples' Friendship University of Russia), Moscow, Russia. She has extensive experience in the field of scientific and practical endocrinology. She has been dealing with problems of endocrinology for more than 20 years. Her main areas of research include: the optimization of the system approach to the treatment and rehabilitation of patients with diabetes mellitus, diseases of the thyroid gland, disturbances in the system of regulation of the organism and other endogenous factors (comorbidity, interstitial humoral transport et al.). She has published more than 20 articles in well-known journals, the author of 25 books and manuals in Russian, 10 patents for inventions.

curnikova@yandex.ru

