

DIABETES CENTER OF EXCELLENCE

NEWSLETTER

Section of Endocrinology, Diabetes and Nutrition



NEWSLETTER NO. 2

NOVEMBER 2009

NATIONAL NEWS

AMERICAN DIABETES MONTH® NOVEMBER 2009

A MESSAGE FROM ADA:

www.diabetes.org

The American Diabetes Association uses the month of November as an opportunity to raise awareness of diabetes and its serious complications. This year, ADA is taking a bolder, more audacious approach. With nearly 24 million children and adults in the US living with diabetes, and an additional 57 million Americans at risk, simple awareness will no longer suffice. Diabetes is an epidemic disease and drastic action is needed.

- ✦ One of every three children born today will face a future with diabetes if current trends continue.
- ✦ Since 1987, the diabetes death rate has increased by 45% while the death rates due to cancer, heart disease, and stroke have declined.
- ✦ About 60-70% of those with diabetes have mild to severe forms of nerve damage.
- ✦ Two out of three people with diabetes die from heart disease or stroke
- ✦ Diabetes is the leading cause of new cases of blindness and kidney failure among adults
- ✦ The cost of caring for someone with diabetes is \$1 out of every \$5 in total healthcare
- ✦ The total national cost of diagnosed diabetes in the US is \$174 billion

Join the ADA in officially launching a national movement to Stop Diabetes. Beginning November 2, visit www.stopdiabetes.com to learn about all the exciting ways to be part of the Stop Diabetes movement.

A MESSAGE FROM THE NATIONAL DIABETES EDUCATION PROGRAM

www.ndep.nih.gov

People with pre-diabetes can cut their risk of developing type 2 diabetes by more than half by following the two recommendations below!

To help stem the diabetes epidemic, the National Diabetes Education Program has launched a major national diabetes prevention effort. Based on the highly successful Diabetes Prevention Program (DPP), the campaign, called *Small Steps, Big Rewards. Prevent type 2 Diabetes* encourages people with pre-diabetes to make modest lifestyle changes that could delay and possibly prevent the onset of diabetes:

1. Lose 5-7% of body weight – that is a weight loss of about 10-15 pounds in a 200 pound person!
2. Get 150 minutes of physical activity a week – that means walking 30 minutes 5 days/week!

Of interest, *Diabetes Spectrum* (Summer 2009) recently published an article describing the results of NDEP's 2006 survey exploring "Predictors or Perceived Risk of the Development of Diabetes". The survey revealed that:

- ✚ More than half of the US population ages 45 and older had one or more risk factors for diabetes, but only about one-fourth felt they were at risk for the disease. Also, African Americans were less likely to feel at risk for diabetes compared to non-Hispanic white.

It is clear that we need to focus on reaching older adults and African Americans and increase their awareness of diabetes risk by emphasizing family history, obesity, and diagnoses of pre-diabetes.

ESTIMATED AVERAGE GLUCOSE – or eAG

ADA is recommending the use of a new term in diabetes management, estimated average glucose or eAG. The results of the A1C –Derived Average Glucose study (ADAG) published in *Diabetes Care* 2008;31:1473-78 have affirmed the existence of a linear relationship between A1C and average blood glucose levels. Health care providers can now report A1C results to patients using the same units (mg/dl)

that patients see routinely in blood glucose measurements. Using eAG may enhance the diabetes education process by focusing on a single set of values for both daily glucose checks and long-term control. For more information, visit the ADA website at www.diabetes.org/professional/eAG



A1C%	eAG _{mg/dl}
5	97
5.5	111
6	126
6.5	140
7	154
7.5	169
8	183
8.5	197
9	212
9.5	226
10	240
10.5	255
11	269
11.5	283
12	298

LOCAL NEWS

iPRO – CONTINUOUS GLUCOSE MONITORING (CGM)

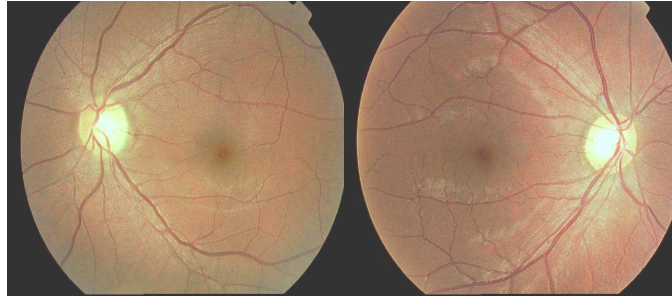


The Diabetes Center of Excellence has purchased Continuous Glucose Monitoring devices (iPro) that we are currently using in our Clinic for diagnostic purposes. CGM helps to discover patterns and problems that A1C testing, logbooks and blood glucose meters alone cannot uncover. The Software for iPro CGM reveals correlations between insulin, carbohydrates, exercise, medication, and glycemic control.

If your patients are experiencing elevated A1C levels, nocturnal hypoglycemia, hypoglycemic unawareness, or postprandial hyperglycemia, you may refer your patients to a MD or NP in Diabetes Services in Logician. We will assess, train, generate reports, and interpret results for you and your patients, and suggest changes in therapy based on a 3-day data collection.

NON-MYDRIATIC RETINAL CAMERA

A non-mydriatic (non-dilated) Retinal Camera has recently been purchased by the Diabetes Center of Excellence to assist in capturing multiple retinal images using advanced video technology. A special diagnostic procedure called Retinal Photos consists of taking a photograph of the back part (retina) of the eye to assess the health of the retina, optic nerve, macula, and blood vessels.



The camera assists in capturing multiple images and incorporates five flash levels to choose from, capturing images with the most effective level of illumination for each photo.



The system incorporates the latest advances in digital imaging software and allows a technician to perform highly accurate color-digital retinopathy screenings. The fixed field positions are automatically forwarded to the computer so that a composite image may be quickly created in the computer for printout and/or evaluation. Low illumination assures patient comfort and compliance to make screening large volumes of patients fast and efficient.

Please let us know if you have patients in need of this service. We are in the process of piloting the Retinal Camera screenings and will be setting up appointments in January 2010. At that time we will be happy to take your referrals through Logician

DIABETES CENTER OF EXCELLENCE: PEOPLE IN THE NEWS

- ✚ Sonia Ananthkrishnan, MD published the following:
Ananthkrishnan S. Diabetes insipidus in pregnancy: etiology, evaluation, and management. *Endocr. Pract.* 2009 Jul-Aug; 15(4):377-82.
- ✚ Roberta Capelson, MS, ANP and Karen Chalmers, MS, RD, CDE presented the first Educational Diabetes Flipchart Program, “It’s Not Just About Blood Sugar” for the ‘Diabetes Champions’ from BMC’s Women’s Health as well as the following BMC’s Community Health Centers: East Boston, Geiger Gibson, Boston Health Care for the Homeless, Manet, Mattapan, and South End. We will be presenting this program again on November 19th for those who were unable to attend our first program.
- ✚ Chalmers, K, Capelson R, Rosenzweig JL. Healthy Living with Diabetes: “It’s Not Just About Blood Sugar” . Boston Medical Center, 2009. pp.1-83
- ✚ Andrea Coviello, MD, MSE, FACE published the following:
 - Coviello AD. Polycystic ovary syndrome: multiple pathways to a common phenotype? *Endocr Pract.* 2009 July-Aug; 15(4):387-9.
 - Coviello AD, Sam S, Legro RS, Dunaif A. High prevalence of metabolic syndrome in first-degree male relatives of women with polycystic ovary syndrome is related to high rates of obesity. *J Clin Endocrinol Metab.* 2009 Oct 16.
- ✚ Philip Knapp, MD, MS and Elliot Sternthal, MD published the following:
Knapp PE, Showers KM, Phipps JC, Speckman JL, Sternthal E, Freund KM, Ash AS, Apovian CM. Self-monitoring of blood glucose with finger tip versus alternative site sampling: effect on glycemic control in insulin-using patients with type 2 diabetes. *Diabetes Technol Ther.* 2009 Apr; 11(4):219-25
- ✚ Dr. Marie McDonnell, Director, Inpatient Diabetes Program at BMC, published the following: Lazar HL, McDonnell M, Chipkin SR, Furnary AP, Engelman RM, Sadhu AR, Bridges CR, Haan CK, Svedjeholm R, Taegtmeier H, Shemin RJ; Society of Thoracic Surgeons Blood Glucose Guideline Task Force. The Society of Thoracic Surgeons practice guideline series: Blood glucose management during adult cardiac surgery, *Ann Thorac Surg.* 2009 Feb; 87(2):663-9.
- ✚ Marie McDonnell, MD and Marina Donahue, MS, FNP, CDE published the following: McDonnell ME, Donahue M. Transitioning patients along the continuum of care: IV to SQ insulin, inpatient to outpatient settings. *ACP Hospitalist Supplement*, 2009.

- ✚ Sara Pietras, MD published the following:
Pietras SM, Obayan BK, Cai MH, Holick MF. Vitamin D2 treatment for vitamin D deficiency and insufficiency for up to 6 years. *Arch Intern Med.* 2009 Oct 26; 169 (19): 1806-8
- ✚ James L. Rosenzweig, MD, Director of Diabetes Services at BMC, was invited to share his diabetes expertise focusing on Updates in Pharmacotherapy in Diabetes at several of the BMC Community Health Centers including Roslindale, Codman Square, and Health Care for the Homeless.
- ✚ Dr. James L. Rosenzweig was an invited speaker:
 - “Diabetes Registries and Performance Improvement in Disease Management”. Mass Medical Society Meeting: Chronic Disease Management: Critical to the Quality and Cost Equation, Waltham, MA
 - “The Evolution of Consensus in Diabetes Quality Measurement: The National Diabetes Quality Improvement Alliance”. National Changing Diabetes Program Workshop, Washington, DC
 - The Brookings Institution, Expert Panel on Lab Data Integration for Diabetes Care Improvement: achieving meaningful use of type 2 diabetes data
- ✚ Rosenzweig J, Capelson R, *Multiple Component Insulin Regimens* 83-107, In Wolfsdorf JI ed. *Intensive Diabetes Management*, 4th Edition, American Diabetes Association, Alexandria, VA., 2009
- ✚ Neil Ruderman, MD, D.Phil. published the following: Lamontagne J, Pepin E, Peyot ML, Joly E, Ruderman NB, Poitout V, Madiraju SR, Nolan CJ, Prentki M. Pioglitazone acutely reduces insulin secretion and causes metabolic deceleration of the pancreatic beta-cell at submaximal glucose concentrations. *Endocrinology*, 2009 Aug; 150 (8): 3465-74.
- ✚ Elliot Sternthal, MD served as a collaborator in the BARI 2D study group,
 - BARI 2D Study Group, Frye RL, August P, Brooks MM, Hardison RM, Kelsey SF, MacGregor JM, Orchard TJ, Chaitman BR, Genuth SM, Goldberg SH, Hlatsky MA, Jones TI, Molitch ME, Nesto RW, Sake EY, Sobel BE. A randomized trial of therapies for type 2 diabetes and coronary artery disease. *N Engl J Med.* 2009 Jun 11; 360 (24):2503-15.
 - Pop-Busui R, Lu J, Lopes N, Jones TL; BARI 2D Investigators. Prevalence of diabetic peripheral neuropathy and relation to glycemic control therapies at baseline in the BARI 2D cohort. *J Peripher Nerv Syst.* 2009 Mar; 14 (1) : 1-13.

