Diabetes Spotlight

Rady Children's

Volume 1, Issue 3: Winter 2015

Managing Diabetes while on Winter Vacation

With proper planning and preparation, your winter vacation can go off without a hitch. Here are a few things to consider:

- 1. Everyone responds to exercise and altitude differently. Most people find that their blood sugars are lower. Consider testing blood sugars every 2 hours to see how you or your child responds. You burn a lot of energy out there on the mountain!
- 2. Testing your blood sugar on the mountain can be a challenge. Remember to bring your meter! Cold fingers might not provide enough blood, so take a moment to warm up your hands before testing.
- 3. Insulin is temperature sensitive. Pack your insulin or pump in a pocket close to your body to keep it from freezing. If there is a chance it may have been exposed to below freezing temperatures, discard and open new insulin.



4. Pack snacks, juice and other sources of fast acting carbs to treat any lows you might have.



- 5. Eat breakfast, take a snack and STOP for lunch. It's important to take breaks to allow your body to rest and recover.
- 6. Wear your medical ID bracelet. Mountain patrol won't be able to help you if they don't know your situation.
- 7. Hydrate, hydrate, hydrate! Activity and elevation can contribute to dehydration.
- 8. Make sure you have a partner! Never let a person with diabetes go off alone.

Upcoming Events:

- SMILE Program open.
- January 19th: Clinic closed in observance of Martin Luther King Day
- ⑤ January 31st: Thriving Gluten-Free. Go to www.ThrivingGF.org for more information and tickets.
- © February 16th: Clinic closed in observance of Presidents' Day
- February 23rd: UCSD Diabetes Public Forum. See below for details.
- February: JDRF Meet the Scientist. Visit www.sd.jdrf.org for more information.
- March 8th: Daylight Savings Time. Remember to adjust the time on your meter and pump.
- April 1st: Registration for Camp Wana Kura opens. See page 3 for details.
- April 18th: American Diabetes Association San Diego Tour de Cure. Del Mar Fairgrounds.
- April 27th: Advanced Pump Class. Please call 858-576-1700 ext 6126 to register or for more information

University of California San Diego: Diabetes Public Forum

The Pediatric Diabetes Research Center and the Sanford Stem Cell Clinical Center are hosting a public forum to share exciting information about the ongoing first-ever clinical trial of a stem cell-derived therapy for patients with diabetes.

Monday, February 23, 2015 5:30-7:30pm Lobby, Sanford Consortium for Regenerative Medicine 2880 Torrey Pines Scenic Drive, La Jolla, CA, 92037

Please RSVP by email or phone: Debbie Taheri (Program Administrator, PDRC) Tel: 858-822-6030, Email: detaheri@ucsd.edu

Yearly Screening and Health Targets

Staying current on how your child's body is performing can go a long way toward avoiding long-term complications of diabetes such as nerve damage, kidney disease, and eye disease.

Here is a list that will help you determine which tests and screenings children need, when to get them, and what targets they should shoot for.

A1C

Why: A measure of your average blood glucose level over the past 2-3 months. A high A1C can indicate uncontrolled diabetes and raise a person's risk for complications.

Target: Ages 0 to 19: A1C less than 7.5 percent How Often: At each visit: generally 4 times a year.

Blood Pressure

Why: High blood pressure is linked to heart disease, heart failure, stroke, and kidney disease.

Target: Below 130/80 mmHg or less than the 90th percentile for a child's age, sex, and height, whichever is lower

How Often: At every exam.

LDL Cholesterol

Why: LDL ("bad") cholesterol can stick to artery walls, leading to narrowed arteries and atherosclerosis. When it is too high, it can raise the risk for having a heart attack and stroke in adulthood.

Target: Less than 130 mg/dl

How Often: At diagnosis for children 2 or older who have a family history of high LDL cholesterol or heart problems before age 55. Children without such family history screening begins at age 10. All children with abnormal cholesterol should be screened yearly. Those with in-range levels should be tested every 5 years.

Thyroid Studies

Why: To screen for thyroid disorders

How Often: Done in conjunction with other screening labs.

Dilated Eye Exam

Why: To screen for and monitor the progression of eye diseases such as retinopathy, cataracts, and glaucoma How Often: Yearly for children who have had diabetes for 3 to 5 years. Begin screening at puberty or age 10, whichever is first. Eye care providers may say a child needs a dilated eye exam less frequently, every 2 years if he or she has had normal results for a couple of years.

Urine Albumin-to-Creatinine Ratio

Why: To screen and monitor the progression of nephropathy (kidney disease)

Target: Less than 30 mg/g

How Often: Annual urine test for children who have had diabetes for five years. Begin screening at puberty or age 10, whichever comes first.

Body Mass Index (BMI)

Why: BMI, a ratio of height to weight, can indicate overweight and obesity. Extra weight can lead to a variety of health conditions in adulthood including heart disease.

Target: Less than 25 or below the 85th percentile for a child's age and sex, whichever is lower.

From Diabetes Forecast, April 2014

http://www.diabetesforecast.org/2014/apr/images/apr14-tests-for-children.pdf





American Diabetes Association Camp Wana Kura

The American Diabetes Association's Camp Wana Kura day camp for children with Type 1 diabetes. It is held at Santee Lakes Recreation Preserve in San Diego County. Campers play water games, sing songs, run relays, do crafts, swim, go paddle boating, learn new things and connect with other kids living with diabetes while building new friendships.

When: July 28 to July 31, 2015 Check-in: 8:30-9 a.m.; Check-out: 3:30-4 p.m

Ages: Campers: 5-12 years, Teen volunteers: 13-17 years

http://www.diabetes.org/in-my-community/diabetes-camp/camps/wana-kura.html



SMILE Program: Self Management In Living Everyday



Have you heard about our SMILE program? This is a program for adolescents with Type 1 diabetes who are struggling with their diabetes selfmanagement.

The program is open to teens 13 years or older who have an A1C greater than 10.

In the 2-3 month long program, the teen is paired with a Health Care Advocate (Graduate nursing student), who works under the supervision of the our Diabetes Team. Together, the HCA and teen meet on a regular basis and text frequently focusing on diabetes areas identified.

Graduates of the program have expressed confidence in their ability to self manage diabetes. We have also seen improved A1Cs, more frequent blood glucose testing and satisfaction with the program.

If you are interested, we are currently accepting teens from Imperial Valley for our Spring session and San Diego teens for the Summer and Fall.

Please speak to our Diabetes Team if interested.

Test Your Diabetes Knowledge

- 1. Which should not be used to treat low blood glucose?
 - a. 3 glucose tablets
 - b. 1/2 cup orange juice
 - c. 1 cup diet soft drink
 - d. 1 cup skim milk
- 2. What effect does unsweetened fruit juice have on blood glucose?
 - a. Lowers it
 - b. Raises it
 - c. Has no effect
- 3. If you are sick with the flu, which of the following changes should you make?
 - a. Take less insulin
 - b. Drink less liquids
 - c. Eat more proteins
 - d. Test for glucose and

ketones more often

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Why Is Physical Activity Important In Managing Type 2?

Physical activity is important in managing type 2 diabetes because exercise can increase your body's sensitivity to insulin. By helping your body respond better to insulin, insulin is used more efficiently and you may need

to make less (or take less) of it to keep your blood glucose levels in normal range. In fact, exercising can keep your blood glucose levels down for hours after you stop exercising. Exercise can even reduce your need for medications to regulate blood sugar.

The recommended amount of moderate to vigorous exercise is one hour per day. It's a good idea to check your blood sugar before the start of the exercise and at the end of the activity. If you take insulin, make sure your blood sugar does not get too low during or after activity. Always carry something to treat low blood sugar with you, such as juice, glucose tablets or a snack. Exercise can also reduce stress, lower your blood pressure and cholesterol levels, and improve circulation, which reduces your risk for cardiovascular complications. Here are some things you can do to stay active:



- Limit TV watching to 2 hours a day and replace the time with a physical activity. Take a walk, hike or ride a bike.
- Exercise intensely for 1 hour a day more if you're a teenager. Play basketball, soccer, tennis or your favorite sport.
- Buy a pedometer to measure the steps you take each day, set a goal to increase your steps, and keep track of how well you do.
- Engage in short bursts of activity even for 10 minutes at a time. Take the stairs instead of the elevator, run around the block, dance or jump rope.

Useful App





GoMeals® is an app that helps you make healthy choices at home or on the go. You can track your activity, calorie intake, read about healthy living and join in discussions. It includes tools for eating healthy, staying active, and tracking your blood glucose levels. The food tracker has nutritional values for your favorite foods and restaurant menu items utililizing the CalorieKing food database. You can even sync data with your fitbit account.

The activity tracker lets you calculate the number of calories you burn while participating in physical activity. GoMeals also offers a handy place to record and view your blood glucose readings. You can track your highs and lows and can enter meal and activity tags. Free app available for Apple and Android devices.

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Cutout Cookies and Sugar Free Icing

Try these for Valentines Day!

Cookies

Ingredients

1/2 cup butter

1/2 cup sugar

1 teaspoon vanilla

1 egg

2 cups flour (can substitute almond flour for gluten free)

2 teaspoons baking powder

Cream butter and sugar together. Add vanilla and egg. Sift flour and baking powder and add to dough. Roll and make cutouts. Bake at 375 degrees for 10 minutes.

Icing/Edible Tempera Paint

Beat 2 egg yolks together and divide evenly into four small bowls. Add liquid food coloring as follows:

Blue or Green = 1/4 teaspoon Red or Yellow = 1/2 teaspoon

Use a small paint brush to paint the cookie before baking. When done, the cookies will have a

 $be a utiful, stained-glass\ appearance.$

Serving size: 2 cookies

Yield: 36 cookies

Nutrition: 120 Calories, 2 g Protein,

16 g Carbohydrate, 4 g Fat

Recipe courtesy of Children with Diabetes



If you have a favorite recipe that you would like to share, please email

kmcnamara@rchsd.org or bring a copy

to your clinic visit.

Please include carb count if known.

Н	Z	G	Z	R	L	A	Р	U	W	N	Н	С	Р	V
F	Y	M	L	I	E	E	J	Н	M	Y	S	A	M	U
E	D	P	P	U	I	т	Н	V	P	E	E	R	U	P
R	N	I	E	U	С	Z	E	0	Н	E	N	В	Р	P
A	D	S	Z	R	F	0	G	M	G	D	0	0	W	Q
S	Α	J	Α	L	G	L	S	N	Q	U	Т	Н	K	Т
X	J	E	V	E	Y	L	I	E	L	G	E	Y	L	L
M	J	С	J	С	R	R	Y	V	N	K	K	D	0	В
Х	Z	E	E	P	Y	С	F	С	Q	S	Q	R	G	Н
D	G	M	L	S	U	Y	N	Н	E	I	N	А	В	V
S	I	S	0	D	I	С	А	A	N	M	Y	Т	0	А
A	0	Х	E	F	P	С	С	L	P	J	I	E	0	U
G	I	N	S	U	L	I	N	M	R	S	Н	А	K	G
R	0	S	N	E	S	F	S	L	Н	Q	В	Х	W	0
Y	U	A	Y	J	U	E	X	Н	Z	W	J	W	Т	K

Diabetes Word Search

ACIDOSIS

CARBOHYDRATE

GLUCOSE

HYPERGLYCEMIA

HYPOGLYCEMIA

INSULIN

KETONES

LIPIDS

LOGBOOK

METER

PANCREAS

PUMP

SENSOR

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Continuous Glucose Sensor 1 week trial

Have you heard about continuous glucose monitors? CGM uses a tiny sensor that placed under the skin that measures the amount of sugar in the fluid inside your body. A transmitter on the sensor then sends the information to a wireless receiver that you can clip on your pants or in your pocket. The monitor displays your sugar levels at 1-, 5- and 10-minute intervals. If your sugar drops to a dangerously low level or a high preset level, the monitor will sound an alarm. It does not replace your finger stick tests, but can help detect trends and patterns to help better manage your diabetes.

Do you want try it for a week?

If you answered yes, then our CGM 1 week trial might be for you.

We have a limited number of Dexcom G4 systems and Medtronic Enlite sensors available to trial.

If you are interested, please talk to your provider at your next clinic visit.

Attention Insulin Pumpers!

As our clinic population has increased, the number of pumps and meters we download daily can be overwhelming and time consuming. If you are able to download your pump at home the morning of your appointment or evening before, it will eliminate you having to disconnect from your pump in clinic and hopefully reduce your appointment wait time.

Please let the Medical Assistant know that you downloaded at home and have your user name and password handy.

If you have not been downloading at home and would like to start, please contact your pump manufacturer for assistance.



Coming soon!! Note Worthy Achievements

We would like to highlight any achievements that you are proud of:

Academic achievements

Athletic achievements

Anything you are proud of and would like to share.

If you would like to be featured, email your story and picture (if you like) to

kmcnamara@rchsd.org

Or drop off a written letter in clinic.



Quiz Answers

- C; diet soda does not contain any carbs so it will not raise your blood sugar.
- B; unsweetened fruit juice contains natural sugars, carbs.
 No sweetener is added which is why it is labeled "unsweetened"
- D; elevated blood sugars ane ketones can develop when you are sick. Even if you are not eating, your body will still require some insulin.