

RISK FACTORS OR COMPLICATIONS AND RECOMMENDED TREATMENT GOALS AND FREQUENCY OF EVALUATION FOR ADULTS WITH DIABETES

Risk Factors or Complications	Goals for Adults with Diabetes or Recommended Tests	Frequency of Evaluation
Glycemic Control	HbA_{1c} < 7% < 6% consider on individual basis	2 times/year if at goal or quarterly if Rx change or not at goal
Fasting & Capillary Plasma Glucose	Preprandial: 70-130 mg/dL, (5-7.2 mmol/L) * Postprandial: <180 mg/dL, (<10.0 mmol/L) *1-2 hr after beginning a meal	Varies depending on Rx regime Individualize to facilitate reaching goal
Anti-platelet Agents Aspirin	75-162 mg daily for those: <ul style="list-style-type: none"> • With CVD or • At ↑ CVD risk: <ol style="list-style-type: none"> 1. > 40 years old 2. *Who have additional risk factors (family history of CVD, HTN, smoking, dyslipidemia, albuminuria) 	Limited evidence for those ≤30 yrs old Not recommended for those ≤ 20 yrs old
Blood Pressure Hypertension	BP <130/80 mmHg If autonomic neuropathy present Sit/Stand BP All patients with DM & HTN should be treated with ACE inhibitor or ARB	At every visit
Cholesterol Dyslipidemia Complete Lipid Panel	LDL <100 mg/dL, (<2.6 mmol/L) <ul style="list-style-type: none"> • In pts < 40 years w/o CVD but w/ CV risk factors or increased duration of DM, treat to LDL-C goal <100 mg/dL • In pts > 40 yrs w/o CVD begin statin Rx to achieve 30%-40% LDL-C reduction regardless of baseline LDL • In pts w/overt CVD treat with lifestyle and statin to achieve 30-40% LDL-C reduction • <70 mg/dL (1.8 mmol/L) using high dose statin is optional HDL-C >40 mg/dL, (>1.1 mmol/L) Consider >50 mg/dL in women TG <150 mg/dL, (< 1.7 mmol/L) Non-HDL-C 30 points above LDL goal	Annually or more often if not at goal or changing Rx
Cardiovascular Disease	Stress exercise testing, Echocardiogram, ABI, Carotid ultrasound	As appropriate in presence of Sx or CV risk factors
Diet	Individualized nutritional assessment, recommendations and instruction by RD Low carbohydrate diets (restricting carbs <130 g/day are not recommended)	Diet consultation initially & when appropriate
Weight loss	Saturated Fat < 7 % of daily caloric intake Weight loss recommended for BMI ≥ 25 kg/m ²	At each visit if overweight/obese or not at goal weight

Risk Factors or Complications	Goals for Adults with Diabetes or Recommended Test	Frequency of Evaluation
Eyes (Retinopathy)	Dilated comprehensive eye exam	Type 2 DM - Annually Type 1DM - Initially w/in 5 yrs of onset DM; annually thereafter
Exercise	A regular physical activity program adapted to the presence of complications If able, at least 150 min/wk of moderate intensity aerobic physical activity distributed over 3-7days a week	Review at each visit
Foot Care (Neuropathy)	Quantitative Somatosensory threshold test using Semmes-Weinstein 5.07 (10g) monofilament, tuning fork, palpation, and visual inspection	Annual comprehensive exam Visual exam @ ea visit with neuropathy
Kidney (Nephropathy)	Serum Creatinine <hr/> Albumin/creatinine ratio (Random spot urine) 2 of 3 tests should be abnormal w/in a 3-6 mo period before making a new diagnosis	<hr/> Annually <hr/> Type 2DM – Annual Type 1DM - Annual with ≥ 5 yr duration of DM
Influenza & Pneumonia	Immunization (vaccination)	Influenza - Annual Pneumococcal - Once May repeat under certain circumstances
Periodontal Disease Common in Type 2DM	Dental Evaluation	Annually
Smoking	Complete cessation	Ask at every visit

Adapted from American Diabetes Association Clinical Practice Recommendations 2008. Diabetes Care 2008; Vol 31 (suppl 1)

SIGNS AND SYMPTOMS OF HYPOGLYCEMIA

Low Blood Sugar (Hypoglycemia) It is important to know the symptoms and treatment.

Symptoms of Low Blood Sugar

You may have one or more of these symptoms when your blood sugar is low:

- Sweating
- Shaking
- Hunger
- Headache
- Anxious/irritable/mood change
- Fast heart beat

Action Plan: Check your blood sugar; if your blood sugar level is low, treat quickly.

Step 1

Eat or drink something with 10 to 15 grams of carbohydrate.

- 1/2 cup of fruit juice
- 2-3 glucose tablets
- 5-6 pieces hard candy
- 6 oz. regular (not diet) soda (about half a can)

Step 2

Wait 15 minutes, and then check your blood sugar.

Step 3

If your blood sugar is still too low (or you don't feel better), take another dose of 10-15 grams of carbohydrate and check again after 15 minutes.

Step 4

Once your blood sugar begins returning to your normal range, eat a snack containing carbohydrate and protein.

If your blood sugar stays too low even after treatment, call your doctor.

Don't Go Overboard

Do not use low blood sugar as an excuse to eat sweets. You will only have the opposite problem - high blood glucose - later in the day. Also, stick to sugary foods that do not have a lot of fat. Fat slows down the movement of sugar into your blood. Candy bars and cookies are not the best choices for treating low blood sugar, unless they are the only high-carb foods nearby.

If you feel a reaction coming on but cannot check your sugar, it is best to treat the reaction rather than wait. Remember this simple rule: **When in doubt, treat.**

Adapted from the American Diabetes Association – <http://www.diabetes.org/type-2-diabetes/hypoglycemia.jsp> and <http://www.diabetes.org/treating.jsp>

SIGNS AND SYMPTOMS OF HYPERGLYCEMIA

High Blood Sugar (Hyperglycemia) It is important to know the symptoms and treatment.

Symptoms of High Blood Sugar

You may have one or ore of these symptoms when your blood sugar is high:

- Increased thirst
- Increased urination
- Increased hunger
- Blurred vision
- Drowsiness

Action Plan:

Test your blood sugar. If over 250 mg/dL, call your doctor.

How do you treat high blood sugar?

Often, you can lower your blood sugar level by exercising. However, if your blood sugar is above 240 mg/dL, check your urine for ketones. If you have ketones, do NOT exercise.

Exercising when ketones are present may make your blood sugar level go even higher. You will need to work with your doctor to find the safest way for you to lower your blood sugar level.

Cutting down on the amount of food you eat might also help. Work with your dietitian to make changes in your meal plan. If exercise and changes in your diet do not work, your doctor may change the amount of your medication or insulin or possibly the timing of when you take it.

How do you prevent high blood sugar?

Your best bet is to practice good diabetes management. The trick is learning to detect and treat high blood sugar early -- before it gets worse.

Adapted from the American Diabetes Association – <http://www.diabetes.org/type-2-diabetes/hyperglycemia.jsp>

BLOOD GLUCOSE MONITORING LOG FOR PATIENTS WITH DIABETES

Patient Name: _____ Provider Name: _____ Provider Phone: _____

Goal: _____ to _____ mg/dL

Target range for your blood sugars

Before meal: 70-130 mg/dL

1-2 hours after starting a meal: <180 mg/dL

Day/Date	Before Breakfast		Before Lunch		Before Supper		Before Bed		Other	Comments Diet, Exercise, Ketones, Illness, or Stress
	Blood Sugar	Insulin (units)	Blood Sugar	Insulin (units)	Blood Sugar	Insulin (units)	Blood Sugar	Insulin (units)	Blood Sugar	
Monday / /										
Tuesday / /										
Wednesday / /										
Thursday / /										
Friday / /										
Saturday / /										
Sunday / /										
Averages										

Within Target Range: _____ # Above Target Range: _____ # Below Target Range: _____

Diabetes medicines (name, dose, time of day):

PATIENT LAB RESULTS SHEET

Patient Name _____ Date _____

Diabetes Prevention	Your Results	Desirable Levels
Fasting Glucose		90-130 mg/dL
HbA1c		< 7% < 6% on individual basis
Total Cholesterol		< 200 mg/dL
Triglycerides		< 150 mg/dL
HDL ("good")		≥ 40 mg/dL Consider ≥ 50 mg/dL women
LDL ("bad")		< 100 mg/dL < 70 mg/dL (optional w/ heart disease)
Non-HDL Cholesterol		30 points higher than LDL goal
Creatinine (kidney)		< 1.2 mg/dL
GFR		>60 mL/min/1.73 m ²
Albumin/Creatinine Ratio (urine)		< 30 µg/mg
Potassium		3.5-5.0 mEq/L
ALT (liver)		< 60 U/L
TSH (thyroid)		0.40 - 40uIU/mL
Hematocrit (red blood concentration)		35-47%
Blood Pressure Systolic ("top number")		< 130 mmHg
Diastolic ("bottom number")		< 80 mmHg
Pulse		< 100
Weight kg / Weight lbs	/	_____
Body Mass Index [weight (kg) ÷ height ² (m)]		< 25 kg/m ² or _____
Exercise		If able, 150 min/wk moderate exercise over 3-7 days/wk
Smoking		Complete cessation
Ophthalmologist Dilated Eye Exam		Annual exam
Comprehensive Foot Exam		Annual - more frequent if symptoms or problems
Dentist		Annually - cleaning 2x/yr
Influenza /Pneumonia Vaccinations		Annually/once (may repeat under certain circumstances)