

### ENDOSCOPIC INTRAGASTRIC BALLOON

NUTRITION GUIDELINES FOR DIET PROGRESSION

### BEFORE YOUR PROCEDURE

All medications should be converted to either liquid or crushable taken with 1 tablespoon of applesauce. Ask your prescribing physician to make this change. We cannot change your prescriptions. You may return to your normal form of medications when you begin the soft foods portion of the diet

Contact information for questions: General GI Clinic: 617-732-6389 Dietitian Phone Line: 617-732-8884

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Typical Dietitian Appointment Schedule Individual appointments are 30 minutes; groups and classes are 45-60 minutes	Typical Endoscopist Appointment Schedule	Dates of Appointments
Before Procedure:	Before Procedure:	
Nutrition Assessment	<ul> <li>Initial Consultation</li> </ul>	
<ul> <li>Nutrition Follow-Ups as needed</li> </ul>	1st Pre-Op Visit	
	<ul> <li>2<sup>nd</sup> Pre-Op Visit if needed</li> </ul>	
After Procedure:	After Procedure:	
2 weeks	• 1 week	
• 4 weeks	4 weeks	
3 months	3 months	
6 months	<ul> <li>6 months (balloon removed)</li> </ul>	
9 months	• 1 year	
• 1 year		
After 1 year, meet with dietitian twice per year (every 6 months) forever	After 1 year, meet with endoscopist twice per year (every 6 months) forever	

### **Skills for Success**

The Intragastric Balloon is only a tool. You must commit to a healthy lifestyle (diet, exercise, behaviors) to stay successful forever.

### Fluids

Choose sugar-free, non-carbonated fluids.

Sip fluids throughout the day, aiming for 48-64 ounces.

Know the signs of dehydration: headaches, dizziness, dark urine.

Avoid alcohol 6-12 months after procedure.

### **Eating Behaviors**

Take bites the size of a dime.

Chew, chew, chew; puree the food with your teeth. Wait between bites to see how your stomach feels. Aim for 30-40 minute meals.

### **Make Eating Mindful**

Avoid grazing, nibbling, and picking throughout the day. Have regularly scheduled eating events.

When you're eating, just eat! Avoid

distractions. Eat off a smaller plate.

### Small Sips of Fluids When Eating Solids

Sip on fluids throughout the day. It's okay to drink while eating, but take small sips of fluids.

Why? Eating and drinking at the same time can overfill your stomach and make you feel sick.

### Plan Ahead

Life is busy now and it will be busy after procedure too.

You will make healthier choices when you plan ahead.

Chop/peel ingredients in advance and meal prep.

Pack food and fluids for busy days.

Bring your own food to social events if you aren't sure what will be served.

### **Stay Accountable**

Track yourself: food and beverage choices, exercise, and weight are good places to start.

Keep your appointments with the endoscopic team.

Let your support team know how they can help you stay on track.

### Getting Ready for Procedure

WHAT TO PURCHASE BEFORE YOUR	PROCEDURE:
Measuring Cups and Spoons	S
Food Scale	
Sugar Free Fluid	
Personal scale for regular, at home, we	eight checks
Protein Shakes*	
Vitamin and Mineral Suppleme	nts*

<sup>\*</sup>Choose protein shakes and vitamin & mineral supplements from the shopping guides

When To Start	Where	Duration	Die	et Stage	Example Foods	Fluid Goal	Vitamins
Day of Procedure	Home	12-24 hours	Stage 1 Nothing to Eat		Water	32 to 48 ounces	
Post Op Day 1		1 day	Stage 2 Water and Sugar Free Clear Liquids		Water, Crystal Light, Broth, Decaffeinated coffee or tea	44 ounces	
Post Op Day 2 Start Date	Home	2 weeks	Stage 3 Protein Shakes and Sugar Free Clear Liquids		Premade protein shakes, protein powder mixed with milk or water, all fluids listed in Stage 2	60 ounces	Start Chewable or liquid vitamins
Post Op Day 15 Start Date	Home	1 week	Stage 4 Soft Proteins: 60-80 grams per day Sugar Free fluids	PROTEIN NON PROTEIN	60-80 GRAMS PROTEIN: cottage cheese, eggs, canned tuna or salmon, canned chicken or turkey	64 ounces	Continue Chewable vitamins
Post Op Day 22 Start Date	Home	Ongoing	Stage 5: Solid Calorie Diet	VEGGIE PROTEIN STARCH	Balanced diet: lean proteins, non-starchy vegetables, fruits, small portions of starches	64 ounces	May transition to non- chewable vitamins

### STAGE 1: Nothing to Eat or Drink

**Begin:** Day of Procedure

**Duration:** 12-24hrs

Fluid goal: 32 to 48 ounces

**Instructions**: You may have water up to 4 hours before your procedure. Patient should avoid all other oral intake until the following day

### STAGE 2: Water and Sugar Free Clear Liquids

**Begin**: Morning after procedure

**Duration**: 1 day

### **Diet instructions:**

- Fluids are the number one priority
- 2 ounces of non-caloric, non-carbonated, non-caffeinated liquids every hour for the first 6 hours
- Then 4oz per hour for the next 8 hours.
- · Record all fluid intake
- Use 1 ounce medicine cup, like the kind that come with cough syrup
- Sip ½-1 ounce every 2-5 minutes
- Sip slowly over 30 minutes and stop as soon as you feel full
- Do not use straw for this one day

### Fluid options:

- Water
- Crystal light
- Propel Fitness Water
- Gatorade Zero or Powerade Zero
- Bouillon or broth
- Fruit₂O
- Decaffeinated coffee or tea (Diet Snapple)
- "Flat" decaffeinated diet soft drink or diet ginger ale
- Diet Jell-O
- Sugar free popsicle (less than 20 calories each limit 2-3 per day)

### **STAGE 3: PROTEIN SHAKES**

**Begin**: 48 hours after procedure

**Duration**: 2-weeks/14 days

Fluid Goal: 60 ounces per day

(protein drinks do NOT count towards fluid goal)

**Protein Goal**: **60** grams per day

Calorie Goal: 800 – 1000 calories per day

Vitamins: TWO chewable multivitamins (children's or adult)

 Centrum adult or children's complete chewable plus additional 500mcg Vitamin B12 daily

Flintstone's complete chewable plus additional 500mcg Vitamin B12 daily

OR

TWO tablespoons of liquid multivitamin

• Centrum liquid plus additional 500mcg Vitamin B12 daily

Calcium Supplement with Vitamin D 1200 – 1500mg per day

- Maximum 500 mg per dose
- Calcium Citrate is preferred due to better absorption

DO NOT take the multivitamin and calcium at the same time taking together may interfere with each other's absorption

### **Diet instructions:**

- Record all fluid intake
- If you are struggling to tolerate fluids: use 1 ounce medicine cup and take sip ½-1 ounce every 5 minutes
- In the first few days after your procedure do not exceed **8** ounces per hour. Over time, it will be easier to tolerate more fluids
- Sip slowly and stop as soon as you feel full
- You can use a straw but do not use the straw to empty the cup of fluids. This can introduce air into your stomach and cause gas pains. Take small, slow sips.
- Avoid gulping, it introduces air into your system and may cause gas pains
- Plan ahead and have the protein drinks ready to drink
- Do not drink other fluids with protein shakes
- Fluids are the number one priority: It is VERY important that you stay hydrated

### STAGE 3: PROTEIN SHAKES (CONTINUED)

### Fluid options: All from Stage 2

- Water
- Crystal light
- Propel Fitness Water, Gatorade Zero, Powerade Zero
- Bouillon or broth
- Fruit<sub>2</sub>O
- Decaffeinated coffee or tea (Diet Snapple)
- "Flat" decaffeinated diet soft drink or diet ginger ale
- Sugar free popsicle (less than 20 calories each limit 2-3 per day)

### Sample Meal Plan: Allow your stomach to rest between fluids

8oz Protein drink - 100-150cal 8am 8oz Water or low calorie beverage 9am 10am 8oz Protein drink - 100-150cal 8oz Water or low calorie beverage 11am 8oz Protein drink - 100-150cal 12pm 1pm 8oz Water or low calorie beverage 2pm 8oz Protein drink - 100-150cal 3pm 8oz Water or low calorie beverage 4pm 8oz Protein drink – 100-150cal 5pm 8oz Water or low calorie beverage 6pm 8oz Protein drink - 100-150cal 7pm 8oz Water or low calorie beverage 8pm 8oz Protein drink - 100-150cal 9pm 8oz Water or low calorie beverage

### **Guidelines for High Protein Supplement:**

- Calories: 150-200cal/serving
- Protein: minimum of 15gm/serving
- Sugar: maximum of 10gm/serving
- A typical protein shake is 8-11 ounces
- If you are using a protein powder, remember to add the protein, calories, and sugar from the liquid you are mixing with.
  - Example: 8 ounces of skim milk has: 8 grams of protein, 90 calories, 12 grams of sugar, and 12 grams of carbohydrates

### STAGE 3: PROTEIN SHAKES (CONTINUED)

Here is where you will find these numbers:

### **Nutrition Facts**

Serving Size 1 Shake (14 fl oz) (414mL) Servings Per Container 1

	Amount Per Serving	
n Facts<	Calories 160	Calories from Fat 30
		% Daily Value*
	Total Fat 3g	5%
Calories from Fat 0	Saturated Fat 1g	5%
% Daily Values*	Trans Fat Og	
0%		70/
0%	Cholesterol 20mg	7%
	Sodium 410mg	17%
6%	Potaccium 560mg	16%
2%		
8%	Total Carbohydrate	5g <b>2</b> %
g <b>1%</b>	Dietary Fiber 3g	12%
8%	Sugare 2g	
46%	Protein 30a	60%
	Calories from Fat 0 % Daily Values* 0% 0% 6% 2% 8% 9 1%	Calories 160  Total Fat 3g Saturated Fat 1g Trans Fat 0g Cholesterol 20mg Sodium 410mg Potassium 560mg Total Carbohydrate Dietary Fiber 3g Sugars 2g

### **Lactose Intolerance:**

Lactose is the natural sugar in milk. Sometimes after your procedure, your body cannot digest this sugar. This causes problems like nausea, cramping, bloating, gas, and/or diarrhea. It is not normal to have these problems from drinking protein shakes. You might be experiencing lactose intolerance.

### What if you are experiencing lactose intolerance?

- Stop drinking protein shakes for 24 hours. Keep drinking your fluids.
- When you start drinking protein shakes again, avoid any shakes that have milk, 'whey protein **concentrate**,' or 'milk protein **concentrate**' in the ingredient list.
- Instead, choose a protein shake that is made from 'whey protein **isolate**.' The lactose has been filtered out of whey protein isolate.
- Call your dietitian if you need help finding lactose-free options.

### STAGE 3: PROTEIN SHAKES (CONTINUED)

### Other problems related to Protein Shakes?

### If the taste is bothering you:

- Flavor your shakes with extracts. You can find extracts in the baking aisle at the grocery store. You only need a couple drops so go slowly and taste-test along the way.
- Flavor your shakes with sugar-free syrups. You can find sugar-free syrups at the grocery store but you will have more flavor options if you order online. Common brands are Da Vinci Gourmet and Torani.
- Flavor your shakes with spices such as cinnamon, ginger, nutmeg, and cloves.
- Flavor your shakes with unsweetened cocoa powder or powdered peanut butter; limit to 1tablespoon total per day.

### If the smell is bothering you:

- Drink your shake from a bottle with a small opening.
- Drink your shake using a straw. Take very small sips and do not use the straw to empty the cups of fluids.
- Drink your shake at a very cold temperature.

### If you need to chew:

- Pour your protein shake into a popsicle or ice cube tray and freeze to make a protein popsicle.
- Semi-freeze your protein shake or blend it with ice to make a slushy.

### **Stage 3 Key Points:**

- Be aware of signs of dehydration: sudden lightheadedness or dizziness, headaches, and urine color becoming darker throughout the day.
- If you're struggling to tolerate fluids, it's helpful to try different temperatures for your beverages. Some patients prefer ice cold while others prefer room temperature or warmer beverages. You can try warming up a protein shake up to 140 degrees; think "hot chocolate" or look for chicken and tomato soup flavored protein (see the Protein Shake Shopping Guide for more details).
- Try pouring your protein shake over ice cubes and slowly sip until the ice is melted.
- Keep track of the amount of protein shakes and fluids that you are drinking using a food log. If you cannot finish a protein shake in a 1 hour period, you can save it for the next meal time and log the amount you drank.

Changes in bowel regimens, such as less frequent movements or loose stools, are normal. If you are having discomfort, contact the endoscopic bariatric team or refer to the end of the guidelines for troubleshooting tips and solutions.

### STAGE 4: SOFT PROTEINS AND NON-PROTEINS

**Begin**: 15-16 days after procedure

**Duration**: 1 week/7 days

**Fluid Goal**: **64** ounces (oz)per day of fluids from Stage 2

(protein drinks do NOT count towards fluid goal)

**Protein Goal**: 60 – 80 grams per day

**Calorie Goal**: 900-1000 calories per day

Vitamins: 2 chewable vitamins – Flintstones complete plus additional 500mcg Vitamin B12

### **Diet instructions:**

• 3 oz of soft, moist protein foods 3 times per day PLUS 1-2 snacks per day

- Have a protein shake if you are unable to meet your protein needs through soft, solid food
- Maintain a food log. Record all oral intake.
- Eat slowly you should take 30-40 minutes to eat a meal.
- Use children's utensils or chopsticks.
- Take small bites and put utensils down between bites.
- Remember to chew well, to applesauce or pureed consistency.
- If you feel full, stop eating continuous overeating can stretch your pouch. Remember it may take 20 min for your brain to know you ate anything.
- Do not eat foods and drink any fluids at the same time. Wait at least 30 minutes before or after eating a meal to drink anything.
- You can use a straw but be careful not to suck air in through the straw
- Avoid foods that are high in sugar or fat as they may cause an upset stomach and they are higher in calories
- Marinated meats, boiled meats and the dark meat of chicken tends to be well tolerated
- Fibrous meats, such as dry turkey, chicken breast or hamburger, can be difficult to digest
- Do not fry your meats: Frying adds calories and can make foods hard to digest

### STAGE 4: SOFT PROTEINS AND NON-PROTEINS (CONTINUED)

### **Soft Protein Food options:**

- Tomato Cream Soup (made with skim milk) 8oz: 6gm protein, 90cal
- Cottage Cheese (low fat) 4oz (1/2 cup): 13gm protein, 100cal
- Egg whites/substitute (no vegetables) 4oz(½ cup): 10gm protein, 100cal
- Hard-boiled egg white mashed (no yolk) 2 large 2oz:
   6gm protein, 30cal
- Tuna (canned or fresh in water) 3oz: 20-22gm protein, 95cal
- Salmon (canned or fresh) 3oz: 20-22gm protein, 120-150cal
- Chicken or Turkey (canned or fresh) moist, 3oz: 15-18gm protein, 120-150cal
- Imitation Seafood 3oz: 10gm protein
- Tofu 3oz: 12gm protein, 90cal

Try to meet the protein goal of 60-70 grams each day before choosing foods from the non-protein list. Your stomach will fill up quickly from the protein foods so you might not have room for the non-protein foods.

### **How to Count Grams of Protein**

This is a container of Greek yogurt. The label says that the serving size is 3/4 cup. That means that each serving has 13 grams of protein. If you eat the whole serving, you have eaten 13 grams of protein. However, with your small stomach, you might not have room for the whole serving. If you eat half of the container, you have eaten 6.5 grams of protein.

	<b>Nutrition Fac</b>	ts
1	Serving size 3/4 cup (1	70g
	Amount per serving  Calories 19	0
l	% Daily	Value 13%
l	Saturated Fat 8g	40%
l	Trans Fat 0g	70 /0
l	Cholesterol 45mg	15%
l	Sodium 75mg	3%
l	Total Carbohydrate 12g	4%
l	Dietary Fiber 0g	0%
l	Total Sugars 8g	
	Includes 0g Added Sugars	0%
	Protein 13g	
I	Vitamin D 0mcg	0%
l	Calcium 261mg	20%
l	Iron 1mg	4%
ı	Potassium 343mg	8%

### STAGE 4: SOFT PROTEINS AND NON-PROTEINS (CONTINUED)

### **Protein Foods**

- Fat-free Greek yogurt (without fruit chunks)
- Low-fat cottage cheese
- Part-skim ricotta cheese
- Tofu
- Chicken or turkey (dark meat is fine)
- Fish (flaky fish like tuna, cod, haddock, salmon, and tilapia)
- Egg, egg whites, or egg beaters
- Protein shakes or powders

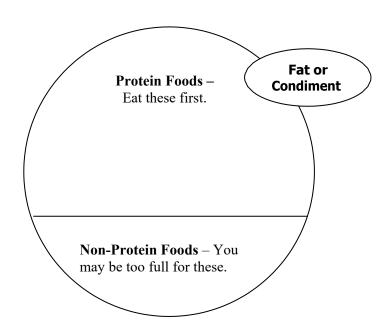
### **Non-Protein Foods**

- Fat-free or light yogurt (non-Greek)
- Unsweetened applesauce
- Canned pears or peaches (in own juice or water; no syrup)
- Soft banana
- · Oatmeal, cream of wheat, or farina
- Tomato sauce
- Well-cooked vegetables (non-starchy or starchy) with no skins or peels

### Fats

- Light mayonnaise or salad dressing
- Hummus
- Avocado
- Smooth nut butter (not crunchy)
- Butter or oil

Example Plate – it might be the size of a dessert plate!



### STAGE 4: SOFT PROTEINS AND NON-PROTEINS (CONTINUED)

Type of Food	Amount	Protein	Fat	Calories
		(g)	(g)	
STARCHES				
Mashed potato	½ cup	2.0	4.4	111
Oatmeal	³4 cup	4.5	1.7	105
Farina	¾ cup	2.5	0.1	87
Cream of Wheat	¾ cup	3.3	0.4	115
FRUITS				
Applesauce (unsweetened)	½ cup	0.2	0.1	53
Peaches (canned in juice)	½ cup	0.8	0.05	55
VEGETABLE				
( ½ cup whole = ¼ cup pureed)				
Green Beans (canned)	¼ cup pureed	0.8	0.1	13
Carrots (baby food)	2.5 oz	0.0	0.0	30
	(2 oz = ¼ cup)			
Beets (canned)	¼ cup pureed	0.8	0.1	26
MILK				
Yogurt, nonfat	8 oz	8	0	90-120
Milk, skim or 1%	8 oz	8	0-3	80-110
MEAT				
Tuna, canned in water	1 oz	7	1	40
	(1 can = 6 oz)			
Imitation crab meat	1 oz	3.5	<1	30
Cheese, low fat or fat free	1 oz	4	0-3	40-50
Cottage cheese, 1% or fat free	1 oz	3.5	<1	20
	(4 oz = ½ cup)			
Egg, scrambled	1 oz	6	6	80
Chicken, pureed (dark meat)	1 oz	7	4.5	72
Turkey (baby food)	2.5 oz	8	5	90
FAT				
Butter	1 teaspoon	0	4.1	36
Olive oil	1 teaspoon	0	4.6	40
Mayonnaise, light	1 teaspoon	0	5	50

### STAGE 5: SOLID CALORIE DIET

Start: Day 21-24 postoperatively

**Duration:** Ongoing

### **Diet Instructions:**

- 900 1200 calories a day
- Fluids: 48-64 ounces per day
- Protein: 60-70 grams per day
- Avoid all high calorie and soft, mushy foods that can easily pass through and around the balloon
- Avoid any foods that dissolve in your mouth or do not require chewing
  - i.e. Crackers or pretzels; yogurt or ice cream or soup
- Avoid all highly refined or processed foods
  - i.e. Protein bars, fast food, frozen meals
- Avoid high fat foods
  - i.e. butter, gravy, cream cheese, peanut butter, oil
- Avoid liquid calories, all beverage should have zero calories
  - Crystal Light, Diet Snapple, Fruit 20, water, etc are ok to drink

### **Important Information:**

- Examples of foods to avoid:
  - Beverages high in calories
    - Fruit juice, fruit smoothie or frappes
    - power drinks, soda, coffee with added cream or sugar
  - Foods that do not require chewing
    - Soups, cottage cheese, yogurt, peanut butter, mashed potato
    - apple sauce, pudding, ice cream
  - Foods that dissolve in your mouth
    - White rice, white bread, crackers, chips, pretzel, cereal
  - Foods that are processed
    - Cookies, protein bar, prepackaged foods, frozen meals
    - Fast food, 100 calorie packs of any kind
  - Limit protein shakes to only 1 per day as a meal replacement
- We encourage you to eat solid, bulky, high fiber, low fat foods.

### STAGE 5: SOLID CALORIE DIET (CONTINUED)

### Sample Diet:

Meal	Food	Liquid	Calories	Protein
Breakfast	-1 scrambled egg		78	6
	-1 piece whole wheat toast		100	3
	-2 links turkey sausage		140	13
		8 oz Decaf	5	0
		coffee		
		8 oz water		
Snack	1 serving fruit		60	0
	Chewable Calcium	8 oz water	0	0
Lunch				
	2 cups salad greens with non-starchy		250-330	21-28
	vegetables			
	4 oz grilled/steamed chicken			
	2 teaspoons oil			
	1 Tablespoon vinegar OR 1 Tablespoon			
	light dressing			
	Herbs, salt, pepper			
Snack	Chewable Multivitamin	8 oz water	0	0
	1 hard boiled egg		78	6
Dinner		8 oz water	0	0
	-3 oz grilled/steamed/poached fish		120-150	21
	-1 cup steamed broccoli		50	2
	-1/3 cup sweet potato		80	3
	Sodium free herbs/seasoning		0	0
Snack	Chewable Calcium	8 oz water	0	0
	1 serving fruit		60	0
		8 oz water	0	0
Total		8 oz water		
		64 oz water	1021-1131	75-82g

### STAGE 5: SOLID CALORIE DIET (CONTINUED)

### Variations:

Instead of: Use:

1 Egg % cup Egg beaters (30 calories, 6 g protein)
2 turkey sausages 2 veggie sausages (120 calories, 13 g protein)

1 piece whole wheat toast ½ Whole wheat English Muffin

Breakfast above 1 cup skim milk and ½ cup of steel cut or Irish oatmeal

1 serving fruit in AM 1 cup cubed melon 1 cup fresh pineapple ½ whole pear

½ cup grapes

Lunch above 3-4 oz meat, fish, or poultry, a non-starchy vegetable, and a starch (rice, pasta,

potato)

2 teaspoons oil and1 Tablespoon regular salad dressing1 Tablespoon vinegar2 Tablespoons light salad dressing

1 hard boiled egg ¼ cup boiled edamame (soybeans)

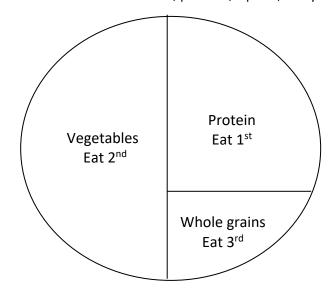
Dinner above 3-4 oz meat, fish, or poultry, a non-starchy vegetable, and a starch (brown rice,

whole grain pasta, baked potato)

1 cup cooked vegetables 2 cups raw vegetables (exclude starchy vegetables, such as peas, corn, potatoes,

lima beans, plantain, squash, and yams)

### Sample Plate:



### **SERVING SIZES**

### **Protein Foods**

Each protein food contains 7 grams of protein per serving. You may eat multiple servings at a time.

1 serving of protein

1 ounce chicken
1 ounce turkey
1 ounce fish or shellfish 1
ounce beef
1 ounce pork
2 oz firm tofu/3 oz soft tofu
1/4 cup non-fat cottage cheese
1/4 cup non-fat ricotta cheese
3 oz Greek yogurt (1/2 individual container)
1/2 cup beans\*
1/4 cup egg substitute 1
egg

7 grams of protein

\*1/2 cup beans is equal to 1 protein serving + 1 starch serving

1 ounce or 1 serving = about 7 grams of protein 2 ounces or 2 servings = about 14 grams of protein 3 ounces or 3 servings = about 21 grams of protein

- Choose lower fat protein foods (like skinless chicken breast, 99% fat free ground turkey).
- Limit red meat (beef, lamb, pork).
- Processed meats can increase a person's risk of colorectal and stomach cancer. Processed
  meats include hot dogs, pepperoni, salami, sausages, corned beef, ham, bacon, pastrami, and
  any other meats that have been cured, smoked, salted or treated with any chemical
  preservatives. The dietitian can provide you with more information about processed meats.

Remember to meet 8 protein servings every day (which is about 60-70 g of protein daily)!

### **Non-Starchy Vegetables**

Each vegetable serving contains 5 grams or less of carbohydrates and 2-3 grams of fiber per serving.

Fresh and frozen vegetables are ready to eat! Rinse canned vegetables to remove some salt.

1 serving of vegetables

1/2 cup cooked vegetables or 1 cup raw vegetables

### **Examples of non-starchy vegetables:**

Artichoke
Asparagus
Beets
Broccoli
Brussels Sprouts
Cabbage Carrots
Cauliflower
Celery Cucumber
Eggplant
Green Beans Kale

Lettuce
Mushrooms
Onions
Peppers
Radishes
Salad Greens
Spinach
Sprouts
Snap Peas
Summer Squash
Tomato
Water Chestnuts
Zucchini

Starchy vegetables (corn, peas, potatoes, plantains, winter squash) are found on the <u>Starches</u> <u>List</u> (page 22).

Aim for at least 4 servings of nonstarchy vegetables every day!

### **Fruits**

Each fruit serving contains 15 grams of carbohydrates and 2 or more grams of fiber.

Use fresh, frozen or canned fruits with no sugar added. Eat fruit in its whole form instead of blending or juicing. Whole fruit will fill you up more!

### Fresh, Frozen, & Unsweetened Canned Fruit

Apple (2 in. across)	_1 apple
Applesauce (unsweetened)	 ½ cup
Apricots (canned)	½ cup or 4 halves
Apricots (medium, fresh)	4 apricots
Banana (8 in. long)	
Blackberries	3/4 cup
Blueberries	<sup>3</sup> / <sub>4</sub> cup
Breadfruit	
Cantaloupe	•
Cherries (canned)	1/2 cup
Cherries (fresh)	12 cherries
Chico fruit (like kiwi)	½ chico fruit
Figs (fresh)	2 fins
Figs (fresh) Grapefruit (medium)	½ granefruit
Grapefruit (segments)	3/ cun
Grapes	
Honeydew melon	1 cun cuhes
Guava, guayaba	
Kiwi Mamey	
Nance fruit (cherry like)	
Mandarin oranges	1/ manga
Mango	1 nostorino
Nectarine (2 ½ in. across)	1 oranga
Orange (2 ½ in. across)	
Papaga fruit	
Passion fruit	
Peach (fresh)	1/ eur (2 helyes)
Peaches (canned)	1/ large and area!
Pear (fresh)	/2 large or 1 small
Pears (canned)	½ cup or 2 naives
Persimmon	2 persimmons
Pineapple (canned)	1/3 cup
Pineapple (fresh)	½ cup
Plantain and green banana	. ½ a plantain or ¾
cup small green banana	
Plum	_2 plums
Pomegranate	½ of fruit
Raspberries	_1 cup
Soursop	
Starfruit	
Strawberries (whole)	_1 ¼ cup
Tamarind 11	-12 raw tamarinds
Tangerine (clementines)	2 tangerines
Watermelon	1 1/4 cup cubes

## Every fruit & amount listed on this page = 1 serving of fruit

### **Dried Fruit (no added sugar)**

Serving sizes for dried fruits are small because they are calorie-dense foods.

Apples	4 rings
Apricots	7 halves
Dates	2 ½ medium
Figs	
Prunes	3 medium
Raisins	2 Tablespoons
Dried cranberries	2 Tablespoons

### Aim for 2 servings of fruit every day!

### **Dairy**

Each serving of dairy contains 6-8 grams of protein. Watch out for added sugars!

1 serving of dairy

8 oz skim / fat-free milk 8 oz 1% / low-fat milk 8 oz Lactaid / lactose-free milk 8 oz soy milk ½ cup evaporated skim milk 1/3 cup dry nonfat milk 1 cup nonfat yogurt (non-Greek)

1 oz cheese\*

1/4 cup shredded cheese\* 1
 string cheese\*

\* Choose reduced-fat, partskim, or light when possible

Aim for 1 serving of dairy every day!

Each serving of fat contains 5 grams of fat. Conversion tip: 1 Tablespoon = 3 teaspoons

1 serving of fat

2 teaspoons of nut butter 1 tablespoon avocado 1 teaspoon butter 1 tablespoon light tub margarine 1 teaspoon mayonnaise 1 tablespoon light mayonnaise 1 teaspoon oil (olive, canola) 10 small or 5 large olives 2 teaspoons creamy salad dressing 1 tablespoon light creamy dressing 1 tablespoon oil-based dressing 2 tablespoons light salad dressing 2 tablespoons of hummus 6 almonds 2 whole pecans 10 small peanuts 2 whole walnuts 1 teaspoon pumpkin seeds 1 tablespoon other nuts and seeds

Limit to 2-3 servings of fat every day!

### **Starches**

Each serving contains 15 grams of carbohydrates.

## Every food & amount listed on this page

=

### 1 serving of starch

### **Cooked Beans/Peas/Legumes**

(also count as 1 protein)

Beans and legumes (kidney, pinto, black, lentils, chickpeas, black-eyed peas) \_\_\_\_\_\_\_½ cup Baked beans \_\_\_\_\_\_¼ cup

## Breads Bagel (from cafe) ¼ (1 oz) Bagel (pre-packaged, grocery store) ½ (1 oz) Bread sticks 2 (2/3 oz) English muffin ½ Hamburger or hot dog bun ½ (1 oz) Pita, 6 in. across ½ Plain roll, small 1 (1 oz) Bread 1 slice (1 oz) Tortilla, 6 in. across 1 Sandwich thins/deli flats 1

Limit to 3 servings of starch every day!

### Choose 100% whole grain / whole wheat options whenever possible!

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# Cereals/Grains/Pasta Cold cereals (unsweetened) 3/4 cup Bran cereals 1/3 cup Bran cereals (flaked) ½ cup Granola 2 Tbsp Shredded wheat ½ cup Bulgur (cooked) ½ cup Hot cereals (unsweetened) ½ cup Grits (cooked) ½ cup Pasta (cooked) ½ cup Rice (cooked) 1/3 cup Quinoa (cooked) 1/3 cup

Crackers and 'Snack Foods'
Animal crackers 8
Graham crackers (2.5 in. square)3
Matzo_34 oz
Melba toast5
Oyster crackers 24
Popcorn (popped, 94% fat free)3 cups
Pretzels¾ oz
Rye crisp (2 in. x 3 in.)4
Rye crisp (2 in. x 3 in.)4
Rye crisp (2 in. x 3 in.) 4 Saltine crackers 6

### TRACKING YOUR DAILY FOOD INTAKE

### Why is logging beneficial?

- Reveals food and activity habits that you may not be aware of
- Holds you accountable for what you eat and drink and how physically active you are
- Research shows that people who log their intake lose more weight
- Helps your dietitian and physician better understand your eating and physical activity habits

### Lose It! Weight Loss Program App: Free (iPhone and Android)



- Provides users with 3 easy ways to track food: searching the Lose It! database of 7 million+ foods, restaurant items and brands, scanning barcodes to upload nutrition information for a product, or by taking a picture of your plate for analysis by Lose It! nutrition experts.
- Website: www.loseit.com

### My Fitness Pal Calorie Counter & Diet Tracker App: Free (iPhone and Android)



- Users can not only track their food but can also link their account to over 50 other apps that support an overall healthy lifestyle.
- Website (Free): <u>www.myfitnesspal.com</u>



### **Baritastic:** Free (iPhone and Android)

- Allows users to upload photos and notes to help users track their journey. Also provides alerts to remind users to take vitamins, protein shakes, or eat a meal.
  - Website: www.baritastic.com

### VITAMIN AND MINERAL SUPPLEMENTS

### **Vitamin and Mineral Supplements:**

You will need to take vitamin and mineral supplements for the rest of your life after procedure. We recommend that you start with chewable or liquid supplements until stage 4. Over time, if you are comfortable swallowing a 'petite' tablet or cutting a pill in half, you can swallow your supplements.

### **Multivitamin with Minerals:**

- Take a 'complete' multivitamin(s) daily; dose will vary based on brand of multivitamin.
- Complete multivitamins contain iron, zinc, folic acid, and copper.
- Avoid gummy multivitamins these don't have all the right nutrients.
- Separate multivitamin(s) with iron from calcium by at least 2 hours.

### Vitamin B<sub>12</sub>:

- Take 350-500 micrograms vitamin B<sub>12</sub> daily in the form of a tablet or liquid.
- You can take vitamin B12 at any time or with any other supplements.
- You can also get vitamin B12 in a nasal spray or injection.
- Your multivitamin might have enough vitamin B12 in it. This will be listed on your shopping guide.

### **Calcium Citrate with Vitamin D:**

- Take 1200-1500 mg of calcium citrate daily split into 2-3 doses.
  - o Your body can only absorb 600 mg of calcium at one time.
  - Check serving size on calcium nutrition facts label to determine how many to take at one time.
  - Separate calcium doses by at least 4 hours.
- Separate multivitamin(s) with iron from calcium by at least 2 hours.
- You can also meet your daily calcium needs from food and supplements. Talk to your dietitian.

### Other Supplements:

Some patients may need extra vitamins and minerals, such as iron, vitamin D, or B vitamins. We will check your vitamin and mineral levels regularly through lab tests and discuss extra supplements as needed.

### **EXERCISE AND PHYSICAL ACTIVITY**

Most people need to exercise at least 250 minutes (over 4 hours) each week to maintain weight loss. It takes time to build up to that amount of exercise but start where you're at. You can even break your exercise up into smaller amounts of time during the day. Remember, find an activity you enjoy!

### Here are some ideas for increasing your physical activity before and after procedure.\*

- ✓ Walk more! You may start walking immediately after procedure.
- ✓ Make exercise a family event. Go for a walk together after dinner or on the weekend.
- ✓ Keep exercise clothes in your car to make sure you will go to the gym.
- ✓ To decrease impact on your joints, try pool exercises, water aerobics, or a stationary bicycle.\*
  - o Please refrain from swimming until your first appointment after procedure.
- ✓ Turn up the music and dance.
- ✓ Do yard work, gardening, or household chores that require brisk movement.
- ✓ Check out exercise videos online.
- ✓ Try chair exercises.
- ✓ Check out a new exercise class.

### Consider using the FITT principle to progress in your physical routine.

Frequency	Intensity	Time	<b>T</b> ype
How often you perform these exercises.	How hard you are exercising.	How long are you exercising for?	This refers to the type of exercise you do.
Start with 1-2 times per week and increase up to 3 times per week.	Instead of resting between exercises, go through an entire set of each exercise of the above routine then repeat 2-3 more times! Or, to progress, increase the weight as you are able.	Try to build up to the recommended amount of exercise.	Try to achieve a balance throughout your week of both aerobic and strength training exercise.

### Phone apps: to track your activities:

- RunKeeper Free app
  - Logs any activities: running, walking, yard work
  - Can be syncronized with other fitness applications and devices
- MapMyRun Free app
  - Logs running, walking, hiking
  - Can be synchronized to other fitness applications and devices

### POSSIBLE PROBLEMS AND SOLUTIONS

We don't expect all of these problems to happen to you but if they do, we want you to know how to solve them. It is helpful to keep a record of anything unusual that occurs and what you did before and after it happened.

### Dizziness, Headaches, Lightheadedness, Dark Urine (Signs of Dehydration)

- ✓ Drink fluids with electrolytes (like Propel Zero or Powerade Zero).
- ✓ Add salt to your foods.
- ✓ Drink salty bouillon or soup broth.

Call the GI Clinic phone line at 617-732-6389 if you are unable to catch up on your fluids.

### Constipation

### Short-term Solutions

- ✓ Increase your fluids aim for 64 ounces daily.
- ✓ Try a laxative, such as Milk of Magnesia or Miralax, and take a stool softener up to 3 times daily.
- ✓ Try psyllium, a natural soluble fiber.

### **Long-term Solutions**

- ✓ Increase your fluids aim for 64 ounces daily.
- ✓ Increase your fiber intake.
  - Eat more fruits, vegetables, and whole grains if your diet stage permits.
  - If you are unable to add more fiber through your diet, try a fiber supplement, such as Benefiber or Metamucil.
  - Slow and steady is the key to adding fiber to your diet. Start with a small amount, such as one serving
    of fiber supplement or one extra serving of food with fiber. Stick with that amount for 1-2 weeks
    before increasing as needed.
- ✓ Stay physically active.
- ✓ Continue taking a stool softener as needed.

### Diarrhea

- ✓ Limit or avoid foods with lactose. Lactose intolerance can occur after procedure. Please see page 8 for more details.
- ✓ Eat slowly and chew thoroughly.
- ✓ Do not drink fluids with meals.
- ✓ Avoid high sugar, high fat, and spicy foods.
- ✓ Limit the amount of sugar-free products (like sugar-free candies). These products may contain sugar alcohols (artificial sweeteners that end with −ol such as malitol, sorbitol, xylitol, etc.) that can cause diarrhea.
- ✓ Limit caffeinated beverages.
- ✓ Try a probiotic supplement ask your dietitian for suggestions.
- ✓ Try psyllium, a natural soluble fiber.

### Nausea and/or Vomiting

- ✓ Tune into your eating behaviors. Take small bites, chew thoroughly and pause after each bite.
- ✓ Stop eating or drinking at the first sign of fullness, which may feel like pressure in your upper chest.
- ✓ Stay hydrated. Drink at least 48-64 ounces of fluids.
- ✓ Keep foods tender and moist.
- ✓ Determine whether you might have lactose intolerance (page 8).
- ✓ Avoid eating and drinking at the same time.
- ✓ If these suggestions do not work, or you vomit bright red or dark brown liquid, please call your doctor's office.

### **Bloating/Gas/Cramping**

- ✓ Limit or avoid foods with lactose. Lactose intolerance can occur after procedure. Please see page 8 for more details.
- ✓ Limit or avoid sugar alcohols (artificial sweeteners that end with −ol such as malitol, sorbitol, xylitol, etc.).
- ✓ Avoid carbonated beverages.
- ✓ If drinking through a straw causes these problems, avoid using one.

### Heartburn

- ✓ Every person has different food and beverage triggers of heartburn. Make a list of the ones that trigger heartburn for you and avoid them.
- ✓ Take your prescribed heartburn medication.
- ✓ Tune into your eating behaviors. Take small bites, chew thoroughly and pause after each bite.
- ✓ Avoid lying down for 3-4 hours after eating.

### **Hair Loss**

- ✓ Hair loss after bariatric procedure is called 'telogen effluvium' and generally occurs around 3-6 months. This happens because some of your hair follicles are in resting stage (telogen phase) during the time of procedure, and the stress of significant weight loss can cause that hair to stay in the resting stage.
- ✓ There's generally not much you can do about hair loss at 3-6 months post-op except minimize washing and brushing to prevent extra fallout.
- ✓ If hair loss continues after month 6, speak to your dietitian. It could be related to iron, copper, zinc, or B vitamin deficiencies or not eating enough protein.
- ✓ You can also try Nioxin shampoo.

### **Dental Health**

- ✓ Because you won't be eating and drinking together after your procedure, you may be at a higher risk for dental carries. Also, acid reflux may damage your teeth, so consider the following:
- ✓ Swish your mouth out with water/mouth wash (don't swallow!) and spit after eating to remove food particles.
- ✓ Floss regularly.
- ✓ Consider brushing 3 times daily.
- ✓ Talk to your dentist about your bariatric procedure, especially if you have acid reflux.
- ✓ Consider adding a 3<sup>rd</sup> cleaning; instead of every 6 months, schedule a cleaning for every 4 months.