

Maintaining Your Muscle Health with Protein and Hydration

Have you been prescribed one of these GLP-1-based medications?

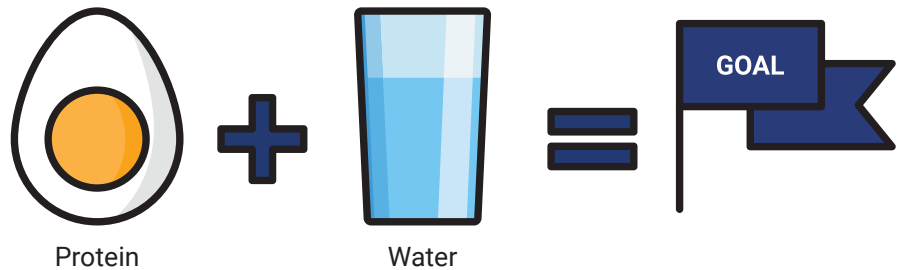
- Dulaglutide (Trulicity)
- Liraglutide (Victoza)
- Semaglutide (oral or injectable Ozempic)
- Tirzepatide (Mounjaro)

These medications can help you lower your blood sugar, and help reduce weight. Losing a lot of weight can have many health benefits. It can also contribute to loss of muscle mass, and cause problems with strength, balance, mobility, and your metabolism.

The good news is that there are strategies to reduce the risk of muscle loss while benefiting from these medications. For each of these strategies, check with your care team before making any major changes to your diet or activity.

EAT ENOUGH PROTEIN

Protein helps repair and maintain muscle, particularly during weight loss. Eating a greater amount of protein has been shown to help reduce muscle loss while losing weight. Depending on your weight and height, 75-100 grams of protein per day is a good place to start for most people.



Recommendations:

- **Aim for 25-30 grams of protein at each meal.**
- Build your meals and snacks around a protein source such as:
 - Animal proteins (fish, chicken, turkey, beef, pork, venison, and lamb)
 - Plant proteins (beans and lentils, tofu and tempeh)
 - Eggs and dairy (Greek yogurt, high-protein yogurt, cottage cheese, and kefir)
- Try pre-made protein shakes, add protein powders to smoothies, or consider a protein bar. Look for varieties without added sugars.
- Pair your proteins with complex carbs (whole grains, fruits, sweet potatoes), non-starchy vegetables (broccoli, beans, leafy greens), and healthy fats (nuts and seeds, olives, avocado) to make a balanced meal and to increase fullness.



These recommendations are for people with normal kidney function. If you have stage 4 or 5 kidney disease, talk with your care team about the right amount of protein for you.

MCT2D Protein Guide
michmed.org/PYZN4



Building Your Plate:
4-Step Process to
Low Carb Meals
michmed.org/JDqMJ



HOW MUCH IS 30 GRAMS OF PROTEIN?

Generally, it takes up ¼ of your plate. Here are some examples:



Chicken
1 small breast
1.5 large thighs
2 medium drumsticks



Beef
5 oz steak
½ cup or 4 oz cooked
ground beef



Fish
5 oz fillet
canned fish
(1½, 5 oz cans)
Shrimp: 4 oz



Egg
4 whole
1 cup egg whites



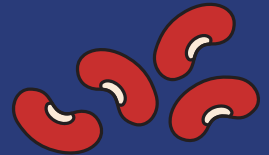
**Greek yogurt (plain) or
cottage cheese**
1.3 cups or 10 oz (brands
may vary slightly)



Tofu (firm)
6 oz or 1¼ cups



Cooked Lentils
2 cups or 12 oz



Cooked Beans
(black, pinto, kidney)
2 cups or 12 oz

DRINK WATER

Hydration helps your muscles function, recover, and absorb nutrients.
Even slight dehydration can hurt muscle endurance, strength, and recovery.

Recommendations:

- Drink small amounts of non-sugar, non-caffeinated fluids with meals and more water throughout the day.
- Choose water as your main beverage. If you don't like the taste of plain water, you can flavor it with small amounts of sugar-free flavorings or fresh fruit.
- Keep a water bottle handy and set reminders to stay hydrated

Additional Tips for Success:

- Monitor your progress. Track your protein, water, and exercise over time using a calendar, pen and paper, and mobile apps.
- Fuel your exercise: drink plenty of water when you exercise and eat protein within 1 hour of strength training.
- Make small achievable changes: it's better to build small habits you can stick with.
- Ask your care team if:
 - Fluid restriction is recommended if you have certain heart conditions.
 - A multivitamin is recommended while on a GLP-1 based drug.



Talk to your care team for specific recommendations, such as personalized protein goals.