

PEAK PERFORMANCE DIET



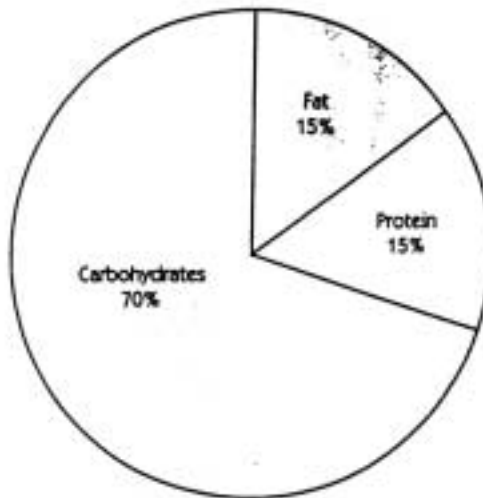
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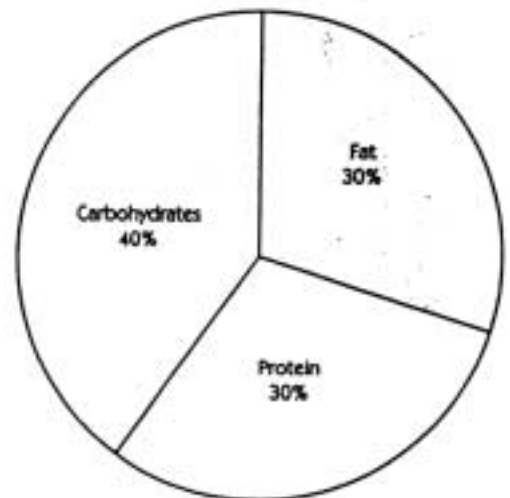
You are what you eat

One man's food is
another man's poison
Let food be
your medicine

Fat, the nutritional experts warn us, will make us fatter. For the last few decades they've advised us to eat less fat and more complex, wholesome carbohydrates such as potatoes, grains and fruit. Yet despite these recommendations, Americans are more obese. Is it possible to lose weight and shave-off fat on a low fat/high carbohydrate diet? Why have two decades worth of human trials on this type of meal plan failed? You don't need to ask the nutrition specialists. Ask the pig farmers, and they'll tell you: "If you want to fatten pigs, feed them grains and corns, and if you want lean meat feed them a high fat diet." Americans, who followed suggestions for a low fat/high carbohydrate diet, are now the most obese nation in the world. We also have an increased incidence of heart disease, hypercholesterolemia, hypertension, diabetes, strokes and cancer. Medical professionals and



Caloric Composition of Recommended Healthy Diet



Caloric Consumption of a Zone-Favorable Diet

* *Enter the Zone*, by Barry Sears, Ph.D., pg. 70 and 71

pharmaceutical companies, who follow U.S. government nutrition guidelines, are the chief benefactors of the escalating incidence of chronic diseases such as diabetes, heart disease, cancer and related complications.

People are confused. The multitude of conflicting diet books and claims provides no cohesive directive for what to eat and what to avoid. What is good fat and what is bad fat? How should one address cholesterol problems or food allergies?

Is the blood type diet

worthwhile? Doctors are as confused as the general public. Often, they will suggest you follow the claims of the latest low fat/high carbohydrate mantra.

I recommend *Enter the Zone* by Dr. Barry Sears and the rotation diet. Based upon food allergy tests over many years, I've witnessed both success and disappointment. Therefore, I will attempt to clarify diet confusion and related myths. The secret to permanent weight loss and peak performance is dietary balance: a symmetry between protein,

carbohydrates and fats (macro-nutrients) at every meal and snack throughout the day.

There is a graphic disparity between federal guidelines for optimal diet versus the Zone's model diet. Check out these figures:

Caloric Composition of Recommended Healthy Diet

-Carbohydrates: 70%

-Fat: 15%

-Protein: 15%

Caloric Composition of the Zone-Favorable Diet*

-Carbohydrates: 40%

-Fat: 30%

-Protein: 30%

(* *Enter the Zone*, by Barry Sears, Ph.D., pg. 70 and 71)

How do you determine

daily caloric and protein/fat/carbohydrate requirements? These factors are based upon an individual's lean body mass, physical activity and metabolic rate.

1. Lean Body Mass (LBM) and Body Fat Percentage—

Our staff can calculate these figures, or you can refer to *Enter the Zone* by Dr. Barry Sears, Appendix B for the calculation of lean body mass.

$$\text{LBM} = (\text{total body weight}) - (\text{total fat weight})$$

2. To Calculate Your Protein Requirement—

$$\frac{\text{LBM} \times \text{your physical activity factor}}{\text{daily protein requirement}}$$

Example: A very active 175 lb. man (Profile xy) with 25% body fat has 44 lbs. of fat and a lean body mass of 131 lbs. $175 - 44 = 131$. In conjunction with a 0.9 physical activity factor from the table below, $131 \times 0.9 = 118$ (grams) of protein per day, or 472 calories from protein per day. (**calories based on: 1 gram of protein and carbohydrate each generate 4 calories; 1 gram of fat generates 9 calories*).



Daily requirements: based on lean body mass, activity, metabolic rate

Physical-Activity Factors*

ACTIVITY	PROTEIN REQUIREMENTS (GRAMS PER POUND OF LEAN BODY MASS)
Sedentary	0.5
Light (i.e., walking)	0.6
Moderate (30 minutes per day, 3 times per week)	0.7
Active (1 hour per day, 5 times per week)	0.8
Very active (2 hours per day, 5 times per week)	0.9
Heavy weight training or twice-a-day exercise (5 days per week)	1.0

(* *Enter the Zone*, by Barry Sears, Ph.D., pg. 80)

3. Calculate the Total Calorie Requirement and the Proportion of Daily Protein/Fat/Carbohydrates Intake—Profile xy, based on The Zone 30/30/40 rule, needs:

Example:	30% protein	472 calories (118 grams)
	30% fat	472 calories (52 grams)
	40% carbohydrates	630 calories (158 grams)
		<u>1574 calories</u>

4. The Meal Plan is for 3 Meals and 2 Snacks per Day—Calculate the calories for meals and snacks. Example: Profile xy needs approximately 1600 calories per day.

Zone Recommendation:	Breakfast	450 calories
	Lunch	450 calories
	Snack	125 calories
	Dinner	450 calories
	Snack	<u>125 calories</u>
		1650 calories

More Realistic Recommendation:	Breakfast	500 calories
	Snack	150 calories
	Lunch	500 calories
	Snack	150 calories
	Dinner	600 calories
	Snack	<u>150 calories</u>
		2050 calories



1650 calories for a 175 lb. man, who is very active, may not seem like many calories, but it will provide the necessary calories based upon lean body mass. If you grow hungry, add additional fat to your diet, but *do not increase your carbohydrate intake*. Use *Mastering The Zone* menus as a creative guideline (see More Realistic Recommendation for daily intake).

Fats are important for three reasons. They make food taste better. Secondly, they release the hormone cholecystokinin (CCK) from the stomach. This hormone tells the brain that you are satisfied and to stop eating. And fats—especially the essential fatty acids such as flaxseed oil, evening primrose oil, borage oil and fish oil—are necessary to produce *eicosanoids*, the superhormone referred to as autocrine hormones.

5. Meal Preparation—Zone diet success relies upon meals that supply ample food to satisfy your gastronomy. Please read *Enter The Zone* and *Zone Perfect Meals In Minutes*. These books offer many recipes to satiate your belly. You will not go hungry on this diet.

“Food is far more important than just something you eat for pleasure or to appease your hunger. Rather, it is a potent drug that you’ll take at least three times a day for the rest of your life. Once food is broken down into its basic components (glucose, amino acids, fatty acids) and sent into the blood stream, it is more powerful and has more impact than any drugs your doctor could ever prescribe,” from *Enter The Zone* by Dr. Barry Sears.

What is Zone?

In the Zone, the mind is relaxed, yet alert and focused. You feel refreshed, confident and in control. The Zone is a real metabolic state in which mind and body operate at peak performance.

Why are we out of the Zone?

Excess insulin is the main culprit. Insulin, a hormone produced by the pancreas, is the master controller of sugar in the blood. Insulin activates or inhibits many metabolic pathways, to make a person feel sleepy, hungry, dizzy, stuporous or bloated. It can raise blood pressure, elevate cholesterol, add more fat into fat cells, retain excess fluid, damage arteries, and accelerate the aging process.

Glucagon, insulin’s counter regulatory hormone, is produced and secreted by pancreatic alpha cells. Glucagon pulls stored sugars from the liver and then from the fat tissues. It converts fatty tissues back into glucose for energy production. (Glucagon is your friend!) Insulin suppresses glucagon release. Consequently, the more carbohydrates you consume at a meal, the more insulin is secreted and less glucagon secreted.

THE ROLES OF INSULIN AND GLUCAGON

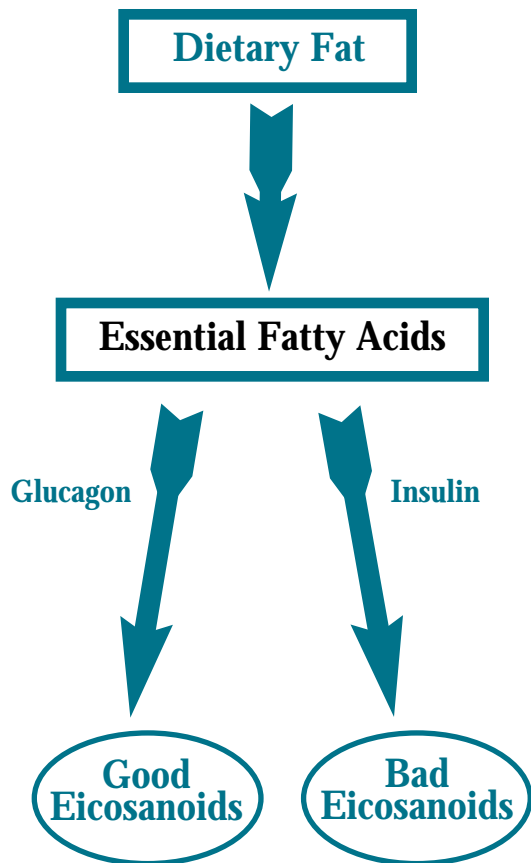
INSULIN

- lowers elevated blood sugar
- shifts metabolism into storage mode
- converts glucose and protein into fat
- converts dietary fat to storage
- removes fat from blood and transports it into fat cells
- increases the body’s production of cholesterol
- makes the kidneys retain excess fluid
- stimulates the growth of arterial smooth muscle
- stimulates the use of glucose for energy

GLUCAGON

- raises low blood sugar
- shifts metabolism into burning mode
- converts protein and fat to glucose
- converts dietary fats to ketones and sends them to tissues for energy
- releases fat from fat into the blood for use by tissues as energy
- decreases the body’s production of cholesterol
- makes the kidneys release excess fluid
- stimulates the regression of arterial smooth muscle cells
- stimulates the use of fat for energy

Eicosanoids Are Controlled by Dietary Fat*



*Enter The Zone by Dr. Barry Sears, Ph.D., p. 35



There are no drugs available to significantly reduce insulin levels. *Dietary manipulation* is the only effective treatment for excess insulin and the side effects of hyperinsulinemia. Hormones such as insulin and glucagon control blood sugar. Eicosanoids control the hormones, along with virtually every vital physiological function: hormone system, cardiovascular system, immune system, central nervous system, reproductive system, etc. In 1982 the Nobel Prize in medicine awarded discoveries and research on eicosanoids.

What controls eicosanoids?

Like all hormones, eicosanoids operate as a tight control system regulated by diet, specifically the balance between macro-nutrients—protein, carbohydrates and fat. Every daily meal and snack have a profound influence on the regulation of eicosanoids and hormonal balance. The medicinal effects of a meal last for four to six hours. Even if you skip the Zone diet for one meal, the next meal can enable you to reenter the Zone within four to six hours.

ACTIONS ASSOCIATED WITH GOOD AND BAD EICOSANOIDS*

GOOD EICOSANOIDS

- Inhibit platelet aggregation
- Promote vasodilation
- Inhibit cellular proliferation
- Stimulate immune response
- Anti-inflammatory
- Decrease pain transmission

BAD EICOSANOIDS

- Promote platelet aggregation
- Promote vasoconstriction
- Promote cellular proliferation
- Depress immune response
- Pro-inflammatory
- Increase pain transmission

(* Enter the Zone by Barry Sears, Ph.D., p. 36)

Food Allergies

The expression, “One man’s food is another man’s poison” could easily refer to food allergies and diet based upon blood type (A, B, O, AB). I have observed patients who lost weight, felt better, and gained energy on the Zone diet. But others did not respond favorably. What is the missing link? Food allergy reactions and blood type (A, B, O, AB) incompatibility are the main culprits behind the variance in response to the Zone diet. While the zone diet dictates what proportion of macro-nutrients, protein, fat and carbohydrates regulate insulin and eicosanoids, it does not offer information for allergic reactions to food or blood type incompatibility with certain foods.

Food allergy is often diagnosed erroneously and excluded from consideration in dietary guidelines. The incidence of food allergy is much higher than what is documented. Food allergy not only causes a variety of cutaneous, gastrointestinal and respiratory problems, but also contributes to chronic fatigue, headaches, depression, sinus infections, palpitations, fluid retention, behavioral problems and disturbance of the central nervous system. Common, everyday foods in the American diet induce allergic reactions: wheat, dairy products, corn, eggs, citrus products, soy and peanuts. Once a specific food allergen is identified, avoidance is the primary treatment option. Skin testing for food allergy has not proven reliable. I recommend the IgE and IgG blood test for food allergy determination. Homeopathic remedies may counteract the allergic reaction to certain foods.

Blood Type Diet

In 1996, Dr. Peter J. D’Adamo put a new twist on dietary guidelines

Eat Right For Your Type is based upon the chemical interaction between blood type and food consumption

Food Combination Rules

Rules designed to aid digestion and assimilation

- Do not combine high proteins with high carbohydrates as the same meal. The old reliable standby, steak with a large potato and bread, can be modified to steak, small potato, salad and no bread.
- Do not combine pure fats (butter, cream and bacon fat) with high carbohydrates (potatoes, bread, cereal and sweets) at any time, i.e., no butter on bread or potatoes. If you use butter on your bread, limit the portion to one slice.
- Do not combine acids and carbohydrates. Don't drink orange or grapefruit juice with high carbohydrates such as cereal, bread or sugars. However, you may have orange juice with steak and eggs.
- Eat fats freely with proteins and acid drinks such as orange juice.
- Add digestive enzymes as need. Tips on how to take digestive enzymes:
*HCL/Pepsin (stomach enzyme) should be taken with food.
*Pancreatic enzyme should be taken 30 to 60 minutes after completion of a meal. It will minimize the interference of stomach enzymes (acid digestion) with pancreatic enzymes (alkaline digestion).

when he published *Eat Right For Your Type*, based upon the chemical interaction between blood type and food consumption.

Nature equipped the immune system with a sophisticated “radar” to distinguish if a substance in the body is compatible or foreign. This ability is called antigen-antibody recognition immune response. Among the most powerful antigens in the body is the one that determines blood type. There are four specific antigens: blood type O, A, B, and AB.

A chemical reaction occurs between blood type and ingested food. Lectins, the abundant and diverse proteins found in food, possess agglutinating (clumping) properties that affect blood. When an intact, but incompatible lectin protein from eaten food settles someplace in the body, it clumps cells and alters their formation. This process makes tissues more vulnerable to destruction.

Example: Many arthritis sufferers find that avoiding night shade vegetables such as tomatoes, eggplants and white potatoes alleviates their arthritis symptoms. Most night shade vegetables are high in lectin.

According to Dr. D'Adamo, adherence to a blood type plan will enable you to:

- **Avoid many common viruses and infections**
- **Lose weight, as your body gets rid of toxins and fats**
- **Defend yourself against life-threatening diseases such as cancer, cardiovascular disease, diabetes and liver failure**
- **Bypass many factors that cause rapid cell deterioration, thus slowing the aging process**

Our office can give you a Blood Type list for the majority of foods listed in Dr. D'Adamo's book. Each list is divided into three categories: highly beneficial, neutral, and avoid.

- **Highly beneficial is a food that acts like good medicine.**
- **Neutral is a food that acts like food.**
- **Avoid is a food that acts like poison.**

I have listed Highly Beneficial (good medicine), Neutral (food), and Avoid (poison) groups, however I highly recommend that you read Dr. D'Adamo's fascinating book, *Eat Right For Your Type*. For the latest food list update for your blood type, see Steve Shapiro's web page at: <<http://darkwing.uoregon.edu/~sshapiro/er4yt/er4yt.htm>>

Food Combinations

Current recommendations for a high carbohydrate diet (pasta, grain and fruit) may interfere with the digestion of certain proteins in the stomach and fats in the small intestine. There are two distinctly different types of digestion:

1. **Acid digestion for protein in the stomach, requiring hydrochloric acid and pepsin.**
2. **Alkaline digestion for carbohydrates in the small intestine, requiring pancreatic enzymes.**

If you eat high protein and high carbohydrates simultaneously, the two distinct acid/alkaline digestive systems receive conflicting signals. The stomach—designed to digest protein meals, but not necessarily high carbohydrates—may undergo sub-optimal digestion, fermentation and bloating. Fats follow yet another course. Pure fats exit the stomach as fats and enter the small intestine, causing the gallbladder to empty bile into the small intestine. This bile emulsifies the fat and liberates fatty acids. Fatty acids neutralize whatever alkaline secretions are present at the end of

Symptoms of hypothyroidism

Fatigue

Fluid Retention

Obesity

Hypoglycemia

Dry Skin

Infertility

Cold Hands and Feet

Hypercholesterolemia

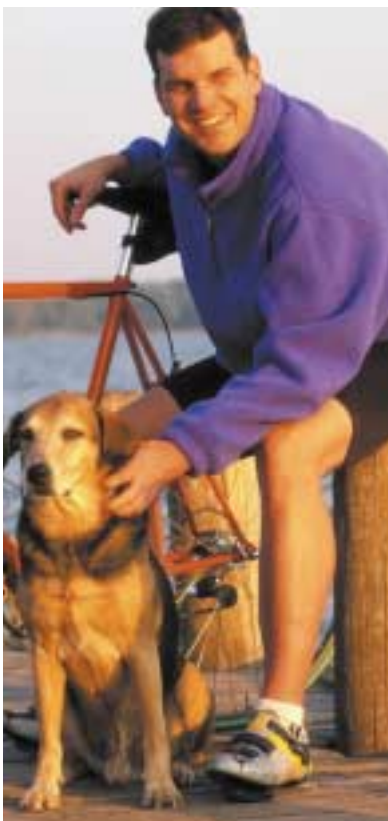
Food Intolerances

Constipation

Recurrent Infections

Narcolepsy

Insomnia



the small intestine. High carbohydrate/high fat meals may interfere with proper digestion of carbohydrates and fats, and produce flatulence (a.k.a. gas).

Glycemic Index

Glycemic index is the entry rate of a carbohydrate into the bloodstream. The lower the glycemic index, the slower the rate of carbohydrate absorption. The higher the glycemic index, the faster the blood sugar is raised in the bloodstream. For example (see *Glycemic Indices of Foods* attachment) corn flakes and potatoes have a higher glycemic index than a Mars candy bar.

Metabolic Oxidation Rate

This rate at which you burn carbohydrates can be a major diet factor for some people. Fast oxidizers, for example, may need to add more protein and fats to their diet than the Zone diet recommends: i.e., 30% protein, 50% fat and 20% carbohydrates. In a small amount of cases, Dr. Atkins diet appears to work. The Hair Mineral Analysis provides data regarding your metabolic oxidation rate.

Sub-Clinical Hypothyroidism

Though one of the most common problems associated with fatigue and obesity, sub-clinical hypothyroidism is least understood by medical professionals.

Dr. Broda Barnes, M.D. devoted his life's work to the study of the thyroid gland and its physiology. He stated that the most reliable indicator of thyroid function is the basal temperature test—not a blood test for thyroxine thyroid hormone level or even a TSH level. Diagnosis for sub-clinical hypothyroidism is determined when the blood test for thyroid function is normal or low normal range, accompanied by clinical symptoms of hypothyroidism and the low basal temperature.

- **How to take your basal temperature**

(See Axillary Temperature Test instruction sheet attachment)

- **Treatment for sub-clinical hypothyroidism**

Thyroid gland enzymes need multiple minerals—iodine, iron, selenium and zinc—to manufacture the thyroid hormones thyroxine (T4) and to convert T4 to the biologically active thyroid T3. These enzymes are highly sensitive to toxic metals, especially mercury. Many patients with silver-mercury dental amalgams show signs of sub-clinical hypothyroidism and respond to the mercury detoxification program. Please read *Optimal Health Maintenance Recommendations*, in the amalgams' section.

bon voyage!

How to begin the steps on your journey

1. Read *Optimal Health Maintenance Recommendations* for a general introduction.

2. **Don't overeat.** Whether you follow the Zone Diet, Blood Type Diet or Food Combination rules—if you overeat, you'll feed bloated and fatigued. This is an invitation for indigestion and a host of chronic illnesses. Remember to chew food thoroughly.

3. **Start the Zone diet.** Consume 30% protein, 30% fat and 40% carbohydrates throughout the day. Eat three meals per day and two to three snacks in between.

4. **Determine your blood type** (A, B, O, AB). Select blood type compatible food in combination with the Zone diet. Also take food allergies into account, intertwining the rotation/elimination diet based on IgE and IgG food allergy tests.

5. **Follow the food combination methods** to aid digestion and assimilation. When indicated, add digestive enzymes.

6. **Check for mineral deficiency and toxic metal exposure and determine metabolic oxidation rate** by the Hair Mineral Analysis test. If you are a fast oxidizer, you may require more fat and protein than suggested in the Zone diet.

7. **Know your basal temperature.** If you suffer from sub-clinical hypothyroidism, you may benefit from a therapeutic trial of natural thyroid medication. Consider a comprehensive hormone/endocrine evaluation.

8. **Incorporate moderate exercise** into your daily routine, i.e., walking or light weight training.

9. **Stay away from starvation diets, weight-loss drug therapies, or other fad diets.** Also keep in mind that prescribed medications, such as blood pressure medicine, may interfere with your metabolism.

10. **Keep these basic principles in mind:**

- One man's food is another man's poison.
- You are what you eat.
- Let food be your medicine. Let medicine be your food. (Hippocrates)



Potential mercury toxic patients need to undergo mercury toxicity determination with the DMPS (a chelating agent) mercury challenge test. Once mercury toxicity is confirmed, patients are advised to go through a dental mercury amalgam detoxification process, including nutritional therapy. If you have sub-clinical hypothyroidism, I highly recommend the use of quality sea salt rich in iodine and other trace minerals. Many people also respond positively to the therapeutic trial of thyroid glandular supplementation. The thyroid gland is not the only hormonal glandular that requires monitoring. In addition, testosterone for men, progesterone for women, growth hormone for middle-aged baby boomers, and cortisol/DHEA productions for adrenal function all play a significant role in weight control and peak performance.

Summary

Dietary guidelines are no quick fix, and no single program fits everyone. All diets need to be tailored to meet the needs of individuals. For the last two decades, Americans have gained even more weight on the experimental low fat/high carbohydrate regimen. Automobile and movie theatre seats are redesigned to accommodate the nation's ever-expanding girth. It's time to design personalized nutritional programs. People are genetically unique, and shouldn't simply devour a prescribed food such as broccoli because "it is good for you." Former President George Bush was criticized when he expressed his politically incorrect dislike for the green vegetable broccoli. Society is programmed to eat broccoli until it comes out of their ears!

My dietary guidelines do not represent a complete formula, but rather a general overview for wellness. However, if you follow these guidelines you will begin to enter the Zone for peak performance. You can shed fat, reverse chronic degenerative conditions, become more healthy and feel younger.

You will embark on an anti-aging journey. Enjoy your travels!