Module 5

Fad Diets, Hot Topics, Food Myths, & Reading Labels

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UNCLASSIFIED
Fix for a Fad Diet

- Many people wish they could lose weight fast!
  - PRT or PFT
  - Wedding
  - High school reunion
- Panic sets in and ads with “before” and “after” shots of stars become noteworthy
Who’s Dieting?

~55% of the American population actively tries to lose weight

Not always through dieting

~20% are considered to be on a diet at any point in time

Half the population is considered to try some form of diet at least once a year

NPD group, consumer market research survey 2013
DIETS DON’T WORK

Source: John Foreyt, Baylor College of Medicine

- Average diet lasts about 42 days
- Only 5-10 percent maintain a significant weight loss
- Many commercial programs or diet-books are scientifically unproven
- Can decrease performance in active duty
- May cause disordered eating
  - The Agency for Healthcare Research & Quality reported in 2012 that Eating Disorders increased by 119%
- EXPENSIVE!!!
  - Most diets include supplements or pills that may be unsafe
- Can cause significant health problems
Diets Should Focus on Behavior Change

New York City considers ban on giant sodas...

Before

After
Most Popular Diets

• Diets or Fads
  ➢ Paleo diet
    • *New form of Atkins, or low-carbohydrate approach*
    • *Similar new diet: Primal Blueprint*
  ➢ Gluten free
  ➢ Intermittent fasting

• Commercial Diet Plans
  ➢ Weight Watchers
  ➢ Jenny Craig
  ➢ NutriSystem
Paleo Diet

• Also called the “Caveman diet”
  ➢ Focus is on eating foods that our ancestors ate
    • *Recommends choosing raw/unprocessed foods*
  ➢ Restricts or eliminates a variety of foods & food groups:
    • *Grains (oats, wheat, and barley)*
    • *Starchy vegetables (i.e. potatoes and corn)*
    • *Dairy products*
    • *Beans*

• Does not specify portions or specific amounts
• Positives

- Some general information and recommendations can be helpful
  - Reduce and minimize amount of processed & refined foods
  - Increase fruit, vegetable, and lean meat choices

• Negatives

- Specific information not practical for 2013
- Extreme food restrictions may cause complications
  - May eliminate important nutrients & cause deficiencies
  - Doesn’t address all the populations and individual restrictions
  - Need to know how to eat right with what you have available
Gluten is a type of protein found in wheat, rye, and barley

Gluten-free is required only for individual’s that have Celiac disease, which is an autoimmune disease

Does not necessarily represent a healthier alternative

- Gluten free brownies, cakes and many other foods represent the same negative impacts as similar gluten foods.

*Focus should remain on less processed foods, regardless of the type of grain

*Whole wheat or whole grain products continue to be the best choice.
Many variations of IF

Most common types:

- Warrior Diet: 20 hr fast with 4 hour feeding timeframe
- Lean gains: 16 hour fast with 8 hour feeding timeframe
- 5:2: 5 days normal eat, with 2 days consume <500 kcal
- Eat, Stop, Eat: 24-hr fast, once or twice weekly
- Meal Skipping: brief, random fasts

Primary goal: To create a calorie deficit by restricting how often you eat
Intermittent Fasting Diet

• Common problems following an IF diet
  - Most schedules don’t fit fasting timeframes
  - If you don’t calorie count, it’s hard to know how much you can eat to maintain a calorie restriction
  - Your performance/work may suffer during fasting periods

• We already fast every day → When you SLEEP

• Focus on food type, portion sizes, daily habits etc., to create a caloric deficit
Commercial Plans

- Jenny Craig’s “Jenny Rewards”
  - Cost of losing 30 pounds: $399 not including food.
  - 30 weeks of food
    - $2,520-3,780

- NutriSystem
  - Cost of losing 30 pounds: $1,174.88
    - Includes all food, except fresh fruit, vegetables and dairy
    - $293.72 per month not including fruit, vegetables and dairy!

- Weight Watchers
  - Cost of losing 30 pounds: $214.80 to $299.80
    - Based on 20 weeks
    - Doesn’t include food

- The Zone Diet
  - Cost to lose 30 pounds: $3,869.1 to $5,158.8
    - Delivers a daily supply of food
How to Recognize a Fad Diet

Diets that advocate:

- Magic or miracle foods
  - Promoting one food or ingredient that can solve everything
- Rapid weight loss/quick fix
- Recommends following for a short period of time
  - Cannot be sustained for long term
- Requires no exercise or establishing other good habits
- Contains “Good” vs. “Bad” foods
- Limited research or efficacy of product
- Sounds too good to be true
Fad Diets

• Ask yourself:
  - Is the author credible?
  - What are the costs for membership, weekly fees, food, supplements, maintenance and counseling?
  - What are the health risks?
  - How many participants succeed in reaching their goal and keep the weight off long-term?
  - What kind of counseling is provided?
  - Does it fit your lifestyle?
  - Are the claims realistic?
  - Is it low in fruits, vegetables, grains and other healthy foods?
  - Are there “good” and “bad” foods?
  - Is exercise considered?
  - Is it considered permanent or just a short period of time?
HOT TOPICS
• The Organic Center at America's Organic Trade Association argued that organic produce is 25% more nutritious than conventional foods

• According to Joseph Rosen professor at Rutgers U.
  ➢ These claims were unfounded
  ➢ Rosen concluded that conventional foods are actually 2% more nutritious than organic varieties
Priority #1 is to choose fruits, vegetables, whole grains, lean meats, healthy fats and low-fat dairy

- Organic and non-organic produce are nutritious

- Eat fruits and vegetables from local farmers to support the local economy and reduce fuel use

- Research farmers markets
  - apps.ams.usda.gov/FarmersMarkets/

- Research in-season produce
  - sustainabletable.org/shop/eatseasonal/
  - Wash fruit and vegetables thoroughly to reduce soil and pesticides
Organic Bottom Line
USDA, Consumer Reports, Environmental Working Group

• Produce with the LEAST amount of pesticides
  ➢ Asparagus
  ➢ Avocados
  ➢ Bananas
  ➢ Broccoli
  ➢ Cauliflower
  ➢ Corn (However, almost all corn is genetically modified)
  ➢ Kiwi
  ➢ Mangoes
  ➢ Onions
  ➢ Papaya
  ➢ Pineapples
  ➢ Sweet Peas
Organic Bottom Line
USDA, Consumer Reports, Environmental Working Group

- Produce with the MOST pesticide contamination

- Nectarines – 97.3% of nectarines sampled
- Celery – 94.5% of celery sampled
- Pears – 94.4% of pears sampled
- Peaches – 93.7% of peaches sampled
- Apples – 91% of apples sampled
- Cherries – 91% of cherries sampled
- Strawberries – 90% of strawberries sampled
- Imported Grapes – 86% of imported grapes (Chile) sampled
- Spinach – 83.4% of spinach sampled
- Potatoes – 79.3% of potatoes sampled
- Bell Peppers – 68% of bell peppers sampled
- Red Raspberries – 59% of red raspberries sampled
Dr. Miller from the University of Buffalo researched energy drink consumption and risky behavior in college students.

- 52% were male
  - 2/3 of the energy drink consumers had used energy drinks as mixers with alcoholic beverages
  - Students think they will have energy to party all night without getting as drunk
- Alcohol and caffeine reduce perceptions of intoxication
  - Still slows reaction time and judgment
- Findings of this research suggest that energy drink consumption is correlated with:
  - Substance use, unsafe sexual activity, other forms of risk-taking
Typically contain caffeine, sugar, and many other ingredients:
- Guarana, ginseng, panax, taurine, gingko biloba, etc...

These ingredients alone or in combinations could lead to multiple negative effects:

- Irregular heart beat / palpitations
- Tremors / shaking
- Upset stomach
- Headaches
- Restlessness / insomnia
- Light-headed / dizziness

*Most stimulants are not well understood and may lead to long term issues*

Actual Sources Energy: Carbohydrate, Protein, and Fat
Most optimal when eaten in combinations
Superfoods?

- Commonly advertised foods with “special” powers
  - Avocados
  - Garlic
  - Coconut
  - Berries
    - Acai, raspberry, blueberry etc…

There is no single food or a handful of foods that can give us everything we need throughout the day!
*Remember to choose a variety of foods throughout the day to ensure you get all of the possible benefits!
MYTHS
• Don’t eat after 2000 hrs?
  
  ➢ The body does not care what time it is

  ➢ If it needs calories for growth, repair or energy then it is ok to eat at anytime

BUT…many Americans make poor food choices at night when they have already reached their calorie needs for the day
• I lost or gained ten pounds last week?

  ➢ It’s possible to see major changes in weight on the scale

    • *Weight fluctuation will be from glycogen, water and maybe some fat*

  ➢ Would need to overeat or undereat by approximately 24,500 calories to gain or lose 10 pounds in one week
Myths?

• Drinking water promotes fat loss?
  - Water doesn’t promote fat loss
  - There may be some calorie burn from extremely cold water consumption but not enough to see significant fat loss
  - Hydration does help aid fat loss by maintaining adequate hydration

  • Allows for better exercise performance
  • Helps flush toxins released from adipose (fat) tissue
Myths?

• Vegetarian diets are the healthiest for fat loss?
  Not necessarily!
  ➢ “High school vegetarian diet” is not healthy
    • *Cola*
    • *French fries*
    • *Pizza*
    • *Candy*

  ➢ They can be “healthful” when planned out & balanced
    • *Nuts, seeds, beans, soy, tofu, fruit, vegetables, whole-grains*
Myth: Carbohydrates are the biggest health problem and should be avoided.

Fact: Usually, we choose too many & too much of simple carbohydrates in the form of pastries, candies, soda, and other snacks that provide more calories and few nutrients which could eventually lead to weight gain.
Nuts are fattening?

- Nuts are high in healthy fats thus calorie dense
- A 1-2 ounce serving provides a plethora of nutrients
- Some nuts may aid in weight loss
  - *Fiber may prevent complete absorption of all calories?*
Myth: The more protein I eat, the bigger the muscles I will get.

Fact: Actually, it takes much more than protein to build muscle. And too much protein will have the same result as anything else → weight gain
Myth: The less I eat, the more weight I should lose, right?

Fact: Wrong! While it’s important to create a calorie deficit for weight loss, the body can have adverse reactions if calories are depleted too much.
FOOD LABELS
Nutritional Labeling and Education Act

- Effective May 1994, a new label format was required on food packages
  - Uniform Listing of Nutrients
  - Serving Sizes in Household Measures
  - New Reference Value to Show How A Food Fits into a 2,000 Calorie Diet
  - More Informative Ingredient List
  - Strict Definitions for Health Claims and Nutrient Content
## Nutrition Facts

**Serving Size** 1 cup (228g)

**Servings Per Container** 2

### Amount Per Serving

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<tr>
<th>Nutrient</th>
<th>Amount</th>
<th>% Daily Value*</th>
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<td>Calories from Fat</td>
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</tr>
<tr>
<td>Protein</td>
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</tr>
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### Vitamin Content

- **Vitamin A**: 4%
- **Vitamin C**: 2%
- **Calcium**: 20%
- **Iron**: 4%

*Percent Daily Values are based on a 2,000 calorie diet. Your daily values may be higher or lower depending on your calorie needs.*

### Calories per gram:
- Fat: 9
- Carbohydrates: 4
- Protein: 4
Food Label Exercise

• Go to the Food Label in your book

  ➢ How many grams of carbohydrate are in 1 cup of oatmeal?
  ➢ How many grams of sugar are in 2 cups of oatmeal?
    • How do you know?
  ➢ How many grams of fat are in 1 cup of oatmeal?
    • How many calories does that make from fat?
Let’s Discuss some Food label questions:

- Do food labels influence your food purchase?
- What information do you look at?
- What information ultimately affects your purchase?
- Do food labels ever frustrate you or deter you from buying a food?
Why Labeling?

• Labels are there to help you make your “personal best” food choices
  ➢ Choices that benefit you now and in the future

• Labels allow you to:
  ➢ Compare one food with another
  ➢ Choose foods that help provide the balance of nutrients your body needs
  ➢ Plan balanced meals
  ➢ Plan a moderate, varied and balanced overall diet
Questions?

- Are there any problems with focusing on one or two nutrients on a label?
- Why is it important to look at nutrients like calcium, protein, and vitamin A, not just fat and cholesterol?
Optional Student Activities

1) Group up in class and complete food label worksheet on next page. Choose a label in workbook, complete, then discuss with class.

2) Go to the commissary/grocery store and write down the amount of sugar and caffeine in 3 different types of energy drinks.

3) Go to the commissary/grocery store and compare prices between organic and non-organic produce. Choose at least 3 types of foods:

   Example:
   
   1lb. apples vs. 1lb. of organic apples