CONTEMPORARY HEALTH SCIENCE
INTRODUCTION: HEALTH IN A CHANGING SOCIETY

By Deidre Orriola, MPH

Objectives
• Define health, wellness, and public health
• List the six dimensions of health and wellness
• Identify changes in health and cause of death in the past century
• List the 4 overarching goals of Healthy People 2020
• Explain the three levels of public health prevention

What is “health”?
What is “wellness”?
What is “public health”? 
Defining Health

- The World Health Organization (1947): “Health is a state of complete well-being and not merely the absence of ____.”

Defining Wellness

Wellness is the _______ of moving toward _______ health.

Defining Public Health

- Public health is the _______ of disease and _______ of health among _______ or groups of _______
Levels of Public Health Prevention
- Primary
  - Definition:
  - Examples:
- Secondary
  - Definition:
  - Examples:
- Tertiary
  - Definition:
  - Examples:

Public Health Terminology
- Prevalence
- Incidence
- Morbidity
- Mortality

Seven Dimensions of Health & Wellness
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Seven Dimensions of Health & Wellness

- Social
- Physical
- Intellectual
- Emotional
- Spiritual
- Environmental
- Occupational

Taking Responsibility for Your Health

- Today _______ diseases are the leading causes of illness and death.
- Taking responsibility for our behaviors means changing our negative lifestyles to positive lifestyles

How Health has Changed

Leading Causes of Death

<table>
<thead>
<tr>
<th>1900</th>
<th>2010</th>
</tr>
</thead>
<tbody>
<tr>
<td>_______ &amp; _______</td>
<td>_______</td>
</tr>
<tr>
<td>_______</td>
<td>_______</td>
</tr>
<tr>
<td>Heart Disease</td>
<td>Stroke</td>
</tr>
<tr>
<td>Stroke</td>
<td>Unintentional Injuries</td>
</tr>
<tr>
<td>Kidney Disease</td>
<td>Alzheimer’s</td>
</tr>
<tr>
<td>Accidents</td>
<td>Diabetes</td>
</tr>
<tr>
<td>Cancer</td>
<td>Kidney Disease</td>
</tr>
<tr>
<td>Senility</td>
<td>Influenza &amp; Pneumonia</td>
</tr>
<tr>
<td>Diphtheria</td>
<td>Suicide</td>
</tr>
</tbody>
</table>
Leading Causes of Death

<table>
<thead>
<tr>
<th>Cause</th>
<th>Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tobacco</td>
<td>435,000</td>
</tr>
<tr>
<td>Poor diet &amp; physical inactivity*</td>
<td>365,000</td>
</tr>
<tr>
<td>Alcohol</td>
<td>85,000</td>
</tr>
<tr>
<td>Microbial agents</td>
<td>75,000</td>
</tr>
<tr>
<td>Toxic agents</td>
<td>55,000</td>
</tr>
<tr>
<td>Motor vehicle crashes</td>
<td>43,000</td>
</tr>
<tr>
<td>Firearms</td>
<td>29,000</td>
</tr>
<tr>
<td>Sexual behavior</td>
<td>20,000</td>
</tr>
<tr>
<td>Illegal drug use</td>
<td>17,000</td>
</tr>
</tbody>
</table>

Contribution of Different Factors to Health

- Medical care: 40%
- Environment: 10%
- Genetic factors: 20%
- Lifestyle: 47%

Lifestyle Diseases—Diabetes

- Type 1 diabetes – no
- Type 2 diabetes – yes
- Gestational diabetes – maybe
Healthy People 2020: Health Goals for Americans

1. Help all people to live high quality, longer lives free of preventable disease, disability, injury and premature death

2. Achieve health equity and eliminate health disparities

3. Create social and physical environments that promote good health for all
Healthy People 2020: Health Goals for Americans

4. Promote quality of life across the lifespan

Factors Contributing to Health Disparities Among Ethnic Minorities

- Access to Appropriate Health Care
- Culture and Lifestyle
- Discrimination
- Income and Education

Gender Differences – Who’s Healthier?

- Longer life expectancy
- More disabling health problems
- Excess body fat
- Suffer earlier heart attacks
- Stroke mortality
- Higher rates of tobacco & alcohol use
- Stronger immune system
- More hostile reactions to stress
- Higher rates of depression
- Succeed more at suicide
- More long-term effects from sexually transmitted infections (STIs)
Barriers to Academic Success

<table>
<thead>
<tr>
<th>Health Issue</th>
<th>% Reporting</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stress</td>
<td>34</td>
</tr>
<tr>
<td>Cold/flu/sore throat</td>
<td>29</td>
</tr>
<tr>
<td>Sleep difficulties</td>
<td>26</td>
</tr>
<tr>
<td>Concern for a troubled family/friend</td>
<td>19</td>
</tr>
<tr>
<td>Internet use/games</td>
<td>17</td>
</tr>
<tr>
<td>Depression/anxiety</td>
<td>16</td>
</tr>
<tr>
<td>Relationship difficulties</td>
<td>16</td>
</tr>
<tr>
<td>Sinus infection/ear infection/bronchitis/strep throat</td>
<td>9</td>
</tr>
<tr>
<td>Death friend/family member</td>
<td>9</td>
</tr>
<tr>
<td>Alcohol use</td>
<td>6</td>
</tr>
</tbody>
</table>

Leading Causes of Death
Ages 15-24

- Unintentional Injuries
- Homicide
- Suicide
- Cancer
- Heart disease

Keys to Physical Health

- Avoid all forms of ______
- Get ______ hours of sleep per night
- Maintain a healthy ______
- Get regular ______
- Eat a ________ diet
- Use ______ safely
Keys to Mental & Spiritual Health

- Time for ______
- Do what you like
- Positivity
- Manage ______
- See adversity as ______ and opportunity for ______

Readings

- 20% of quiz questions will come from reading material not covered in the notes. See Canvas for readings associated with this chapter.