Author(s): Michael Jibson, M.D., Ph.D., 2009

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Psychiatry Sequence (PSY614)

Topic: **Suicide**

Faculty: Michael Jibson, M.D., Ph.D.


Lecture: Thursday, 10/30/08, 11:00 am – 12:00 noon

Learning Objectives:

After reviewing the material on suicide, the student will be able to:

1. Summarize the major epidemiologic data on suicide, including
   a. overall suicide rate
   b. relative risk of suicide among various demographic groups
   c. recent trends and their public health implications

2. Describe the relationship between specific psychiatric disorders and suicide, including
   a. depression
   b. alcoholism/drug abuse
   c. schizophrenia

3. List the major clinical risk factors for suicide, including
   a. Demographic factors
   b. Psychiatric factors
   c. Mental status findings
   d. Other issues

4. Describe the major principles of clinical decision-making and intervention when working with a suicidal patient

5. Recognize common myths about suicide

Sample Test Question:

Which of the following characterizes the association between suicide and depression?
A. Suicide is the most common cause of death in those with a depressive disorder.
B. Suicidal tendencies usually decrease dramatically after a depressive episode begins to improve.
C. Among suicide victims, depression is a more common diagnosis than is schizophrenia.
D. Overdose of prescribed medications is the most common cause of death among suicide victims.
E. Suicide is more likely in depressed women than depressed men.

Answer: C
Suicide

I. Epidemiology


1. Annual rate is 11.1 suicides per 100,000
2. >32,000 deaths annually
3. 15th leading cause of death overall
4. 3rd leading cause of death at ages 10-24

<table>
<thead>
<tr>
<th>Group</th>
<th>Number</th>
<th>Rate (per 100,000)</th>
<th>% of Deaths</th>
</tr>
</thead>
<tbody>
<tr>
<td>US Population</td>
<td>32,439</td>
<td>11.1</td>
<td>1.4</td>
</tr>
<tr>
<td>Male</td>
<td>25,566</td>
<td>17.7</td>
<td>2.2</td>
</tr>
<tr>
<td>Female</td>
<td>6,873</td>
<td>4.6</td>
<td>0.6</td>
</tr>
<tr>
<td>White</td>
<td>29,251</td>
<td>12.3</td>
<td>1.4</td>
</tr>
<tr>
<td>Black</td>
<td>2,019</td>
<td>5.2</td>
<td>0.7</td>
</tr>
<tr>
<td>Nonwhite</td>
<td>3,188</td>
<td>5.8</td>
<td>0.9</td>
</tr>
<tr>
<td>Elderly (65+ yrs.)</td>
<td>5,198</td>
<td>14.3</td>
<td>0.3</td>
</tr>
<tr>
<td>Young (15-24 yrs.)</td>
<td>4,316</td>
<td>10.4</td>
<td>12.9</td>
</tr>
</tbody>
</table>

5. Prevalence Rates for Subpopulations
a. Age: Highest rates among elderly
b. Gender: Men complete suicide 3-4x more often than women; however, women attempt suicide 3x more often than men
c. Race: Whites have highest rate; African Americans the lowest
d. Region: Highest rates in Mountain States (inc. Alaska)
e. Profession: Highest rates for professions that deal with death and violence, and that have access to lethal means
   i. Physicians (men & women: 38/100,000)
   ii. Police officers
   iii. Military personnel
6. Methods of Completed Suicides for Subpopulations
   a. Firearms most common method for men and women in the U.S. (57%)
   b. Hanging second most common for men
   c. Toxic ingestion (poison, drug overdose) second most common for women.
7. Lethality of Means

<table>
<thead>
<tr>
<th></th>
<th>Most Lethal</th>
<th>Least Lethal</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>90%</td>
<td>&lt;1%</td>
</tr>
<tr>
<td></td>
<td>70%</td>
<td></td>
</tr>
<tr>
<td></td>
<td>50%</td>
<td></td>
</tr>
<tr>
<td></td>
<td>10%</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Ingestion</td>
<td>Cutting</td>
</tr>
<tr>
<td></td>
<td>Hanging</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Falls</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Firearms</td>
<td></td>
</tr>
</tbody>
</table>

B. Recent Trends and their Public Health Implications
   1. Increases among young and women
   2. Increases in suicide by firearms

C. Suicide Rates for Various Nations
   1. U.S. has a moderate suicide rate relative to other nations
   2. Hungary has the highest rate; Finland, Denmark, Austria, Switzerland, France, Japan, Norway, among others, also have higher rates than the U.S.
   3. Italy, Ireland, England, Portugal, Spain, Israel, Greece, Venezuela, among others, have lower rates than the U.S.
D. Previous Attempt and Help Seeking Histories
   1. 30-40% of completers have attempted suicide before
   2. Nearly two-thirds of suicide completers communicated their suicidal intentions to others
      (including to health-care providers)
   3. Most suicide attempters are able to experience a reduction in suicidality and a return to full function

II. Clinical Aspects of Suicide
   A. Clinical Risk Factors
      1. Mental/Psychiatric Disorders
         a. Depression
            i. >50% clinically depressed at time of suicide
            ii. Nearly 15% of persons with significant mood disorders will commit suicide
            iii. Depression is genetically predisposed, and there is a strong link between depression and suicide
            iv. Suicide can occur in all phases of depressive episode
            v. Risk may be highest during early recovery phase
         b. Alcoholism/Drug Abuse
            i. Nearly one-third of suicides occur in persons with chronic alcoholism
            ii. 2-4% of chronic alcoholic patients commit suicide
            iii. Positive blood alcohol levels are evident in 30-40% of suicides
         c. Schizophrenia
            i. 5-10% of schizophrenic patients commit suicide
            ii. In general population studies, schizophrenia accounts for 5% of suicides
         d. Other Mental Disorders also increase risk (5-10%)
         e. Serious Physical Illness
      2. Social Isolation/Interpersonal Loss or Conflict
         a. Among alcoholics who commit suicide, 50% have a history of interpersonal loss within previous year
         b. Suicide more common among divorced, widowed, and single/never married than among married
         c. Among adolescents & young adults, interpersonal conflict and disciplinary or legal problems often precipitate suicide
            i. Break-up with boyfriend or girlfriend
         d. Hopelessness regarding a dilemma, especially with the prospect of public humiliation
i. Failing class but don’t dare drop out
ii. Sexual impropriety about to come to light
e. Hopelessness regarding a dilemma, especially with the prospect of public humiliation
   (failing class but don’t dare drop out, sexual impropriety about to come to light)

3. Suicide Indices
   a. Suicidal ideation
      i. Passive – no plan or intent
         1. I wish I were dead
         2. I wish I could just go to sleep and never wake up
      ii. Active – specific plan and intent to act
         1. Intrusive and obsessional vs
         2. Researched and thought out
   b. History of attempts (esp if highly lethal)
      i. Highest predictive value in past 2 months
      ii. Suicide rehearsals of preparation
         1. Counting pills
         2. Holding gun
         3. Check out high places
   c. Final arrangements
      i. Will
      ii. Suicide note
      iii. Giving away possessions

4. Current Mental Status
   a. Hopelessness
   b. Acute agitation
   c. Intoxication
   d. Psychosis (especially with command hallucinations or delusions)
### Summary of Risk Factors

<table>
<thead>
<tr>
<th>Demographic</th>
<th>Psychiatric</th>
<th>Mental Status</th>
<th>Other</th>
</tr>
</thead>
<tbody>
<tr>
<td>Older</td>
<td>Depression</td>
<td>Hopeless</td>
<td>Medical Illness</td>
</tr>
<tr>
<td>White</td>
<td>Substance abuse</td>
<td>Agitated</td>
<td>Recent losses</td>
</tr>
<tr>
<td>Male</td>
<td>Psychosis</td>
<td>Command hallucinations</td>
<td>Hopeless dilemma</td>
</tr>
<tr>
<td>Living alone</td>
<td>Other psychiatric</td>
<td>or delusions</td>
<td>Prospect of public humiliation</td>
</tr>
<tr>
<td>Not working</td>
<td>disorders</td>
<td>Suicidal ideation</td>
<td></td>
</tr>
</tbody>
</table>

**Availability and Lethality of the Means:** Firearms > Falls > Hanging > Ingestion > Cutting

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**B. Clinical Assessments/Interventions**

1. **General Principles of Intervention**
   a. Recognize the "cry for help" or the expressed suicidal ideation/intent
   b. Ask questions in an objective, straightforward, nonjudgmental manner
   c. Assess depression, substance abuse, impulsivity, and psychosis
   d. Ask specifically about availability of firearms
   e. Do not alienate patient with sarcasm, ridicule, or disbelief
   f. Do not minimize their perceived problems
   g. Talk calmly and openly about problems
   h. Convey a sense of hope; counteract hopelessness
   i. Always seek corroborative information
      i. Family and friends
      ii. Outpatient mental health providers
   j. Ask the tough questions that need to be asked
      i. What will keep this from happening again?
      ii. What is different now?

2. **Clinical Decision Making**
   a. Gather as much information as possible
   b. Carefully assess the risk and protective factors
   c. Discuss the case with another clinician
   d. Establish limit-setting on self-destructive behavior
   e. Assess and discuss reasons for living
   f. Involve family and friends whenever possible
   g. Convey knowledge that depression (or other treatable condition that is present) is treatable
3. Hospitalize if:
   a. An attempt is clinically serious
   b. Risk factors suggest high risk
   c. There is no established outpatient care
   d. There is a discrepancy between the patient’s story and other information
4. Consider outpatient care if:
   a. Risk is relatively low
   b. Stressors can be immediately addressed
   c. The patient already has a mental health provider
   d. Other safeguards can be implemented (eg, family support)
   e. Suicide threats or attempts are repeatedly used to communicate distress or manipulate others

C. Myths
   1. People who talk about suicide won't commit suicide
   2. People who want to commit suicide won’t tell you
   3. Suicide happens without any warning
   4. All suicidal persons are "insane"
   5. Suicide stems from a single disease or mental disorder
   6. Asking about suicide "plants" the idea in the patient's mind