Myth: People With Mental Illness Are More Prone to Violence

August 31, 2018

SUGGESTED LESSON PLANS

Addressing this myth can be a nice capstone to the course, as it integrates a number of topics from research methods, cognition, social psychology, abnormal, and other areas of psychology. Unlike some other misconceptions, this myth is based almost entirely in intuition and anecdote; as such, the structure of this unit might be a little different, as students are likely to have difficulty coming up with evidence in support of the myth, but may nonetheless struggle to accept evidence that counters it. Instructors should be prepared to listen for —and challenge — **belief perseverance**, and can use this myth to highlight how automatic and difficult belief perseverance can be to overcome.

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Why the Myth Persists

Belief in this myth perseveres for a number of reasons, most of which represent cross-cutting themes that can be listened for and elicited from students:

- **Availability heuristic:** How do sensationalized media stories affect our estimates of the prevalence of violent crimes committed by people with mental illness? What kinds of evidence would we want to seek to counter effects of this heuristic? (Discuss problems with relying on media accounts)
- **Syllogistic / logical errors:** Imagine we find evidence that shows that violent crimes are in fact disproportionately committed by people with mental illness. Is that the same as saying that people with mental illness disproportionately commit violent crimes? (A provocative example of the logical error: The fact that most rapists are men does not mean that most men are rapists.) The *representativeness heuristic* also contributes to these logical errors (see below).
- **Stereotypes and representativeness heuristic:** Are we likely to overestimate prevalence of violence perpetrated by people with mental illness because of our stereotypes? Do media / other accounts assume mental illness because behavior fits stereotypes?
- **Operationalizations of terms:** How do definitions of *dangerousness* or *violence* fit with the ways mental illness is diagnosed? How is *mental illness* operationalized?

In addition, associations that do exist (e.g., between severe, untreated mental illness, particularly when co-morbid with substance abuse) are often poorly understood, mischaracterized or exaggerated.

Examples of sources that seem to support the link between violence and mental illness:

[Don't Deny the Link Between Serious Mental Illness and Violence](#)   (*Washington Post*).
This article is written by a family member of someone with serious mental illness, and argues that violence is a very real problem, particularly in those with un(der)treated severe mental illness.

> *"In a* [2016 report](#) *by the nonprofit Treatment Advocacy Center, my co-authors and I found that serious mental illness — typically untreated — is associated with an estimated 29 percent of family homicides and 7 percent of all homicides. In 2013, these fatalities outstripped the number of deaths related to meningitis, kidney infection or Hodgkin's disease."*

You can point out to students that, without an understanding of *base rates* (i.e., what proportion of the population is (a) actively struggling with serious mental illness at any time or (b) has ever received a diagnosis of serious mental illness), statistics such as these are difficult to interpret.

The 2016 report cited above presents data that 50% of parents who kill their children had a serious mental illness and 67% of children who kill their parent(s) had a serious mental illness. However, these figures are estimates based on a range of data of varying quality from other countries:

> "In the absence of any definitive American data, and given the fact that public mental health services in the United States are significantly inferior to those in Canada, where the most detailed studies have been carried out, it seems reasonable to estimate that in at least half of filicide cases

> in the United States, the parent had a serious mental illness."
> (Torrey, Bruce, Lamb, Jacobs, Jaffe, & Snook, 2016, p. 11).

For example, individuals determined to have been "actively psychotic" at the time of the crime are assumed to be equivalent to individuals with pre-existing diagnoses of severe mental illness prior to the crime.

[Yes, the Untreated Mentally Ill Are More Dangerous Than Others](#) (*National Review*).
This argues that statistics showing people with mental illness are not more violent are looking at *all* mental illness, but that people with un(der)treated severe mental illness are in fact dangerous.

This source can be used to highlight:

(a) the importance of clear operationalizations of terms; and

(b) policy implications and the nuances of debate around this issue; for example, why is it important to distinguish between questions like "Are the mentally ill more prone to violence?" and "Are people with severe mental illness who don't receive adequate care more prone to violence?" or "Are mass shooters mentally ill?" and "Are mass shooters more likely to have an untreated severe mental illness?"

Sources that challenge the link between violence and mental illness:

Students are far more likely to find sources that challenge the myth. Some examples:

Stuart, H. (2003). Violence and mental illness: An Overview. *World Psychiatry, 2,* 121 – 124. Available at: https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1525086/

This accessible review nicely summarizes the methodological issues and data, with easy to understand, nuanced answers, on "three key questions:

- Are the mentally ill violent?
- Are the mentally ill at increased risk of violence?
- Is the public at risk?"

Important critical thinking points raised include:

- The representativeness of samples used (e.g., do they rely on hospitalized individuals, whose symptoms are almost by definition more severe, making them less representative of the diagnostic category as a whole?)
- The extent to which other known predictors of violence / co-morbid conditions (e.g., substance use, previous history of violence) are controlled

Speaking of Psychology podcast: [Dispelling the myth of violence and mental illness,](#) with J. Dvoskin.

Miller, J. (October, 2017). Gun violence and mental illness: Myths and evidence-based facts. *American Mental Health Counselor's Association.* Available at http://www.amhca.org/blogs/joel-miller/2017/10/03/gun-violence-and-mental-illnessmyths-and-evidence-based-facts

Varshney, M., Mahapatra, A., Krishnan, V., Gupta, R., Deb, K. S. (2016). Violence and mental illness: What is the true story? *Journal of Epidemiology and Community Health, 70*, 223 – 225. Available at: http://jech.bmj.com/content/70/3/223

Position statement from *Mental Health America.*

Below are several options for how you might want to organize the unit, depending on how much time you have. The goals and basic structure are the same, but differ in terms of how much depth you are able to go into with students. In general, the structure of this unit (described in more detail below) is as follows:

1. Get students to think critically about the claim and to generate a list of the kinds of evidence that would support or refute it.
2. Discuss and critique the evidence that does exist in light of the discussion from Step 1.
3. Integrate and apply the ideas related to critical thinking and policy

If you have only 1 day to spend on this myth:

Plan to spend the majority of the class session on *Step 1: thinking critically about the claim and generating a list of the kinds of evidence that would support or refute it.* With this focus, students will be prepared to seek and evaluate evidence on their own if they want to know more. You will want to be sure that you have reviewed some of the evidence that appears to support and that refutes the myth (see above).

Thinking critically about the claim and generating a list of the kinds of evidence that would support or refute it. (~30 minutes)

Ask students to consider what strong evidence in support of claims that *People with mental illness are more prone to violence* or that *People with mental illness are dangerous* might look like. By this point in the semester, students should be well aware of the limitations of anecdotal evidence. Ask them to try to break down the ideas underlying the myth and to generate the kinds of evidence that would support those ideas. You might prompt them with questions such as these:

- *"What am I being asked to believe or accept?"*
- *"If that were true, what would that mean?"*
- *"If that were true, what would I expect the evidence to show?"*
- *"If I were going to design a study to test this hypothesis, what would a good study entail?"*

For example, implicit in the statement *People with mental illness are dangerous* is the idea that *People with mental illness are **more dangerous than people without mental illness***. If that were true, what would we expect the evidence to show? Have students generate examples of the kinds of evidence that

would be consistent with these statements, such as "*I'd expect higher rates of violence among people diagnosed with mental illness than among people not diagnosed*". Engage students in thinking about how terms need to be operationalized. For example, ask them:

- "How are we going to operationalize mental illness? Violence?"
- "What problems might there be in relying on incarceration records or arrest reports?"

Remember to listen for / elicit from / share with students themes related to:

- Availability heuristic
- Syllogistic / logical errors
- Stereotypes and representativeness heuristic
- Operationalizations of terms

Throughout the discussion, make a running list on the board of (a) the kinds of evidence students would expect to find if the myth were true and (b) a list of "red flags" to look for in evidence that is found (e.g., logical errors, poor operationalizations, reliance on media accounts.)

Discussion of evidence (10-20 minutes)

If you have more time and /or a smaller class, you could at this point invite students to pull out their laptops, tablets, or cell phones to do a simple internet search about the myth to see what they find. Note that such searches are more likely to come up with evidence that challenges the myth than that supports it. Some exceptions are noted at the end, along with a few examples of sources that challenge the myth. There are many more that students might find. Have students integrate the ideas from the board about good evidence and red flags for problematic evidence into their discussion. Depending on class size and structure, you could have students place colored sticky notes next to important ideas on the board to provide a visual tally of the number of times *availability heuristic, logical errors, inappropriate comparison group,* etc. are found in their research.

If you have less time, you might choose one source to summarize for and discuss with students. Two good options (described in more detail above):

- Discuss this *Washington Post* opinion piece, [Don't Deny the Link Between Serious Mental Illness and Violence.](#) Encourage students to generate questions about the opinion piece in light of the list of evidence / red flags on the board
- Present students with a summary of the results from Stuart, H. (2003). Violence and mental illness: An Overview. *World Psychiatry, 2*, 121 – 124.

Integration and application of the ideas (5-15 minutes)
These questions could be used to wrap-up the day's discussion, either as class discussion questions or reflective writing prompts in the final minutes of class. If class time is especially short, these questions could be used for assessment (see more assessment ideas at the end of the unit):

- Based on critical analysis of the evidence, what are the students' conclusions about the myth? What would they tell friends or family members who believe the myth?

- Why does the myth persist? (Perhaps discuss students' own reactions to the evidence and the extent to which they found themselves (dis)believing the evidence and why).
- What are the policy implications of the evidence?
- What questions remain unanswered, and what additional research is needed?

If you have 1.5 – 2 days to spend on this myth:

If you have even part of a second class session to devote to this unit, then you should plan for students to search for evidence relating to the myth on their own. This work can begin in class on the first day if needed. You will spend the majority or entirety of the first class session on *Step 1: thinking critically about the claim and generating a list of the kinds of evidence that would support or refute it.* With this focus, students will be prepared to seek and evaluate evidence on their own if they want to know more. Before the second class session, you will want to be sure that you have reviewed some of the evidence that appears to support and that refutes the myth. Several good examples are included above.

Day 1: Thinking critically about the claim and generating a list of the kinds of evidence that would support or refute it.

This will be structured nearly identically as described in the single-day plan. But there are some differences: You might explicitly review key information from across the semester. For example, you might tell students:

> *"Today, we are going to be discussing the question of whether people who have been diagnosed with a mental illness are dangerous or prone to violence. You may have noticed that I asked you to review information about a number of topics we have discussed this semester, including these."*

Present students with a slide that lists the names of concepts you asked them to review, such as *availability heuristic, representativeness heuristic, control group, stereotyping.* Ask students (individually as a written exercise, in small groups, or as a whole class discussion):

> *Why do you think I asked you to review each of these terms? First, let's make sure we remember what each one is by briefly defining it. Now, how do you think this idea might be relevant to the question we're considering? Why might keeping these concepts in mind help us evaluate evidence related to this question?*

You can spend more time really getting students to grapple on their own with the prompting questions (*What am I being asked to believe or accept? If that were true, what would that mean? If that were true, what would I expect the evidence to show? If I were going to design a study to test this hypothesis, what would a good study entail?*) or having them generate ideal studies that might provide the kinds of compelling evidence they would want to see before accepting the claim. For example, if students have generated a statement such as, *People with mental illness are more dangerous than people without mental illness*, ask students to design a study to test that hypothesis. Again, depending on the size of the

class and the time available, this could be done as a whole class exercise, with students in smaller groups (perhaps with each group designing a study for a different hypothesis if many have been generated), or as an individual written assignment.

By the end of class, you want students to have generated (a) the kinds of evidence students would expect to find if the myth were true and (b) a list of "red flags" to look for in evidence that is found (e.g., logical errors, poor operationalizations, reliance on media accounts.)

If you have time left on Day 1, invite students to pull out their laptops, tablets, or cell phones to begin a simple internet search about the myth to see what they find.

Before students leave for the day, task them with conducting (or continuing) their research outside of class and bringing their findings to the next class. Depending on the number of topics generated and the size of the class, you may want to assign specific topics / ideas to specific groups of students to research for next time. For example, you might assign one group of students to specifically look for evidence related to school shootings, another group of students to look for evidence related to intimate partner violence, and so on.

Day 2: Discussion of evidence and integration / application of ideas

Plan to spend one-half to two-thirds of your time on Day 2 discussing the evidence students have found and the remaining time integrating and applying the ideas.

Discussion of evidence: Begin class by reviewing the list of good evidence and red flags for problematic evidence generated in the previous class, and then have students share the evidence that they found in their searching. Here are some options for this sharing:

- If you assigned topics to groups, you might use a jigsaw classroom approach in which students first get together in their topic group to go over their information together, then re-group students so that each student has a different source or idea to discuss before reporting back to the entire class.
- You might go through the list of characteristics of good evidence / red flags and ask students to share examples of each. (*Did anyone find an example of evidence that relied on inappropriate comparison groups? What examples of different ways of operationalizing* mental illness *did you find?)* Depending on class size and structure, you could have students place colored sticky notes next to important ideas on the board to provide a visual tally of the number of times *availability heuristic, logical errors, inappropriate comparison group,* etc. are found in their research.

Integration and application of the ideas

Use the remaining class time to discuss the wrap-up questions, perhaps with particular emphasis on the last question, since you may not have had time to fully explore the evidence. As noted elsewhere, these questions could be used in different ways, for example as class discussion questions or reflective writing prompts. If class time is especially short, these questions could be used for assessment (see more assessment ideas at the end of the unit):

- Based on critical analysis of the evidence, what are the students' conclusions about the myth? What would they tell friends or family members who believe the myth?
- Why does the myth persist? (Perhaps discuss students' own reactions to the evidence and the extent to which they found themselves (dis)believing the evidence and why).
- What are the policy implications of the evidence?
- What questions remain unanswered, and what additional research is needed?

If you have 2.5 – 3 days to spend on this myth:

If you have all or part of a third class session to devote to this unit, then you can plan to spend one day on each of the 3 steps in this unit.

Day 1: Thinking critically about the claim and generating a list of the kinds of evidence that would support or refute it. This day will be structured as described for a 1.5-to-2 day lesson, with explicit review of concepts such as *availability and representativeness heuristics, logical errors, stereotypes,* and *operationalizations of variables,* expanded time for students to grapple with the questions about the characteristics of strong evidence and red flags of questionable evidence. End this class with (a) a specific list of strong evidence and red flags and (b) students assigned to search out their own evidence for and against the myth.

Day 2: Discussion of evidence. This day will be structured similarly to the 1.5-to-2 day lesson plan. With a full day for this step, good options for expanding and deepening discussion include:

- Using a jigsaw approach for students to discuss and share evidence with each other before coming back as a larger class.
- Explicitly mapping the sources and types of evidence found against the lists created on the first day, with discussion of the relative strengths and weaknesses of the overall body of evidence. Are there particular areas (e.g., school shootings) where the evidence is stronger / weaker than other areas or prone to common problems (e.g., overreliance on anecdote, poor operationalizations of variables).
- Providing a brief mini-lecture summarizing the key points from Stuart, H. (2003). Violence and mental illness: An Overview. *World Psychiatry, 2*, 121 – 124.

At the end of this class, ask students to identify questions that remain unanswered or have been raised by the discussion, and ask them to conduct research before the next class to see if they can find any evidence that speaks to these questions. You might encourage students to seek not only popular sources (e.g., as might be found in a Google search) but also scholarly sources (e.g., via PsycInfo).

Day 3: Integration and application of ideas. Begin this final day similarly to the previous day, by inviting students to share, critique, and discuss the evidence they found in their second search.

Foster the integration and application of the ideas through discussion and/or reflection, prompted by questions such as these:

- Based on critical analysis of the evidence, what are the students' conclusions about the myth?

What would they tell friends or family members who believe the myth?
- Why does the myth persist? (Perhaps discuss students' own reactions to the evidence and the extent to which they found themselves (dis)believing the evidence and why).
- What are the policy implications of the evidence?
- What questions remain unanswered, and what additional research is needed?

Assessment ideas:

1. Ask students to write a letter to a friend or family member, compose a Facebook post or tweet about the myth. This could be done as a low-stakes in-class writing assignment or a higher stakes out-of-class assignment
2. Have students write a science op-ed about the issue of mental illness and violence (see, for example, http://www.actionteaching.org/award/action-writing)
3. Use an essay question on an exam such as, "We discussed the myth that the mentally ill are more prone to violence. What is one question about this issue that you still have that has not been answered by the research evidence you've seen? State this question (1 sentence) and then briefly describe (2-3 sentences) a research study that could begin to address this question."

Reference

Torrey, E. F., Bruce, R. D., Lamb, H. R., Jacobs, C., Jaffe, D. J., & Snook, J. (2016). *Raising Cain: The role of serious mental illness in family homicides.* Treatment Advocacy Center. Retrieved from: http://www.treatmentadvocacycenter.org/storage/documents/raising-cain.pdf