

Mental Health Care in Academia: A graduate student perspective



Andrea J. Welsh
University of Valencia
June 11, 2018

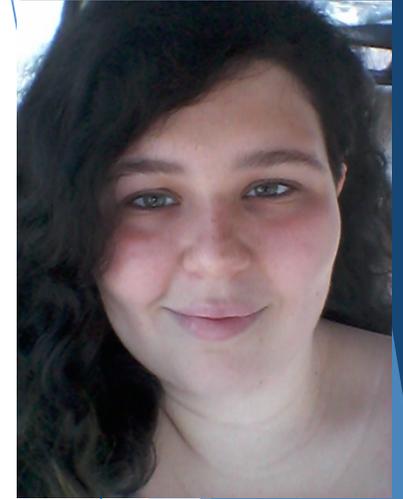
Andrea Welsh (awelsh8@gatech.edu) *Ph.D. candidate at Georgia Tech*

B.A. in Physics and Mathematics from Boston University

M.S. in Physics from Georgia Institute of Technology

Currently working on nonlinear dynamics/soft matter physics thesis

- ▶ Article “It’s Time for Physicists to talk about Mental Health” 5th most read article in Physics Today 2017
- ▶ Chaired the 2016 CUWIP at Georgia Tech
- ▶ APS Forum of Graduate Student Affairs Member-at Large
- ▶ Postdoctoral husband in Physics at GT, two cats
- ▶ Hobbies include: video games, reading, cosplaying, drawing
 - ▶ Made her own wedding dress for her wedding this fall!
- ▶ Has depression, anxiety, PTSD, insomnia (on and off), eating disorders (on and off), possibly ADHD



What are we talking about when we say “Mental Health”?

- ▶ Emotional, psychological, and social well-being
- ▶ Ability to cope with stress
- ▶ Ability to be productive
- ▶ Ability to make a meaningful contribution to one’s community
- ▶ Ability to meet one’s potential

What does poor mental health look like?

- ▶ Eating or sleeping too much or too little
- ▶ Pulling away from people and usual activities
- ▶ Having low or no energy
- ▶ Feeling numb or like nothing matters
- ▶ Having unexplained aches and pains
- ▶ Feeling helpless or hopeless
- ▶ Experiencing severe mood swings that cause problems in relationships
- ▶ Thinking of harming yourself or others
- ▶ Inability to perform daily tasks

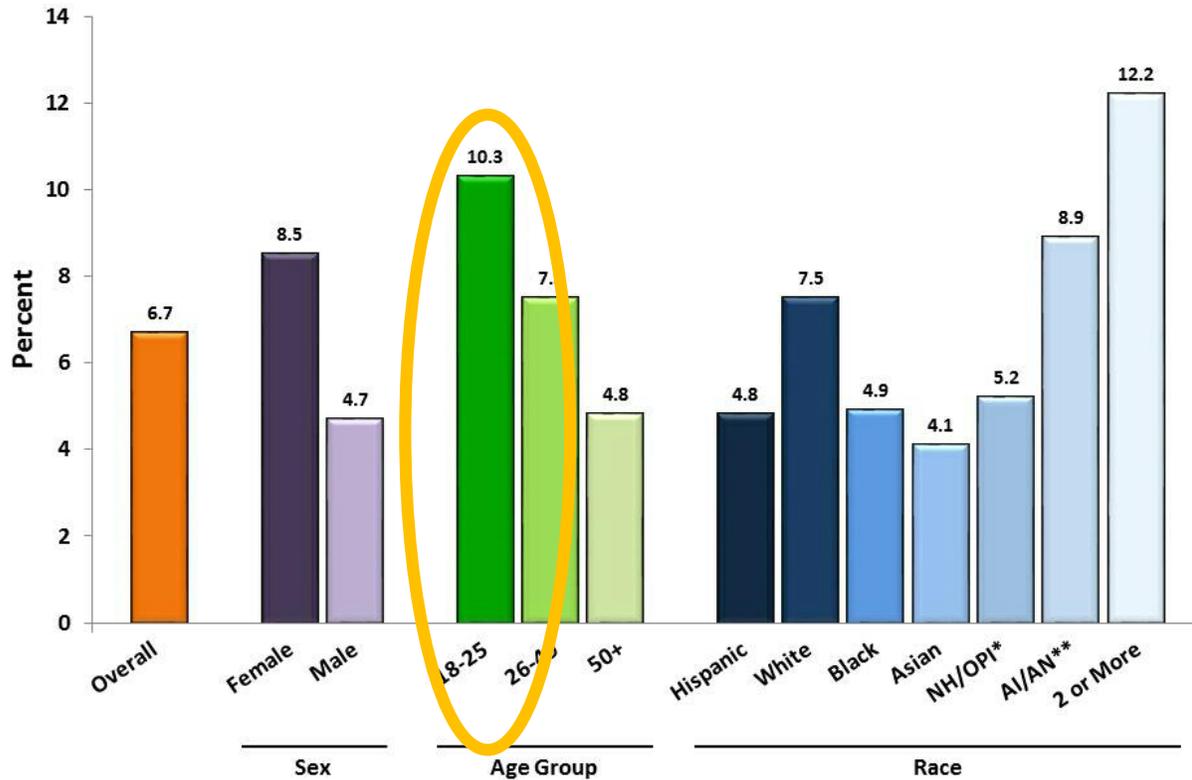
You may have heard words like:

Depression Anxiety Bipolar Disorder
PTSD Borderline Personality Disorder OCD
Insomnia Dissociative Identity Disorder
Mania Seasonal Affective Disorder Autism
Schizophrenia Psychosis Eating Disorders
Panic Disorder Suicide Phobia

But, you don't need to be diagnosed with an illness to have poor mental health and take an active role to have good mental health!

How bad is it?- National Alliance on Mental Illness

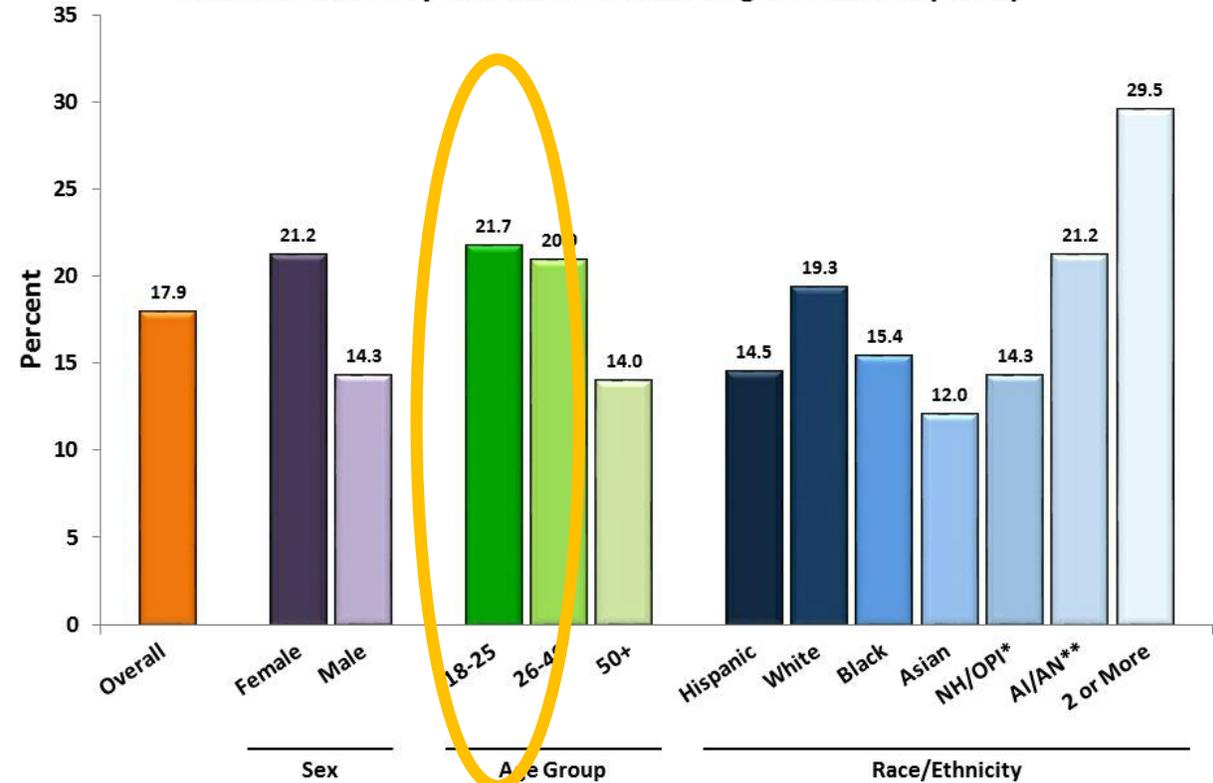
12-month Prevalence of Major Depressive Episode Among U.S. Adults (2015)



Data courtesy of SAMHSA

*NH/OPI = Native Hawaiian/Other Pacific Islander
 **AI/AN = American Indian/Alaska Native

Prevalence of Any Mental Illness Among U.S. Adults (2015)



Data courtesy of SAMHSA

*NH/OPI = Native Hawaiian/Other Pacific Islander
 **AI/AN = American Indian/Alaska Native

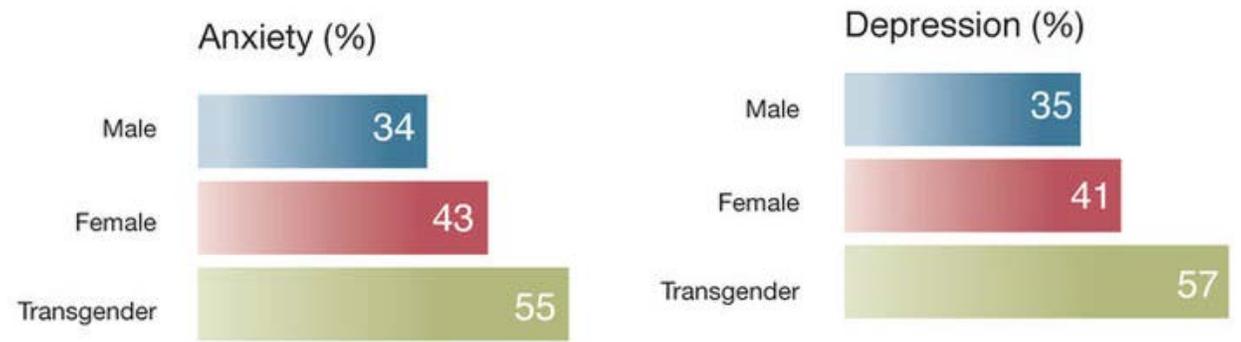
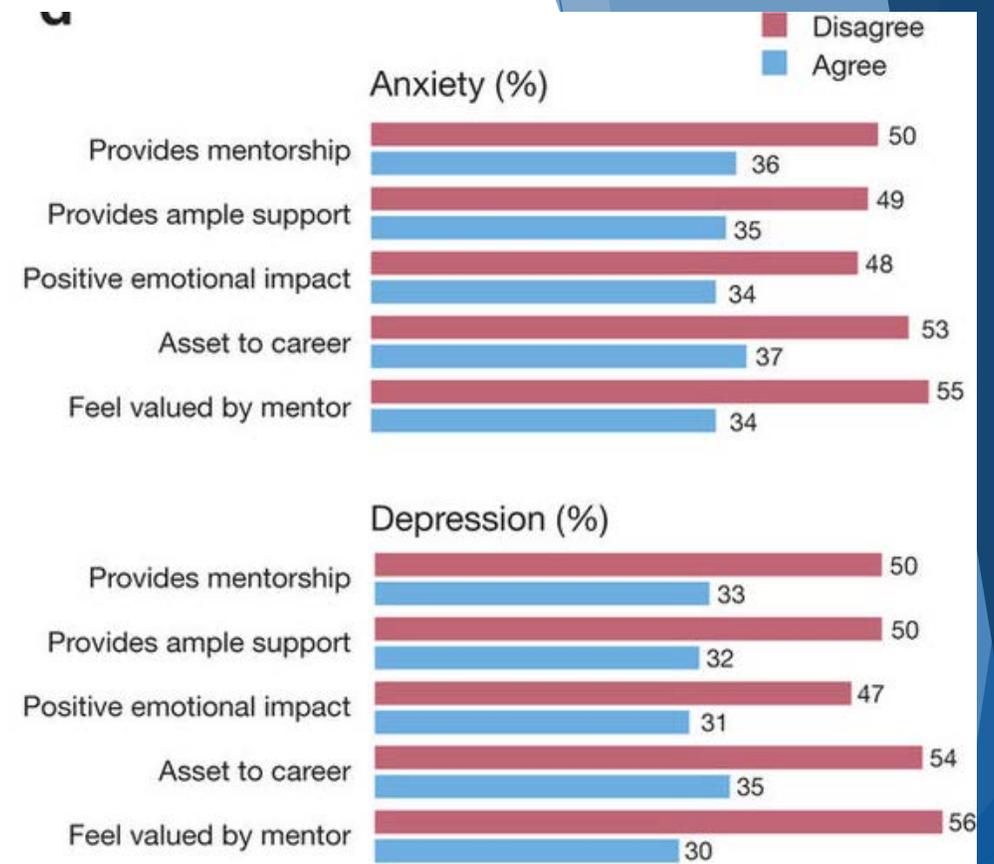
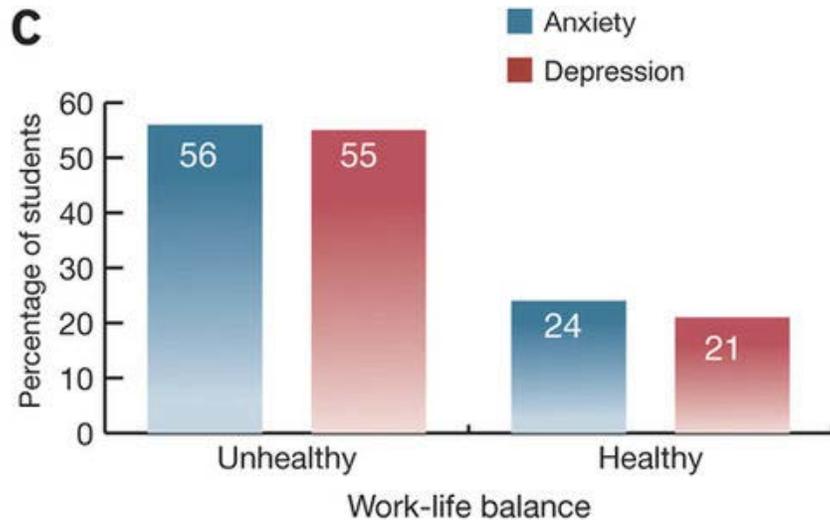
Prevalence in graduate school

Symptom	Prevalence (%)
Felt under constant strain	41
Unhappy and depressed	30
Lost sleep over worry	28
Lost confidence in self	24
Felt worthless	16
Could not make decisions	15
Reported at least two symptoms	51
Reported at least four symptoms	32

Data from 3700 Ph.D. students surveyed in Belgium
K. Levecque et al., *Research Policy* 46, 868, 2017

Another study....

- ▶ 41% of grad students scored as having moderate to severe anxiety compared to 6% of general population
- ▶ 39% of grad students scored as having moderate to severe depression as compared to 6% general population



Data from 2279 grad students surveyed from 26 countries, 234 institutions
 Evans et al *Nature Biotechnology* 36, 282-284, 2018

Why is it so high in academia?

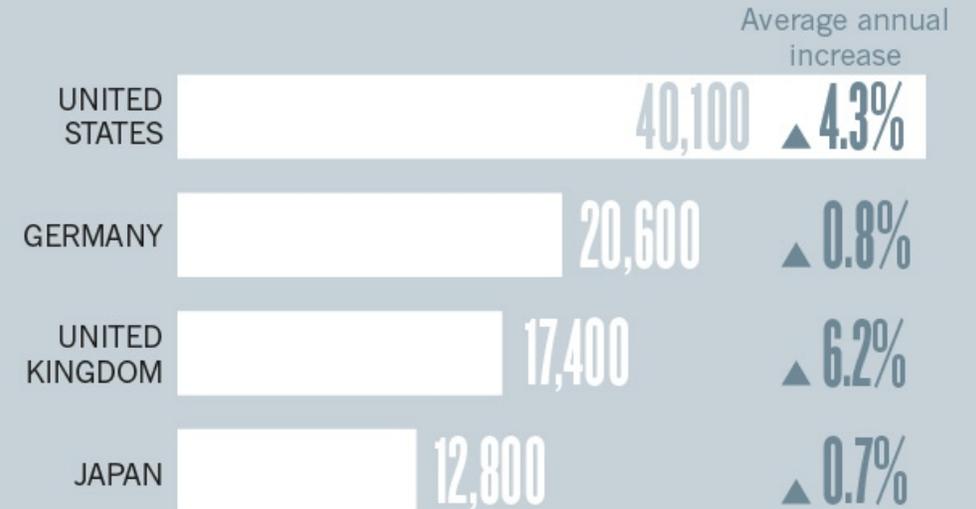
- ▶ **Poor work-life balance:**
 - ▶ Long work hours - 60-80 hours/week
 - ▶ Little time for social activities
 - ▶ Family management & 2 body problem
- ▶ **Work related to funding**
 - ▶ "Publish or Perish"
 - ▶ Writing grants → less science
 - ▶ # people increase, awards available the same
- ▶ **Principal Investigation/student relationship**
 - ▶ No "real" mentorship
 - ▶ Students don't feel valued
 - ▶ Lack of clear expectations—"What is success?"
- ▶ **Lack of career development**
 - ▶ Jobs outside of academia?
 - ▶ Interview prep?

Never knowing if you're doing enough, fast enough. It's so individual that you can't compare your work progress to others (at least you shouldn't).



PHDS RISING, JOBS FLAT

The number of graduates with advanced science and engineering degrees has been rising around the world. The Organisation for Economic Co-operation and Development (OECD) has recorded an increase in the number of science-related doctorates that would typically funnel into academic positions. The leading OECD nations in 2014 were:



1.6%

The proportion of young people completing a doctorate of any kind in OECD member countries has doubled from **0.8%** less than two decades ago.

3,000

In most countries, however, the growth in academic jobs has not kept pace. US universities, for example, create only about **3,000** new full-time positions annually.

An unsupportive faculty advisor (an extreme by not singular case)

*"...I need to keep track of your progress. You are to be in your office from 9am to 8pm, unless you have lectures or teaching... **irrespective of your health, mood or state.** Your past does not concern our work. **I would like you to discontinue the therapy/psychiatry treatment you are undergoing. You must condition yourself to believe that work is the best therapy...**"*

(email from advisor to student, posted with permission)

Work, work, work, work, work....

" We have received some questions about how many hours a graduate student is expected to work. There is no easy answer, as what matters is your productivity, particularly in the form of good scientific papers. However, if you informally canvass the faculty (those people for whose jobs you came here to train), most will tell you that they worked 80-100 hours/week in graduate school. No one told us to work those hours, but we enjoyed what we were doing enough to want to do so. We were almost always at the office, including at night and on weekends."

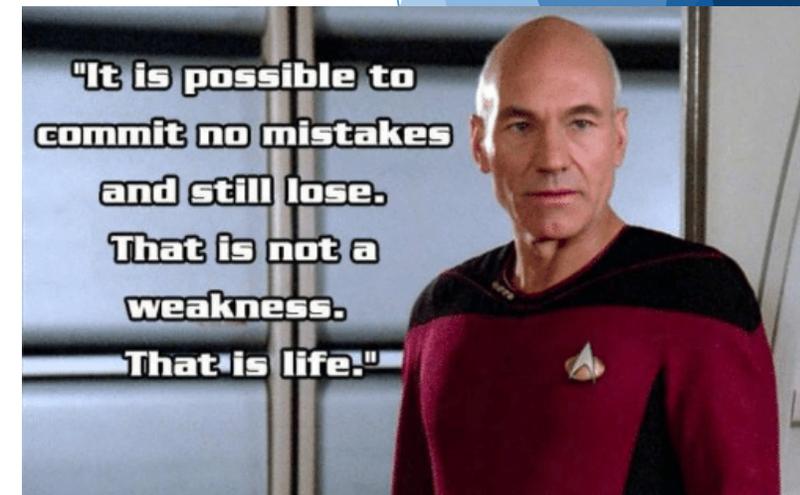
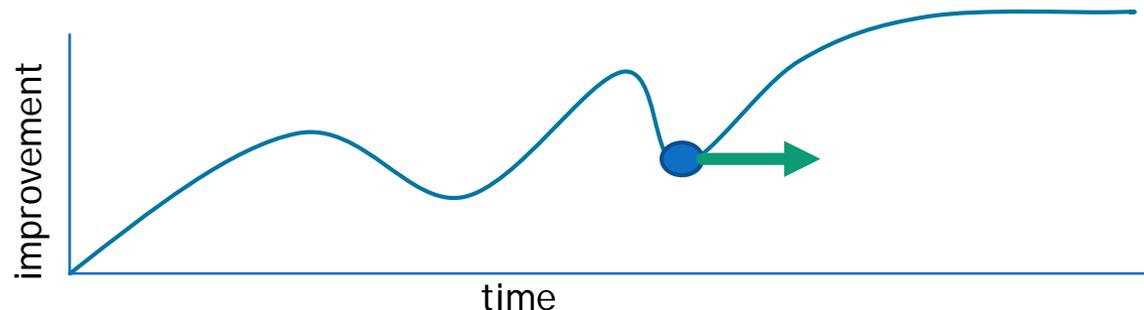
<http://scienceblogs.com/startswithabang/2012/10/10/hey-physics-astronomy-professors-this-is-not-okay/>

What can we do to help students?

- ▶ Talk about it:
 - ▶ Grad advisor drew first years to the counseling center during their orientation
- ▶ Make resources, especially those on campus, easily available students
- ▶ Have departments hold workshops through campus Counseling Centers
- ▶ Train faculty, perhaps similar to a “Safe Space Training”
- ▶ Address it in syllabi as an instructor or TA
- ▶ Address it in FAQ for conferences, especially conferences aimed at younger students
- ▶ For research advisors:
 - ▶ Make goals clear

Mental Health doesn't have an easy fix

- ▶ It affects many areas: energy, sleep, concentration, mood
- ▶ Sometimes exercise helps, sometimes you can't even get up
- ▶ Some counselors may not be as good a fit
- ▶ Sometimes medications work, sometimes not
- ▶ Sometimes failure still happens even if you are taking care of everything!
 - ▶ Know your limits, but don't limit yourself (pass fail, withdrawal, medical leave, lighter class load, Masters program first then PhD,)
 - ▶ Fluctuations in your health are natural
- ▶ It is different for everyone



What Kind of Resources are Available?

- ▶ Therapy (on or off campus)
 - ▶ Individual
 - ▶ Group
 - ▶ Couples
 - ▶ Teletherapy
 - ▶ Workshops (Managing Stress, Perfectionism, etc)
- ▶ Medication (Prescribed from a Psychiatrist)
- ▶ Apps
 - ▶ Medication Tracking
 - ▶ Mood Tracking (AnxietyCoach, Happify, MoodTools, etc)
 - ▶ Sleep Tracking (Google Fit, Sleep as Android, Sleep Better with Runtastic)
 - ▶ Exercise/Meal Tracking
- ▶ Online Communities
 - ▶ Reveal to Heal: A Mental Health Series for Women of Color in STEM
 - ▶ The Mighty
 - ▶ Chronically Academic
 - ▶ Other social media services
- ▶ Emotional Support Animals

What did you wish you knew as an undergrad about Mental Health?

 **Dr Jessica Boland**
@DrJessBoland Following

Replying to @theoreticalwzrd

I wished people told you that not going into academia or not carrying on with physics is not failing. Success is what you make it and can only be measured by you and your personal happiness.

5:20 AM - 2 Jan 2018

 **Listen up fives, a ten is speaking**
@PutJackOnJill Follow

Replying to @theoreticalwzrd

I wished I had recognized earlier that it's okay to ask for help, and it's not wrong to utilize mental health care. I also wish I took more advantage of my parents health care

1:35 AM - 2 Jan 2018

 **Andrea Tellez**
@Andreaaats Following

Replying to @theoreticalwzrd

I wished I had know that mental and emotional health should always come first than your career.

2:19 AM - 2 Jan 2018

Remember...



Some Resources

- ▶ National Suicide Prevention Lifeline: 1 800 273 8255
- ▶ The Trevor Project: Suicide prevention for LGBTQIA+ Youth
<http://thetrevorproject.org/>
- ▶ National Alliance on Mental Illness <https://www.nami.org>
- ▶ Ulifeline: online resource for college mental health <http://www.ulifeline.org/>
- ▶ Campus counseling centers: often free, but in high demand, check available options)
- ▶ Local off campus centers: often cost \$, some have sliding rates+
- ▶ The Mighty - <https://themighty.com/>
- ▶ Anxiety and Depression Association of America - <https://adaa.org/finding-help/mobile-apps>
- ▶ Chronically Academic - <https://chronicallyacademic.org/>
- ▶ If You're Reading This - <http://www.ifyourereadingthis.org/> (recommended by Dr. Ruzek)

Some articles about mental health in academia

- ▶ “Hey, Physics & Astronomy Professors? THIS IS NOT OKAY!”
<http://scienceblogs.com/startswithabang/2012/10/10/hey-physics-astronomy-professors-this-is-not-okay/>
- ▶ “Young Scientists under pressure: what the data shows”
<https://www.nature.com/news/young-scientists-under-pressure-what-the-data-show-1.20871>
- ▶ “Young, talented, and fed up” <https://www.nature.com/news/young-talented-and-fed-up-scientists-tell-their-stories-1.20872>
- ▶ Reveal to Heal: A Mental Health Series for Women of Color in STEM
<http://vanguardstem.com/reveal-to-heal-curation-part-1/>
- ▶ “It’s Time for Physicists to talk about Mental Health” by Andrea Welsh
<http://physicstoday.scitation.org/doi/10.1063/PT.6.3.20170531a/full/>
- ▶ “Commentary: Surviving scientist Burnout” by Luigi Delle Site -
<https://physicstoday.scitation.org/doi/full/10.1063/PT.3.3675>
- ▶ “Evidence for a mental health crisis in Graduate Education” Evans et. al
<https://www.nature.com/articles/nbt.4089>
- ▶ “My Invisible Battle” Physics World, March 2018 <https://physicsworld.com/a/my-invisible-battle/>