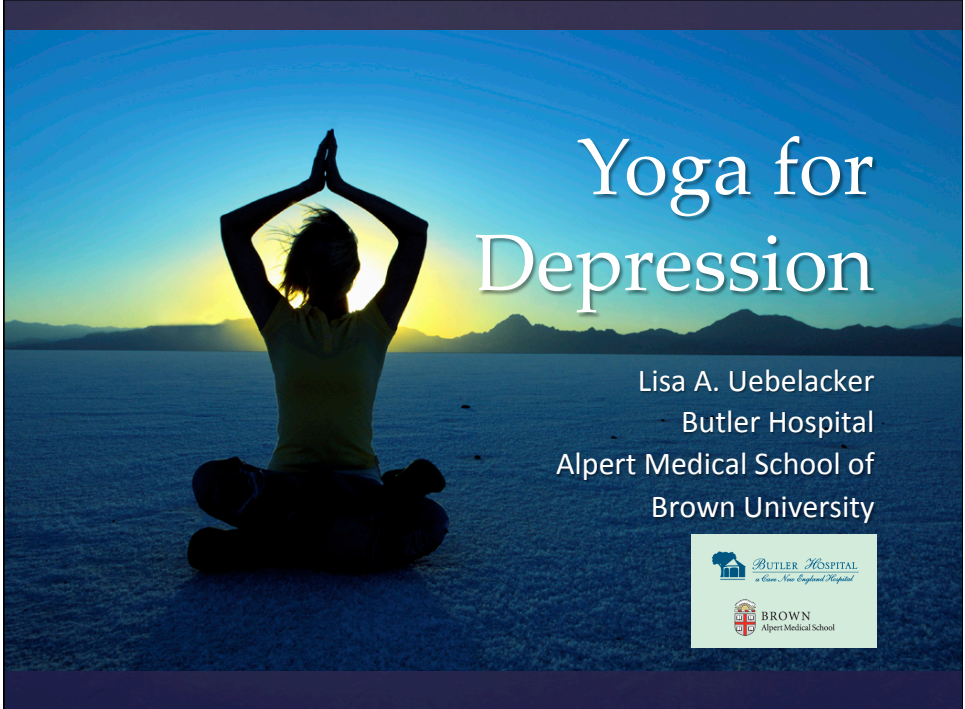




Yoga for Depression

Lisa A. Uebelacker
Butler Hospital
Alpert Medical School of
Brown University



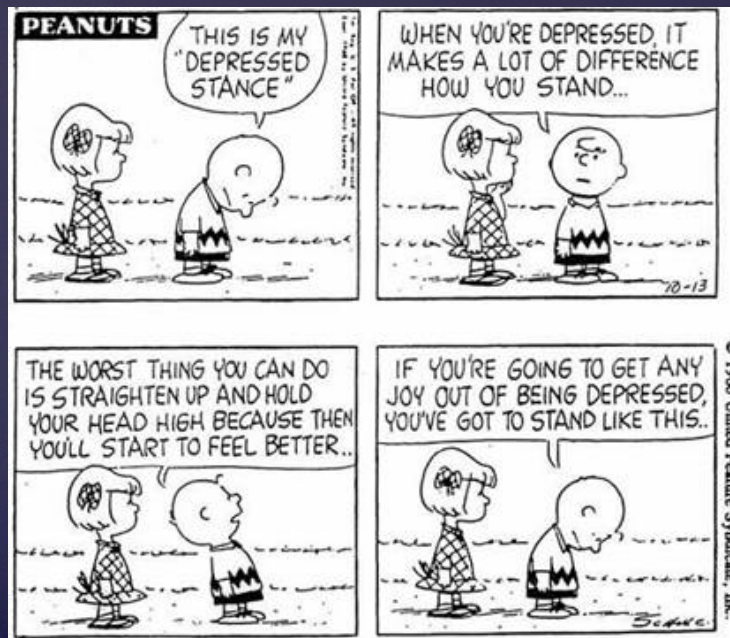
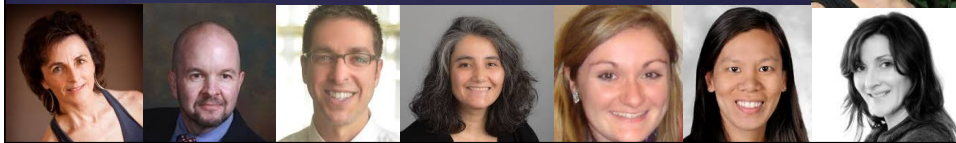
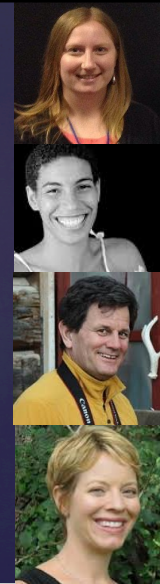
Holistic Approaches to Depression

Funding:
R01 NR012005
(PI: Uebelacker)

clinicaltrials.gov
identifier:
NCT01384916

Collaborators

- Ana Abrantes
- Cynthia Battle
- Leslie Brick
- Monica Broughton
- Debbie Bourque
- Mimi Budnick
- Liz Butler
- Julie Cloutier
- Gary Epstein-Lubow
- Sarah Garnaat
- Brandon Gaudiano
- Tom Gillette
- Patricia Hottel
- Morganne Kraines
- Richard Liu
- Joanne Matthew
- Gretchen Mayhew
- Ivan Miller
- Nicole Nugent
- Julie Shore
- Jennifer Spaziano
- David Strong
- Tanya Tran
- Geoff Tremont
- Audrey Tyrka
- All participants
- And more...



Rationale

- Many claims that yoga is useful for depression
- Plausible mechanisms by which yoga may have an impact on depression
 - Psychological
 - Physiological
- Existing studies of varying to poor quality
- Expectation that yoga may be used as an adjunctive intervention
- Substantive group of people who do not fully respond to traditional depression treatment

Inclusion criteria

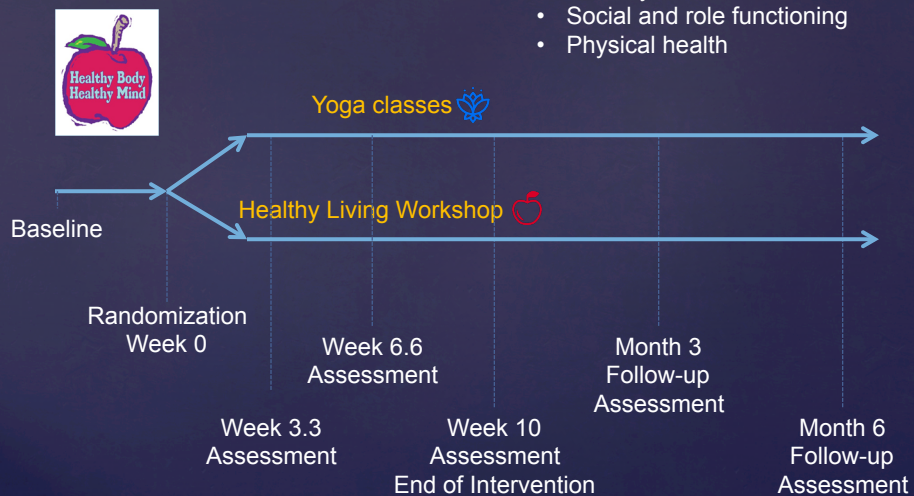


- Elevated depressive symptoms
- Met criteria for MDD in past 2 years
- Taking an antidepressant medication for ≥ 8 wks
- Yoga-naïve
- No current hazardous substance use
- Medically cleared for moderate physical activity
- Fluent in English

Participants

- 81% female
- Mean age = 47
- 84% White; 12% Other/ multiracial; 3% Black/ Afr. Am.
- 5% Latino
- 33% Income < \$25,000/ year
- 42% employed, 22% unemployed, 20% disability, 11% homemaker/ parent/ retired, 5% student
- 65% chronic depression

RCT Design



Yoga class outline

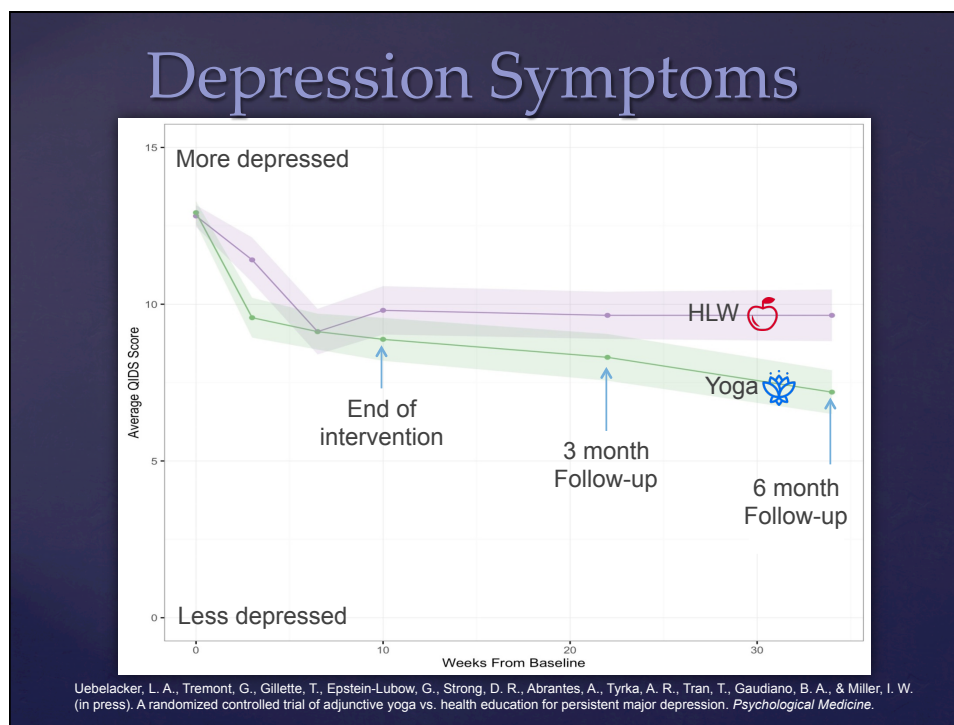
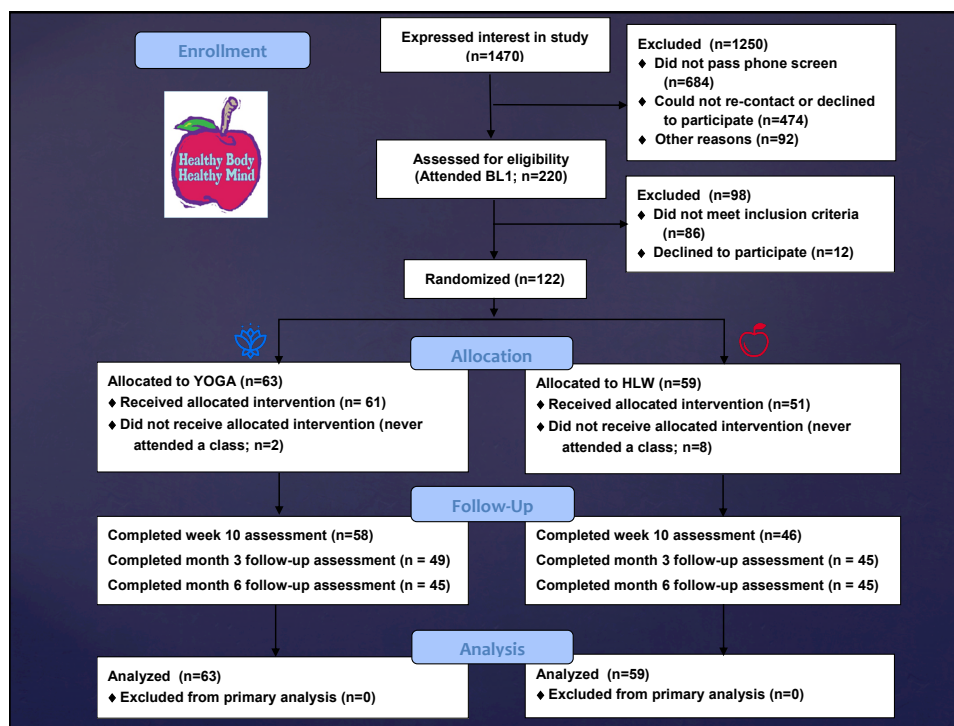


- Greeting
- Pranayama and seated meditation
- Warm-ups and half sun salutation
- Standing postures
- Seated postures
- Inversion and knee-down twist
- Guided shavasana
- Wrap-up and homework discussion

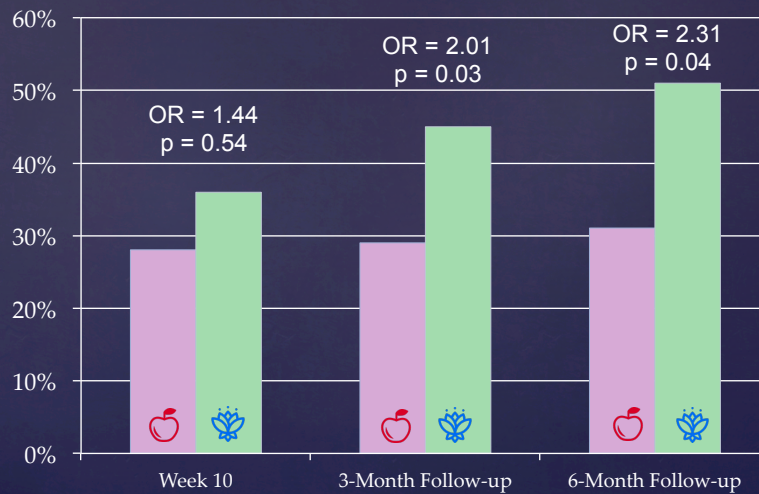
Healthy Living Workshop



- Alcohol, nicotine, & caffeine
- Being a smart patient
- Brain diseases: stroke and Alzheimer's disease
- CAM approaches to depression
- Cancer prevention
- Depression and diabetes
- Food: what not to eat
- Food: what to eat
- Germs colds and the flu
- Get moving: aerobic exercise
- Get moving: strength and flexibility
- Getting a good night's sleep
- Government and health
- Junk food
- Physical pain
- Prevalence and causes of depression
- Protecting your heart
- Silent problems
- Spirituality and religion
- Your brain on drugs



Response Rate

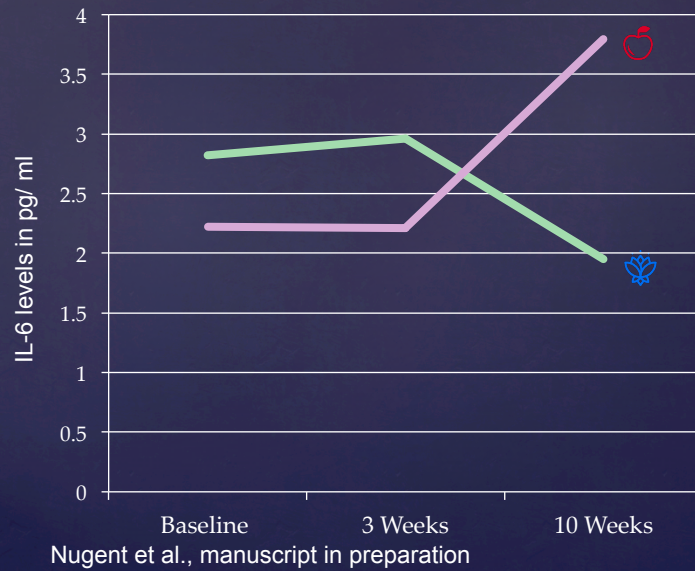


Markers of inflammation

- IL-6
- TNF-alpha
- C-reactive protein
- Measured at BL, 3 weeks, 10 weeks
- Subset of total sample



IL-6: marker of inflammation



Qualitative Data

- What did you like about the study program? Please tell us specific things that you liked.
- What did you NOT like about the program? How could it be improved? Again, please tell us specific details.
- What is the most important thing that you learned?



Uebelacker et al., in press, Complementary
Therapies in Medicine

Instructors

"The teachers were all wonderful."

"I liked the tone set by the instructors – the attitude of not judging or comparing yourself to others."

"I liked the way the instructors helped me to change a pose to a way I would be getting the same effect and it was comfortable to me."

"The teachers were all great! They were gentle, non-judgmental, helpful, loving, caring."



Key elements of classes

"I loved feeling relaxed at the end."

"I liked the physical-ness of the class, the stretching."

"I liked when the yoga instructors tied the poses and the breathing to a concept like thinking about control, or judgment, or courage."

"I loved how the instructors had us stop and reflect on how we were feeling at certain points in the classes."

Effects of yoga

The most important thing I learned was when I feel overwhelmed or anxious or fidgety that I can take a minute and just focus on my breathing -- can help relax me and make me feel more focused and less overwhelmed."

(What is the most important thing you learned?) *"Concentration to get more in tune with the moment"*

"The yoga taught me to relax."

(What is the most important thing you learned?) *"My body is not my enemy, and that physical strength and emotional strength are connected".*

Yoga outside of class

"I've learned to use the yoga in many situations and throughout the day"

[I learned] *"that I can do yoga anywhere."*

"Yoga and the breathing can help calm me and refocus me during stressful times"

"The breathing [is]...something I can do at work whenever I feel stressed."

I *"realized I'd have to dedicate time every day for a longer-term benefit I think -- and I'm too depressed at the moment to feel motivated."*

Concerns or drawbacks

- Difficulties with participation because of physical limitations
- Wanting more individualized instruction
- Not liking the class time
- Wanting an opportunity to participate more, and particularly to attend make up classes
- Wishing that the written take-home materials that we had provided had illustrations

Summary

- People taking an antidepressant medication, with persistent depression
- Yoga vs. health education (HLW)
- At week 10, yoga NOT > HLW for depression
- Over entire study including 6 months follow-up, yoga > HLW
 - Depression
 - Social functioning
 - Life activities
 - General health perceptions
- Over 10 weeks, yoga > HLW for IL-6
- Instructors very important
- Participants learned mindfulness
- Participants used breathing exercises in every day life



Thank you!



luebelacker@butler.org



Icons made by [Freepik](https://www.freepik.com) from www.flaticon.com