

These are a few of my least favorite things (part three)



Intelligent Medicine means combining the best of high-tech medicine and the best of natural therapies to promote health and cure disease. But that doesn't mean I uncritically endorse the worst examples of excesses from both realms; I'm an equal-opportunity critic of Bad Science and Bad Medicine. In **part one** and **part two** of this series, I listed some of my picks for recent offenders. Here are a few more that I denounce:

Prevagen: This purported memory-enhancing supplement is aimed at the ripe market of seniors worried about cognitive decline. Commercials are even cleverly placed on *Jeopardy*, a favorite show of older adults who like to practice their recall.

Twenty years ago, I was approached by the Quincy Biosciences representatives who market Prevagen. They wanted me to endorse it on my radio show and promised a lucrative sponsorship. I found their studies weak and doubted whether their ingredient, apoaequorin, had a plausible mode of action in the brain. So I declined. A recent *Forbes* review sums it up:

"The product website only lists one clinical study to support its efficacy, which is

sponsored by Quincy Bioscience, the manufacturer of Prevagen. This study claims to use quantitative measures of memory and cognitive function to assess adult participants over 40 years old, and it states that the active ingredient apoaequorin is intended to support brain cells. Results reveal no significant cognitive health changes overall in participants who took Prevagen, with minor results in those who joined the study with either minimal or no cognitive impairment."

Quincy has received blowback in a civil suit from the FTC and New York State challenging its memory claims for Prevagen, but that hasn't hindered them from continuing a multi-million dollar media blitz to promote it.

There are many plausible supplements to support brain health, but Prevagen's not one of them.

TikTok: There's been a lot of angst lately about the pernicious impact this social media giant has on our kids. A recent survey of mostly female eating disorder patients found that TikTok use reinforced aberrant food consumption behaviors:

"For 59.0%, using TikTok reduced self-esteem, while 26.9% reported TikTok-related significant changes in their daily lives, and 3.8% reported experiences of body-shaming. Patients describing a negative effect of TikTok on their self-esteem more frequently searched and browsed 'diet'."

A *Wall Street Journal* investigation revealed that TikTok creates algorithms that bombard diet-focused adolescents with posts that exalt emaciated body appearance. TikTok features 300-calorie eating plans and the "corpse-bride diet".

Covid has caused screen time to skyrocket among distressed and isolated teens; many are spending hours obsessively scrolling through videos that exhort them to "burn belly fat" and "lose 20 pounds by Christmas" while displaying images of gaunt influencers whose hip bones protrude.

A recent "social contagion" of psychosomatic Tourette's-like ticking among girls obsessed with social media reveals the harmful influence of sites like TikTok—other platforms are culpable, but TikTok is a particular favorite of kids.

Studies demonstrate that young people who spend inordinate amounts of time online are increasingly likely to be depressed, anxious and even suicidal. They're also more prone to be sedentary and overweight. The frenetic pace of social media scrolling is certainly not helping with impulse-control and attention span. And easy access to extreme pornography is creating unrealizable expectations about sex among adolescents.

The genie is already out of the bottle on these novel technologies. It's time we rein them in for the sake of future generations.

Online dispensers of psych meds: Another of the legacies of Covid lockdowns has been the proliferation of websites offering remote prescribing of psychiatric drugs. They range from ADHD medications to antidepressants and anti-anxiety drugs. Testosterone replacement and ED meds are also readily available from some soup-to-nuts men's health sites.

Staffed by MDs and physician-extenders like nurses and physician assistants, they offer snap-diagnosis and immediate hassle-free dispensing of prescriptions. One of my patients, for example, prior to seeing me, was prescribed an anti-depressant via an online site. When it didn't work, she was given a different med by another practitioner. (Her previous "doctor" had quit the platform.) When my patient didn't

improve, a third practitioner informed her that they didn't prescribe medication for patients with obsessive-compulsive disorder, which they now concluded, with scant evidence, that she had, and she was bluntly advised to seek help "elsewhere", without a referral, which is customary when discontinuing care for a challenging case.

A recent *Bloomberg* article documents the downward mental health trajectory of a patient who consulted the online dispensary Cerebral for attention deficit disorder. After multiple drugs were prescribed, Cerebral's client developed auditory hallucinations and required inpatient hospitalization.

Ex-employees of Cerebral say they were pressured to "increase volume" by readily prescribing ADHD meds, in many cases inappropriately, uncritically acceding to customer wishes. Not surprising, in view of the business model of these online dispensers, who, imitating the success of algorithm-enabled startups delivering prescription eye glasses, hearing aids, and even custom dentures, seek to disrupt and commodify the traditional doctor-patient relationship. Venture capital funding is fueling the proliferation of these profitable telehealth enterprises—with greater emphasis on return-on-investment than on quality care.

More's the pity, because the very pandemic that has fueled a mental health crisis has spawned a plethora of online purveyors of powerful, casually-prescribed psych meds.

Leg lengthening surgeries: Rarely, children are born with length disparities of the arms or legs that threaten mobility and functionality. Orthopedists have pioneered techniques that have enabled them to stretch bones to overcome these developmental abnormalities.

Enter the brave new world of leg-lengthening surgery—merely to increase height in individuals who elect to overcome their perceived shortness. While admittedly, short stature can be a professional and social impediment, undertaking an expensive and potentially hazardous procedure for merely cosmetic purposes is pretty drastic. It's part of an ever-escalating trend of sculpting our bodies to attain an ideal appearance.

NBC News recently reported on the trend:

"The \$75,000, four-hour operation, which is not generally covered by insurance, involves cutting the thigh bones in each leg and inserting rods inside them. Then over the next three to four months, the rods are lengthened by up to 1 millimeter (0.04 inches) per day, via an external remote control. New bone grows over the rods."

Clients can expect to gain around three inches of stature. But complications abound: Limb lengthening puts patients at risk of nerve damage, muscle damage, joint contracture, dislocations, leg length disparity, gait problems, and arthritis. There is also the possibility of non-union of bone, which can be catastrophic.

It's a big operation where the bones are cut and prosthetic nails are inserted. The process takes around one year, during which the patient is trained to apply little stretches of a few millimeters at a time by means of a handheld external remote control, at intervals specified by the surgeon. The first phase requires that the patient be immobilized in a wheelchair. Physical therapy is necessary throughout, to facilitate adjustment of muscles and nerves, and to forestall gait abnormalities. I imagine it's hard to adjust to having your thigh bones suddenly grow by 3 inches

five times faster than during a normal adolescent growth spurt!

Practices like the **International Center for Limb Lengthening** are proliferating. They display before-after photos of satisfied customers who increased their height from 5'7" to 5'10", for example. I hope it's all worth it.

But why not simply follow the example of champions who overcame their stature liabilities to attain extraordinary heights?

- Napoleon, conquered Europe: 5'2"
- Actors Dustin Hoffman, Al Pacino and Tom Cruise: 5'5", 5'6", and 5'7"
- Boxer Manny Pacquiao, winner of 12 major world titles: 5'5"
- NBA basketball player Muggsy Boggs with 6,858 points: 5'3"
- MLB baseball player Jose Altuve with 2047 hits: 5'6"
- Green Beret Richard J. Flaherty, recipient of 2 Bronze Stars, 2 Silver Stars and 2 Purple Hearts: 4'9"

What are some of *your* suggestions for "least favorite things" that I might tackle in a future newsletter article? Share them with us via questions@drhoffman.net.