



Teaching Millennials and Generation Z Clinical Medicine

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VALUES | EDUCATION | SERVICE

Disclosure

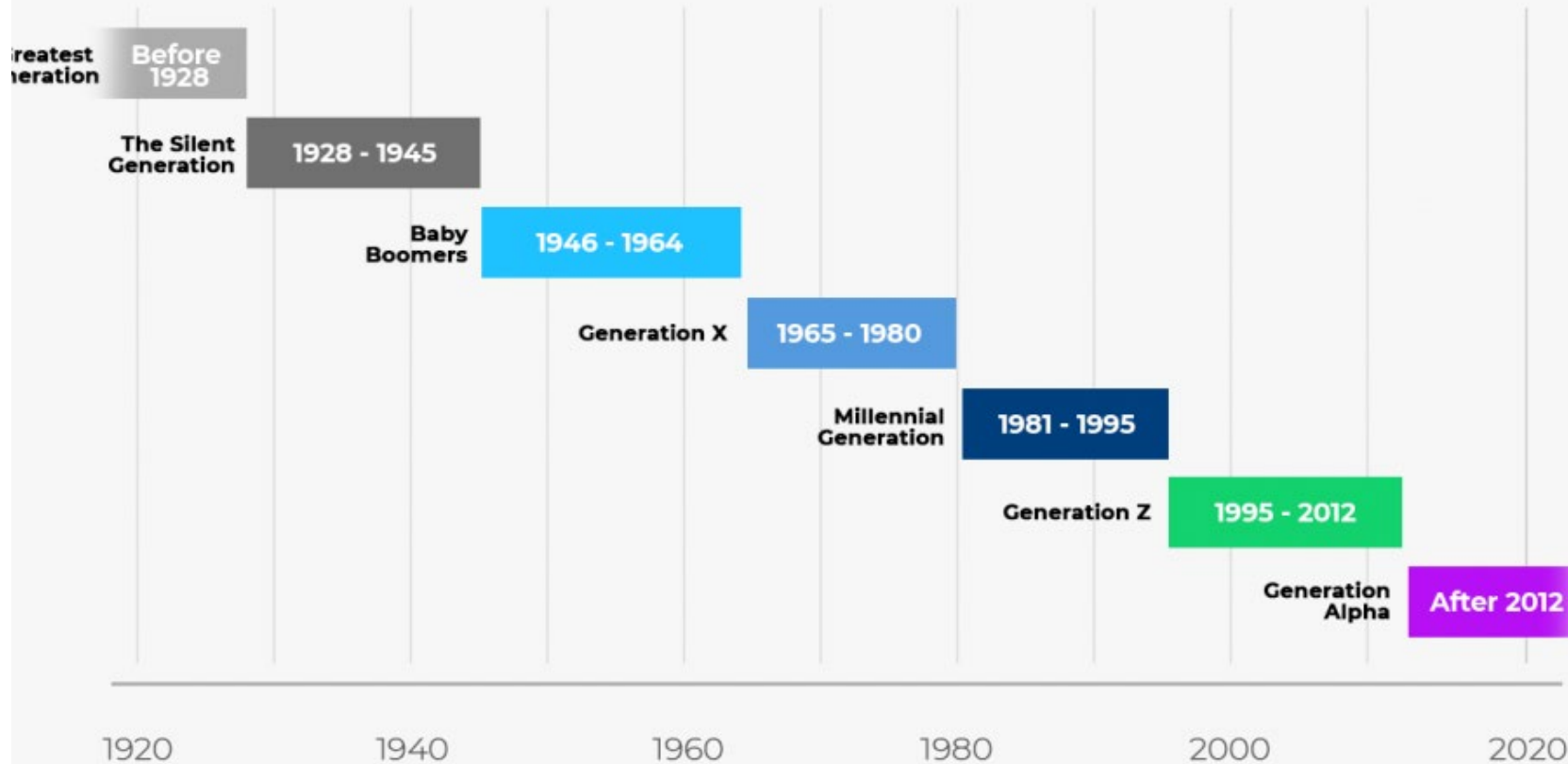
- I have no actual or potential conflict of interest in relation to this program/presentation.

Objectives

- Compare and contrast the 5 generations currently engaged in medical education.
- Describe traits unique to Millennial generation and “Gen Z”.
- Introduce several generation-specific challenges to medical education.
- Apply best practices for providing effective feedback for Millennial and Gen Z medical students.



The Generations Roughly Defined

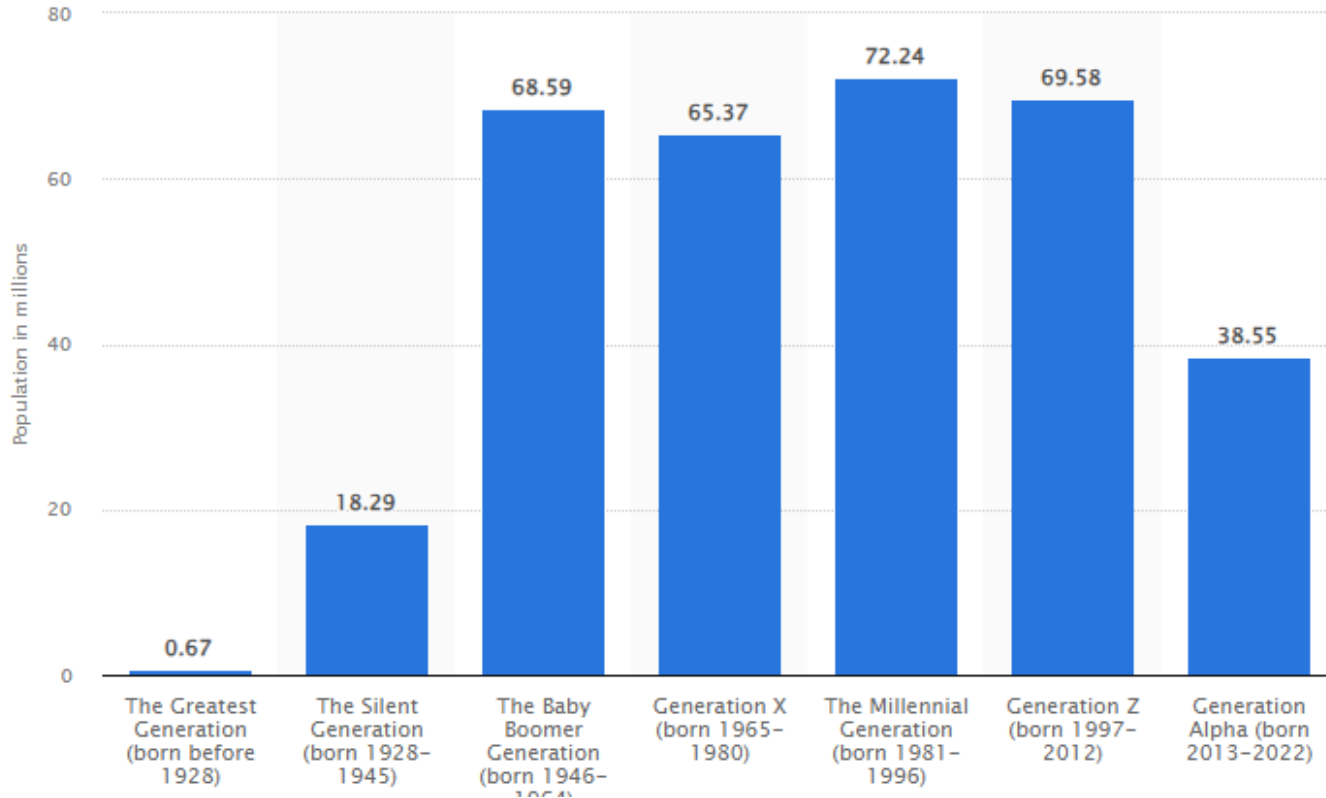


Sources: Pew Research Foundation and other sources. Note that the date range for these cohorts are defined differently by different researchers.

Five American Generations in Medicine

- 1. Traditionalists/the Silent Generation (1925 - 1946)**
- 2. Baby-Boom Generation (1946 - 1964)**
- 3. Generation X (1965 - 1981)**
- 4. Millennials* (1981 - 1996)**
- 5. Gen Z* (>1997)– potentially fourth year medical students this year...**
- (6. Gen Alpha (>2012) – will be here soon!)**

Resident population in the United States in 2022, by generation (*in millions*)



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I mostly identify as a:

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The Millennials

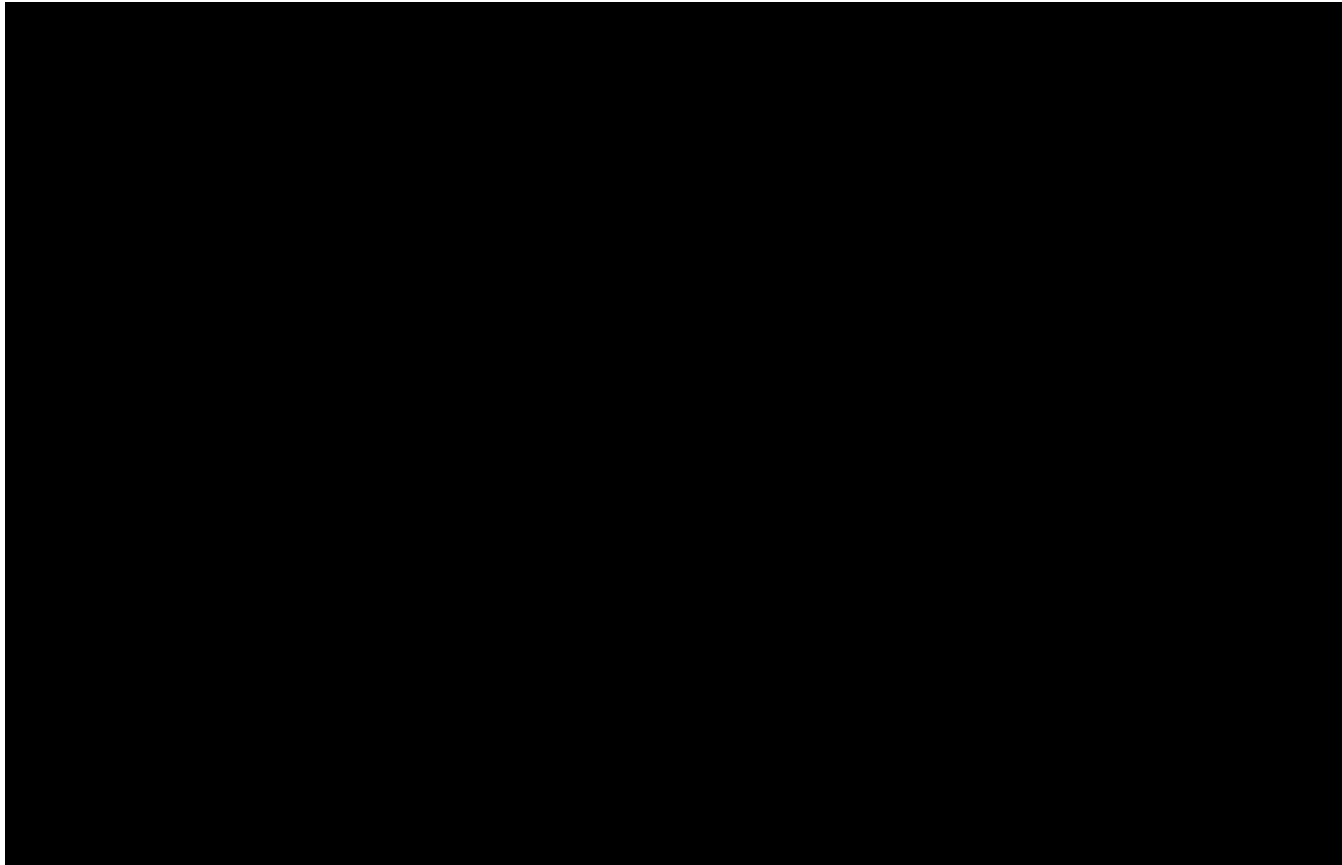
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**I would describe
Millennials as...**

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So, who are the Millennials?



Millennials

- **Defining influences:**
 - Global terrorism, rapid technological change, economic downturn, climate change, Middle East wars, pandemic
- **Upbringings:**
 - Parents (Boomers) were often protective/available (“helicopter parents”)
 - Internet/electronic media present since young age; “near **digital natives**”; hyperconnectivity

Millennial Self-Reported Characteristics

- Confident
- Digitally competent
- Flexible
- Optimistic
- Perfectionistic
- Broke
- Value integrity, social responsibility
- Desire direction (mentoring, coaching) and *immediate* feedback
- Seek *immediate* gratification
- Impatient
- “Older generations can learn from us”
- Liberal

Millennial Self-Reported Characteristics

- **Values:**

- tolerance, cooperation, novelty
- family (no difference between work and personal life; continuum – “play at work, work at play”; every day is “casual Friday”)
- gender-equality
- community, connectedness, team oriented/collaborative
- achievement > power
- prefer social/group learning
- e-learning solo is least preferred

Millennial learning style

- Approach questions differently but excel at finding consensus-based information (find, filter, & focus)
- Still read - but do so differently than earlier generations; scan, not for memorization
- Explorative, experiential, social learners who learn by discovery as opposed to by being told
- “Edutainment” – online modules, podcasts, Youtube videos, available on mobile device

Generation Z

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**My personal or
professional
understanding of "Gen Z"
is...**

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Generation Z

Defining influences:

- Smart phones
- Social media/networking
- Hyperconnectivity/FOMO
- War/terrorism
- Gun violence
- Persisting racism
- Climate change
- Gender equality
- LGBTQIA rights
- Corporate social responsibility
- Election of Obama, 2007
- Recession 2008
- COVID-19 Pandemic

Upbringing:

- Generation X parents
- Baby Boomer grandparents
- Gen Zs are raised to be:
 - autonomous
 - cynical
 - independent
 - highly educated
- Global events shape Gen Z worldview because they have always had access to world via technology

Gen Z self reported characteristics

- Expect diversity
- True digital natives from birth
- Pragmatic
- Entrepreneurial
- Financially minded
- Depressed/isolated***
- Shrewd consumers
 - Purchase based on values/identity
 - Research every purchase
 - Political views
- Socially progressive and left leaning
- Engaged
- Conscientious
- Independent
- Equitable

Gen Z Learning Style

- Mobile applications
- Video content
- Desire mentoring
- Expect transparency
- Abstract concepts/ reflective observations
- Require logical concepts and time to think things through
- Theories best when accessible
- Personalized/ self-paced
- Hate long lectures – want to know what they need to succeed in the moment (social media)
- Immediate feedback
- Shorter attention spans
- Multiple PROMPTS
- Digest small frequent bits of information at a time, step by step (think video gaming)
- Less likely to ask questions due to anxiety/poor social skills
- Collaborative - prefer innovation/creativity
- Procrastinate
- Can find info fast, but need help validating

How should generational traits in our medical students affect our educational efforts?

Specific challenges to medical education

- Why must we change the way we do things to accommodate the Millennial and Gen Z undergraduate medical student?
 - To adequately and skillfully train the next generation of physicians
 - To ensure an adequate number and quality of physicians and other providers necessary to care for patients

Situation	Generation Z Response	Faculty Usual Response	Generation Z Targeted Response
A resident knowledge gap is identified related to a near miss	Pull out cell phone and Google for information Talk with other residents Hide knowledge gaps	Schedule quality time to sit down with the resident Offer guidance and evidence-based literature	Have an electronic meeting if face-to-face can't happen immediately Encourage admission of knowledge gaps Recommend an online video and meet to discuss/reflect
A resident persistently appears distraught and colleagues report concerns about well-being	Spend time on social media connecting with friends Talk to parents Post on Twitter	Schedule time to meet with the learner and provide mental health referrals	Proactively provide wellness activities (eg, mindfulness-based stress reduction programs), training in suicide prevention, and a professional for wellness coaching
Residents are not engaged during lectures	Complain about terrible lectures Give bad evaluations Play on cell phone during the lecture	Meet with residents and review expectations for lecture engagement	Reevaluate teaching methods Replace lectures with flipped classroom Problem-solve (eg, cases) in small resident groups Proactively provide faculty development for new instructional technologies
A resident contacts program director and attendings 24/7 for questions about assignments or work activities	Fail to complete assignments Ask other residents or parents for help Complain about unresponsive program to new applicants	Provide written and online brochure detailing all expectations Schedule a meeting with resident after milestones not achieved or assignments not completed	Make clear when and how faculty can be contacted Provide faculty training to function as coaches Coach resident to create and follow realistic timelines

Specific challenges to medical education

1. Mobile devices:

- Adapting teaching methodologies to mobile delivery to enhance social learning
- Incorporate social networking/learning sites i.e.,
 - Class “secret” facebook page
 - Sketchy, Anki, Pathoma
 - Online MedEd – speaks to many of the preferences of the Millennial/Gen Z medical student (modules viewed at own pace, with repetition to point of learning, immediate feedback via questions)
- Expect to chart from anywhere i.e., cloud based EMR

2. Medical school curriculum:

- Use of podcasts, games, simulations, interactive videos (think Khan Academy), telemedicine*
- Alternative reality games to increase collaboration, learn complex skills, engage in critical thinking and problem solving

Specific challenges to medical education

3. Interprofessional education (IPE)

- Require activities that demonstrate learning teams from different specialties. Develops critical thinking and problem solving skills. Reflective of actual team oriented practice of medicine.

4. Competency based completion of medical school and residency

- Benchmarks, milestones in technical skills, factual learning to measure progress
- Competent communication skills*
- Evaluations beyond examinations to board
- No longer “4 years of med school and I am a doctor” or “3 years of residency and I am done”

Specific challenges to medical education

5. CME will be interactive, socially oriented

- Practitioner maintained learning portfolio starting in residency and maintained to stay board certified (MOC)

6. Diversity = the norm for both practice and learning

- Culturally diverse across 5 generations; members of diverse teams of physicians will strengthen healthcare education/delivery

7. Coaching vs. mentoring and feedback

- Difference must be understood by faculty.
- Feedback expected in real time with short turnaround.
- Monthly at the end of rotation will not suffice for Millennials or Gen Z learners.

Specific challenges to medical education

8. Generational differences (work-life balance, communication, etc.) must be addressed

- to facilitate learning and development of the ACGME competencies
- to ensure practice based and lifelong learning
- Millennial and Gen Z learners are very aware of statistics for physician burnout and lack of physician wellness among older generations of physicians

Coaching vs. Mentoring

- Coaching
 - task oriented
 - short term
 - performance driven
 - spontaneous (unstructured, unplanned)
- Coach role based on experience with task at hand.
- Mentoring
 - relationship oriented
 - long term
 - development driven
 - always structured/planned
- Mentor role based on influence, expertise.

Generational differences

- Millennials/ Gen Zs will advocate for selves and comfortably challenge status quo
 - Does this offend older generations of physicians who revered their preceptors and did what they were told without question or hesitation?
 - Our current students expect diversity, equity, pragmatism, transparency
- Millennials/ Gen Zs desire a healthy work-life balance
 - Do older generations of docs see this as a sign of laziness? Working smarter and not harder?
 - Gen Z blurs the lines even further between work and play – naps, video gaming suites at the office, long afternoon breaks with resumption in pm, work from home, work at own pace
- Millennials/ Gen Zs are digital natives, hyperconnected, information at fingertips – can find, can't always apply*
 - If a millennial texts as opposed to a calling or face to face meeting, is that seen as distant, lazy or aloof by older doctor more used to slower, more formal communication? Use of phone in the room with patient – okay or not okay? Digital footprint – does their social media persona impact others?
 - Gen Z: Never without connection since birth...but limited human connectedness. We must harness the power of their devices and connectivity to work for medical education while carefully teaching soft skills of social relatedness so pivotal to medicine.

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It is acceptable to NOT wear a white coat in outpatient clinic or formal medical educational settings.

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It is acceptable for a physician to introduce themselves by first name only and to converse with the patient using first names.

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Generational differences

- Do older doctors make assumptions about motives or character based on younger individuals' use of technology or brevity of communications?

“When a change comes, it’s not because a new generation comes in and changes it. It’s because the older generation decides something isn’t really working that well and new people come in with good ideas.” (Mercer)

Feedback for the Millennial/ Gen Z learner

- Create a culture of feedback from first day of rotation
- Explain to medical students they **WILL** receive criticism throughout their training
- Provide set of expectations that will guide development of students' attitudes, knowledge, and skills.
 - Explicit, clearly stated.
 - We recommend liberal use of the "One Minute Learner"

Feedback for the Millennial/Gen Z learner

- Millennials and Gen Zs are used to frequent positive feedback; must set tone for ability to receive constructive criticism and/or negative feedback
- Perfectionists who want to do it right the first time
- May interpret negative feedback as failure

- Soften negative feedback (constructive) because **acceptance and others' perceptions of them are highly important to Millennials/Gen Zs**

- Feedback that doesn't work for Millennials/Gen Zs
 - Bootcamp style (Traditionalist)
 - "No news is good news" (Baby Boomer)
 - Blunt, undiplomatic (Gen X'ers)

In closing...

- 5 generations currently represented in medical practice and education
- Social, experiential, mobile device friendly learning is preferred by Millennials/Gen Zs
- Remain optimistic about the current generation of medical students and the technological savvy and connectedness they bring
- Remain open to adopting new ways of teaching to engage Millennial and Gen Z learners

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I would attend a preceptor development session on social, experiential, mobile device friendly learning and attempt to employ what I learn with my third-year students.

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References

- Boysen PG 2nd, Daste L, Northern T. Multigenerational Challenges and the Future of Graduate Medical Education. *Ochsner J*. 2016;16(1):101–107.
- Eckleberry-Hunt J, Lick D, Hunt R. Is Medical Education Ready for Generation Z?. *J Grad Med Educ*. 2018;10(4):378-381. doi:10.4300/JGME-D-18-00466.1
- Meister JC, Willyerd K. *The 2020 Workplace: How Innovative Companies Attract, Develop, and Keep Tomorrow's Employees Today*. New York, NY: HarperBusiness; 2010.
- <https://www.pewresearch.org/topics/millennials/>
- www.td.org/insights/mentoring-versus-coaching-whats-the-difference

References

- Aaron, M., Levenberg, P. The Millennials in Medicine: Tips for Teaching the Next Generation of Physicians. *J. Aca. Opthal.* 2014;7:e17-e20.
- McKimm, J. *Br J Hosp Med (Lond)* 2009 Mar; Vol. 70 (3), pp. 158-61.
- Mercer C. How millennials are disrupting medicine. *CMAJ.* 2018;190(22).
- <https://www.youtube.com/watch?v=eRpB8zCFuDk>