Disclosures

• Non-Financial Relationships
  - Board Member for Just Say Something
  - Board Member for Pridelink

• Financial Relationships
  - Contracted MD with the Girlology/Guyology Program
  - Consulting MD with the Eating Recovery Center of the Carolinas
  - Contracted Nexplanon Trainer with Merck
  - Full Time Employee with Prisma Health Upstate

None of these relationships have an influence or impact on the information presented in today's presentation.
Objectives

• Adolescent Development and Biology Review
• Structuring the Adolescent Well Visit
  • The HEEADSSS Exam
• Guidelines per topic
• Scenarios
• Resources
Ah (or Ahhhhhhhh!!!)......to be young again

• “Adolescence is like having only enough light to see the step directly in front of you.”
  • Sarah Addison Allen
• “Maturity is when your world opens up and you realize that you are not the center of it.”
  • M.J. Croan
• “Common sense is the collection of prejudices acquired by age eighteen.”
  • Albert Einstein
• “Snow and adolescence are the only problems that disappear if you ignore them long enough.”
  • Earl Wilson
• “Adolescence is the same tragedy being performed again and again. The only things that change are the stage props.”
  • Lindsey Leavitt
• Adolescence is “the period following the onset of puberty during which a young person develops from a child into an adult.”
  • Best friend/future spouse
  • Begin to develop future career goals
  • Make mistakes

• 3 developmentally divided stages
  • Early Adolescence: 11-14yo
  • Middle Adolescence: 15-17yo
  • Late Adolescence: 18-21yo

• Brain Development is specific during adolescence
  • Pruning of neural connections/maturation of frontal lobe
  • Dominance of the amygdala through most adolescence
SYNAPTIC DENSITY CHANGES OVER TIME AND NEURAL CONNECTIONS GET PRUNED DURING ADOLESCENCE.

Why is this relevant?

- Emotional maturity, self-image, and judgment continue to be affected/impulsive until the PFC develops
- Environmental/social impacts delay this maturation
- Recent studies suggest that brain does not mature until 25yo!!
Brain Processes (Fits and Bursts)

- *Use it or lose it*
- *Blossoming and Pruning*
- *The window of opportunity*
  - Kitten experiment
- *The window of sensitivity*
  - Ear infections in childhood vs substances in adolescence
  - Impact of abuse
- *Myelination*
  - Emotional regulation
  - Increases by 100% through adolescence
- All five processes continue well into adolescence
It’s All About Me!

• The adolescent brain is wired to be selfish.
  • Curiosity, Novelty, and Survival
• Risk taking and thrill seeking satisfy a **NEED** the adolescent has
• Very little experience to provide context to actions
The Visit (...cue the dramatic music)

• Goal with 50% of adolescents: DON'T GET SUCKED INTO THE CHAOS
  • Goal with the other 50%: Be the cool engaging doctor that you were born to be
• Having a structural plan saves a lot of headache later
• Don’t forget your poker face!
The HEEADSSS 3.0

• Updated for the social media generation
  • Media may affect 10-20% of any specific health problem

• Allows for asking of questions in a foundational manner
  • Less invasive → more invasive

• Gives opportunities for rapport building and engagement
Home

• Who do you live with?
  • Where do you live? Type of home?
• Any stressors at home?
• Do you feel safe at home?
• Do you have your own room?
Education and Employment

- Where do you go to school?
- What’s the last grade you completed?
  - How are your grades? Favorite classes?
- Do you feel safe at school?
- What are your education goals?
- Are you working?
Eating

- Any concerns regarding your weight today?
- Tell me about some of the foods/meals you eat?
- Have you tried to lose weight before? How?

...And diet 'Pepsi', please
I don't want to gain weight.
Activities

• What do you do for fun?
• Do you have you license?
• Do you use social media?
  • Ever been bullied online?
Drugs (PRIVATE)

• Have you ever tried/used tobacco? E-cigs? Alcohol? MJ? Other Drugs?
• Do your friends use anything?
• Ever use someone else's meds?
Sex and Sexuality (PRIVATE)

- Are you in/have you ever been in a relationship?
  - Boys? Girls? Both?
- Have you ever done anything sexual with anyone?
  - Boys? Girls? Both?
- What types of sex have you had?
  - Protection Always/Sometimes/Never
- Ever had STI testing?
- How do you identify regarding orientation and gender?
Suicidality and Sadness (PRIVATE)

- What’s your current stress level?
- Have you ever felt sad or worried?
- Have you ever had thoughts of hurting or killing yourself?
- Have you ever tried to hurt or kill yourself?

Sometimes the worst place you can be is in your own head.
Safety (PRIVATE)

• Have you ever felt unsafe?
  • Home/School/Online

• Have you ever experienced or witness violence?
  • Between Parents? In neighborhood?

• Have you ever been pressured to do something you didn’t want to do?
  • Physical? Sexual

• Do you wear your seatbelt when driving?
Ensuring Confidentiality = Ensuring Comfort

- Visit should start with introductions and statement of confidentiality
- Expression of space being safe and non-judgmental
- Include parents in this discussion
- Be clear on when confidentiality must be breached
Guidelines for Screening: Sexual Health

- **HIV**
  - Routine HIV testing to be offered at least once to all adolescents (despite report of sexual activity) by 16-18yo in clinic settings where HIV prevalence is >0.1%
  - Prevalence <0.1%: HIV testing for all sexually active adolescents and those with other risk factors

- **GC/CT**
  - Annual routine screening for all sexually active females (<25yo)
  - Consider screening males annually in high prevalence rate areas

- **Syphilis**
  - Routine screening for non-pregnant, heterosexual adolescents **not recommended**

- **Trichomonas**
  - Routine screening **not recommended**
## Integrating Adolescent Health Screening Into Health Supervision Visits

<table>
<thead>
<tr>
<th></th>
<th>Universal</th>
<th>Selective</th>
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<tbody>
<tr>
<td><strong>Early Adolescence</strong></td>
<td>Depression (beginning at 12Y)</td>
<td>Anemia</td>
</tr>
<tr>
<td>(11 Year Visit</td>
<td>Dyslipidemia (once between 9Y and 11Y)</td>
<td>Dyslipidemia (if not universally screened)</td>
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<tr>
<td>through 14 Year Visit</td>
<td>Hearing (once between 11Y and 14Y)</td>
<td>HIV</td>
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<td>Tobacco, Alcohol, or Drug Use</td>
<td>Oral Health</td>
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<tr>
<td></td>
<td>Vision (12Y)</td>
<td>Sexually Transmitted Infections (STIs; Chlamydia, Gonorrhea, Syphilis)</td>
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<td>Tuberculosis</td>
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<td></td>
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<td>Vision</td>
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<tr>
<td><strong>Middle Adolescence</strong></td>
<td>Depression</td>
<td>Anemia</td>
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<tr>
<td>(15 Year Visit through 17 Year Visit)</td>
<td>Dyslipidemia (once between 17Y and 21Y)</td>
<td>Dyslipidemia (if not universally screened)</td>
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<tr>
<td></td>
<td>Hearing (once between 15Y and 17Y)</td>
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<td>Tuberculosis</td>
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<td></td>
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<td>Vision</td>
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<tr>
<td><strong>Late Adolescence</strong></td>
<td>Cervical Dysplasia (all young women at 21Y)</td>
<td>Anemia</td>
</tr>
<tr>
<td>(18 Year Visit</td>
<td>Depression</td>
<td>Dyslipidemia (if not universally screened)</td>
</tr>
<tr>
<td>through 21 Year Visit</td>
<td>Dyslipidemia (once between 17Y and 21Y)</td>
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<td>Vision</td>
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Guidelines for screening: Preventative Health

• **Vitals:**
  - Assess for HTN annually
  - Assess BMI at least annually (likely more often)

• **Vaccines:**
  - Teen Specific: HPV, Men A/C/W/Y and B, Tdap, Hepatitis A/B

• **Laboratory:**
  - Lipid Profile between 9-12yo and again between 17-21 (universal)
  - Hgb once after menses established for girls
Guidelines for Screening: Mental Health

• Adolescents 12+ should be screened at least annually for depression using a standardized tool
• Anxiety is a little more nebulous
  • At least assessed with every WCC starting as early as 8yo
• Other conditions screened based on symptoms/risk factors:
  • Trauma
  • ADHD
Guidelines for Screening: LGBT Care

• Follow general preventative health guidelines with a few points of focus:
  • 1.) Sexual Health
    • Screen based on behavior, not identity
  • 2.) Mental Health
  • 3.) Substance Use
  • 4.) Resilience/Risk of Homelessness
Guidelines for Screening: LGBT Care

**MSM**

- **PrEP!!!!!**
- Screening at least annually:
  - HIV
  - Syphilis
  - Urine NAAT for Gonorrhea and Chlamydia if insertive anal sex
  - Rectal NAAT for GC/CT if receptive anal intercourse
  - Pharyngeal NAAT for GC if receptive oral intercourse

**WSW**

- Up to 28% of WSW have had sex with a man in the past year
  - Less likely to use hormonal contraception
  - Higher rates of teen pregnancy
- Transmission of HIV, HSV, Syphilis, HPV
  - Bacterial STIs less common
- Bacterial Vaginosis
  - More common in WSW
  - Transmission of vaginal flora
  - Considered an STI
Case Scenario 1:

• A 16yo guy presents for well adolescent visit and during the private portion of the visit confides that he is having sex and does not want his parents to know.

  • How do you engage this teen?
  • What are the take away points you want him to know?
Case Scenario 2:

• A 17yo girl presents for well adolescent visit and you notice that she has lost 15lbs since her last visit 3 months ago.

• What parts of the HEEADSSS exam need to be explored in more detail with this patient?

• What are some ways this patient can be engaged in this discussion?
Resources if your begging for more

- Bright Futures
- Textbook of Adolescent Health
- Adolescent and Young Adult Health Care: A Practical Guide
- The Mount Sinai Adolescent Health Center Blueprint
- The Fenway Guide
References

- http://www.aap.org
- Bright Futures Guidelines, 4th Edition
- Policy Statement: Screening for nonviral sexually transmitted infections in adolescents and young adults. The American Academy of Pediatrics
- CDC: http://www.cdc.gov
- The Mount Sinai Adolescent Health Center: https://teenhealthcare.org