

Clinical Preventive Services (“CPS”) for Adolescents

Adolescence: a unique opportunity for primary and secondary prevention

- Period of major growth and development.
- Greater responsibility for daily health habits, such as diet and exercise.
- Initiation, among some, of adult behaviors, e.g., driving, substance use and sexual activity.
- For those with chronic conditions, need to take on a greater role in managing conditions.
- Critical period for the emergence of mental disorders.

Professional Medical Organizations support adolescent clinical preventive services

- Several professional medical organizations have issued guidelines & recommendations for adolescent CPS since 1994, including a periodic check-up, with screening & counseling.
- Guidelines consolidated into *Bright Futures*, 3rd ed., 2008, led by the American Academy of Pediatrics.

Yet, few receive annual check-ups and fewer receive recommended CPS

- Only about 4 in 10 adolescents attend preventive visits.
- Receipt of recommended counseling is low; for example, 31% for helmet and seat belt use, highest was 49% for healthy eating.
- Time alone with a clinician, when sensitive topics such as sexuality and substance use might be addressed, was received by 40% of those with a preventive visit.

Shortcomings of the current health care system for adolescents.

- Many adolescents lack adequate financing to gain access to needed services.
- Reimbursement system rewards acute care more than preventive care.
- Paucity of clinicians skilled in providing clinical care to adolescents.

A new opportunity: ACA removes barriers to services, especially preventive services

- Major expansion of public and private insurance for adolescents.
- Most private insurance plans required to cover preventive services recommended by *Bright Futures* and CDC-recommended vaccines with no cost-sharing.

What are the next steps? How can we:

1. Increase the proportion of adolescents who receive an annual check-ups?
 2. Improve the delivery of clinical preventive services in both wellness and other visits?
- Use outreach strategies to increase annual check-up (e.g., adapt strategies already used by State MCH programs to get eligible kids enrolled in insurance).
 - Work with multiple systems. There have been successful efforts to increase the delivery of recommended preventive services to adolescents in large staff-model HMOs, state Medicaid systems and community health centers.
 - Partner with professional medical organizations; organizations of public officials; networks of clinics; and private organizations.

Other strategies might include:

- Creating networks to share expertise, discuss challenges and best practices.
- Using outreach, webinars, social media and other internet technology.
- Sharing/creating resources, e.g., charting tools and clinic protocols.

Table 1: Recommendations for the adolescent annual checkup (ages 11-19)

Annual Checkup Components	
<ol style="list-style-type: none"> 1. Physical examination & immunizations 2. Screening for physical problems (e.g., visions & hearing screening; selected laboratory tests) 3. History/key developments since last visit 4. Monitor development (information obtained through the medical examination, by asking questions and through general discussion) 5. Observations of parent-youth interaction 6. Discussion of the following priority issues and areas 	
Priority Issue	Areas
Physical growth and development	Physical and oral health; body image; healthy eating; physical activity
Social and academic confidence	Connectedness with family, peers, and community; interpersonal relationships; school performance For ages 18-19: Job performance
Emotional well-being	Coping; mood regulation and mental health; sexuality
Risk reduction	Use of tobacco, alcohol, or other drugs; pregnancy; STIs
Violence and injury prevention	Safety belt and helmet use; guns; bullying For ages 11-14: Substance abuse and riding in a vehicle; interpersonal violence (fights) For ages 15-17: Driving (graduated license) and substance abuse; interpersonal violence (dating violence) For ages 18-19: Driving and substance abuse; interpersonal violence (dating violence, stalking)

Table 2: Recommended Vaccinations for Adolescents

Immunizations	11-12 years	13-18 years
DTaP/Tdap (Diphtheria, tetanus, pertussis)	√	<i>Catch up</i>
HPV (Human papillomavirus)	√√√	<i>Catch up</i>
MCV4 (Meningococcal conjugate)	√	<i>Catch up</i>
HepB (Hepatitis B)	<i>Catch up</i>	
Polio		
MMR (Measles, mumps, rubella)		
Varicella (Chickenpox)		
HepA (Hepatitis A)		
Influenza	Recommended Annually	

Adapted from: Centers for Disease Control and Prevention. 2012 *Recommended Immunizations for Children from 7 through 18 years old*.

Available from : <http://www.cdc.gov/vaccines/who/teens/downloads/parent-version-schedule-7-18yrs.pdf>

Monitoring Progress

Several national health surveys could be used to assess progress in access, quality, and content of care, as well as equity in these areas.

Annual surveys include:

- National Health Interview Survey provides measures of:
 - ✓ annual check-up
- Medical Expenditures Panel Survey provides measures of:
 - ✓ Type of visits, including annual check-up
 - ✓ Content of care, including several preventive services and time alone
- National Ambulatory Medical Care Survey
 - ✓ Types of visits, including annual check-up
 - ✓ Health education ordered/given

Some data from these surveys are available for state-level analyses through approval processes via their specific data centers, if needed.

The following national surveys are not administered annually

- ✓ National Survey of Children's Health
- ✓ National Survey of Children with Special Health Care

Reading list

1. Adams SH, Husting S, Zahnd E, Ozer EM. Adolescent preventive services: Rates and disparities in preventive health topics covered during routine medical care in a California sample. *J Adolesc Health* 2009;44:536–45. <http://www.ncbi.nlm.nih.gov/pubmed/19465317>
2. Brindis C, Kirkpatrick R, Macdonald T, VanLandeghem K, Lee S. Adolescents and the State Children's Health Insurance Program. San Francisco, CA: National Adolescent Health Information Center; 2000. <http://nahic.ucsf.edu/adolescents-and-the-state-children's-health-insurance-program/>
3. Edman J, Adams S, Park MJ, Irwin CE, Jr. Who gets confidential care? Disparities in a national sample of adolescents. *J Adolesc Health* Epub 2009;46(4):393-5. <http://www.ncbi.nlm.nih.gov/pubmed/20307830>
4. English A, Park MJ. The Supreme Court ACA Decision: What Happens Now for adolescent Young Adults? Chapel Hill, NC: Center for Adolescent Health & the Law; and San Francisco, CA: National Adolescent and Young Adult Health Information Center; 2012. <http://nahic.ucsf.edu/download/the-supreme-court-aca-decision-what-happens-now-for-adolescents-and-young-adults/>
5. Hagan JF, Shaw JS, Duncan PM, eds. Bright Futures: Guidelines for Health Supervision of Infants, Children, and Adolescents, Third Edition. Elk Grove Village, IL: American Academy of Pediatrics; 2008. http://brightfutures.aap.org/3rd_edition_guidelines_and_pocket_guide.html
6. Irwin CE, Jr., Adams SH, Park MJ, Newacheck PW. Preventive care for adolescents: Few get visits and fewer get services. *Pediatrics* 2009;123:565–72. <http://www.ncbi.nlm.nih.gov/pubmed/19336348>
7. Klein JD, Allan MJ, Elster AB, et al. Improving adolescent preventive care in community health centers. *Pediatrics* 2001;107(2):318–327. <http://www.ncbi.nlm.nih.gov/pubmed/11158465>
8. Klein JD, Sesselberg TS, Gawronski B, et al. Improving adolescent preventive services through state, managed care, and community partnerships. *J Adolesc Health* 2003;32(6 suppl):91–97.

- <http://www.ncbi.nlm.nih.gov/pubmed/12782447>
9. Koh HK, Sebelius KG. Promoting prevention through the Affordable Care Act. *N Engl J Med* 2010;363(14):1296–1299. <http://www.ncbi.nlm.nih.gov/pubmed/20879876>
 10. Ma J, Wang Y, Stafford RS. US adolescents receive suboptimal preventive counseling during ambulatory care. *J Adolesc Health* 2005;36:441. <http://www.ncbi.nlm.nih.gov/pubmed/15841517>
 11. Ozer EM, Adams SH, Lustig JL, et al. Can it be done? Implementing adolescent clinical preventive services. *Health Serv Res* 2001;36:150–65. <http://www.ncbi.nlm.nih.gov/pubmed/16148966>
 12. Ozer EM, Adams SH, Lustig JL, et al. Increasing the screening and counseling of adolescents for risky health behaviors: A primary care intervention. *Pediatrics* 2005;115:960–8. <http://www.ncbi.nlm.nih.gov/pubmed/15805371>
 13. Ozer EM, Adams SH, Orrell-Valente JK, et al. Does Delivering Preventive Services in Primary Care Reduce Adolescent Risky Behavior? *J Adolesc Health* 2011;49(5):476-482. <http://www.ncbi.nlm.nih.gov/pubmed/22018561>
 14. Ozer EM, Zahnd EG, Adams SH, et al. Are adolescents being screened for emotional distress in primary care? *J Adolesc Health* 2009;44:520–7. <http://www.ncbi.nlm.nih.gov/pubmed/19465315>
 15. Park MJ, Macdonald TM, Ozer EM, et al. Investing in Clinical Preventive Health Services for Adolescents. San Francisco, CA: Public Policy Analysis and Information Center for Middle Childhood, Adolescence, and Young Adult Health and National Adolescent Health Information Center; 2000. <http://nahic.ucsf.edu/download/investing-in-clinical-preventive-health-services-for-adolescents/>
 16. Rand CM, Auinger P, Klein JD, et al. Preventive counseling at adolescent ambulatory visits. *J Adolesc Health* 2005;37:87–93. <http://www.ncbi.nlm.nih.gov/pubmed/16026717>

**Prepared by Jane Park, MPH & Charles E. Irwin, Jr. MD
Division of Adolescent and Young Adult Medicine
University of California, San Francisco**

**415-269-4272
jane.park@ucsf.edu**