

Adult Hepatitis A/Hepatitis B Immunization Strategies:

What's New from the ACIP?

National Viral Hepatitis Prevention Conference
December 6, 2005



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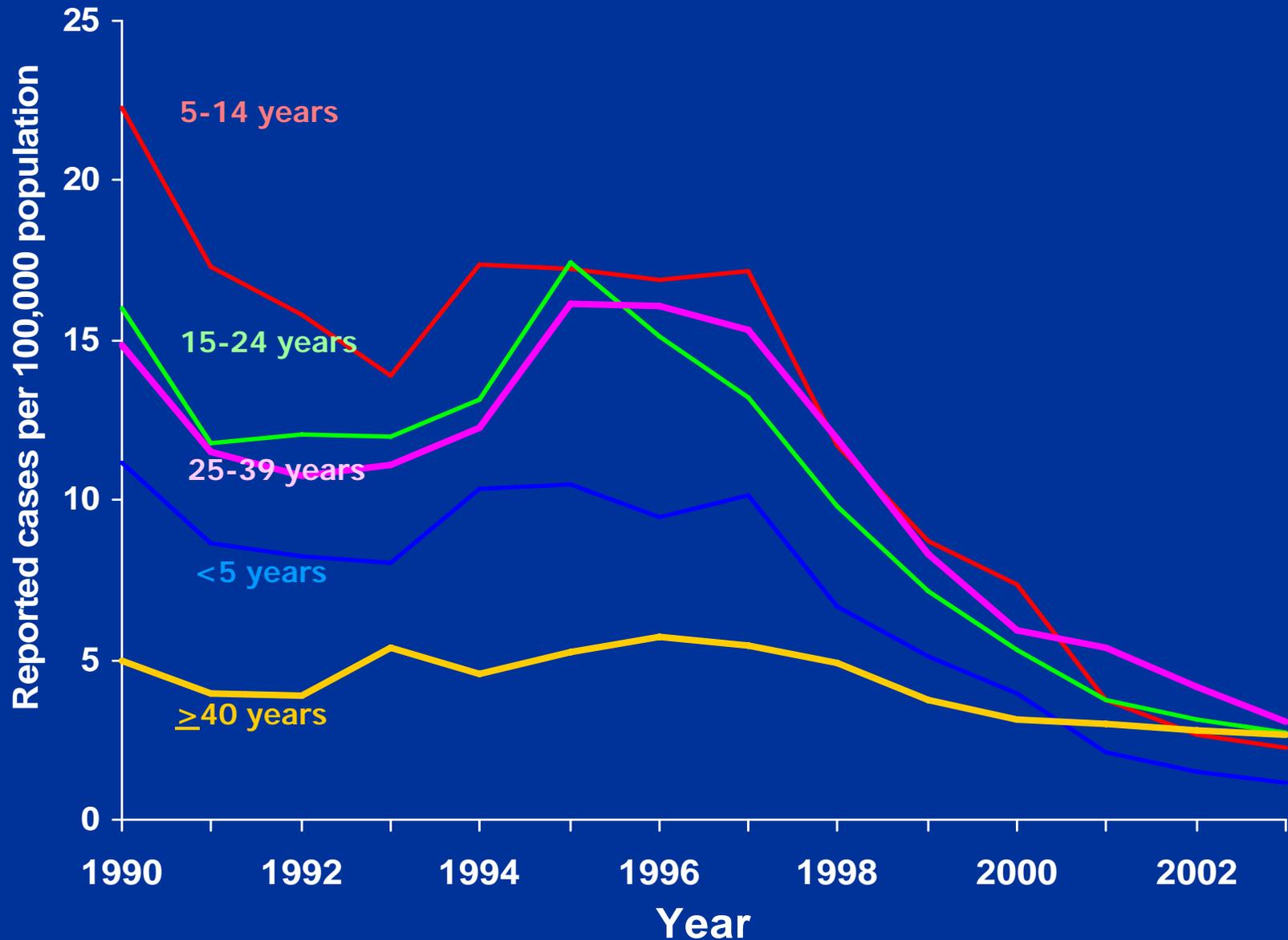
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ACIP Decisions

At the October, 2005 ACIP meeting, the ACIP approved new recommendations for prevention of hepatitis A and prevention of hepatitis B through immunization of children and adults

Incidence of Reported Hepatitis A by Age, United States, 1990-2003



Reported Risk, Acute Hepatitis A United States, 2002-2004

International travel	13%
MSM	12%
IDU	9%
Suspected food- or waterborne outbreak	10%
Sexual or household contact	13%

Source: NNDSS.

Note: Risk factors not mutually exclusive. Percentages reflect those cases with risk data reported

Adult Hepatitis A Vaccine Recommendations

- Travelers
- MSM
- IDU and NIDU
- Persons working with nonhuman primates
- Clotting-factor recipients
- Persons with chronic liver disease

Adult Hepatitis B Vaccine Recommendations

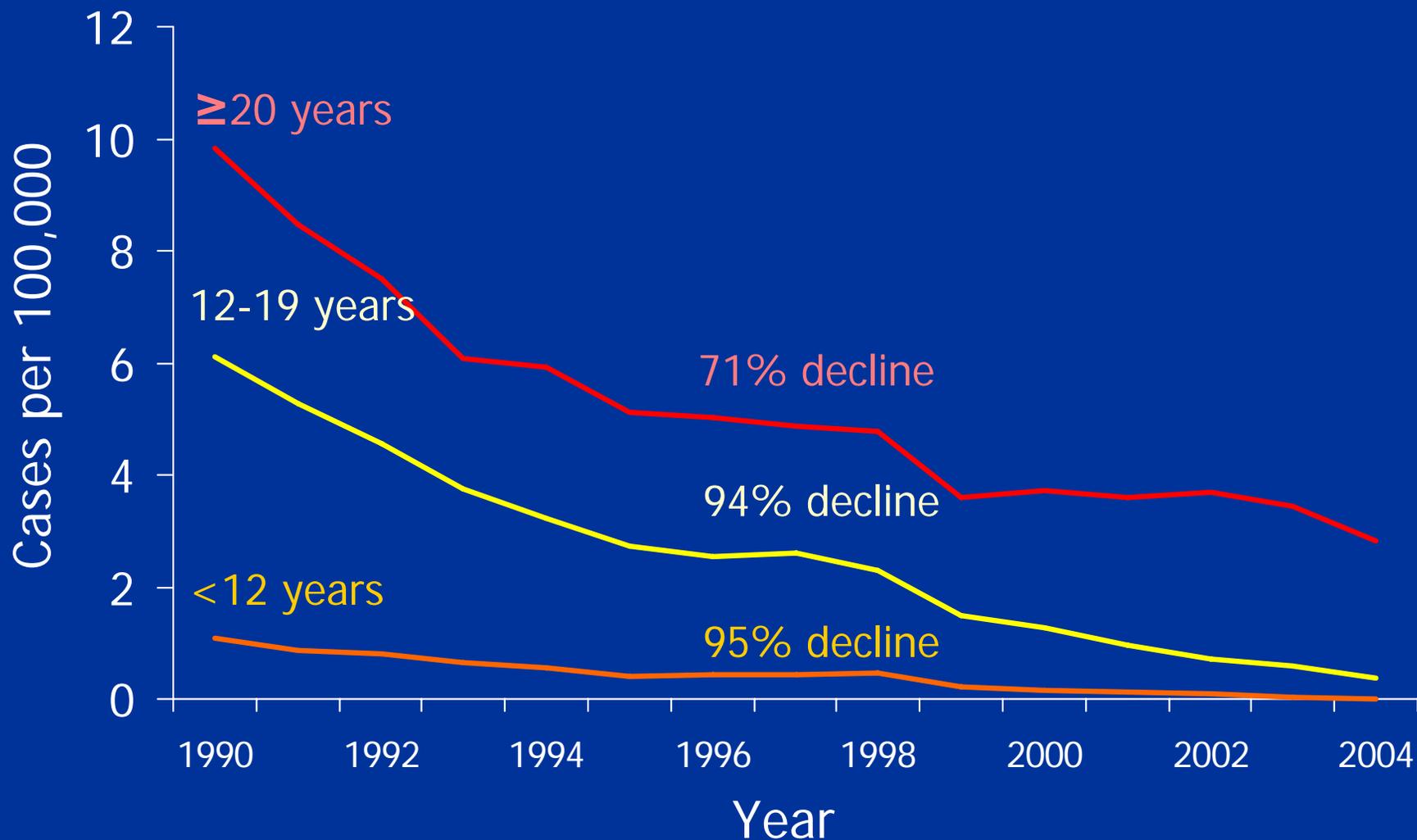
Outline

- Hepatitis B disease trends
- Vaccination data
- Adult hepatitis B vaccine recommendations
- Implementation planning

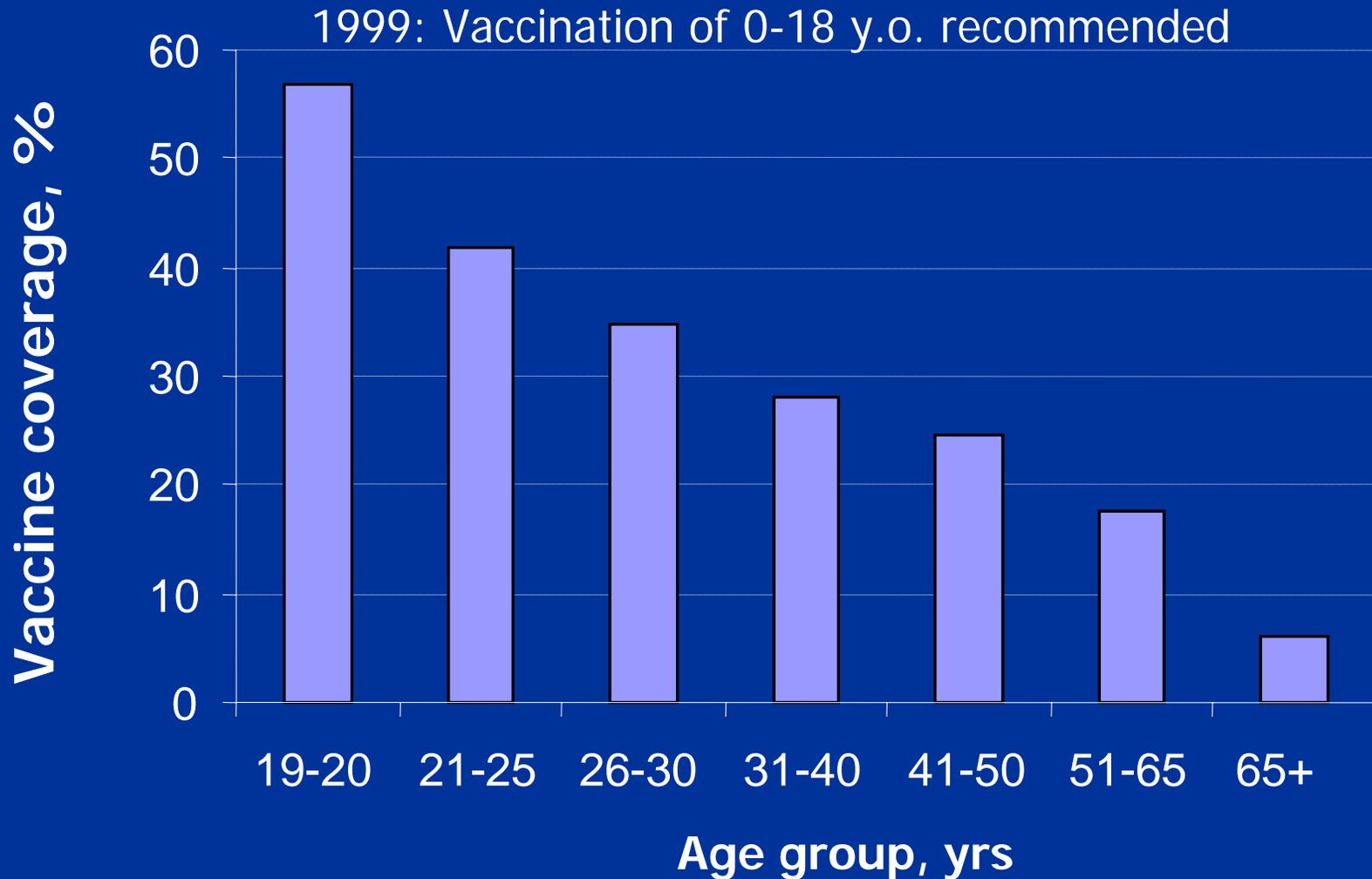
Why Update 1991 Recommendations?

- Since 1982, ACIP has recommended HepB vaccination for adults at risk for HBV infection
- However, recommendations have not been effectively implemented
 - Many health care settings do not vaccinate high risk adults
 - Vaccine coverage among most high risk adults is low
- New implementation strategies are needed

Reported Acute Hepatitis B Incidence By Age Group: United States, 1990-2004

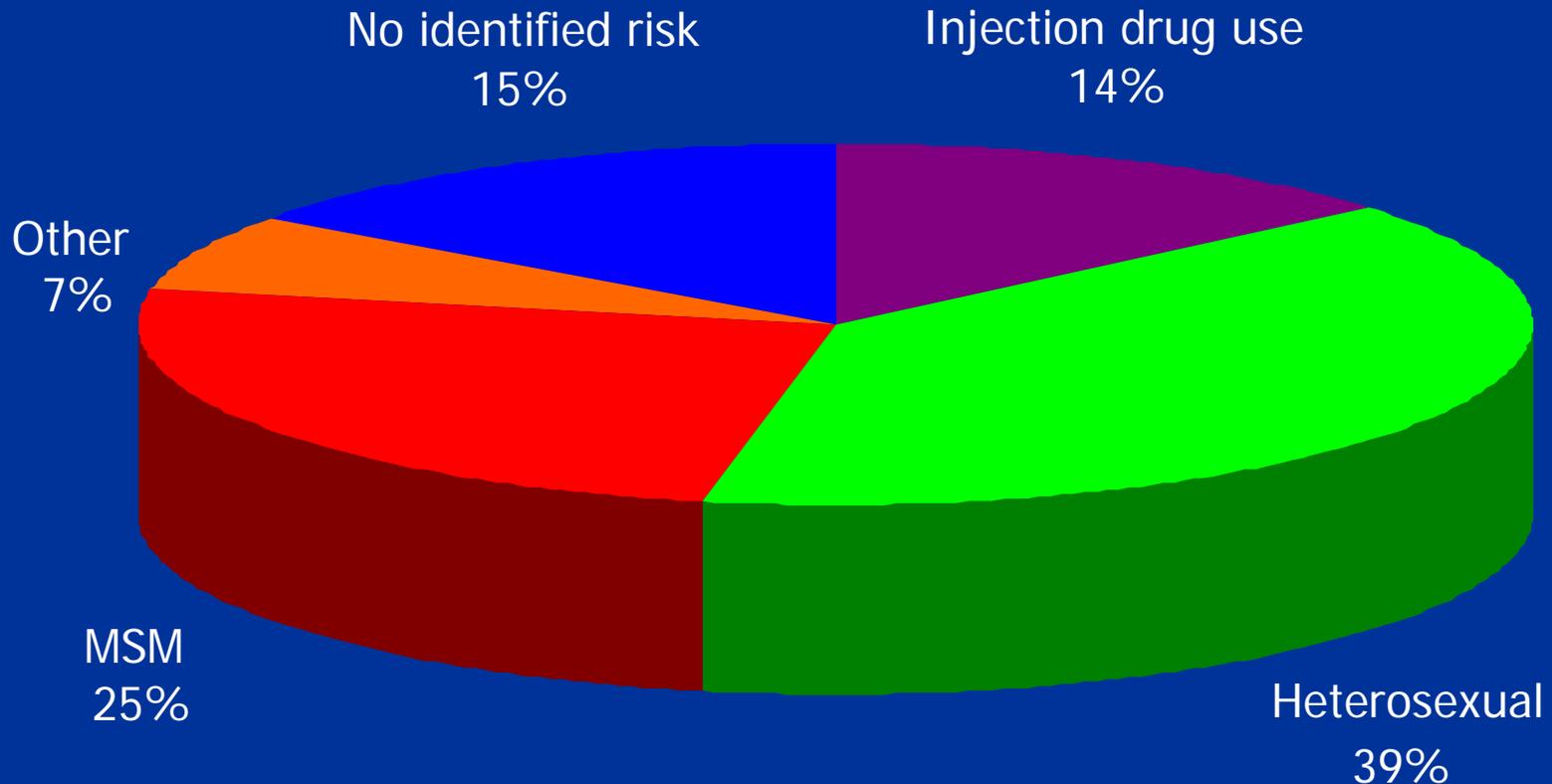


Adult Hepatitis B Vaccine Coverage, 2002



Source: CDC, National Health Interview Survey

Reported Risk Characteristics Among Adults with Acute Hepatitis B: United States, 2001-2003



*Other: Household contact, institutionalization, hemodialysis, blood transfusion, occupational exposure

Hepatitis B Vaccine Coverage, by Group

MSM	30%
IDU	Unknown
Multiple heterosexual partners	23%
Adults at risk-based settings	
STD clinics	10%-30%
HIV CTS	Unknown
Correctional facilities	Unknown
Drug-abuse treatment	Unknown
Health care workers	76%
Police/fire-fighters	66%

Sources: Self-reported data from National Health Interview Survey (NHIS), 2003; National Health and Nutrition Examination and Survey (NHANES), 1999-2002; Demonstration project, San Diego; VHIP, Denver

Prior Opportunities For Vaccination Among Patients With Acute Hepatitis B, 2001-2004

Prior Opportunity for Vaccination	%
Incarcerated in a detention facility, jail, or prison	40%
Screened for or sought care for an STD	39%
Participated in a substance abuse treatment program or a needle exchange program	22%
Any of the above	61%

Source: Sentinel Counties Study of Viral Hepatitis (n=591)

Hepatitis B Vaccination In High-Prevalence Settings

- Demonstration projects have established:
 - feasibility of vaccinating as part of STD and HIV/AIDs prevention services, 1st dose acceptance 75%-85%
 - program components required to successfully implement adult hepatitis B vaccination
- Funding for vaccine and administration is primary barrier to implementation in these settings

Cost-effectiveness of Hepatitis B Vaccination

High-risk adults

Cost-saving

Risk-based settings

Prison entrants

Cost-saving

STD clinic clients

Cost-saving

Clients of publicly funded HIV CTS

\$4,000 per QALY gained

Drug-abuse treatment site

Unknown

Recommendations

ACIP Recommendations for Hepatitis B Vaccination of Adults

Hepatitis B vaccination is recommended for:

- **All unvaccinated adults at risk for HBV infection**
- **All adults seeking protection from HBV infection**
 - acknowledgment of a specific risk factor is not a requirement for vaccination

Unvaccinated Adults at Risk for HBV Infection

- Sexual exposures
- Percutaneous or mucosal exposure to blood
- Others

Persons with Sexual Risk

- Sexual partners of HBsAg-positive persons
- Sexually-active persons not in a long term, mutually monogamous relationship (>1 partner in 6 mo)
- Persons evaluated/treated for STDs (including HIV)
- Men who have sex with men

Percutaneous or Mucosal Risk

- Household contacts of HBsAg positive persons
- Injection-drug users
- Healthcare and public safety workers
- Persons with endstage renal disease, including pre-dialysis, hemodialysis, peritoneal dialysis, and home dialysis patients

Other Vaccination Candidates

- International travelers to areas with high or intermediate levels of endemic HBV infection (HBsAg prevalence $\geq 2\%$; Figure 3)
- Persons with chronic liver disease

Implementation Guidance

Barriers to Adult Immunization

- Infrastructure
 - Vaccine delivery not well established
 - Lack of tracking systems
- Provider
 - Lack of time
 - Not a priority
 - Risk ascertainment difficult
- Patient
 - Lack of awareness of need for vaccine
 - Stigma of acknowledging risk behaviors
- Fiscal
 - Patients without insurance to cover vaccination
 - Lack of knowledge of reimbursement mechanisms

Consultation on Implementation

May 18, 2005

- Discussion of barriers to implementation of adult hepatitis B vaccination in public and private sectors
- Strategies/experience to address barriers
- Participants:
 - 20 Non-CDC participants
 - Implementation perspective
 - ACIP hepatitis workgroup representative

Adult Hepatitis B Vaccine Implementation Initiative

- Work groups formed across CDC to plan for implementing adult vaccine recommendations
 - Draft recommendations
 - Propose funding
 - Prepare program guidance
 - Plan health education and communication strategies
 - Identify data needed to evaluate implementation
- Draft funding proposal is being considered by CDC

Implementation Recommendations

- Setting-specific vaccination strategies to achieve high coverage among persons recommended to be vaccinated
 - Doctors' offices: primary-care and specialty medical settings
 - Higher prevalence settings
 - Occupational health settings

Doctors' Offices: Risk-Targeted Approach to Vaccination

- Risk-targeted vaccination is most efficient
 - ~15-20% of all adults report risk factors for infection
- Risk identification is recommended (e.g., AAFP, AMA, USPSTF)
- Many persons at risk have other prevention needs:
 - HIV counseling and testing
 - STD screening
 - Drug treatment

Higher Prevalence Settings: Vaccination Recommended For All Adults

- STD treatment facilities
- HIV testing facilities
- HIV treatment facilities
- Facilities providing drug abuse treatment and prevention
- Correctional facilities
- Health care settings serving men who have sex with men
- Chronic hemodialysis facilities and endstage renal disease programs
- Institutions and nonresidential daycare facilities for developmentally disabled persons

Higher Prevalence Settings: Targeting All Clients for Vaccination

- Assume all unvaccinated adults are at risk
- Vaccinate as a component of STD, HIV/AIDS, and other prevention and clinical services
- When feasible, vaccinate in outreach settings

Barriers and Strategies: Infrastructure

Barrier

Lack of systems to track persons seen in multiple settings

Lack of infrastructure to administer vaccine

Recommendation

- Implement accessible adult immunization registries
- Public health and medical communities should educate providers about methods to implement and support HepB vaccination services

Barriers and Strategies: Providers

Barrier	Recommendation
Risk ascertainment intrusive and time-consuming	<ul style="list-style-type: none">• Simplified risk assessment – emphasizes sexual and percutaneous exposures• Office staff may administer questionnaire• Alternative vaccination strategies can be used (e.g., < age 45 y)
Vaccination not a priority/Lack of time	<ul style="list-style-type: none">• Providers should be knowledgeable about hepatitis B and vaccination• Public health/medical communities should educate providers about vaccination benefit• Standing orders reduce provider time

Barriers and Strategies: Patients

Barrier	Recommendation
Lack of awareness	<ul style="list-style-type: none">• Outreach by health departments and CBOs, focused on at-risk populations• Assist patient assessment of need for vaccination
Stigma of risk groups	<ul style="list-style-type: none">• Risk factor acknowledgement not required for vaccination
Don't return to complete vaccine series	<ul style="list-style-type: none">• Tracking and reminder systems needed• Concerns about series completion should not preclude series initiation

Summary

- Adult hepatitis B rates have declined by >70% since 1990
 - Expect continued decline with aging of vaccinated cohorts of infants, children and adolescents
- Elimination of HBV transmission can be accelerated by increasing vaccination coverage among at-risk adults
 - ~85% of cases among persons with risk characteristics
- Recommendations provide:
 - Setting-specific implementation strategies to achieve high vaccination coverage among at risk adults
 - Recommendations to overcome barriers to vaccination

Related Sessions

Today:

A3: Vaccination Strategies for Injecting Drug Users

A5: Hepatitis Vaccines: Making it a Reality in STD Clinics

Tomorrow:

Plenary: Progress Toward Reducing Perinatal and Childhood Viral Hepatitis

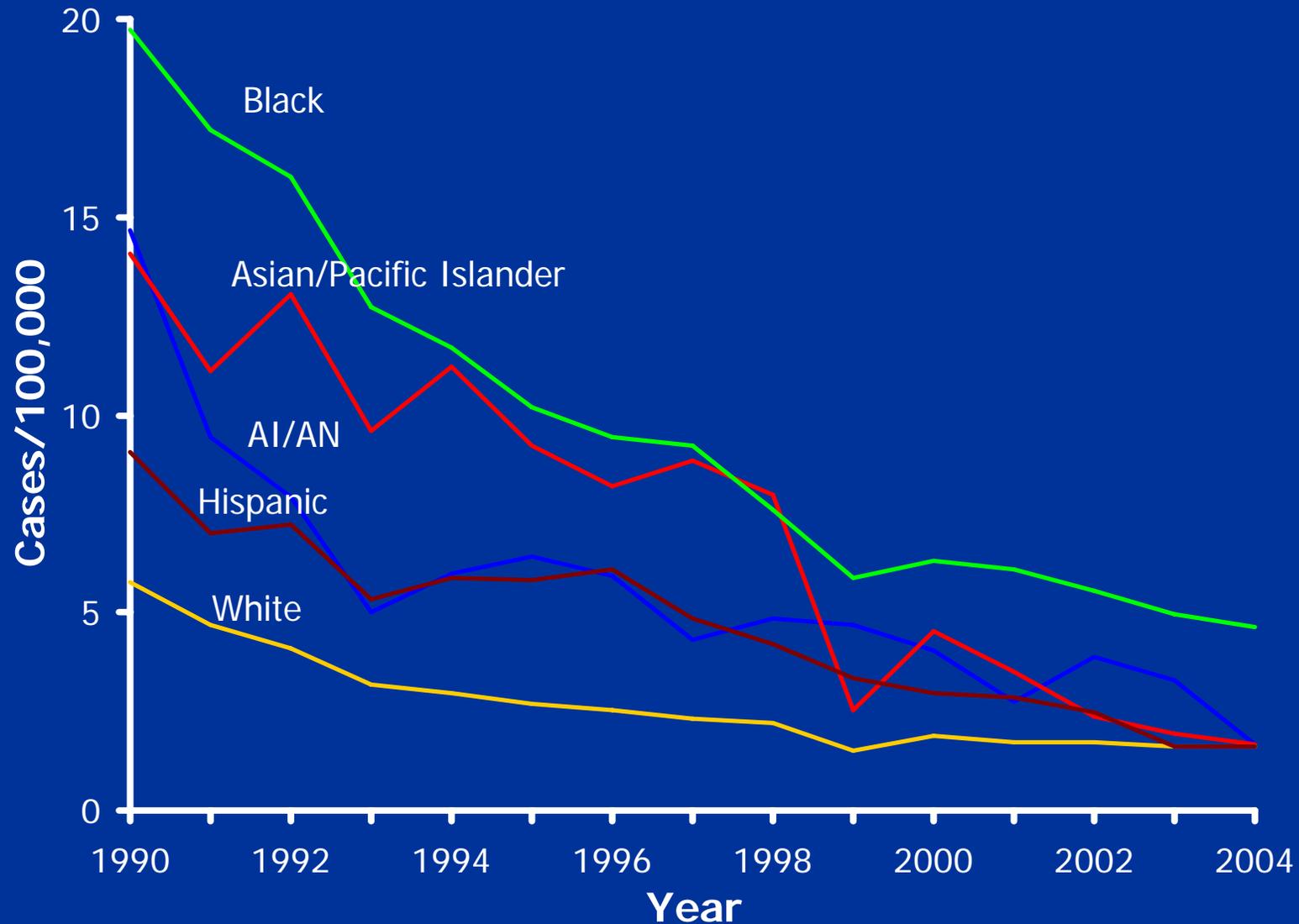
Thursday:

H6: Models of Hepatitis Vaccination in Substance Abuse Treatment Settings

Friday:

J6: Creative Approaches to Maximizing Resources

Hepatitis B Incidence ≥ 19 Years By Race/Ethnicity: United States, 1990-2004



Reported Acute Hepatitis B Incidence By Age and Sex: United States, 2004

