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Mark Your Calendars:

CHOP Vaccine Education Center Webinars
September 11, 2013
http://vaccine.chop.edu/webinars

20th Annual Immunize Georgia Conference
September 12, 2013
Callaway Gardens, Pine Mountain, GA

Limiting Tdap Administration
AAFP News Now (06/24/13) Brown, Matthew L.

ACIP discussed changes to delivery of the Tdap vaccine. The ACIP pertussis work group now recommends against a second dose of Tdap for adolescents and adults and instead suggests that the Td vaccine be used as a booster dose, as the cost-benefit ratio with use of a second Tdap dose appears poor. Pregnant women are still recommended to receive the Tdap vaccine with each pregnancy.

New School Vaccine Rules Planned for Sixth Graders in Georgia
Georgia PH Week (Georgia Department of Public Health) July 15, 2013
-Story by Carrie Gann, DPH Communications

New vaccine requirements for the state's schoolchildren will begin next year. Beginning in the 2014-15 school year, all students entering the sixth grade will be required to get Tdap (tetanus, diphtheria and pertussis) and meningococcal vaccines before the beginning of the school year, leading to greater protection for Georgians of all ages from a host of dangerous infectious diseases.

"Adding these new school requirements will lead to an increase in immunization coverage levels, reduce the burden of disease and protect the community against meningitis, tetanus, diphtheria and pertussis," said Steve Mitchell, MPH, immunization director at the Georgia Department of Public Health (DPH).

For many years, the U.S. Centers for Disease Control and Prevention (CDC) has recommended children be immunized against tetanus, diphtheria and pertussis by age 18 months with the DTaP vaccine. But evidence indicates the protection provided by this series of shots wanes with time. Immunization with one dose of the Tdap vaccine at age 11 or 12 provides the best protection against the diseases.

DPH is also working to increase Georgia's rates of immunization against meningitis, a dangerous disease that is a particular risk for adolescents and young adults. CDC recommends children get their first dose of the MCV4 vaccine against meningitis at age 11 or 12.

The new vaccine rules for sixth graders add to a list of shots already required for Georgia schoolchildren before enrolling in kindergarten, including DTaP, hepatitis B, polio, MMR (measles, mumps and rubella) and varicella, as well as hepatitis A for children born after Jan. 1, 2006.

Mitchell said DPH also hopes that the new school vaccine requirements will help Georgia improve its immunization rates compared to other states. According to the National Immunization Survey, Georgia ranks 39th in Tdap vaccination rates and 22nd in meningococcal vaccination rates.

DPH is still formulating its statewide implementation plan for the new vaccine rule. In the meantime, the department and the Georgia chapter of the American Academy of Pediatrics urge parents to talk with their child's pediatrician to ensure proper vaccination prior to the 2014-15 school year.

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Fifteen Years After Autism Panic, a Plague of Measles Erupts
Wall Street Journal (07/19/13) P. A1 Whalen, Jeanne; McKay, Betsy

A measles outbreak from November 2012 to early July has infected 1,219 people in southwest Wales, the same region that saw widespread resistance to a vaccine for measles, mumps and rubella in 1998. There were just 105 cases of measles in all of Wales in 2011. Many of the new cases involve children 10 to 18 years old who went unvaccinated after a British doctor, Andrew Wakefield, suggested the MMR vaccine might cause autism. The connection between the vaccine and autism was disproved, but resistance to the vaccine continued even after that. The outbreak is a concern to the rest of the world because measles can quickly cross oceans. Although most cases occur in the developing world, measles is resurging in countries such as France, the United States, and England. Wales declared the outbreak over on July 3, but there may be other ripples from the autism scare. Parents' refusal to let their children get the MMR vaccine, for example, may have contributed to a spike in mumps in the United Kingdom in recent years, according to U.K. health officials.

Effectiveness of Monovalent and Pentavalent Rotavirus Vaccine
Pediatrics (06/13) Cortese, Margaret M.; Immergluck, Lilly Cheng; Held, Melissa; et al.

New research shows that the RV1 and RV5 vaccines are both highly effective against severe rotavirus disease. U.S. investigators measured the effectiveness of the two-dose RV1 and three-dose RV5 vaccines against rotavirus disease that caused hospital emergency department or inpatient care. The study included 165 rotavirus case patients and 428 rotavirus-negative controls. The vaccine effectiveness was 91 percent for RV1 and 92 percent for RV5 among children who were at least eight months old. The investigators noted that RV1 carried sustained protection during the first two years of life and demonstrated high effectiveness against disease caused by the G2P[4] strain.

Use of 13-Valent Pneumococcal Conjugate Vaccine and 23-Valent Pneumococcal Polysaccharide Vaccine Among Children Aged 6-18 Years
Morbidity and Mortality Weekly Report (06/28/13) Vol. 62, No. 25, P. 521

In February 2013, the Advisory Committee on Immunization Practices (ACIP) recommends the routine use of 13-valent pneumococcal conjugate vaccine (PCV13) for prevention of invasive pneumococcal disease in children aged six to 18 years who have immunocompromising conditions, functional or anatomic asplenia, cerebrospinal fluid leaks, or cochlear implants, and have not previously received PCV13. A study of 158 children, aged six to 18 years, with sickle-cell disease who previously received the 23-valent pneumococcal polysaccharide vaccine (PPSV23) showed that one dose of PCV13 was safe. Recommendations for use of PPSV23 for children in this age group have not changed. The new recommendation changes from permissive and off-label recommendation of PCV13 in the pediatric immunocompromised population to a category A recommendation. PCV13 is already recommended for all children aged two months to 59 months and for children aged 60 to 71 months with chronic medical conditions.

Novartis Says FDA Expands Age Indication For Meningococcal Vaccine Menveo
By RTT News, August 01, 2013, 06:45:00 PM EDT

(RTTNews.com) - Novartis AG (NVS) said Thursday (August 1) that the US Food and Drug Administration has approved Menveo for the prevention of meningococcal disease caused by four strains of the bacterium Neisseria meningitidis in infants and toddlers from 2 months of age.
With the expanded indication, pediatricians in the US can now offer a single vaccine for the protection of infants, children and adolescents against four of the five most common serogroups that cause meningococcal disease.

The FDA approval was based on data from three randomized multicenter studies involving more than 8,700 infants, conducted in Australia, Canada, Latin America, Taiwan and the US. The studies showed that Menveo generated a robust protective immune response and was generally well tolerated when administered with other routine pediatric vaccines.

Infants younger than 7 months old are the most vulnerable age group to meningococcal disease in the US. In their first year of life, infants are more than seven times more likely to contract the disease than 14 to 24 year olds. Of the infants who contract the disease, more than 10 percent will die from it and of those who do survive, approximately one in every five will suffer permanent, devastating side effects, including amputations, hearing loss, paralysis and brain damage.

(Editorial Note: ACIP recommends meningococcal vaccine for persons aged ≥2 months with certain medical conditions such as anatomical or functional asplenia or complement component deficiency. When this recommendation was published (MMWR / March 22, 2013 / Vol. 62 / No. 2) Hib-MenCY-TT (MenHibrix) was the only meningococcal vaccine licensed for infants 2 months or older.)

Cost-Effectiveness of Using 2 vs 3 Primary Doses of 13-Valent Pneumococcal Conjugate Vaccine
Pediatrics (07/13) Stoecker, Charles; Hampton, Lee M.; Link-Gelles, Ruth; et al.

Removing the third dose from the four-dose series of the 13-valent pneumococcal conjugate (PCV13) vaccine may promote cost savings but might also result in a moderate increase in pneumococcal disease, researchers suggest. The PCV13 vaccine is effective in preventing pneumococcal disease, but it is also the most expensive vaccine on the recommended U.S. pediatric schedule. Researchers used a model following a single birth cohort of 4.3 million to calculate societal cost savings and increased disease burden by removing the six-month dose of PCV13. The results showed that removing the third dose of PCV13 would save $500 million annually (in 2011 dollars), but it would also lead to an estimated 2.5 additional deaths among inpatients with pneumonia or invasive pneumococcal disease. In addition, the estimates suggest that removing this dose would result in 261,000 estimated otitis media cases and 12,000 estimated pneumonia cases annually. However, the researchers note, the additional illnesses may be prevented by a modest increase in vaccine coverage.

Why HPV Vaccination Can't Wait
by **Larry K. Pickering, M.D., FAAP**
AAP NEWS July 2013

A vaccine is available that prevents cancer, but only 50% of eligible adolescent girls and far fewer adolescent boys have been provided this protection. Rates of human papillomavirus (HPV) vaccine uptake for adolescent females during 2012 have not changed from rates in 2011.

Research indicates that pediatricians anticipate a "difficult" conversation when talking with parents of an 11- or 12-year-old about the HPV vaccine because it may involve a discussion of sexual issues. However, this does not need to be the case. Research shows that HPV vaccine acceptance, like any childhood or adolescent vaccine, is influenced predominantly by your strong recommendation. This means not just suggesting that parents consider HPV vaccine, or mentioning casually that it's available, but presenting the vaccine with the conviction and urgency that it deserves — that HPV vaccine will prevent several types of cancer, and this prevention should begin today.

"A conversation about HPV vaccination isn't difficult. A difficult conversation is one I have nearly every week — when I have to look a young woman in the eye and tell her she may no longer be able to have children — or even worse, that she may die from cervical cancer. *That's* a difficult conversation," said Daron Ferris, M.D., professor in the Department of Obstetrics and Gynecology at Georgia Regents University Cancer Center.
HPV vaccine is cancer prevention — and it can't wait. Not only does the immune system respond better at the recommended 11- to 12-year-old range when initiating the HPV vaccine series, but protection begins immediately after the recommended doses are given.

For each year HPV vaccine rates stay at 30% coverage instead of achieving 80%, 4,400 future cervical cancer cases and 1,400 cervical cancer deaths will occur. Let's remove HPV vaccination from the realm of sexuality and place this childhood vaccine where it belongs — as cancer prevention. Just like any other vaccine, HPV vaccine needs to be given well before exposure occurs. Don't let *your* patients become an oncologist's patients in 20 years. We have a powerful tool to prevent cancer now, and we must not fail to protect the children in our care.

ACIP updates U.S. vaccine abbreviations
On April 1, CDC posted ACIP Abbreviations for Vaccines on its website.
http://www.cdc.gov/vaccines/acip/committee/guidance/vac-abbrev.html

The standardized abbreviations are intended to provide a uniform approach to vaccine references used in ACIP recommendations that are published in *MMWR*, CDC's "Pink Book," the American Academy of Pediatrics' "Red Book," and the U.S. immunization schedules for children, adolescents, and adults. The version posted on April 1 features revised abbreviations for the influenza vaccines approved for use in the 2013–14 influenza season.

On July 11, CDC posted Vaccine Acronyms & Abbreviations.
http://www.cdc.gov/vaccines/about/terms/vacc-abbrev.htm

It differs from the ACIP version mentioned above in that it contains abbreviations for currently used and older vaccines, including some non-standard abbreviations that can be found on immunization records from years past.

Pneumonia vaccine said to reduce U.S. hospitalizations
Wed, Jul 10 2013 By Gene Emery

NEW YORK (Reuters Health) - The seven-strain pneumonia vaccine used in the U.S. beginning in 2000 has prevented 168,000 hospitalizations for the disease each year since, and its effectiveness showed no signs of waning, a new study concludes. The biggest benefit, by far, was seen among people age 85 and older, for whom the so-called 7-valent pneumococcal conjugate vaccine, marketed as Prevnar, prevented 73,000 hospitalizations annually.

Children under two years old were also major beneficiaries - an estimated 47,000 pneumonia hospitalizations were prevented per year - a reduction of 43 percent compared to before the vaccine was available, according to the findings published in the New England Journal of Medicine.

"This is only the hospitalizations," lead author Dr. Marie Griffin of Vanderbilt University Medical Center in Nashville, Tennessee, told Reuters Health. "This is only one piece of what this vaccine is doing. It's also preventing ear infections and outpatient visits. It's really an amazing vaccine."

She and her colleagues calculated that in all age groups, about 12,000 deaths were also prevented annually over the past 12 years, but most were among people 75 years and older. In that age group, pneumonia is fatal for 7 to 12 percent of those who get it.
A newer vaccine, Prevnar 13, that protects against six additional pneumonia strains has been in use since 2010. As a result, "there's an expectation there will be another big decline," Griffin said in a telephone interview.

The fact that hospitalization rates declined - and remained low - after the seven-strain vaccine was added to U.S. immunization schedules alleviates concerns that other strains not covered by the vaccine would become more common, the researchers said.
"The worry was that the (strains) not included in the vaccine may actually take over and that didn't happen, so this was good news," Dr. Paul Goepfert, director of the Vaccine Research Clinic at the University of Alabama at Birmingham, told Reuters Health by phone. He was not involved in the new study.

Griffin and her colleagues also found that, for all age groups, the time spent in the hospital for pneumonia treatment was a bit shorter after the vaccine was introduced.
The vaccine's effect on hospitalization rates for children ages 5 to 17 years old and adults 18 to 39 was not significant, but those groups had the lowest rates before the vaccine was introduced.

Pneumonia accounted for just over four percent of all U.S. hospitalizations that didn't involve childbirth before the original seven-strain vaccine was introduced.
Griffin pointed out that the reduction in elderly hospitalization rates happened despite the fact that children are the only group who are routinely vaccinated against pneumonia.
"This was a very nice demonstration of herd immunity," Goepfert said. "It's neat that a vaccine in kids can protect adults."

He added that the findings offer more evidence that doctors can use to encourage parents who may be reluctant to get their kids vaccinated.
"The clinician can say, 'This is not only helping your child, it's helping the adults around your child,'" said Goepfert.
SOURCE: New England Journal of Medicine, online July 10, 2013.

Meningitis B Vaccine Rejected by UK
Guardian (United Kingdom) (07/24/13) Boseley, Sarah

The U.K. Joint Committee on Vaccines and Immunization (JCVI) has rejected Novartis' Bexsero vaccine, the first to protect children against meningitis B. JCVI said there was not enough evidence to show that Bexsero will protect children well enough to justify routine vaccination. The committee considered all the research, including studies of the vaccine commissioned in the United Kingdom. Bexsero was licensed in January. European authorities licensed the vaccine "in the absence of key data to support an assessment of effectiveness and cost-effectiveness," noted the JCVI. However, no country has added Bexsero to their national immunization program yet. The data on the effectiveness of the vaccine comes from measuring the levels of antibodies to the meningococcal bacteria in the blood of vaccinated individuals, rather than from observing how many vaccinated versus unvaccinated children become ill.

Updated Recommendations for Use of VariZIG--United States, 2013
Morbidity and Mortality Weekly Report (07/19/13) Vol. 62, No. 28, P. 574

The U.S. Food and Drug Administration approved VariZIG, a varicella zoster immune globulin preparation, in December 2012 for postexposure prophylaxis of varicella for high-risk persons who do not have immunity to varicella and for whom the varicella vaccine is contraindicated. VariZIG is the only varicella zoster immune globulin preparation currently available in the United States. It can be administered as soon as possible after varicella-zoster virus exposure but ideally within 96 hours or four days for the highest effectiveness. The Centers for Disease Control and Prevention (CDC) has revised the patient groups recommended by the Advisory Committee on Immunization Practices to receive VariZIG, harmonizing them with the American Academy of Pediatrics recommendations. According to the CDC, the decision to administer VariZIG depends on whether the patient lacks evidence of immunity to varicella, whether the exposure could lead to infection, and whether the patient is at higher risk of varicella complications compared to the general population. The CDC recommends that specific patient groups receive VariZIG: immunocompromised patients without evidence of immunity, newborn infants whose mothers have signs of varicella around the time of delivery, hospitalized premature infants, and pregnant women without evidence of immunity.

6 Cases of Congenital Rubella Syndrome Identified in US Since 2004
Red Book Online Special Alert – July 18, 2013

In 2012, three infants were born with congenital rubella syndrome (CRS) in the United States. All had severe defects, and one died. In all three cases, the mothers likely were exposed to rubella in Africa, and none had documentation of vaccination against the disease.
With elimination of endemic rubella in the United States, CRS occurs infrequently (six cases identified since 2004). However, rubella continues to circulate in other areas of the world, especially Africa. It is important that health care providers know the immunization status of all women of childbearing age, especially those who are planning to travel internationally.
Health care professionals should consider CRS in any infant with compatible birth defects, so that appropriate laboratory confirmation, epidemiologic investigation, and counseling can be performed.