

Children's vaccines protect communities and save lives

By Dr. Todd Huffman

For The Register-Guard, July 12, 2007

When it comes to children's health, prevention is always better than treatment. Nowhere is this more evident than with immunizations.

Vaccines help prevent infectious diseases and save lives. Childhood immunizations are responsible for the control of many infectious diseases that were once common in this country, including polio, measles, diphtheria, pertussis (whooping cough), rubella (German measles), mumps, chickenpox, hepatitis B, tetanus and Haemophilus influenza type b (Hib).

While the United States has near-record low cases of vaccine-preventable disease, the viruses and bacteria that cause them still exist. Vaccines can usually prevent such germs from causing disease in people who are exposed to them, and can usually protect those who come in contact with contagious unvaccinated individuals.

Vaccines also protect communities, by reducing or eliminating the spread of certain infectious diseases.

Prior to the availability of vaccines, thousands, sometimes millions, of children became infected with diseases that often resulted in lifelong disabilities or death.

But four decades of successful mass immunization programs have vastly reduced these awful numbers to the degree that many parents wonder whether these diseases still exist. They do, and they can be just as deadly.

Because many parents today have never seen a child with such diseases as measles or whooping cough, they mistakenly believe that they are simply mild childhood diseases.

In the case of measles, the truth is that before the vaccine became available in 1963, measles killed 3,000 U.S. children and caused nearly 50,000 hospitalizations annually.

The number of measles cases decreased by more than 98 percent in the following decades, until the late 1980s, when a drop in measles immunization rates resulted in a deadly outbreak that resulted in 11,000 hospitalizations and the death of 123 children. Since then, with improved vaccination rates, these numbers have fallen, and measles is once again rare in the United States.

This is why we have to be so diligent about vaccinating our children against illnesses. The fact that we don't see certain diseases anymore does not mean they do not exist. It simply means that the vaccines are working. And they will continue to work, and protect children and society, only so long as we continue to immunize our children.

The United States has the safest, most effective vaccine supply in history. Many years of testing are required by law before a vaccine can be licensed. And once in use, vaccines are continually monitored for safety and efficacy. The Centers for Disease Control and the Food and Drug Administration continually work to make vaccines even safer.

That is not to say that vaccines come without risks. Immunizations, like any medication or herbal remedy, can cause side effects. However, a decision not to immunize also involves risk. It is a

decision to put the child and others who come in contact with him or her at risk of contracting a disease that could be dangerous or deadly.

Witness the recent small outbreak of measles cases here in Lane County, during which one unvaccinated individual who became infected while in Japan returned to spread the disease to another unvaccinated individual. Both individuals put many others at risk.

In most cases, vaccines are effective and cause no side effects, or only mild soreness at the injection site. Uncommon side effects include fever and local allergic reactions. But when weighed against the risks of complications from the diseases themselves, such side effects seem pretty minor.

For example, there is whooping cough. Upwards of 40 percent of adults carry the germ that causes this disease. Roughly one in 20 infants and young children who become infected and who are unvaccinated, will die from whooping cough if the disease is not recognized and treated very early. And it is a horrible death; infants literally cough themselves to death over a period of a few weeks.

For another example, there is Haemophilus influenza type b (Hib), which was once the leading cause of meningitis in children. Children who survived often suffered lifetime disabilities, such as mental retardation or deafness. Most physicians have not seen a case of this awful and now preventable disease in 15 years since children began to be vaccinated against it, even though the bacteria still exists in our everyday environments.

Other parents worry not so much about side effects, but rather whether giving so many vaccines early in life overwhelms the child's immune system, suppressing it so it does not function properly. There is no evidence that this is the case. Parents should rest easy knowing that their baby's immune system fights off hundreds, perhaps thousands, of real live germs every day, and therefore can handle the 125 or so antigens, or germ particles, to which they are exposed once they've received their entire host of vaccinations.

Some people should not get certain vaccines or should wait to get them. If you or your child has an underlying disease, discuss with your doctor whether to proceed with vaccinations. However, a person with a mild, common illness, such as a cold with a low-grade fever, does not have to wait to be vaccinated.

As with most anything regarding your child's health, contact your child's pediatrician, family physician or nurse for more information. And don't wait to vaccinate!