

Pharmaceuticals Europe

# Medicines and Vaccines for children



## Our commitment

**We are committed to researching and developing medicines and vaccines for children and adults. Many of our medicines are labelled for paediatric use, including treatments for asthma, HIV and AIDS, cancer, migraine, diabetes, infectious diseases, epilepsy and eczema. We also market over 25 vaccines to protect children against illnesses such as chicken pox, diphtheria, flu, whooping cough, measles, meningitis, mumps, polio, rotavirus and rubella.**

## Clinical research

The safety of our products is of vital importance. Therefore the journey from molecule to medicine involves a series of studies in both animals and humans to ensure that the medicine is as safe and effective as possible. Conducting research into paediatric medicines and vaccines is highly complex, however, without such research children will not receive the best treatments. We ensure that research undertaken on children respects and protects their vulnerability.

We make the results of all our clinical trials, including paediatric trials, widely available to healthcare practitioners and others who use or evaluate the use of our medicines. We also publicly disclose information on ongoing trials on [www.ctr.gsk.co.uk](http://www.ctr.gsk.co.uk)

## Research and development

We dedicate substantial proportions of our research and development programmes to diseases which affect the poorest countries and are proud to be the number one provider of vaccines to UNICEF.

In March 2007 we announced the submission of a regulatory file to European Agency for the Evaluation of Medicinal Products (EMA) for the combination vaccine candidate *Globovix*<sup>™</sup> (diphtheria, tetanus, pertussis, hepatitis B, Haemophilus influenzae type b, Neisseria meningitidis serogroups A and C). This vaccine candidate could be available as early as 2008 and has the potential to break the cycle of meningitis epidemics in Africa.

## What we are doing

More than 10 million children under the age of five die each year. Two-thirds of these deaths are preventable. We currently offer treatment options, or are active in R&D, for the six major diseases which affect children and account for 90% of childhood deaths.

## Pneumococcus

Pneumococcus is a bacterium that causes meningitis, pneumonia and ear infections. It kills 1.6 million people every year, including over a million children under the age of five. Our pneumococcal vaccine candidate targets the most dangerous strains worldwide and includes three groups of viruses that are not in any currently available pneumococcal vaccine, and which are of particular importance in the developing world.

## Rotavirus

Rotavirus is the leading cause of severe diarrhoea and vomiting (gastroenteritis) in children under five. It causes misery in young children, considerable disruption to parents' lives and places a significant burden on hospitals admitting children. In developing countries around 600,000 children die from rotavirus each year. Our rotavirus vaccine was first launched in Mexico in January 2005, where the burden of this disease is the greatest. It has now been licensed in 97 countries including 25 countries in Europe, and children are already benefiting from the vaccine in 61 countries. *Rotarix*<sup>™</sup> received the 2006 UK Prix Galien Award for pharmaceutical innovation, representing one of the highest accolades in the development of new medicines.





## Malaria

Malaria is an infectious disease that is widespread in tropical and subtropical regions. It infects between 300 and 500 million people every year and causes between one and three million deaths annually, mostly among young children in Sub-Saharan Africa. Our anti-malarial medicines provide treatment for, and prevention of, malaria and are available at not-for-profit prices in sub-Saharan Africa. We hope to submit the world's first effective malaria vaccine for children in Africa to regulatory authorities in 2010.

## Measles

Measles is a viral infection which mainly affects young children, causing fever, conjunctivitis, coughing and a rash, and may lead to serious, even fatal, complications such as pneumonia, diarrhoea and encephalitis. Before the launch of the World Health Organization's (WHO) extended programme on immunisation in 1974, measles killed several million children every year. As vaccine coverage is still less than 80% of children worldwide, measles remains one of the most fatal childhood diseases. We offer a combined measles, mumps and rubella vaccine which is normally given in two doses: one at about 12 to 15 months of age and a second before starting school.

## HIV and AIDS

Today, approximately 2.2 million children are infected by HIV which is transmitted from mother to child before birth, at birth or through breast feeding. Liquid formulations of HIV medicines are currently the only way to treat very young children, and all our single ARVS are available in liquid forms. They are not always easy to use, however, in a developing world setting and we are currently assessing the development of new ways to administer the right dose efficiently and safely to older children. We are committed to the development of a safe and effective AIDS vaccine and are pursuing four different approaches. With approximately three million people dying from AIDS and five million people becoming infected with the HIV virus every year, even a partially effective vaccine has the potential to save millions of lives.

## Asthma

In the western world, asthma is one of the most common lung problems in children with about one in 10 children suffering at some point during childhood. Some children with asthma just need a reliever medicine, however, others need everyday treatments that are designed to prevent symptoms as well as more serious attacks.

We have an extensive portfolio of products for the treatment of childhood asthma, all of which are available in formulations that are specially designed to make them easy to use. Ventolin™ was one of the first inhaled treatments available via spray for relief of symptoms and treatment of asthma attacks. We have made it available for nebulisation, with an indication for the treatment of acute asthma in infants and children.





## Community focus on European children's health

Our community programmes focus on children's health, with each programme based on a criteria to enable the best chance of creating maximum benefit for children. They also ensure that we can reproduce successful programmes in other countries. We are proud to be a founding partner of The Barretstown Gang Camp in County Kildare, Ireland, the first programme of its kind in Europe to provide therapeutic recreation for seriously ill children. Other children's health community programmes include:

- **Social exclusion programme for young people affected by HIV and AIDS in Romania**
- **L'Envol in France a medically orientated camp for children undergoing treatment**
- **In Spain, a programme focusing on healthcare in children's shelters**
- **In Russia, the community based programme 'Multi-coloured lives' aims to improve the quality of life of children with disabilities.**

### Key facts

- Our mission is to improve the quality of human life by enabling people to do more, feel better and live longer
- Globally we employ 100,000 employees in 116 countries
- We make almost four billion packs of medicines and healthcare products every year
- Over 15,000 people work in our research teams to discover new medicines
- We screen about 65 million compounds every year in our search for new medicines
- We supply one quarter of the world's vaccines
- We believe GSK remains the only pharmaceutical company researching both new vaccines and treatments for HIV and AIDS, TB and Malaria – the World Health Organization's three priority diseases.



For more information please see [gsk.com](http://gsk.com)