

International PolioPlus Committee
PolioPlus Facts and Figures
January 2018

1. The goal of the PolioPlus program:

The goal of the PolioPlus program is the global certification of polio eradication. By eradication, the World Health Organization (WHO), the Global Commission on Certification and Rotary mean the interruption of the transmission of all polioviruses.

2. Rotary's financial contribution to the polio eradication effort:

By the time the world is certified polio-free, Rotary's contributions to the global polio eradication effort will exceed US\$2.2 billion, including over US\$985 million in matching funds from the Bill & Melinda Gates Foundation. Rotary's contribution to the Global Polio Eradication Initiative since 1988 accounts for nearly 14% of all contributions through June 2017 and represents approximately 42% of private sector contributions.

Rotary is the leading non-governmental voluntary organization contributor to the GPEI.

3. Rotary's volunteer contribution to the polio eradication effort:

Rotary has mobilized a legion of volunteers who are providing support during vaccination campaigns, mobilizing their communities for polio eradication activities, raising funds and awareness for polio eradication, and advocating for the cause with government officials. More than one million Rotarians worldwide have contributed toward the success of the polio eradication effort.

4. The budget for the Global Polio Eradication Initiative:

The budget for the Global Polio Eradication Initiative is prepared by WHO and UNICEF in consultation with their country offices, and ministries of health. It is reviewed and revised regularly to reflect changing epidemiology as well as new contributions and financial commitments made by Rotary and others to the program. Further information is available www.polioeradication.org.

5. Funding requirements of the global polio eradication effort:

From 2013 until the certification of eradication, an estimated US\$7 billion in donor contributions is needed to fully implement the activities of the *Polio Eradication and Endgame Strategic Plan*.

6. Activities that Rotary's contributions support:

Rotary provides grant funding to WHO and UNICEF for the following activities:

- Technical assistance including salaries for technical advisors
- Operational support to ensure the vaccine reaches all children; including stipends for the millions of volunteers who administer the vaccine and perform house-to-house follow up visits
- Surveillance for disease detection, including the polio laboratory network
- Social mobilization to raise awareness of the vaccination campaigns and the benefits of immunization
- Research into new products and approaches to facilitate eradication
- Transition planning to ensure the orderly transition of polio immunization activities to routine immunization following the eradication of polio.

7. The number of countries benefiting from PolioPlus grants:

To date, 122 countries around the world have benefited from PolioPlus grants.

8. The number of polio cases prevented annually through immunization:

From the launch of the Global Polio Eradication Initiative in 1988, more than 17.4 million people, mainly in the developing world, who would otherwise have been paralyzed, are walking because they have been immunized against polio. More than 650,000 paralytic cases of polio are now prevented every year.

9. The number of children that will be paralyzed every year if we do not eradicate polio:

If polio is not eradicated, within 10 years, as many as 200,000 children could be paralyzed by it each year. A polio-free world will be a safer world for children everywhere.

10. The number of children immunized against polio:

Since 1988, more than 2.5 billion children have received oral polio vaccine.

In 2016, more than 450 million children were vaccinated in more than 45 countries using more than two billion doses of oral polio vaccine.

11. The percentage of the world's children that live in polio-free countries:

In 1988, 10% of the world's children live in polio-free countries; in 2016, over 95% are living in polio-free countries.

12. The number of polio cases in the world:

The number of polio cases has declined by more than 99.9% from over 350,000 in 1985 to 37 in 2016.

13. The cost to fully vaccinate a child:

It costs an average of US\$3.00 to fully protect a child against polio, including the cost of the vaccine and activities required to deliver the vaccine such as transportation costs, vaccinator stipends, vaccine carriers, chalk to mark houses after each visit, and dye to paint children's fingers purple to indicate they have been vaccinated. A child must receive multiple doses of polio vaccine to be fully protected and therefore must be reached multiple times.

14. The number of polio endemic countries:

Since 1988, the number of polio endemic countries declined from over 125 countries to three in 2016 (Nigeria, Pakistan, Afghanistan).

15. The number of countries that are polio-free and the number of people who live in countries, territories, and areas that have been certified polio-free:

Two hundred and ten (210) countries, territories and areas are now free from indigenous polio, and 145 of these have been certified polio-free by independent commissions. In March 2014, the WHO South-East Asia Region was certified polio-free, joining the World Health Organization regions of the Americas, the Western Pacific, and Europe. Almost six billion people or 90% of the world's population lives in the 145 countries, territories and areas that are now certified polio-free.

16. Polio in Nigeria, Pakistan and Afghanistan:

Wild poliovirus transmission is at the lowest levels ever, with fewer cases reported from fewer areas of fewer countries than ever before. In 2016, 37 cases of wild poliovirus were reported from Nigeria, Pakistan and Afghanistan compared to 74 cases in 2015.

Nigeria had not reported a case of wild poliovirus since July 2014 and was subsequently removed from the list of endemic countries in September 2015. However, in August 2016, four new cases were confirmed in Borno state in the northeast. Confirmation of these cases underscores the risk continued low-level undetected transmission poses to children and countries everywhere. An emergency, multi-country regional outbreak response was launched immediately to stop this outbreak.

17. The risk of polio in polio-free countries:

As long as indigenous wild poliovirus transmission continues anywhere in the world, the risk of international spread of poliovirus remains. Particularly vulnerable are high-risk countries, i.e., those bordering endemic areas, those with close socio-cultural-economic ties to endemic areas and those with low routine immunization levels.

In 2013 and 2014, new outbreaks occurred in Cameroon, the Horn of Africa (centered on Somalia), and the Middle East (with cases confirmed in Syria). While aggressive outbreak response activities rapidly stopped these outbreaks, they underscore the danger ongoing transmission continues to pose to polio-free countries everywhere.

18. Rotary's advocacy efforts:

In 1995, Rotary launched a task force to advocate the cause of polio eradication to donor governments. The work of this task force has helped secure more than US\$8 billion in contributions and commitments from donor governments to the Global Polio Eradication Initiative. These advocacy efforts are ongoing and will be continued as necessary.

Polio-specific contributions by governments can be found at:

http://polioeradication.org/wp-content/uploads/2017/06/Copy-of-Historical-Contributions_31May2017.pdf

19. Rotary’s engagement with other organizations related to polio eradication:

The Global Polio Eradication Initiative (GPEI), launched in 1988, had four *spearheading* partners: the World Health Organization (WHO), Rotary, the US Centers for Disease Control and Prevention (CDC) and United Nations Children’s fund (UNICEF).

Since the Bill & Melinda Gates Foundation joined the GPEI, the five *core* partners are WHO, Rotary, CDC, UNICEF and Bill & Melinda Gates Foundation.

Rotary is the leader of a *coalition* to advocate for increased contributions by the US Government to global polio eradication. The other members include the United Nations Foundation, Task Force for Global Health, US Fund for UNICEF, American Academy of Pediatrics, and March of Dimes.

20. Global certification of polio eradication:

An independent commission will consider global certification when no wild poliovirus has been detected for at least three years, in the presence of certification-standard surveillance, and all poliovirus stocks have been appropriately contained.

21. Cessation of polio immunization with oral polio vaccine (OPV):

After certification of eradication, appropriate containment of poliovirus stocks, and establishment of sufficient polio vaccine stockpiles, routine immunization with OPV will stop. This will occur in a phased manner the first of which was conducted in April 2016 through the globally synchronized switch from trivalent to bivalent OPV in 155 countries around the world over a two-week period. It marked the single-largest and fastest global vaccine replacement in history.

22. Estimated annual global savings after cessation of immunization:

Once polio has been eradicated, the world will reap substantial financial, as well as humanitarian, dividends due to foregone polio treatment and rehabilitation costs. Depending on national decisions on the future use of polio vaccines, these savings could exceed US\$1 billion per year. A study published in November 2010 in the leading medical journal *Vaccine* estimates the economic benefit of the GPEI at between US\$40-50 billion based on activities from 1988 to 2035.

“Economic Analysis of the GPEI” *Vaccine*. Vol. 28, Issue 50, pp 7825-8048 (23 November 2010).

23. The annual cost of immunization against polio of children in the United States:

The United States Centers for Disease Control and Prevention (CDC) estimates that more than US\$640 million per year is spent on immunizing children in the United States against polio.

24. Types of poliovirus:

There are three types of wild poliovirus. Type 2 wild poliovirus last occurred in October 1999 and was certified eradicated in September 2015. Type 3 wild poliovirus has not been found since November 2012, suggesting that only Type 1 wild poliovirus continues to circulate.

25. Instances of vaccine-derived polio:

Circulating vaccine-derived poliovirus (cVDPV) occurs when high proportions of children are susceptible to poliovirus infection due to very low vaccination coverage. If routine or supplementary immunization activities are poorly conducted, the population is left susceptible to poliovirus, whether from vaccine-derived or wild poliovirus. Hence, the problem is not with the vaccine itself, but low vaccination coverage. If a population is fully immunized, they will be protected against both vaccine-derived and wild polioviruses.

Since 2000, there have been 29 episodes of cVDPVs resulting in 787 polio cases (511 of which were in Nigeria and Pakistan). During that period, over 15 billion doses of OPV were administered to more than 2.5 billion children, and as a result more than 10 million polio cases were prevented.

In 2017, two new cVDPV outbreaks emerged in Syria and the Democratic Republic of the Congo. Outbreak response in both countries is ongoing to stop these strains.

26. Vitamin A distribution during polio National Immunization Days (NIDs):

Since 1998, the inclusion of Vitamin A supplements during NIDs has averted an estimated 1.5 million childhood deaths. Vitamin A comes in liquid form in soft gelatin capsules that are opened to give as drops. It is an essential nutrient that is needed for healthy growth and development. Vitamin A deficiency can lead to blindness, increased risk of infection, and a 25% greater risk of dying from childhood diseases such as measles, malaria and diarrhea.