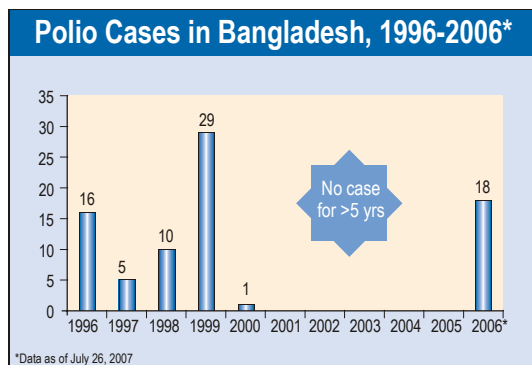


# Polio Eradication in Bangladesh



Routine immunization is conducted at refugee camps.

Concerted efforts to eradicate polio in Bangladesh, resulted in the country being declared polio free in August 2000. This status was maintained for over 5 years. On 8 March 2006, an AFP case identified by the national surveillance system in Chandpur district, in Chittagong division was found to be a polio case by the Global Specialized Polio Laboratory (GSPL) in Mumbai, India, which tests all polio virus isolates from Bangladesh. They reported a wild polio virus type 1 isolate, from the 9 year old child who had had an onset of paralysis on 23 January 2006. On 10 March, the GSPL confirmed that the genetic analysis showed that this wild poliovirus was an importation and not native to Bangladesh.



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In Bangladesh, routine immunization began in 1979 and this was expanded to include the whole country by 1985. AFP surveillance was strengthened with introduction of the Surveillance Medical Officer (SMO) network in 1999. Passive surveillance was upgraded in 2003. Non polio AFP rate has increased significantly from 0.87/ 100,000 children under 15 years in 1999 to 2.34/100,000 children under 15 years in 2001 and the rate has been above 2 during last 5 years, signifying effective surveillance. A combination of high routine OPV coverage and high OPV coverage during NIDs contributed to make Bangladesh polio free in 2000. Only one case was reported in 2000 as compared to 29 cases in 1999.

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After the March 2006 polio case, the Government of Bangladesh responded to this threat very quickly and efficiently with the help of the International Rapid Response Team. As per recommendations by the experts, the government decided to conduct 3 rounds of NIDs to stop the spread of this wild virus. The first round of NID was conducted within five weeks of polio virus notification, setting a global record for the quick response time to an importation. All three rounds were conducted between April and June 2006. However, as polio cases were still occurring

over a wide geographical area throughout the country, the government decided to conduct a 4th round of NID in the first week of August.

This was followed by a mop-up campaign in mid October 2006 in Chittagong District, Chittagong City Corporation and adjoining part of Cox's Bazar District as there were four cases reported from one upazila (sub-district) of Chittagong.

In 2007, Bangladesh has conducted two rounds of NIDs. In March there were reports of a polio outbreak in Myanmar and this was believed to be an importation from Bangladesh. Again, one polio case of Myanmar visited Bangladesh and received treatment during the period of virus shedding. Due to the Polio outbreak in Myanmar, Bangladesh also conducted two additional rounds of Mop-up Campaign in Chittagong including City Corporation, Cox's Bazar and Bandorban in May and July 2007 synchronized with the Mop-up Campaign of Myanmar. Since 1995, Bangladesh has conducted 15 rounds of NIDs and one Sub-NID. The last round of NID was conducted in April 2007. Since the 9th NIDs, the coverage has been more than 95%.

So far Bangladesh has reported 18 wild polio cases after importation in 2006, the last has had onset of paralysis on 22 November 2006.

For the future, there will be one NID with two rounds in October and November 2007. After this each year from 2008, Bangladesh will conduct one NID with two rounds till such time that India becomes polio free. Meanwhile, routine EPI and AFP surveillance have also been heightened.

Routine EPI sessions are now conducted as per yearly planned sessions. Much effort has been made to produce pragmatic micro plans for routine EPI. Supervision and monitoring of routine EPI have been strengthened. Data Quality Self Assessment tools are in operation to improve the quality of routine immunization. Vaccination at border posts has also been strengthened.

In order to intensifying surveillance, divisional/ district level periodic surveillance review using a Checklist is being done. Tracking of the late reported cases to detect and address the loopholes

of the system has been started. Sensitization and re-orientation of health care providers is going on as per need.

For last seven months Bangladesh did not report any polio case but the genetic sequencing of the polio virus found in Myanmar and pockets of under performing areas in the country suggest that there is still a possibility of low grade transmission of polio. Bangladesh has to take the challenge and prove that it has once again become polio free. ■

