The Value of Vaccines

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Disclaimer: These notes were taken by AIM staff who read the report. These are not official notes provided by International Vaccine Access Center.

The Value of Vaccines report summarized recent evidence demonstrating how vaccines provide incredible value in more ways than one. In addition to saving the lives of millions of children, vaccine programs also provide a high economic return on investment. New research from the Decade of Vaccine Economics (DoVE) project and the Vaccine Impact Modelling Consortium demonstrates the impact and value of vaccination for policy makers.

The Value of Vaccines: Investments in Immunization Yield High Returns

Key Messages

- Every US $1 invested in vaccine programs returned an estimated $20 in saved healthcare costs, lost wages, and lost productivity.
- Using a Value of Statistical Life approach to model the value of immunization, vaccine programs returned an estimated US $52 for each $1 invested.
- In the next decade, vaccination against 10 pathogens is projected to save 32 million lives globally.
- With a dip in childhood vaccinations due to COVID-19, this data really highlights what "may be lost if current vaccination is not sustained."

Lives Saved

- The 10 vaccine-preventable diseases included in the analysis were: hepatitis B, *Haemophilus influenzae* type b (Hib), human papillomavirus (HPV), Japanese encephalitis, measles, meningitis A (Neisseria meningitidis serogroup A), pneumococcal disease (Streptococcus pneumoniae), rotavirus, rubella, and yellow fever.
- From 2000 through 2019 these 10 vaccines saved 37 million lives and reduced deaths in children under 5 by 45%.
- Vaccination against measles had the largest impact by averting 33 million deaths. Between 2020-2030 it is predicted measles vaccination will avert 2.1 million deaths per year.

The Economic Benefits of Vaccine Programs far Outweigh Their Costs

- The **Cost of Illness approach** captures the observable impact of immunization programs on household costs, health care costs, and labor productivity.
- The **Value of a Statistical Life approach** reflects the less tangible costs associated with societies' willingness to pay for saving lives.
- Assessing return on investment based on the value societies place on the Value of a Statistical Life approach, vaccine programs will return about US $52 for every $1 spent from 2021 to 2030. For comparison, publicly traded American companies in the S&P 500 have returned an average of US $2.16 for every $1 invested after ten years.
- Vaccination against measles accounted for most economic benefits (76.4% using the Cost of Illness modeling approach and 58.5% using the Value of a Statistical Life approach modeling approach) generated by vaccine programs.

The Value of Immunization Compendium of Evidence, *The Value of Vaccine Programs*, February 2021, https://www.jhsph.edu/ivac/wp-content/uploads/2020/11/Vaccine-ROI-Policy-Brief-Nov-20.pdf

The Value of Immunization Compendium of Evidence, *The Value of Vaccines: Investments in Immunization Yield High Returns*, February 2021, https://immunizationevidence.org/featured_issues/the-value-of-vaccines-investments-in-immunization-yield-high-returns/