

Vaccine Vial Monitor Update

Polio Sabin™ [oral]

Vaccin antipoliomyélique ; vivant atténué.
Poliomyelitis vaccine ; live attenuated.
Vacuna antipoliomielítica ; viva atenuada.

Cons. : + 20°C.

1 dos. = 2 gouttes, drops, gotas.

Polio virus / TCID50 / dos. I 10⁶ ; II 10⁶ ; III 10⁶.

SB BIOLOGICALS - Rixensart - BELGIUM.



10 dos.

526643

Description of Vaccine Vial Monitor (VVM)

A VVM contains a heat sensitive material that registers cumulative heat exposure over time.



VVMs on OPV Containers

Can This Vaccine Be Used?





Vaccine Vial Monitor *VVM says....*

The square is lighter than the circle.
If the expiry date is not passed, *use* the vaccine

The square is lighter than the circle.
If the expiry date is not passed, *use* the vaccine

The square matches the circle.
Do *not* use the vaccine. Inform your supervisor

The square is darker than the circle
Do *not* use the vaccine. Inform your supervisor

VVMs Will Be On All Vaccines Purchased By UNICEF This Year

BCG

Tetanus

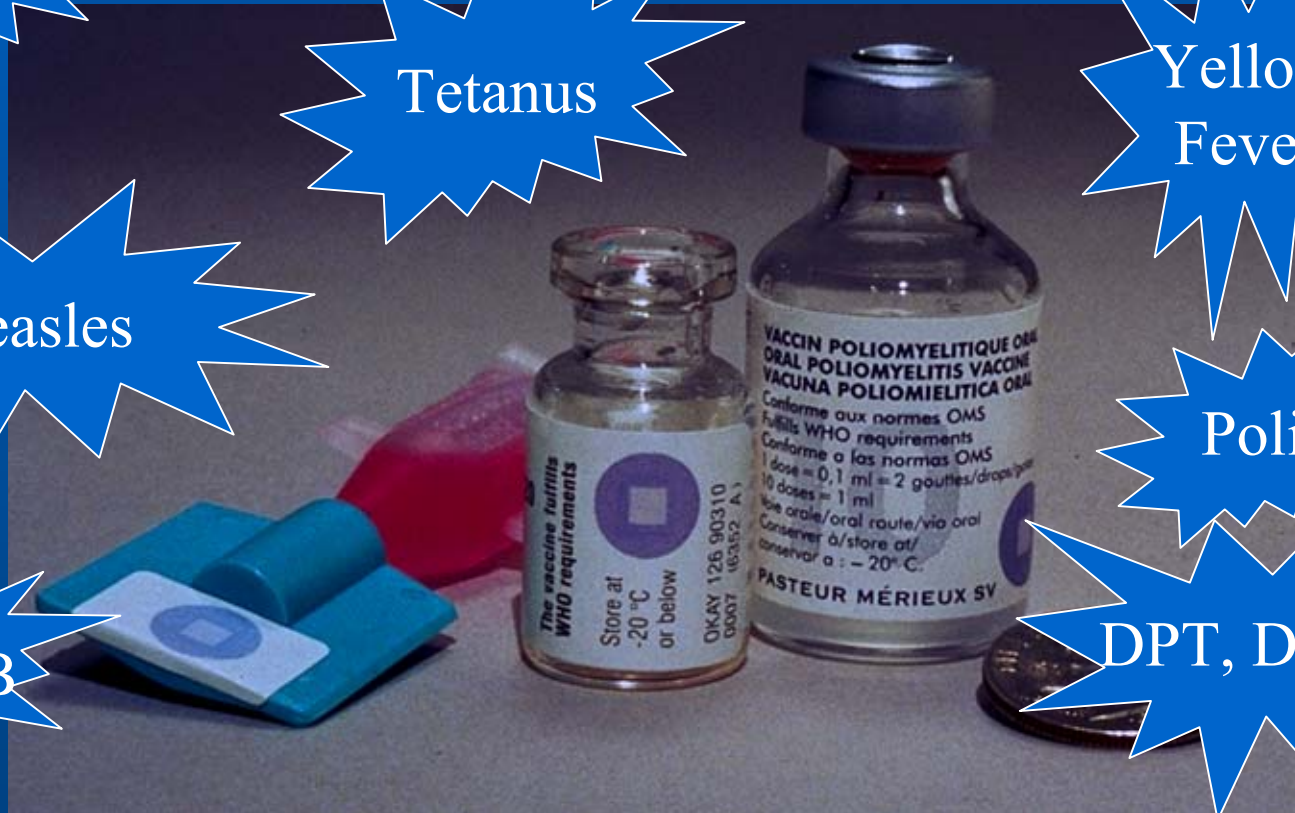
Yellow
Fever

Measles

Polio

Hepatitis B

DPT, DT, Td



The Vaccine Vial Monitor says...

if the expiry date is not passed,



USE the vaccine



USE the vaccine
FIRST



DO NOT USE
the vaccine



DO NOT USE
the vaccine

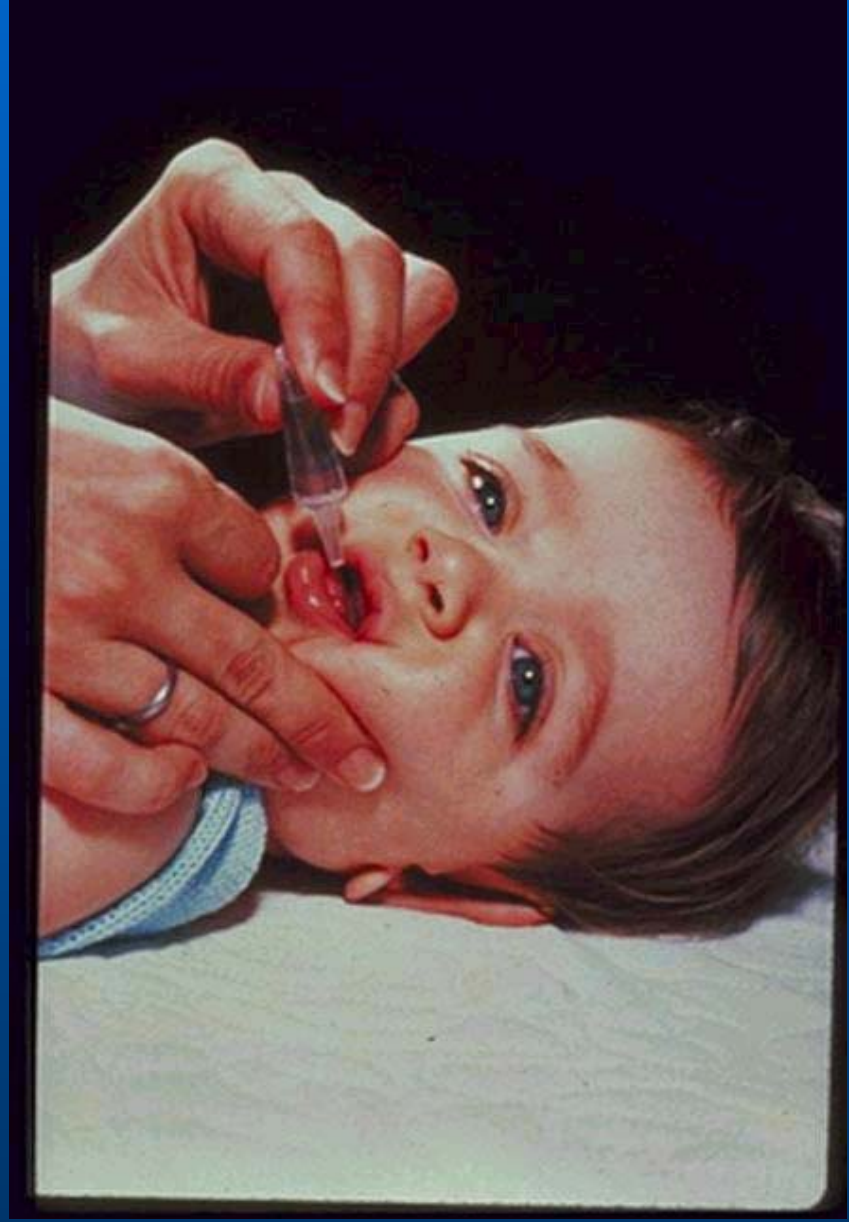
Lessons Learned

ভ্যাকসিন ভায়াল মনিটর-টি (ভি ভি এম) লক্ষ্য করুন

- ভিতরের চতুর্ভুজের রং বাইরের বৃত্তের রং-এর সাথে মিশে গেলে অথবা বৃত্তের রং-এর চেয়ে গাঢ় হলে ভায়ালটি ব্যবহার করবেন না।
- মেয়াদকাল উত্তীর্ণ হবার আগেই ভায়াল ব্যবহার করুন।



VVMs Prevent Delivery of Heat-Damaged Vaccine



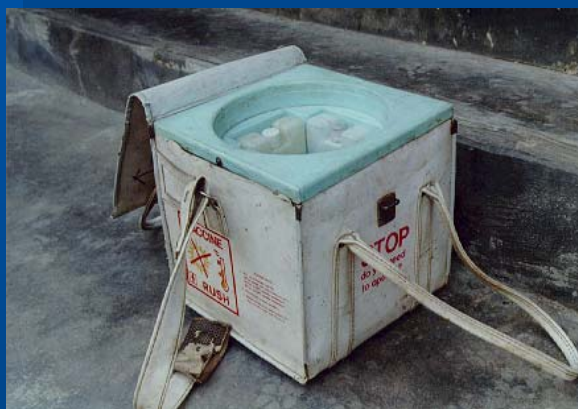
©World Health Organization.

path May 2001

VVMs Detect Cold Chain Problems...

Problems...

if vaccine wastage is documented.



©Debra Kristensen, PATH

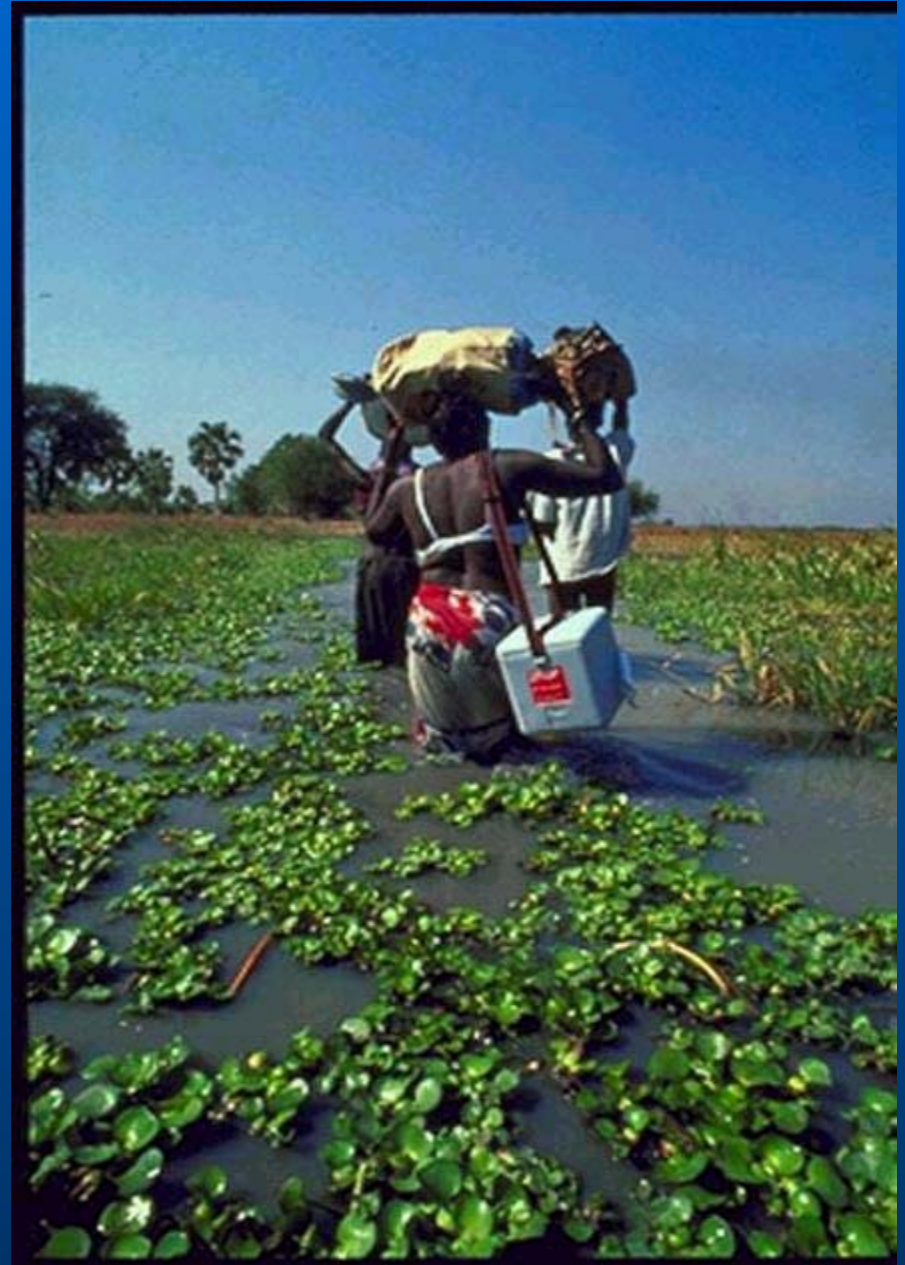


©Debra Kristensen, PATH

VVMs Facilitate Outreach: Especially for NIDs



©Dr. Gordon Perkin



©World Health Organization:

VVMs are Cost-Effective

- When heat exposure occurs, VVMs indicate which vials can be saved.
- Lessen cold chain requirements.
- VVMs facilitate the multi-dose vial policy.



Multi-Dose Vial Policy

Opened vials of liquid vaccine (DPT, DT, OPV, TT and hepatitis B) can be used for up to 30 days, provided:

- The expiration date has not passed.**
- They have not been heat-damaged; i.e., VVM is still good, or appropriate cold chain conditions have been maintained.**
- Aseptic techniques have been used to withdraw all doses.**

Bhutan Study Results



©Debra Kristensen, PATH

Wastage Rate Reductions in Multi-Dose Vial Policy Districts June-November 1998

Wastage Rates	OPV	DPT	DT^b	TT	Hepatitis B
Baseline	56.4%	56.1%	99.3%	65.9%	33.1%
Multi-Dose Vial Policy	7.6% ^a	29.0%	90.6%	10.2%	9.3%
Difference	48.8%	27.1%	8.7%	55.7%	23.8%
Percent Reduction	86.5%	48.3%	8.8%	84.5%	71.9%

^a Data included from Bumthang, Pemagatshel, Punakha, and Samtse.

^b Of the 1,203 doses used, 1,110 were discarded because they were expired.

THE END!

