Health services for children with HIV/AIDS
in resource constrained settings


Background

HIV/AIDS is having an increasing impact on the health and welfare of children. Recent estimates from UNAIDS suggest that globally there are about 2.3 million children less than 15 years of age living with HIV, 90% of whom live in Sub-Saharan Africa. In 2005 alone, an estimated 700,000 children were newly infected, mainly through mother-to-child transmission (MTCT).

HIV is already ravaging hard-won child survival gains in some of the highly affected countries, where up to 58 percent of under-5 mortality is attributable to HIV. Current evidence suggests that unlike in adults, HIV infected children follow a more aggressive course of illness, with 30 percent dying at age one and 50 percent at age two. The majority of these deaths could be avoided through early diagnosis and timely provision of effective care, support and treatment.

Challenges

Scaling up of PMTCT
While interventions for the prevention of mother to child transmission of HIV have been initiated in an increasing number of countries during the last 7 years overall coverage is still relatively low. As long as there is no universal access to PMTCT services, a target set at the PMTCT Global Partners Forum held in Abuja, Nigeria in December 2005, young children will keep on getting infected with HIV. Therefore more investment are required to ensure universal access to PMTCT services.

But even where PMTCT services are available and successful there will always be a small summer of children that still get infected with HIV. While in theory PMTCT interventions provide an unique opportunity to for a continuum of prevention, care and treatment services to mother and child, in reality this continuum is often not present and

1 Walker N (personal communication)
3 Data presented at the PMTCT Global Partners Forum in Abuja Nigeria, December 2005, showed that only about 10% of HIV positive pregnant women do receive PMTCT services.
women and children that have received PMTCT services are lost before care, support and treatment services are initiated.

**Diagnosis of HIV in young children**
One of the critical challenges in providing care to HIV infected children under 18 months old is the lack of specific and affordable diagnostics. Although the commonly used HIV antibody tests are cheap and easy to use they are unreliably when used among children below 18 months old. Viral load tests could be used to detect HIV among these children, but these test are relatively expensive (between $25 and $125) and less easy to use and therefore not available in most health facilities in resources constraint countries. As HIV diagnosis in children is the first step towards providing care, support and treatment it is essential that prices for diagnostic tests and especially viral load tests are significantly reduced and that new more easy to use diagnostic tests for children under 18 months old are developed.

**Access to paediatric treatment**
At the beginning of this decade treatment action groups, groups of people living with HIV/AIDS and others started demanding access to ARV treatment for people living with HIV in resource constrained settings. Access to ARVs is slowly improving partly due to initiatives like the WHO led 3by5 Initiative and the work of the Clinton Foundation. Initially these initiatives have been focussing on adult treatment and not paediatric treatment. However, a change has been visible during the last year, e.g. with the implementation of the 3by5 Initiative, where in several countries targets are now also set for scaling up access to paediatric treatment and programs supported by the Clinton Foundation, PEPFAR, UNICEF and others for the roll out of paediatric ARVs.

There are roughly 660,000 children under the age of 15 who need access to antiretroviral treatment. However less than 5 percent of HIV-positive children in need of anti-retroviral medicine receive it. Experience from the field shows that where paediatric ARVs are available, the response of children in resource constrained country settings is as good as that observed in industrialised countries.

Pediatric ARV formulations in syrup form are on the market, but they are expensive compared to adult presentations. While adult first line antiretroviral fixed-dose combination treatment costs now as little as $140 per person per year, comparable pediatric formulations cost four to eight times more. Second line treatment suitable for young children is even less accessible Also the drugs are difficult to handle and caregivers of young children often have to break and crush adult formulations to administer to children, risking under- or overdosing

Previously some pharmaceutical companies that produce antiretroviral drugs have hesitated to invest in the development of pediatric ARVs because of a limited and

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uncertain market. However the situation is changing and several companies are developing cheaper easy-to-use pediatric three-drug combinations that are generally expected to be available mid-2006.

But it is not only access to paediatric ARVs that needs to be ensured. Administration of cotrimoxazole prophylaxis (costing as little as US$0.03 per child per day) helps to prevent commonly acquired opportunistic infections in HIV-infected children and can reduce hospital admission and stay and mortality by as much as 43 percent (at 24 months follow up) in populations where antiretroviral therapy is not available. However, so far only 1 percent of the children who need cotrimoxazole prophylaxis have access to it.

Available of paediatric care, support and treatment infrastructure
A good working paediatric care, support and treatment infrastructure is often not available in many resource constraint settings and in many cases there are just a few health facilities providing paediatric care, support and treatment. One challenge includes poor referral systems between for instance PMTCT interventions and follow up care and support resulting in many of the children exposed to HIV not receiving HIV testing and follow care, support and treatment.

Many countries also struggle with a lack of trained medical staff to treat children. To address the health staffing crisis some resource constraint countries have introduced user fees for health services. However these fees often restrict poor people’s access to the health services. Another challenge includes the often narrow focus on the provision of ARVs ignoring the need of HIV infected children to nutritious food, nutrition supplements including vitamin A, access to clean water and sanitation and early diagnosis of and prompt treatment of opportunistic infections.

Objectives
The “Unite for children. Unite against AIDS” Campaign consistent with and supportive of the commitments by both the 2005 G-8 Summit and the 2005 World Summit to come as close as possibly to universal access to treatment defined the target for Paediatric treatment as: ”By 2010, provide either antiretroviral treatment or cotrimoxazole, or both, to 80 per cent of children in need”.

To reach this target the following major actions need to be supported in collaboration with governments, UN agencies, and non-governmental, faith based and civil society organizations.

- **Cotrimoxazole prophylaxis** for all infants born to HIV-infected mothers, from six weeks after birth until infection has been ruled out; for all infants known to be

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infected, whether symptomatic or not; and for all symptomatic HIV-positive children.

- **An integrated public health approach to paediatric treatment**, promoted through increased linkages to relevant child survival and development programmes – including vitamin A supplementation; immunization; counselling and support on optimal, safe infant and young child feeding practices; oral rehydration therapy for diarrhoea; antibiotic treatment for pneumonia; and insecticide treated mosquito nets in malarial areas.

- **Clinical screening and HIV testing** for children born to women living with HIV (after PMTCT interventions during pregnancy and delivery) and to children in paediatric care units, therapeutic feeding centres, primary care facilities, and adult tuberculosis and antiretroviral care points.

- **Community capacity** for treatment preparedness, literacy and adherence, symptomatic treatment (pain, oral thrush), and palliative care and support.

- **Access** to all appropriate and affordable testing kits and medicines, especially those adapted to the special needs of children.

**Programming Framework**

Following several global consultations on paediatric care, support and treatment in 2005, in January 2006 WHO and UNICEF hosted a consultation to support the development of a programming guide for HIV related treatment care and support for HIV infected and exposed children in resource constrained settings. This guide will support the implementation of above mentioned major actions. The consultation identified seven programme guiding principles that will form the basis of a Programming Framework including:

1. **Urgency.** Immediate scale up of diagnosis and treatment.
2. **Equity of Access.** All children in need of treatment, care, and support, including the hard to reach, will receive it.
3. **The Centrality of People Living with HIV/AIDS.** The needs of children living with HIV/AIDS and their caregivers should be at the centre of the framework’s approach.
4. **Life-Long Care.** Once started, antiretroviral therapy is for life.
5. **Country Ownership.** Country ownership of the programme and its activities.
6. **Learning by Doing, Using Innovative Approaches, and Experience Sharing.** Capturing and disseminating lessons across countries and regions in a rapid manner.
7. **Accountability.** Mechanisms to ensure accountability to be developed and supported.

Common identified and agreed pillars on which scale up of paediatric HIV care, support and treatment should be based include:

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10 Adapted from WHO 3X5 Strategy.
Enhanced government leadership and ownership, including evidence based programming and budgeting; a designated structure for implementation and coordination of the cross sectoral partners; development of national scale up plans and policies.

Decentralized care delivery, including integration of paediatric HIV prevention, diagnosis, care, and treatment into existing service delivery sites and with other child survival programs; Improving linkages with key child entry points including PMTCT; district based delivery systems; Community and family-based approach to identification and treatment and supportive services like home-based care, community-centred psychosocial support, treatment adherence, linkages to other child welfare programs and school-based activities.

Ensuring reliable and secure supplies to support scale up, which includes: Ensuring that any Procurement and Supply Management Plan (PSM) includes paediatric care, support and treatment; Country level to coordinate procurement, including quantification, and supply of HIV supplies; Establishing management information tools and systems.

Enhancing identification of HIV-exposed and infected infants which includes: Linkages with other health care services where HIV infected children might present including PMTCT; Innovative approaches for making PCR testing widely available; Offering routine rapid antibody testing at well child clinics; Linking mothers and children’s HIV status (supported by government policies).

Scaling up delivery of care, support and treatment, including: Widely implement cotrimoxazole prophylaxis for infants; Rapidly scale up capacity development for implementation of paediatric care, support and treatment at all levels, building on existing tools and sites, and using a decentralised approach.

Strengthening community-based delivery of care, support and treatment, including: Strengthen existing community capacity to identify cases and refer for testing; and Promote follow up and support for HIV exposed infants at community level.

Partnerships

To implement the programming framework and reaching the objective of universal access to Paediatric treatment and its supporting major actions it is essential that all partners including Governments, international support agencies including UN and donors, civil society and the private sector work closely together and take urgent action. Some of the actions that the different partners need to urgently take include:

Governments

- Develop decentralised scale up plans and budgets and a supportive policy framework on paediatric care, support and treatment including resource
allocations for paediatric HIV interventions including universal access to cotrimoxazole and paediatric ARVs

- Ensure the “3 ones approach” towards paediatric HIV including one policy framework, one coordinating mechanism and one monitoring and evaluation system
- Ensure integration and/or linkages between paediatric care, support and treatment and other child health intervention, including ensure a continuum of care starting with PMTCT interventions
- Ensure adequate supply policies and systems, including procurement and supply management plans, policies on generic drugs and test kits and early registration of paediatric drugs.
- Develop community mobilisation strategies to facilitate community based delivery of care, support and treatment.

**International support agencies including UN agencies and donors**

- Develop simple guidelines for treatment and care protocols for children in resource poor settings.
- Provide Governments with technical assistance for the scaling up of paediatric HIV interventions
- Support further operational research into paediatric HIV and the impact of various care, support and treatment interventions (including nutrition, and preventive interventions)
- Provide financial assistance to assist countries in developing sustainable scaled up paediatric HIV interventions
- Support countries with access to cheaper paediatric ARVs and diagnostics through facilitating bulk buying.

**Private sector**

- Improve the availability and accessibility of suitable first line and second line paediatric ARVs including fixed dose combinations in liquid form and paediatric dosages
- Improve the availability and accessibility of suitable paediatric HIV diagnostics

As the existence of paediatric HIV is mainly due to the failure of PMTCT interventions it is important to recognize that while above mentioned actions are undertaken it is essential for Government and all other partners to work together in ensure universal access to PMTCT interventions by 2010 in line with international agreed priority actions.11

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