Annex 8:

IMAI focus study within the WHO “3 by 5” Evaluation
I. Context of this report

The WHO “3 by 5” strategy aimed to “work with national governments to strengthen health systems to respond to the crisis” and to “start the emergency expansion of training with a goal to train 100 000 professional and lay staff.” The WHO Integrated Management of Adolescent and Adult Illness (IMAI) was initially considered as an approach that could achieve this but had not yet been tried and tested in this context.

IMAI now provides a much broader package of technical support tools, guidelines, management procedures and training activities for scaling up the public health approach (PHA) to HIV prevention, care and treatment. This includes components for strengthening health service management at the district level; clinical team-building; clinical mentoring; patient education and self-management; and patient monitoring systems. It is being further developed to take on an increasingly broad scope of primary-care interventions relevant to HIV and has also been expanded for supporting secondary-level care.

For the reader who is not familiar with IMAI, further information is available from the WHO website http:\www.who.int/3by5/capacity/en. The report is also written to explain IMAI (from the evaluator’s perspective.

IMAI is being considered as a health services strengthening intervention for providing universal access to an essential package of HIV and AIDS prevention, treatment and care interventions in the next phases of scaling up. Since this is considered as one of the most important WHO contributions to scaling up the PHA the Evaluation Team believed IMAI required an in-depth review as part of the “3 by 5” evaluation process.

This report is the result of a ‘formative’ appraisal of IMAI that has investigated:

1. Whether the WHO IMAI approach has been an appropriate, relevant, feasible and adequate intervention to support scaling up the PHA (comparing expectations at the headquarters level, with the needs and expectations identified within countries).

2. The lessons that can be learnt from experiences to date of developing, promoting, adapting (customizing) and delivering IMAI activities during the “3 by 5” period.

3. Whether IMAI has potential for further scaling up and sustainability as one of the key WHO technical strategies for strengthening health systems towards universal access1.

---

1 “Universal Access” refers to the Framework for Universal Access to HIV/AIDS Prevention, Care and Treatment that is being developed within the United Nations in response to a G8 declaration to fund this objective for sub-Saharan Africa by 2010.
There are still too few (early) indications of how well IMAI is working in practice, since WHO mainly undertook developmental activities (including customization and pilot testing) during the period under review from December 2003 to the end of 2005. This evaluation has therefore been oriented more towards formative findings, reviewing the inputs, structure, process and products of IMAI rather than looking at specific outcomes that might have been achieved. It is also not intended to review the scientific rationale or technical assumptions on which IMAI is based, although the analysis does provide some reflection on whether this approach is likely to achieve its intended results.

At some point, IMAI should be required to demonstrate evidence that it produces health gains by building capacity to increase the availability and improve the quality (safety and effectiveness) of HIV-related public health care.

The study has also raised questions about how this HIV-focused application of IMAI could fit into a broader WHO strategy for strengthening health systems by bringing together integrated approaches that are currently functioning as separate initiatives (IMAI, the Integrated Management of Childhood Illness (IMCI) and the Integrated Management of Pregnancy and Childbirth (IMPAC)).

The study was carried out as a supplementary activity within the independent WHO “3 by 5” Evaluation

This was carried out with support from the HLSP Institute (which provides policy analysis, training, and applied research on issues relevant to better development practice, attainment of the Millennium Development Goals and reduction of inequalities in health). An intensive review of relevant published and unpublished documentation was undertaken (see References) and interviews were held with key informants identified in discussion with WHO.

The most substantial input into the study was a two-day international consultation meeting facilitated by the Evaluation Team at the end of November 2005 that provided a unique opportunity for sharing information and experiences between technical experts who were involved in developing IMAI and individuals who have experience implementing the approach.

Validation of these findings has taken place, where possible, through a process of ‘triangulation’—comparing the findings from the consultation meeting, Evaluation Team field missions; key informant interviews; and documentation review.

Findings are presented within three main headings to address the evaluation questions described above:

A. The relevance and appropriateness of IMAI as a strategy for strengthening health systems

B. Feasibility of the IMAI approach and its potential for rapid scaling up and sustainability

C. The performance of WHO in delivering IMAI as a contribution to “3 by 5”
Observations relevant to each finding are briefly discussed and include “lessons learnt”, where possible. This includes recommendations for how IMAI could be improved and strengthened.
II. Findings of the IMAI focus study

A. The relevance and appropriateness of IMAI as a strategy for strengthening health systems

1. IMAI has unique value as an integrated package for scaling up PHA interventions for HIV treatment and prevention

i. This is designed as a comprehensive, generic approach

It offers an expanding range of procedural guidelines, training tools and implementation support activities for scaling up comprehensive HIV/AIDS care, treatment and prevention. These are based on WHO PHA standards and guidelines.

WHO claims that IMAI is: “A concrete blueprint for the realization of ambitious scale-up targets by integrating simplified clinical management of HIV/AIDS (with back-up from clinical mentors and referral to hospital) into the routine work of existing health services, with strong community support” (1).

There are no known equivalent comprehensive generic approaches that are purposely designed to integrate public health interventions for HIV and to simultaneously strengthen peripheral level services in this way. IMAI has therefore attracted attention as a uniquely valuable offering from WHO that has some of the recognized characteristics (standardization, simplification and institutional endorsement) required for scaling up services to achieve universal access (2).

ii. The approach aims to provide more than training

IMAI has been described by WHO as “a package”, “a toolkit”, “a strategy” and “an approach”. Exploring this further with the IMAI team, it is evident that IMAI is based on a generic conceptual paradigm or “model” for strengthening service delivery through simplified operational guidance, training and management support “within the framework of existing health systems”. WHO believes that IMAI places the ministries of health (MOHs) in a stronger position to regain their custodianship over the variety of capacity-building activities taking place within their countries.

“The IMAI toolkit contains concrete tools and guidelines that support the organization of all relevant aspects of a comprehensive HIV/AIDS health sector response, including health service management at the district level, training and job aids for clinical teams, materials to support patient education and self-management, and a patient monitoring system. IMAI also offers detailed guidance for country adaptation of the materials, and a wealth of support for implementation”.

We interviewed health systems experts who agreed that IMAI has the potential to provide a “platform” for developing, sharing and delivering generic tools and approaches for strengthening health systems to deliver PHA interventions.

---

2 The public health approach to scaling up integrated HIV/AIDS services is based on a simplified standardized approach to treatment, care and prevention that can be broadly applied on a population basis. Care and prevention activities are integrated with antiretroviral therapy (ART) at service delivery points.
Some country participants in the IMAI consultation meeting felt that implementing IMAI has already helped align the activities of partners more closely with their national HIV/AIDS programmes.

iii. It fits within a conceptual ‘triad’ of integrated interventions that could potentially strengthen the delivery of all primary-level care

IMAI was originally conceptualized as part of a “health-care triangle”, building on IMCI (which has been promoted since the mid 1990s as the WHO strategy for delivering child health services) and including IMPAC as the third component.

HIV diagnosis and care issues have only recently been added to IMCI training, while for IMPAC, this is still under development, led by the “Making Pregnancy Safer” Department at WHO headquarters.

If these three strategies are implemented together, they could potentially provide a comprehensive district health-service delivery approach for managing HIV within health facilities. Beyond this, they could combine to strengthen the delivery of “horizontally integrated” essential public health care for all priority diseases in all age groups. This is important if IMAI is to be considered as an intervention that strengthens other parts of the system and that does not undermine the delivery of other services (for example, by diverting personnel from ‘competing’ health programmes).

Whether this conceptual model can be translated into practice remains to be seen and is beyond the scope of this evaluation. Most of the IMAI implementation activities to date have been confined to clinical and district coordinator training that has focused on the HIV/AIDS components of the guidelines and tools.

However, participants at the IMAI consultation meeting agreed that IMAI should be integrated with IMCI and IMPAC to become a ‘unified platform’ for strengthening health systems overall.

2. IMAI is appropriately targeted at the district level to strengthen decentralized health care delivery

Decentralization is necessary to achieve expanded levels of coverage for the essential HIV-related public health interventions (towards the goal of universal access). This requires a district/subdistrict approach to planning and building on what services are already available (including working with non-state service providers). IMAI provides a district coordinator toolkit that claims to guide the establishment of networks of well-managed health facilities, although it is still too early to evaluate whether this is true.

IMAI, along with IMCI, IMPAC, TB, Family Planning (FP) and the Expanded Programme on Immunization (EPI) defines most of the priority content for public health services delivered within health districts. Practical health systems strengthening can potentially be achieved at the health district level by identifying what are the common technical and managerial requirements for these integrated services and providing integrated training, supervision and management capacity-building support and tools. District coordinators and clinical teams generally welcome these efforts to integrate delivery models, since this spares them from the usual fragmented support activities.
3. IMAI was based on the concept of IMCI and is backed by the experience and evidence that IMCI works

Learning from what IMCI has achieved provides insights into whether IMAI will be feasible and effective. IMCI was rolled out extensively over the past decade and especially over the past five years, with many countries having experience of it. This was subjected to a longitudinal multi-country evaluation (5, 6), which provided evidence that IMCI:

*Improves health-worker skills* –
- IMCI training is effective, improving health-worker performance and motivation, the quality of care delivered to sick children attending first-level public health facilities, and caretaker satisfaction.
- The standard case management guidelines and training package for improving health-worker skills are highly valued. Medical and nursing schools are beginning to recognize the value of introducing IMCI and its training methods, which emphasize evidence-based and hands-on approaches.

*Strengthens health systems* –
- IMCI has succeeded in ensuring that drugs required for child health are included in essential drugs lists.
- In some contexts, it has improved availability of essential drugs at first-level facilities and follow-up visits to recently IMCI-trained health workers (although coverage with follow-up visits falls significantly as IMCI is expanded to additional districts). Beyond this, the impact on health systems has been limited so far.

*Improves family and community practices* –
- The importance of the key practices for child health is well accepted and there is growing interest in community approaches.

IMAI has many similarities with IMCI, but the current environment (intent on scaling up) is possibly more conducive to IMAI achieving early successes. Criticism of IMCI has tended to come mostly from the donor community and development partners (although this is lessening with documentation of the performance improvements achieved through IMCI and its impacts on mortality). There is strong support for IMCI within many countries on which IMAI can build. The IMAI team recognizes that it is important to build on the successes (and learn from the failures) of IMCI and this should translate into concrete guidance for implementers of the approach. IMAI must provide evidence as soon as possible of whether claims of health systems strengthening are being achieved.

4. The approach fits into broader initiatives for health systems strengthening

Health systems strengthening has become an important priority for global health initiatives and is increasingly being backed by development partners and governments. IMAI could be uniquely positioned to provide practical mechanisms for this. IMAI focuses on strengthening the mechanisms for delivering the "end products" of the health system and so stimulates demand for system-wide strengthening.
In theory, IMAI may directly contribute to strengthening at least five of the generic components of health systems described by WHO (7) (Exhibit A).

The case study (Box 1) illustrates how IMAI District Coordinator Training identified gaps in current HIV testing policies and guidelines. Changes that were needed to strengthen the national programme (and human resources in the health system) became evident through this practical training activity that placed the MOH in a more strongly identified position to lead this change.

Exhibit A
Health systems components requiring strengthening and which can be strengthened through IMAI:

i. Policy and custodianship;
ii. Health workforce mobilization, distribution, and motivation;
iii. Drugs, equipment and infrastructure supply, distribution, maintenance;
iv. Organization and management of health services;
v. Information and monitoring systems; and
vi. Financing arrangements.

However, there are still few other specific examples demonstrating how IMAI achieves these “system-wide” effects. This is one of the challenges that IMAI must address in order to substantiate the claim that it does strengthen health systems beyond the programme-specific interventions for HIV/AIDS. The limitations of this approach must also be identified and made more explicit to ground IMAI in realism.

i. IMAI addresses human resource constraints through mechanisms for ‘task shifting’

WHO claims that the IMAI clinical training courses are a “technically sound approach to shifting tasks within the clinical team and for expanding the team to include PLHA.” This seems to be generally acknowledged as an appropriate response to human resource constraints, which many analysts have suggested will be the biggest bottleneck to scale-up.

Uganda is an example of this. It was one of the first countries where IMAI was introduced. This country’s critical shortage of health personnel is becoming worse: in 1996, there were 18.7 nurses for every 100,000 inhabitants and by 2002, there were only 5.4 per 100,000 inhabitants (8). With these current ratios of health personnel to numbers of people needing HIV care and treatment, the prospect of achieving universal access seems unrealistic. Using the IMAI approach in selected districts, Uganda has been able to successfully shift some tasks from more specialized (and scarce) to less specialized health workers (9).

This mechanism also supports the community in becoming progressively involved in supporting chronic care (for example, by providing adherence support, obtaining drug refills and undertaking simple clinical monitoring). The most important task shift is to patients themselves (self-management), which has been acknowledged as essential for chronic care to be successful (10).

3 These task shifts have a growing evidence base. IMAI has emphasized patient safety in developing the simplified guidelines and has validated the ability of nurses and other non-physicians to make critical decisions during guideline development (comparing their acute care decisions with that of an experienced doctor with some laboratory support). During implementation, the doctor on the clinical team and the district coordinator are thoroughly involved through case review, close supervision and ongoing monitoring.
Box 1

Case study: District Coordinator Training in Ethiopia

Ethiopia held two IMAI-based District Coordinator Courses (DCC) during 2005. The first targeted 10 Addis Ababa district health offices and the second offered national training to participants from regional health bureaus and major hospitals providing (or planning) ART.

The training incorporates guidance on decentralizing HIV services; setting ART targets; service availability mapping; assessing the human resource situation; mapping partners; preparing the community for scaling up; and planning follow-up support and supervision after training.

Participants undertook an exercise to estimate targets for ART supply at regional and district levels, which requires estimating the number of people that must be tested. This leads to planning assumptions, such as estimating the human resources required. The activity demonstrated that more than 5 million individuals would need to be counselled and tested in order to identify 100,000 eligible for ART, if Ethiopia continued to depend exclusively on the client-initiated approach, and the country would require 1,668 trained full-time counsellors to achieve this.

If Ethiopia continued to rely on nurses as counsellors, voluntary counselling and testing (VCT) activities alone would divert 1,668 nurses from other activities. The National Programme Officer explained: “The training was an eye-opener to the costs of scaling up HIV/AIDS prevention, care and treatment”. This initiated discussions about the need for provider-initiated testing and lay counsellor approaches – issues that were subsequently presented in MOH regional meetings. The National VCT Technical Working Group became involved to revise the existing HIV Counselling and Testing Guideline. As a result, the national guideline is now more comprehensive; incorporates the needs of different segments of the population (including children and adolescents); makes provision for lay counsellors in public health facilities; and promotes provider-initiated testing. This is a demonstration of how IMAI interventions can lead to strengthening the national programme (with the potential for system-wide benefits, such as shifting human resource policies to incorporate new cadres of health workers into the system).

By demonstrating the feasibility of task shifting, IMAI has introduced an extremely important new paradigm for increasing access to all chronic care in low-resource settings.

However, further research is needed to demonstrate the overall efficiency, effectiveness and acceptability of these practice changes across different settings. This should investigate whether task shifting adversely affects the outcomes of care when specific clinical decisions (such as when to initiate ART) are delegated to nurses; or when care activities (such as adherence counselling) are delivered by lay practitioners. Additional quality assurance procedures might need to be introduced for monitoring transfer of the more routine, administrative tasks (such as record-keeping) to less skilled workers.

5. Innovative mechanisms have been developed for involving people living with HIV/AIDS into care services, but this is not yet widely accepted in practice

IMAI has shown that involving PLHA (who are experts in their own illness) as “patient-trainers” can be a very effective methodology for training health workers. In both the Basic ART Clinical Course and ART Aide Course, PLHA are trained to play the role of specific HIV cases during...
“skill stations” sessions and they join small group discussions during interactive training. This novel element of IMAI training has been extremely well received by health workers and seems to work well in practice.

PLHA have an important role in the care team as “ART Aides” who form a link with the community. They can be effective treatment advocates, peer educators and counsellors. However, in many settings there are still policy constraints that prevent the formal participation of lay health workers in health-care delivery.

B. Feasibility of the IMAI approach and its potential for rapid scaling up and sustainability

1. Experience to date seems to show that IMAI is feasible, but this needs to be better documented

i. Many countries have already successfully adapted IMAI and some have implemented the first phases of implementation

More than 27 countries have already started adaptation of the generic package and 12 (11 of which are African countries) have implemented at least some components of the approach. This includes countries across almost all regions, although the primary focus has been in Africa. This progress is summarized in Exhibit B.

Adaptation of IMAI to country circumstances is an important feature of the approach (4). This adaptation addresses five priority areas: clinical practice; patient monitoring systems; patient education materials; introduction within existing health services; and the inclusion of IMAI in certification exams. Clinical adaptation is the most important step that has usually been conducted through a country-level process facilitated by an IMAI WHO head office level technical officer, the WHO regional IMAI focal points, a technical adviser from the Institute of Tropical Medicine of Antwerp, or an IMAI experienced physician from Uganda (for Sudan and Swaziland) or Senegal (for Burkina Faso, Burundi, Haiti)\(^4\).

This adaptation process takes anything from two months to a year, depending on the availability of key participants in the adaptation committee (including WHO IMAI adaptation facilitators). It also depends on whether national policies and guidelines need to be amended. This is one of the main bottlenecks to initiating IMAI.

The IMAI Consultation Meeting recommended that the adaptation stage in each new setting should be preceded by a more structured situation analysis to inform planning for the introduction of IMAI. There is also a need to strengthen the Adaptation planning guide and to establish a reliable network of trained consultants to provide technical assistance for this process (11).

Relatively few countries plan to use the complete IMAI approach at this stage and most tend to select modules that they feel are needed. While WHO feels this is an acceptable use of the

\(^4\) The European hospital-twinning initiative “ESTHER” (*Ensemble pour une Solidarité Thérapeutique Hospitalière En Réseau*) was supposed to provide technical support for adaptation in a number of west-African countries. However, they experienced some significant delays and technical support is still expected by countries.
materials, it has implications for whether IMAI will really become a fully integrated intervention in these situations.

Exhibit B

![Countries adapting IMAI tools-cumulative](image)

**ii. There is increasing demand for IMAI, reflected in new requests from countries**

More than 30 countries have expressed interest in reviewing their current programmes against what IMAI has to offer, indicating strong interest in this approach. Much of the recent new demand is probably being driven by WHO (“3 by 5” officers) who have become more established within their countries. It would be interesting to establish what the other drivers of this interest are to use them to increase the efficiency and effectiveness of “marketing” IMAI.

2. **Linkages between IMAI and IMCI can immediately be strengthened**

There are both strong historical ties between IMAI and IMCI and active collaboration at headquarters and in several countries. Collaboration around district and national management training and other support has started but needs to be pursued more systematically. Since the same providers and service managers at first-level care facilities tend to be targeted by both IMCI and IMAI, it makes sense to harmonize the IMAI-IMCI offering, wherever possible. As a combined ‘package’ IMCI and IMAI could have the potential to serve as a single platform for delivering primary health care for the continuum of PHA prevention, care and treatment interventions across all age groups. A combined offering would allow for integrated planning,
implementation and management for training and systems strengthening that should appeal to
decision-makers.

In circumstances where it does not make sense to promote a combined package (e.g. due to
donor preferences), the IMAI paediatric HIV care module should at least be delivered as part of
either IMCI or IMAI. Inclusion of the HIV care module into IMCI would strengthen the IMCI
offering and make this more attractive to MOHs (and possibly also to donors). This will help to
“revitalize” IMCI in settings where uptake has previously been poor.

Each initiative could strategically build on the gains that have been made by the other in existing
situations, rather than relying on coincidental opportunities for collaboration.

3. Remaining gaps in the approach need to be addressed and IMAI could be adapted for
broader use

The core IMAI package (that mainly focuses on HIV/AIDS) is well developed, although the
evaluation has identified that specific gaps still need to be addressed:

- IMAI could benefit from including change management and service improvement
  methodologies into the approach (to focus on learning through problem-solving and to
  improve quality).

- Prevention of mother-to-child transmission (PMTCT) has been notably absent from these
  integrated approaches and this has been an enormous missed opportunity for preventing HIV
  transmission to children and for strengthening maternal and child health services as an
  important entry point for HIV diagnosis and treatment for mothers and families. This resulted
  from delays in the production of PMTCT modules that were planned to be part of IMPAC
  and overall there has been sub-optimal collaboration between IMPAC and IMAI. WHO (the
  Making Pregnancy Safer Department) has not yet made it clear how it plans to implement
  IMPAC and the programmatic synergies between these approaches have not yet been
  adequately explored. Modules for operationalizing linkages to PMTCT from acute and
  chronic care for adults and adolescents are finally being developed as a complementary short
  course within IMAI.

- There is a gap in IMAI to provide capacity to community prevention workers (for example
  Lesotho has announced that it will require 15 000 trained community health workers to
  implement a universal strategy of door-to-door HIV testing). Materials for community health
  workers are still under development.

- Guidance for targeted interventions that are more relevant to low HIV prevalence settings,
  such as for injecting drug users (IDUs), is still missing (although good materials already exist
  that could easily be integrated into IMAI). For these settings, it might be more appropriate
  for other priority disease conditions (besides HIV/AIDS) to be the main drivers for
  implementing IMAI. The current package is not really oriented towards this, although
  ostensibly it could be easily adapted.

IMAI has important potential for improving non-state provider (including commercial as well as
not-for-profit private providers) participation in delivering the essential package of PHA
prevention, treatment and care interventions for HIV. This is important because private providers
(in Africa, India and elsewhere) already deliver at least half of all non-hospital care and are seen
as an essential resource for scaling up service coverage towards the goal of universal access \((12)\). However, this will require a different “marketing approach” and framework (such as public–private mix models) for continuing support and to strengthen the linkages with public sector and community providers to deliver appropriate chronic care and support. IMAI has the potential to be seen as a “franchise for public health care” \((13)\). This will require specific adaptation and testing of the IMAI implementation methodology for these settings.

4. Other technical departments see IMAI as having potential beyond HIV/AIDS

Where the approach can also be adapted and led by other initiatives, this will enable further integration at the delivery level; improve efficiencies in resource utilization; reduce duplications; miss fewer opportunities for “horizontal” service strengthening; and ensure that a more coherent standard operational package is being recommended by WHO. There is already interest within other WHO departments (including TB and Noncommunicable Diseases) to champion IMAI.

5. IMAI faces considerable challenges in further scaling up and sustainability

i. There are only a few examples where IMAI has been implemented beyond the initial demonstration phase

IMAI is typically implemented in phases, beginning with adaptation and demonstration activities in the first stage, before implementing IMAI systematically (although this is often only phased through selected districts). Scaling up beyond this requires reaching every facility and simultaneously providing follow-up where implementation has already taken place.

Uganda has the most experience with IMAI, with core IMAI training having been implemented across all districts and second-phase activities are being planned. Providing post-training follow-up and support has been a significant challenge in this setting\(^5\) and is likely to become an even greater challenge with further programme expansion.

The IMAI strategy for follow-up and continuous support after training needs to be improved through strengthened management systems and prescribed methodologies. This requires much more technical development and field testing.

ii. The challenges of scaling up change with each successive phase and IMAI has not yet developed a specific scaling up methodology

The IMAI design for adaptation, planning, preparation, implementation and follow-up does not provide guidance on managing the complexities of scaling up beyond a single implementation cycle (except to mention “evaluation and iterative improvement” as the final step of this process). It is not yet evident how the lessons from initial IMAI implementation experiences have been incorporated into decisions about subsequent activities, or whether all these steps and concurrent activities have been followed in practice. For instance, no structured evaluation was conducted after the first phase of IMAI implementation in Uganda.

Scaling up is not a linear process and can become more complex in successive phases. Initial challenges can differ from those in later phases and may vary in different settings. Constraints

---

\(^5\) This was contributed to by a temporary embargo on Global Fund disbursements to Uganda, which has now been resolved.
can also scale up differently (for example, economies of scale might improve with increasing levels of activity, whereas quality can deteriorate). Many public health interventions fail to achieve full-scale implementation, or to move beyond pilot-phase activities for such reasons. It is therefore important for WHO not to underestimate the oversight requirements for scaling up IMAI. Stronger guidance can be provided (working with programme managers) on how to manage the cross-cutting support activities and systems that need to be in place. This will most likely require more direct technical assistance to countries beyond the phase of introducing IMAI.

Rapid scaling up of IMAI needs structured approaches to accelerating the rate of improving the intervention by simultaneously, rather than sequentially, coordinating (and learning from) implementation experiences across multiple settings.

WHO could consider working with quality improvement experts to strengthen the IMAI scale-up approach by identifying and testing appropriate structured methodologies for rapid scale-up and quality improvement.

**iii. The scope of IMAI has been expanding and this is becoming an increasingly complex set of interventions to scale up**

The core IMAI package “covers the range of HIV/AIDS-related prevention, care and treatment issues—from clinical staging, to treatment of acute conditions and opportunistic infections, to ART and palliative care, with prevention integrated throughout”. However, this is becoming more complex with the addition of expanded modules and training activities for district coordinators; mentors; TB/HIV; and provider initiated testing and counselling, etc. Scaling up approaches that are synergistic with IMAI and part of an “integrated continuum” would be preferable because this could reduce the total resources and time needed for training, as well as reinforce programmatic linkages.

IMAI uses several types of facilitators: clinical facilitators, counselling facilitators (to train the ART aid, psychosocial support for children, and pre- and post-test counselling) and expert patient-trainers (PLHA trained to present cases and provide feedback to health workers). Facilitator training can be done before the actual training of health-care providers or can be integrated within the initial training of trainers (TOT) by pairing experienced facilitators with facilitator-trainees.

The basic IMAI clinical team training takes place over more than a week (Exhibit C), but there are now supplementary modules that can be added to this. Training of the expert patient-trainers requires three days.

While this modular approach is logical, it presents logistical challenges to operationalize. Considerable guidance and support is needed to manage these various training elements and it is not obvious how this can be easily decentralized. This might become too ambitious for target countries in terms of complexity and cost.

---

6 WHO has described structured approaches to rapid scale-up in *An Approach To Rapid Scale-Up Using HIV/AIDS Treatment And Care*, Geneva, World Health Organization: 1) The Breakthrough Series (BTS) collaborative: An improvement approach that relies on the spread and adaptation of existing knowledge to multiple settings simultaneously, to accomplish a common aim; 2) The Real-Time Interactive Operational Research (RTIOR) method: This method, which is linked to the BTS approach, allows providers of health-care services at facilities to learn from their experiences and to share their knowledge with peers; 3) A multiplicative scale-up framework: To reach the full scale intended, this framework expands implementation from an initial number of pilot sites, using a sequence of phases – each involving 5-10 times more facilities.
### Exhibit C

The original "6 + 2" training schedule for basic ART and acute care/Opportunistic Infections clinical team training

<table>
<thead>
<tr>
<th>Monday</th>
<th>Tuesday</th>
<th>Wed</th>
<th>Thurs</th>
<th>Friday</th>
<th>Saturday</th>
<th>Sunday</th>
<th>Monday</th>
<th>Tuesday</th>
</tr>
</thead>
<tbody>
<tr>
<td>Basic ART clinical course</td>
<td>Clinical team-building</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Nurses, midwives, medical assistants, pharm techs</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Basic ART clinical course</td>
<td></td>
<td>Patient monitoring</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Clinical officers, health officers</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ART Aid course</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PLHA, other lay providers, nursing or health assistants, or nurses</td>
<td>Off</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Second level ART/OI course</td>
<td>Medical officers/doctors</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Second level ART/OI clinical course</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Medical officers/doctors</td>
<td>Medical officers/doctors</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### iv. Implementation of IMAI activities needs to become more efficient

The process of introducing IMAI to a country takes place through a series of steps, outlined in Exhibit D. To some extent, these steps need to again be replicated at each level of the health system (moving from national, to regional and district), as IMAI is rolled out. At each step, there are various activities that can either take place in isolation, or be more efficiently linked to simultaneous activities in other settings.

#### Exhibit D

IMAI implementation steps

1. **Introduction/orientation**
2. **Country adaptation** (clinical guidelines, education messages, health system fit, patient monitoring system)
3. **District management course**
4. **Training of trainers**
5. **Support for rapid scale-up of training (continuous training)**
6. **Post-training follow-up and supervision** (quality assurance by the district management team, clinical mentoring)
7. **Emergency pre-service introduction**

For example, introductory training has tended to take place at central locations and as isolated events, rather than “back-to-back” and in parallel. “Efficiencies of scale” could potentially be achieved through concerted scaling up, but this requires good planning and management. Implementation also needs to be well planned and integrated with other processes, so that activities take place at the appropriate times (e.g. training should occur as part of the process of facility accreditation, rather than months before). Improved efficiency will be vital if IMAI is to remain feasible beyond the first tier of training.
v. IMAI training needs to be introduced into pre-service training of health workers

IMAI has not yet been formally introduced into the curriculum of any training institution, although “emergency” supplementary training activities have already been delivered for graduating health workers at a few such institutions. This has been done as an interim solution that does not demand unrealistic scheduling changes within existing courses and circumvents the longer process of curriculum revision.

It is critical for IMAI to become an institutionalized part of pre-service health worker education, in order to achieve sustainability and rapid scaling up:

- This can become part of the routine educational process with the same manpower and without added cost.
- Pre-service IMAI does not interfere with the work of health workers at their health facilities.
- It does not depend on external staff coming from another region or country, except for the initial training of faculty.
- If all training institutions are involved, significant numbers of trained health workers would be introduced into the health services each year.

WHO needs to work in partnership with training institutions to integrate IMAI within existing curricula; provide capacity and support faculty; produce suitable adaptations of the training materials; and develop the evaluation tools that link this training with professional accreditation.

6. Implementation activities are dependent on funding and partnership support at the country level

Training activities have relied to some extent on support from WHO country offices (for example, providing funding from their “3 by 5” budget allocation and paying for printing of materials). This will be even more of a necessity from 2006, when WHO will no longer fund country support activities from the headquarters level.

In some cases, IMAI implementation would not have taken place without significant additional contributions from other partners, including the Presidential Emergency Plan for AIDS Relief (PEPFAR) contractors (ITech, FHI and many others). National governments have made significant contributions in staff time and have mobilized specific funding for this. Other countries will still need to be assisted to re-programme their Global Fund grants (many of which remain under-spent) and to identify dedicated funding to invest in IMAI.

7. IMAI can only be sustained with supportive systems in place

Weak health systems are not an absolute constraint to introducing disease-specific programmes. Experiences implementing IMAI have anecdotally shown that service-strengthening gains can be achieved in the short-term within such settings. However, experience from IMCI has also clearly demonstrated that these cannot be maintained without supporting systems in place, such as mechanisms for ongoing supportive supervision.
i. There are concerns about quality being compromised in the process of scaling up

IMAI currently does not have the resources for implementing quality improvement activities within IMAI (although some guidelines have been developed on aspects of this, such as for clinical mentoring). Experience from IMCI has shown quality in training to be a significant concern with scaling up that is affected by factors such as the experience of facilitators; facilitator-trainee ratios; and post-training on-the-job supervision. This requires IMAI’s further attention as it may consider incorporating established performance improvement methodologies into IMAI.

C. The performance of WHO in delivering IMAI as a contribution to “3 by 5”

1. The WHO IMAI team has achieved solid progress during the “3 by 5” period (despite organizational constraints)

i. An extensive and coherent range of core guidelines and generic tools has been produced, that can continue to be updated and improved

The IMAI team has led the development of an impressive range of tools and materials, with many new modules still being developed as part of an “expanded” toolset. In many cases, materials sourced from other initiatives and particularly those already in use within countries have been appropriately incorporated into IMAI.

The team has generally achieved a quick turnaround time in responding to requests for modifications or additional components. Procedures for developing and reviewing these tools have been rapid (although some feel that this has been at the expense of broader consultation and providing opportunities for detailed review of the end products). This has been done without formally convening an expert panel to review each new item, as the generic materials are reviewed again through an adaptation process within countries. The IMAI team also has an extremely strong informal network of technical experts, consultants and country-level participants who have participated in developing the approach and reviewing the materials. The end products seem to be generally appreciated for their quality and appropriateness to low-resource settings.

ii. The team has delivered intensive direct country support for IMAI that now needs to be sustained

Support activities have mostly been delivered through missions from the IMAI team at WHO headquarters, with the WHO Regional Office for Africa and other regional offices only recently starting to take a more active role in this as they have developed more capacity. There is increasing use of consultants (drawing on the growing network of people who have experience in implementing IMAI, as is happening between countries in east Africa) and collaboration with partner organizations. WHO could consider establishing a more structured technical support network to meet the increasing demand for these support activities.

This programme’s work needs to move towards providing more routine and consistent implementation support on the ground, before investing in much more content development. The IMAI team realizes that staff and consultant capacity in countries, regions and partner
organizations needs to be further developed, but that it requires a WHO directive and appropriate resources to achieve it.

**iii. Participation by other technical departments contributing expertise to the development of IMAI content has been good, but there are still some gaps**

IMAI was developed with technical inputs from 22 WHO departments (with good contributions from Noncommunicable Diseases - chronic care unit; Adolescent and Child Health; Stop TB; Malaria; and Oral Health). Stop TB and TB-HIV core technical group has recently endorsed the IMAI TB Care module, based on the TB-HIV Co-management guideline, and this seems likely to become one of the main tools for implementing TB-HIV interventions. These collaborations provide a good starting point to continue increasing the support and participation of other (non-HIV/AIDS) technical and disease-specific groups in scaling up the “big vision” integrated health systems strengthening platform described above.

In contrast, collaboration with the Making Pregnancy Safer (MPS) department to develop joint PMTCT tools and to establish stronger linkages between IMAI and IMPAC has been problematic. These tools have still not been produced, despite MPS having been provided with a budget for this by the HIV/AIDS department through the CIDA grant. Within the HIV/AIDS Department, IMAI has also not succeeded in getting inputs from the Strategic Information and Research Unit to improve the patient monitoring, evaluation and operational research components of the strategy. This internal lack of collaboration is an unnecessary impediment to making progress.

**iv. The IMAI team has received good support from a wide range of external partners, although should consider establishing a more structured partnership model**

IMAI has received growing levels of support from an impressive range of external partners at both the international and country level. Strong links have been established with the United States government contractors and agencies funded by PEPFAR (although WHO was perceived as initially “competing” with these organizations within many countries, there is now much more willingness to work together and definite opportunity for collaboration, guided by MOHs).

These partnerships have provided opportunities for collaborative technical development; joint delivery of technical assistance; provision of training; funding; and programme evaluation, etc. However, managing these many types of partnership has been challenging for the small IMAI team. For the full potential of IMAI to be achieved, more structured partnership arrangements that are appropriately managed will be required. WHO should consider developing a more structured partnership model (distinguishing between technical partners, strategic partners, funding partners and operational partners), since each type of partnership has its own characteristics and needs to be managed differently. Formal instruments (such as Memoranda of Understanding) could be used to define expectations within these partnerships.

2. **This progress has been achieved with modest funding support and few technical staff (but this cannot sustain growth)**

IMAI is well supported by a range of donors (including the Rockefeller Foundation, USAID and the Dutch Innovative Fund) and the CIDA “3 by 5” grant. However, this has only been sufficient for the initial phases of the development, mostly supporting headquarters-level inputs. Funding to strengthen the initiative at the decentralized level was not allocated within the WHO budget.
and considerable future investment will be needed to provide sustained country-level technical support.

The IMAI team is located within the WHO HIV/AIDS Department, led by a highly experienced team leader (who was previously involved in developing IMCI). By the end of 2004, a WHO “re-profiling” exercise had reduced this team to only two individuals. It has subsequently been re-built and now has 6.5 technical officers (5.5 medical doctors and a nurse). However, there are fears that this will be reduced again when the WHO decentralization policy is implemented in 2006.

Very few of these activities have yet taken place through WHO regional offices. Unlike IMCI, which attributed much of its early successes in scaling up in the early 1990s to being driven from the WHO Regional Office for Africa, there is no equivalent IMAI team based in that regional office. This has complicated the logistics of providing country support in Africa, since this has mostly needed to be done from WHO headquarters in Geneva, however, this is not sustainable.

3. **The IMAI concept is not widely understood and has not been well communicated**

   i. *There are still widespread misperceptions about what IMAI offers*

   There are numerous misperceptions about IMAI, showing that many people still see this as a limited intervention: mainly for Africa, only providing training, targeted at peripheral first-level facilities (health centres) and not hospital outpatient clinics, and which is only appropriate for community health workers. Some believe that IMAI has no role in settings where there are many doctors available; that it is only relevant in certain “health systems”; not needed in middle resource settings; only for facilities where ART is already available; or relevant to “basic” service settings where there are no CD4 and other laboratory tests. This misunderstanding is found both within WHO and externally—including in countries, MOHs and among other implementing partners.

   In Ukraine, for example, the Evaluation Team heard opinions that IMAI is “for Africa where there are no doctors”. The WHO Regional Office for Europe has not supported IMAI and an “alternative” training model has been developed through the Regional Knowledge Hub (that on closer examination is built on many of the same principles as IMAI).

   Knowledge and understanding of the IMAI approach within WHO therefore needs to be improved to ensure consistency and improve internal “buy-in”. WHO country representatives and all technical staff in countries must be adequately briefed.

   ii. *WHO has not provided a consistent description or simple definition of IMAI*

   A review of the WHO publications produced during the “3 by 5” period reveals various (sometimes conflicting) descriptions of IMAI. It has been referred to as:

   • a package of training modules and clinical guidelines; *(14, 15, 16)*
   • a health service delivery model; *(17, 18)*
   • an approach or a strategy; *(4)*
   • training modules and clinical guidelines are referred to as components of this approach and *tools to implement the strategy*; and
the most recent (unpublished) briefing document the IMAI team produced refers to IMAI as “an integrated approach to scaling up comprehensive HIV/AIDS care, treatment and prevention” (4).

It is not clear from these descriptions that IMAI is designed for delivering a wider range of primary level prevention and care and that it is not only HIV/AIDS-focused. The links that IMAI has to IMCI and IMPAC, as well as its relationship to other interventions (such as TB Directly observed treatment short course (DOTS) training) are not made apparent. This lack of definition is one of the consequences of WHO not having specified a technical framework or strategy document on which IMAI is based.

It has been suggested that WHO should develop an improved communication strategy for IMAI that describes, in a simple way, that this is the operational platform for the WHO PHA. WHO should clarify what the scope of the [IMAI] package is and how this links with IMCI and IMPAC.

iii. There is no familiar brand name or coherent communication and marketing strategy

The approach has been named using an acronym ("IMAI", or “PCIMAA” in French) that is not easy to pronounce and does not really describe what it is. Communications experts were not consulted in developing the branding and marketing strategy (as is now commonplace in global initiatives). As a result, there are no effective marketing materials or accessible descriptions available to promote IMAI. Although the IMAI materials are (appropriately) designed to be generic tools, they similarly lack visual impact and consistent design elements that could make them more distinctive.

These communications challenges are not only a problem at the global level (where WHO is trying to promote IMAI to partner organizations, donors and MOHs), but also where IMAI is being implemented and where the end-user has to understand what they are “buying into”.

IMAI could be re-branded to provide a more literal understanding of what it is and to make it more marketable. A suggestion from the consultation meeting was that it could be branded as the public health approach health service strengthening package [for the Integrated Management of Adolescent and Adult Illness]. WHO should invest in a professional communications strategy, but this can only be done once the scope and nature of this strategy has been agreed on.

iv. The initiative has not given visibility to its successes

Despite being a key WHO activity under “3 by 5”, IMAI has not featured prominently in WHO publications. The June 2005 “3 by 5” progress report did not describe the significant progress made by IMAI, except to say that: “A training package for health workers at first-level facilities has been developed based on the WHO Integrated Management of Adult and Adolescent Illness (IMAI) format” (19).

There are very few published case studies or media statements by WHO reflecting the achievements of this initiative. Positive publicity is critical for sustaining and increasing support as well as demonstrating that the approach works.
4. IMAI does not have a monitoring framework to measure and report on changes and no systematic learning has taken place

i. **IMAI should be expected to demonstrate that it produces desirable changes in health service delivery (in the short-term) and longer-term health impacts.**

IMAI claims to produce outcomes in:

- decentralizing the provision of HIV prevention and treatment interventions by equipping care teams at the facility and health district levels;
- task-shifting through skills transfer and changing the scope of practice of health workers;
- improving the consistency and quality of health service delivery through practice improvements and motivating health personnel;
- establishing community linkages for a continuum of care and support;
- re-organizing health workers into care teams and incorporating PLHA into care teams;
- implementing patient monitoring systems for chronic care;
- strengthening drug management within health facilities;
- establishing linkages between related services, such as TB and MCH;
- strengthening referral systems between different levels of care; and
- ‘intensifying’ HIV-prevention activities that are delivered by health-care providers.

However, WHO has not yet developed a framework (indicators, instruments and a methodology) to monitor these changes, and this precludes IMAI from demonstrating any evidence that it is effective. Reporting is a vital element of the PHA and can be used to generate evidence that standardization and simplification do not compromise the quality of clinical care.

IMAI should increase the knowledge management and health-care improvement functions of the approach by building “communities of practice” and facilitating mechanisms for continuous learning and knowledge transfer.

ii. **A number of important operational research questions have been identified, but not yet investigated**

Only limited operational research has been conducted on IMAI and there are many key research questions to be addressed that the IMAI team has already identified.

In addition to “routine” operational research questions that investigate how well IMAI works in different settings, this includes important questions about the safety and effectiveness of IMAI, such as:

- whether clinical decisions made by nurses following IMAI algorithms (such as the medical eligibility for ART; clinical stage and identification of higher-risk patients) differ significantly from doctors;
- PLHA versus nurses as data clerks and adherence counsellors/case managers;
- training efficiency using various methods to augment generic IMAI training materials; and
- training and post-training support requirements and staff time required to run an effective HIV care/ART patient monitoring system, by level of health system.

An explicit strategy is needed for generating evidence that IMAI works. This needs to show “real-time” results and will require innovative methodologies for continuous evaluation and improvement.

5. IMAI must now become properly institutionalized as a WHO programme

i. IMAI has evolved within the context of HIV and AIDS treatment (through “3 by 5”), but has the potential to integrate more fully

During much of the development, IMAI was not in the Department of HIV/AIDS (Stop TB, then CPE), where it was conceived broadly as a public-health intervention for primary health care. During the declared “3 by 5” emergency response, the IMAI team moved into the Department of HIV/AIDS and IMAI became the main operational intervention promoted by WHO for scaling up the PHA to HIV/ART. This has provided the IMAI initiative with critical focus and resources linked to “3 by 5” and also shaped IMAI recently as a mainly HIV-focused intervention.

Before “3 by 5”, IMAI had been unable to gain significant momentum, which illustrates how attaching general health-system development processes to the momentum and resources of HIV treatment and prevention scale-up (or other global health initiatives, for that matter) can have positive spin-offs. The same principle should apply to both IMCI and IMPAC, as renewed commitments are being made to support maternal and child health. There is also an increasing emphasis on providing access to paediatric ART and on strengthening HIV prevention activities, including PMTCT.

ii. The place of IMAI within the WHO “3 by 5” strategy has never been satisfactorily resolved

IMAI was adapted as an approach for implementing the WHO PHA to HIV prevention and treatment in high HIV-burden, low-resource countries across all regions, but with particular emphasis on countries where large numbers of people need ART. WHO has focused on promoting treatment targets, rather than prescribing a specific strategic framework on which countries could build their public health policy and programmes to achieve this (as the “TB DOTS” strategy does). Consequently, the WHO initiative became “target-driven” and “guideline-led”, which initially positioned IMAI simply as a training package for implementing treatment guidelines. Although prevention interventions were included in the initial IMAI package, these have only recently been properly recognized as core high-priority components of the approach.

It has taken time to reposition IMAI more strategically as a comprehensive operational package for implementing the PHA.

During this period, IMAI has become independently established as a programme area within the HIV/AIDS Department, evolving into a prominent and extensive initiative that has encountered some internal resistance. The IMAI team has pursued an urgent programme of work, for emergency scaling up. They have sometimes “bent the rules” to get things done, which has been challenging to the Organization.
To a large extent, this reflects a continuing tension within WHO about whether it is appropriate for IMAI to be an operational activity at headquarters level in the HIV/AIDS Department (actively delivering training and technical support to countries), or mainly a normative activity (producing guidelines and materials for others to implement).\(^7\)

Dr Jim Kim (outgoing Director of the Department) only recently provided public endorsement for IMAI\(^8\), saying that the issue for WHO should no longer be about whether IMAI should exist, but rather how to continue improving this and scaling it up. Stronger leadership needs to be shown by WHO for IMAI to become a more established and successful strategy.

**iii. As a consequence, IMAI has not been appropriately supported within the WHO HIV/AIDS Department**

No additional personnel were recruited into regional and country WHO offices to support IMAI implementation at these levels. Although “3 by 5” officers were given the task of introducing IMAI into countries, this responsibility and the continuing role that they will play has not been clearly defined in their scope of work or as a performance expectation. The “3 by 5” officer orientation training was also too brief to provide a sound understanding of IMAI and how to implement the strategy in practice. Many officers missed this opportunity, since they were not yet in position.

**iv. The current organizational model for IMAI is weak and this needs to be expanded into an institutionalized programme**

People who have worked with the IMAI team in WHO express frustration that there has been a lack of consistent follow-up and communication: “The IMAI team is difficult to work with, as they are extremely busy and often away from the office on country missions”. This is symptomatic of the lack of programme capacity that has also affected the team’s ability to move beyond the current model of delivering ‘ad-hoc’ country support through many small-scale projects. This has begun to compromise the performance of IMAI\(^9\) and is beginning to show through lost follow-up to specific opportunities; delayed production of technical products; slower response times to country requests; lack of critical review and reporting on progress, etc.

For IMAI to move into full-scale implementation, the initiative needs to become institutionalized at all levels within the Organization and to be appropriately supported. WHO should consider whether this can continue to function as an isolated operational activity (within the HIV/AIDS Department), or expand IMAI into a cross-cutting programme that draws together the integrated components from different WHO departments for strengthening health systems to deliver PHA interventions.

**v. There are numerous drivers for scaling up IMAI as an institutionalized WHO programme**

Current developments in international health provide good rationale for urgently transforming IMAI into a properly institutionalized programme. These include:

---

\(^7\) The HIV/AIDS Department has traditionally focused on these “normative” functions, although there are good examples of operational initiatives (such as EPI) across other WHO departments.

\(^8\) IMAI Consultation Meeting, 29-30 November 2005.

\(^9\) During the last quarter of 2005, WHO was forced to postpone the implementation of IMAI in six west-African countries (Benin, Chad, Mali, Mauritania, Niger and Togo); has not been able to follow-up on the Burundi adaptation; and had to postpone support to Malawi.
- commitments to scaling up health services to deliver “Universal Access”;
- increasing investment into health within poor countries;
- expectations for global initiatives to support health systems strengthening;
- decentralization of service delivery to achieve coverage targets;
- renewed interest in developing human resources for health;
- increasing demand for services (through changing utilization and care-seeking patterns);
- lower costs of using services (with the abolition of user fees in many countries);
- increasing availability of drugs and supplies (including paediatric formulations);
- the urgency of intensifying HIV prevention, reflected by the UNAIDS global epidemic report;
- political commitments to increase harmonization and alignment;
- increasing involvement of the non-state sector;
- greater community participation in health service delivery; and
- the need for more reliable strategic information.

This is an important period in WHO’s history, in which the Organization has the opportunity to choose how to embrace these opportunities and build on the momentum of “3 by 5” and progress that IMAI has already made. WHO needs to decide whether IMAI will remain primarily HIV/AIDS-focused, or be further developed to become a standard platform for delivering population-based health care in low- and middle-income countries.

Various models already exist within WHO (including global partnership models, such as “Stop TB”) for how this broader vision might possibly be structured. However, it is beyond the scope of this evaluation to make any recommendations in this regard and this deserves further consideration. In either case, further implementation experience is still needed (with better mechanisms for rapid feedback and improvement) to prove that IMAI has the potential to achieve this.
III. Key recommendations and conclusions

1. IMAI has been an appropriate development aiming to provide operational guidance and support to countries implementing public health approach HIV/AIDS prevention and treatment interventions.

2. It is valuable because it offers a generic, simplified and institutionally endorsed (by WHO) integrated set of tools and methodologies. All stakeholders can buy into, adapt and implement these across a range of settings. However, WHO needs to promote IMAI more strategically to gain further partnership support and avoid creating misperceptions that this is “WHO proprietary”, or restricted in its scope and approach.

3. IMAI is particularly relevant for strengthening service delivery at the primary-care level through decentralized services (within subdistricts), as there are few “competing” approaches and decentralization is an essential health sector strategy to increase coverage for essential interventions (towards achieving “3 by 5”, but particularly in moving towards the goal of Universal Access).

4. There is potential for IMAI to immediately integrate with IMCI and IMPAC, to provide a standard “platform” for all primary-care level HIV/AIDS interventions. Making this happen will require stronger leadership and sustained interdepartmental collaboration within WHO.

5. These characteristics of IMAI are probably more important than the specific content and scope (which can be adapted, as necessary). Rather than focusing resources on further content development, WHO now needs to prioritize implementation (by strengthening partnerships, financing, decentralized programme capacity, monitoring and learning systems, and the other recommendations described in this report).

6. The relevance of IMAI is demonstrated by the growing interest being shown by countries. However, it is still not evident whether this is a trend towards adopting IMAI in its comprehensive format, or for limited (modular) use. WHO needs to provide more explicit guidance about how these approaches fit into health sector strategies for scaling up public health approach HIV/AIDS interventions (especially as part of a framework for achieving Universal Access).

7. The adequacy of IMAI contribution to “3 by 5” is difficult to judge, because it had to go through a developmental process that required time. However, the full potential of these activities was probably not realized, due to organizational constraints that require institutional action, such as:
   - the lack of an explicit strategy for IMAI within the “3 by 5” strategy and ambivalent leadership support for the approach in the earlier phases of “3 by 5”;
   - staffing restrictions that have limited growth of the IMAI team;
   - inadequate support for IMAI within the HIV/AIDS Department; and
   - lack of dedicated resources to provide IMAI support through WHO regional offices (particularly the WHO Regional Office for Africa) and at the country level.
8. Despite these constraints, IMAI has achieved considerable progress during the relatively short period of “3 by 5”. Materials were produced quickly and an approach to adapting these at country level has been established (although the mechanisms and resources for rapidly scaling this up will need to become more robust).

9. Key technical experts within WHO already see IMAI as valuable because it offers a standardized approach that could be expanded beyond HIV/AIDS. This provides immediate opportunity for WHO to decide whether to take the approach broader than HIV/AIDS (however, this requires further appraisal that is beyond the scope of this study).

10. There is potential for IMAI to contribute towards strengthening health systems, especially if harmonized with other integrated programmes (IMCI and IMPAC). The approach could also possibly be combined with existing TB DOTS training activities and later incorporate chronic noncommunicable diseases. These health systems effects need to be measured in practice (given that traditional IMCI programmes in isolation failed to demonstrate significant systems strengthening impacts). If WHO decides to pursue this broader goal, the technical area would probably need to be relocated within the Organization and strengthened as a programme at the regional office and country levels.

11. WHO needs to prioritize scaling up the capacity to implement IMAI by making this an institutionalized programme that is better positioned within WHO (with stronger involvement of regional offices – especially the WHO Regional Office for Africa; more “programme” staff and a strong programme manager; better-trained and supported “3 by 5” officers; a professional communications strategy promoting what it can offer; systems for learning and continuous improvement; as well as other elements that are described throughout this report).

12. This will require more stable funding and a much more explicit strategy that is supported by leadership within WHO and achieves partnership participation and “buy-in” (including by major donors and MOHs).

13. WHO also needs to develop more effective mechanisms for working with other key players, such as a practical partnership model and instruments for engaging partners to deliver coordinated contributions.

14. WHO must strengthen systems for routine monitoring, evaluation and operational research (considering using modern “real-time” knowledge management and improvement methodologies) to progressively adapt the IMAI approach for rapid scaling up and to demonstrate that this works.
References


9. As reported by the National AIDS Programme Manager during the IMAI consultation meeting.


