

Country Name	Integrated HIV and AIDS Care Implementation Project at District Level
Republic of Zambia	

I. Project Outline

Background	<p>Zambia has been severely hit by the pandemic of HIV/AIDS with the adult HIV infection rate of 16.5% at the end of 2003, which was much higher than the world average (1.1%) and the average of Sub-Sahara African countries (7.5%). The socio-economic development of the country had been hindered by the ravages of the disease through the loss of human resources in all sectors. Approximately one million HIV-positive persons were estimated in Zambia and 200,000 persons needed Anti-retroviral treatment (ART). The Zambian government had committed herself to provide ART to 100,000 Zambians by the end of 2006 in the context of “3x5” Initiatives of the World Health Organization (WHO). In addition, the Zambian government introduced a free provision of ART since August 2005 which led to increase in the number of ART centres and clients who were able to access ART. However, there were challenges in the health and medical services in Zambia such as lack of health and medical service workers and lack of accessibility to appropriate HIV care services in the rural areas.</p>												
Objectives of the Project	<p>This project was aimed at improving the quality of and accessibility to the HIV/AIDS care services in Chongwe and Mumbwa districts in Zambia, and the approach for improvement of HIV/AIDS care services practiced in the project was expected to be introduced in other districts. Based on the above, the following project purpose was set.</p> <ol style="list-style-type: none"> Overall Goal: Interventions to improve the HIV and AIDS care services for People Living with HIV (PLHIV*) demonstrated at target districts are introduced in other districts. Project Purpose: HIV and AIDS care services are improved and accessible at target districts. <p>* People Living with HIV (PLHIV) is a terminology used in UNAIDS' Terminology Guidelines.</p>												
Activities of the project	<ol style="list-style-type: none"> Project site: Chongwe District (Lusaka Province) and Mumbwa District (Central Province) Main activities: (i) Training for health workers and non-health workers in the skills related to ART services; (ii) provision of mobile ART services**; (iii) training for District Health Management Team (DHMT) staff in management skills for strengthening HIV care services; (iv) conduct Operational Research***; and (v) conduct workshop to disseminate the lessons learnt for their incorporation in national guidelines. <p>** Mobile ART service: The ART Services offered at a mobile site outside the work station of the static site on a regular basis. The services provided by the mobile unit at the mobile site should be complementary to provide a comprehensive package of ART services. The static site is the health facility that is fully accredited to provide HIV services as an established site that has resources to support other facilities to provide the same services.</p> <p>*** Operational Research: A practical research planned and implemented in the data collection and analysis by the service providers in order to improve for effective and efficient implementation of programmes by directly reflecting the results in to the programme.</p> <ol style="list-style-type: none"> Inputs (to carry out above activities): <table border="0" style="width: 100%;"> <tr> <td style="width: 50%;">Japanese Side</td> <td style="width: 50%;">Zambia's side</td> </tr> <tr> <td>1) Dispatch of experts: 11 persons (Long-term experts: 4 persons, short-term experts: 7 persons)</td> <td>1) Counterpart personnel: 15 persons</td> </tr> <tr> <td>2) Acceptance of trainees in Japan: 4 persons</td> <td>2) Land and facilities: project office and facilities, utilities, ARVs and HIV test kits, etc.</td> </tr> <tr> <td>3) Provision of equipment: Vehicles, laboratory equipment and office equipment (PC, projector, printer, copy machine, etc.)</td> <td>3) Local cost: salaries to counterpart personnel</td> </tr> </table> 					Japanese Side	Zambia's side	1) Dispatch of experts: 11 persons (Long-term experts: 4 persons, short-term experts: 7 persons)	1) Counterpart personnel: 15 persons	2) Acceptance of trainees in Japan: 4 persons	2) Land and facilities: project office and facilities, utilities, ARVs and HIV test kits, etc.	3) Provision of equipment: Vehicles, laboratory equipment and office equipment (PC, projector, printer, copy machine, etc.)	3) Local cost: salaries to counterpart personnel
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Ex-Ante Evaluation	2006	Project Period	April 2006 – March 2009	Project Cost	(Ex-Ante) 315 million yen (Actual) 266 million yen								
Implementing Agency	Ministry of Health (MOH)												
Cooperation Agency in Japan	National Center for Global Health and Medicine (NCGM)												

II. Result of the Evaluation¹

1 Relevance
<p><Consistency with Development Policy of Zambia Government at the time of ex-ante evaluation and the project completion></p> <p>This project was consistent with Zambia's development policy of “to increase accessibility of HIV/AIDS care service in the entire country” as set forth in the policy documents including the National Health Strategic Plan (NHSP) (2006-2010) and NHSP (2011-2015).</p> <p><Consistency with Development Needs of Zambia at the time of ex-ante evaluation and the project completion></p> <p>This project met the development needs of Zambia to increase accessibility of ART services in the rural area. Although HIV/AIDS prevalence among adults aged 15-49 years decreased from 16.5% in 2003 to 14.3% in 2007 in Zambia, this figure is still at high level.</p>

¹ There was a change in administrative zone of project site as a result of public sector reform of Zambia in 2013. Chongwe district was divided into two districts as Chongwe and Rufunsa districts in 2013 since Mpansha and Rufunsa areas of Chongwe district were separated from Chongwe district and they established a new district as Rufunsa district. Mumbwa district was downsized in 2013 since Nampundwe area of Mumbwa district was separated from Mumbwa district and integrated with other areas from Lusaka province into Shibuyunji district.

Therefore, reduction of the spread of HIV/AIDS by increasing access to HIV/AIDS care services including ART services has been needed. <Consistency with Japan's ODA Policy for Zambia at the time of ex-ante evaluation>

The project was consistent with Japan's Country Assistance Policy for Zambia (2006) to improve the cost effective health and medical services.

<Evaluation Results>

In the light of above, the relevance of this project is high.

2 Effectiveness/Impact

<Status of Achievement of the Project Purpose at the time of project completion>

The project purpose was achieved by the project completion. Regarding the cumulative number of HIV positive case detected by Voluntary Counseling and Testing (VCT)/ Prevention of Mother and Child Transmission (PMTCT), it was 4,193 in the second quarter of 2008 in Chongwe, which fully met its target value (105% of achievement). For Mumbwa, it was 5,887 in the second quarter of 2008, which mostly met its target value (84% of achievement). As for the cumulative number of ART clients, it was 1,852 in March 2009 in Chongwe, which mostly met its target value (80.5% of achievement). For Mumbwa, it was 2,566 in December 2008, which met its target value to some extent (73% of achievement). Regarding the percentage of defaulters within 6 months among ART clients, it was 9.7% in March 2009 in Chongwe and 8% in December 2008 in Mumbwa and both fully achieved their target values.

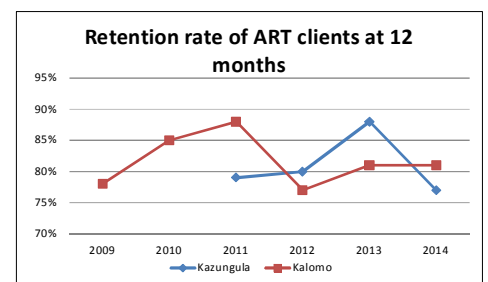
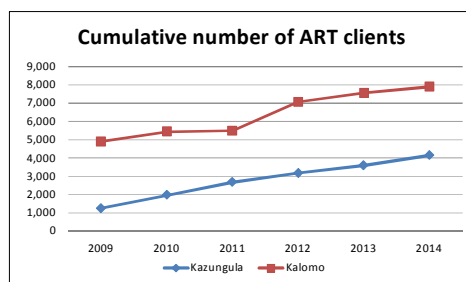
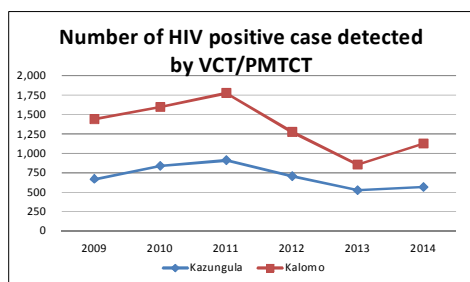
<Continuation Status of the Project Effect at the time of ex-post evaluation>

The provision of HIV and AIDS care services including mobile ART services have been continued in the target districts after the project completion. After the project completion, ART sites in Chongwe were increased from 13 to 21, and Mumbwa were increased from 10 to 14. The cumulative number of HIV positive case detected by VCT/PMTCT in Chongwe and Mumbwa has increased steadily after the project completion, and it reached to 13,696 in Chongwe and 17,876 in Mumbwa by 2012. Also the cumulative number of ART clients expanded to 7,524 in Chongwe and 14,372 in Mumbwa by 2012. Regarding the retention rate of ART clients at 12 months ^(Note 1), it maintained a high level such as 83% (2012) in Chongwe and 90% (2011) in Mumbwa. The major reasons for increase in the number of ART clients are considered as (i) increase in the number of ART sites, (ii) change in treatment guidelines and (iii) training of staff in ART. As a result of public sector reform of Zambia in 2013, the target two districts were restructured and separated into four districts such as Chongwe, Rufunsa, Mumbwa and Shibuyunji districts. The actual performance data of the above three key indicators in 2013 and 2014 were not fully available in the four districts. However, based on the available information, the project effect seems to have been continued in the four districts as well. According to the interview with People Living with HIV (PLHIV) in the four districts, they recognized the improvement in quality of HIV and AIDS care services such as increase in the accessibility of the services, improvement of quality of medical staff and good availability of the drugs and the lab tests. In addition, it was confirmed that the guidelines developed by the project helped to maintain the quality of the mobile ART services as they were used when opening the new sites.

<Status of Achievement of the Overall Goal at the time of ex-post evaluation>

The overall goal has been achieved. The project approach to improve the HIV and AIDS care services for PLHIV has been disseminated to other districts in Zambia. It was confirmed that as of December 2013, 57 out of 72 districts in Zambia introduced and practice mobile ART services. This result was attributed to the change of ART guideline by the government according to the WHO new guideline revised in 2013. It includes change of initiation criteria for the treatment and Option B+ ^(Note 2) for prevention of mother to child transmission (PMTCT).

On the other hand, Kazungula and Kalomo districts, where the follow up technical cooperation project "the Project for Scaling Up of Quality HIV/AIDS Care Service Management (SHIMA) (2009-2015)" was implemented, demonstrated positive outcomes in improvement of HIV and AIDS care services (see the figures below).



<Other Positive and Negative Impacts>

The project has an indirect positive impact on the gender equality in the community. The interview with ART clients indicates that community women were benefitted from improvement of accessibility to medical services through mobile ART services since they reduced the travel time and distance from home to the health facilities without leaving home and household duties for a long period of time. On the other hand, some negative impacts are observed. Due to increase of number of ART clients exceeding the capacity of health facilities which do not have enough number of health care providers, the quality of service was compromised to some extent.

<Evaluation Results>

Both the project purpose and overall goal were achieved and some positive impact was observed. Therefore, effectiveness/impact of the project is high.

Achievement of project purpose and overall goal

Aim	Indicators	Results																								
(Project Purpose) HIV and AIDS care services are improved and accessible at target districts	(Indicator 1) Cumulative number of HIV positive case detected by VCT/PMTCT	<p><u>Status of achievement: Mostly achieved</u> (Terminal evaluation/Ex-post evaluation)</p> <table border="1"> <thead> <tr> <th>District</th> <th>Target</th> <th>2007 Q3</th> <th>2008 Q2</th> <th>2009</th> <th>2010</th> <th>2011</th> <th>2012</th> </tr> </thead> <tbody> <tr> <td>Chongwe</td> <td>4,000</td> <td>2,616</td> <td>4,193</td> <td>6,045</td> <td>8,451</td> <td>10,949</td> <td>13,696</td> </tr> <tr> <td>Mumbwa</td> <td>7,000</td> <td>3,473</td> <td>5,887</td> <td>8,509</td> <td>11,514</td> <td>14,891</td> <td>17,876</td> </tr> </tbody> </table>	District	Target	2007 Q3	2008 Q2	2009	2010	2011	2012	Chongwe	4,000	2,616	4,193	6,045	8,451	10,949	13,696	Mumbwa	7,000	3,473	5,887	8,509	11,514	14,891	17,876
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(Overall goal) Interventions to improve the HIV and AIDS care services for People Living with HIV (PLHIV) demonstrated at target districts are introduced in other districts.	(Indicator 1) Number and contents of interventions introduced in other districts	<p><u>Status of achievement: Achieved</u> (Ex-post Evaluation)</p> <ul style="list-style-type: none"> 57 out of 72 districts in Zambia were offering mobile ART services as of December 2013. ^(Note 3) The kinds of contents of interventions in other districts are Diagnostic Counselling and Testing (DTC), Prevention of Mother and Child Transmission (PMTCT), Finger Pricking HIV Testing and Mobile ART services. 																								

Source: Terminal evaluation report, JICA internal documents, Interview with counterparts.

Note 1: Instead of “Percentage of defaulters within 6 months among ART clients”, this ex-post evaluation collected “Retention rate of ART clients at 12 months” as an alternative indicator to confirm the continuation status of the project effect at the time of ex-post evaluation since the data of “Percentage of defaulters within 6 months among ART clients” was not available at MoH after project completion.

Note 2: Option B+ is a World Health Organization (WHO) treatment guideline which recommends providing lifelong ART to all pregnant and breastfeeding women living with HIV regardless of CD4 count. It is mostly intended for the Prevention of Mother-to-Child Transmission (PMTCT) of HIV/AIDS. CD4 is an indicator to measure the level of immunity when infecting HIV.

Note 3: At present, the total number of districts of Zambia has increased to 103.

3 Efficiency

Both the project cost and project period were within the plan (84% and 100%), therefore, effectiveness of the project is high.

4 Sustainability

<Policy Aspect>

The Government of Zambia has maintained to prioritize HIV/AIDS Policy including free provision of anti-retroviral drugs. Integration of ART services into other health programmes at district level is being planned and some districts have already started the process of integration. In addition, the government plans to go beyond this and for achieving Universal Health Coverage, start Option B + ^(Note 3) and HIV Self-testing.

<Institutional Aspect>

At the central level, the Directorate of Clinical Care and Diagnostic Service, MOH oversees the ART program. At the district level, a district ART coordinator of District Medical Office (DMO) is in charge of implementation of mobile ART services as well as coordination of the activities of ART programme with MOH. The Mobile ART team is established at each target districts (currently four target district), and the ART team is formed by the clinician, nurses and pharmacist of the district hospital. In overall, organizational set up is arranged appropriately at target districts. On the one hand, it is reported that the staff number of DMO mobile ART team is appropriate in Chongwe and Mumbwa districts. On the other hand, there is a shortage of staff at DMO and mobile ART team in Rufunsa district and rural health centres in all target districts. Particular, no clinician is stationed at many rural health centres in Mumbwa district. Since ART services are giving extra workload to the rural health centres such as record keeping in the registers and preparation of patient files, many rural health centres faces an issue of staff shortage such as a data clerk who handles these extra works. In addition, the mobile ART services are supported by the volunteers who play an important role in adherence counselling and follow-up of defaulters. However, it is not easy to keep their motivation and commitment for a long time. While MOH has been promoting the mobile ART services to other districts through the annual partners meetings, local national conferences and annual planning meetings by using the results from the operational research.

<Technical Aspect>

The medical doctors, nurses, and counsellors of mobile ART team in Chongwe, Mumbwa, and Rufunsa districts have maintained the necessary knowledge and skills to conduct the ART services. The staff of rural health centres in Chongwe, Mumbwa and Rufunsa districts have also maintained the necessary knowledge and skills to conduct the HIV and AIDS care services practiced by the project such as DTC, PMTCT, Tuberculosis (TB), Sexually Transmitted Infections (STI) and Antenatal clinic and Finger Pricking HIV testing, while the rural health centres in Rufunsa district conduct only PMTCT. The operation of health centres in Chongwe, Mumbwa and Rufunsa districts are monitored and supervised by DMOs through their regular visits to rural health centres in quarterly base. However, it is reported that DMOs face some difficulties in availability of transportation and fuels necessary for monitoring of rural health centres due to limited financial resources. As mentioned earlier, registers are not fully updated on time due to a shortage of staff, particular a data clerk.

In order to maintain the quality of ART services for concerned staff of DMOs and rural health centres in the target districts, MOH has been offering trainings for them with the assistance of various development partners including JICA. However, the training opportunities for staff of rural health centres are limited due to budget constraints. Regarding the technical capacity of DMO, mobile ART team and rural health centre in Shibuyunji district, it was difficult to evaluate it due to non-availability of data.

<Financial Aspect>

Basically the Government of Zambia heavily depends the budget for ART services on the financial support of the development partners. 75% of the budgets for ART services including the purchase of medicines are financed by the cooperating partners such as the Global Fund to Fight AIDS, Tuberculosis, and Malaria (GFATM) and The United States President's Emergency Plan for AIDS Relief (PEPFAR). The ARVs and other necessary commodities for ART services in the district level are budgeted at MOH as a part of their annual budget and the shortage of the ARVs was not observed. However, additional budget such as fuel and daily subsistence allowances is necessary for the mobile ART service team to go to the sites. Those additional operation and monitoring costs must be budgeted at the district level. As mentioned earlier, the mobile ART services have been continued in the target districts. It is confirmed that Mumbwa receives 120,000 ZMW every year as annual budget for the implementation of mobile ART services. However, DMO explained that the allocated budget is insufficient or disbursement of funds delays. This caused a negative impact on number of staff, arrangement of logistics for monitoring activities, training opportunities, etc.

<Evaluation Results>

Some problems have been observed in institutional, technical and financial aspects. Therefore, sustainability of the project is fair.

5 Summary of the Evaluation

This project has achieved the project purpose and overall goal. The three key indicators such as (i) the cumulative number of HIV positive case detected by VCT/ PMTCT, (ii) the cumulative number of ART clients, and (iii) the percentage of defaulters within 6 months among ART clients achieved or mostly achieved the respective target values for the target districts. The provision of HIV and AIDS care services including mobile ART services introduced by the project have been continued in the target districts with increased number of ART sites through the support by the "Project for Scaling Up of Quality HIV and AIDS Care Services" which commenced in 2009 after this project completion. Also the improvement in quality of HIV and AIDS care services such as increase in the accessibility of the services, improvement of quality of medical staff and good availability of the drugs and the lab tests were recognized by the ART clients. The project approach to improve HIV and AIDS care services for PLHIV has been disseminated to 57 out of 72 districts in Zambia as of December 2013 supported by the government and cooperating partners. The project has an indirect positive impact on the gender equality in the community. At the same time, some negative impacts were observed such as compromised quality of ART due to increase of ART clients without increase in number of health care providers.

Regarding the sustainability, there are some problems in terms of institutional, technical and financial aspects due to a shortage of staff, limited training opportunities, and limited amount of budget.

In the light of above, this project is evaluated to be highly satisfactory.

III. Recommendations & Lessons Learnt

Recommendations for Implementing agency:

- Mobile service is very effective way in the process of the expansion of ART services in the rural areas. However several issues and constraints were identified that require additional costs and human resources. For the sustainable provision of quality ART services, MOH is recommended to consider the following issues:
 - (1) Allocation of adequate human resources to rural health centres, particularly health service providers, is necessary since the existing number of health providers at rural health centres (1-2 staff /rural health centre) is limited to provide quality ART services in addition to their duties.
 - (2) Since mobile ART services require extra costs such as transport cost and per diem for the staff and these costs are borne by DMOs, it is a financial burden for DMOs, which makes difficult to continue mobile ART services. In order to maintain provision of ART services at rural health centres, it is recommended to consider to technical transfer of provision of ART services from mobile ART team to the rural health centre staff in order that rural health centres will be able to provide ART services without support of mobile teams.
 - (3) Consider incentives for community volunteers such as adherence counsellors so as to reduce the high turnover.
 - (4) As the existing number of staff at rural health centres are not able to respond to increasing number of ART clients, it is recommended to open up more ART sites to reduce congestion in existing facilities, both rural and urban.

Lessons learnt for JICA

- Since the model of mobile ART services introduced by the project was very effective to improve accessibility of services by the ART clients. The project design and approach can be referred as a good practice for the similar type of the project in the future.
- This project demonstrated the effective intervention approach to improve the HIV and AIDS care services for PLHIV at pilot sites (target districts), and its results were feed backed to the Ministry of Health. At the same time, the project established the mobile ART service

guidelines and proposed the follow up technical cooperation project “the Project for Scaling Up of Quality HIV/AIDS Care Service Management (SHIMA)” in order to disseminate the intervention approach proposed by the project to the national level. These inputs of the project have contributed to scaling-up of mobile ART service in the country. The above project design and exit strategy taking into consideration overall goal can be referred as a good practice for the similar type of the project in the future.



Vital check by ART team



Patients waiting for the treatment



Female volunteers supporting ART services

(Mobile ART team working at Rural Health Centre)