Rwanda

Joint Appraisal 2014

Executive Summary

Rwanda's immunization program is among the best in the African Region. Currently, 12 antigens are being utilized by the Routine Immunization program, including BCG, OPV, Measles (MR and MSD), Pentavalent, PCV, RCV and HPV. Rwanda has achieved immunization coverage above 95% for all antigens, and 94% of all children under one in Rwanda are fully immunized (Rwanda National Immunization Survey 2013).
Many factors have contributed to the achievement of high immunization performance, these factors include: (1) political commitment to improving Rwandan welfare from the grassroots level with the introduction of a community health insurance, (2) improving health system delivery (98% of deliveries took place either at health centre or the hospital and was attended by a skilled person, >90% of vaccination services are provided at government institutions, and around 10% are provided during outreach sessions), (3) expanding the engagement of Community Health Workers (CHWs) in vaccinations and other health issues. Rwanda has 15,000 villages and each village has 3 CHWs who are responsible for identifying all eligible children to be vaccinated and tracking defaulters.

The JA has been conducted in the context of a request for renewal of Gavi support for penta, PCV and RCV. The previous APR was reviewed in July 2013 and the country was requested to provide clarifications on budget and expenditures for last HSS/VIG. The country has reported 100% coverage for almost all antigens, though there are some denominator related issues. The country plans to maintain high coverage in coming years. The major issue the country faces is in terms of fixing the target and they have been requested to conduct in-depth analysis of targets from the health facility level upwards and come up with more realistic targets.

The country received US$ 2,462,813 as first tranche of HSS (2013-17) and it reports utilization/commitment of 62% of the budget, delays have been attributed to late receipt of tranche and subsequent delays in start-up of activities. The country is now planning to prepare a catch up plan to speed up the activities for year 2.

Despite the high performance of the country related to immunisation there were a number improvement areas that were identified for follow up action. In this context, the JA recommends renewal of Gavi support, with certain recommendations detailed in the table below.

Immunization Program	
Areas for Improvement	**Recommendation**
Targets need to be revised following recent census results.	Vaccine antigen targets need to be adapted based on population targets. The country needs to evaluate its new targets precisely.
Insufficient storage capacity of vaccines due to many new vaccines introduced without expanding cold chain capacity Cold chain management capacity needs to be strengthened	Fast track installation of additional 5 cold rooms with 40m3 each in 2014/15 with support from UNICEF, and GAVI/HSS Implement the recommendations from the Cold Chain Inventory from 2013 & EVM 2014 to augment the cold chain capacity, management and monitoring
HPV vaccination targets and strategy need to be re-evaluated.	Country should consider coverage survey on HPV vaccination to shed light on the quality coverage

	data and integrate HPV vaccine into to the routine immunization program (static and outreach)
Low TT2+ administrative coverage: The women who have achieved 5 doses of TT are not taken into account in calculating coverage. Those women represent 20% of target	Shift to measuring PAB rather than TT2+ coverage
Programme Governance and Oversight	
Ministry of Finance and Economic Planning (MINECOFIN) is not represented on the ICC	Secure MINECOFIN representation on the ICC to ensure that they understand and secure the resource needed to fund new vaccines and operational costs.
Regularity of ICC meetings	Establish a schedule for regular ICC meetings that are led by the MoH and discuss program performance on regular basis and not just Gavi related business.
No NITAG in Rwanda	MoH will discuss merits of creating a NITAG and take a decision accordingly
Programme Delivery	
Delay in HSS fund transfer from Gavi and subsequently within country to districts Delays in procurement	Improve financial disbursement and accountability systems to facilitate funds flow Improve and streamline the government procurement systems; Request for procurement to be transitioned to UNICEF to mitigate delays.
The RED/REC Strategy is not well structured	Improve planning, implementation and monitoring of the RED/REC Strategy to support efforts to reach 100% coverage
Overstocking of Vaccine	Vaccine and logistics management needs to be streamlined to avoid overstocking and under stocking at all levels through training and regular monitoring of stocks at all levels
Monitoring and Evaluation	
Use of data for programme planning at district and health centre level is not systematic	Strengthen capacity of EPI staff in data analysis and use
EPI specific supervision visits and Review meeting not regular	Establish periodic EPI specific M&E and supervision visits and review meetings at all levels of health system
Health System Strengthening	
Gavi HSS funding is not aligned to the country's planning system	Review Gavi HSS funding to determine whether it can be aligned to the country's planning cycle
Baselines for HSS support have not been established	Determine baselines for the remaining years of HSS support to ensure that the impact of the support can be adequately measured
Programme and financial reports lack details like status of completion of activities and funding spent	Ensure that programme and financial reports provide an update on the status of activities and also funds spent on activity implementation along with identification of other funding agencies

	(government or donors)
Financial Management	
Asset management needs to be improved	Develop an asset register for procurements undertaken with Gavi support and promote culture of keeping assets in good-condition.
Transition from the MoH to the Rwanda Biomedical Centre (RBC) for implementation management	Rwanda needs to submit to Gavi by Oct 2014 a note outlining the change in implementation management and transition process need to be monitored closely by MoH
New vaccines and Polio	
AEFI surveillance system is weak	NRA including AEFI surveillance systems needs to be strengthened
Immunisation Financing and Sustainability	
Sustainability of the program: Many operational costs are being funded through Gavi HSS, need to increase government resources for routine activities	Increase government contribution to the immunization program, specially operational costs
Technical Assistance	
A range of technical assistance areas were identified	Technical support with the development of success stories from the health sector; Technical support with an external evaluation on the national immunisation programme; Technical support to develop an operational research agenda including a data quality assessment and EVM, the development of an Elimination Plan for Measles/Rubella and a Readiness Assessment for SARA. Technical assistance to enhance durable financial sustainability strategies and to update the costing tool for cMYP.

Introduction

A joint appraisal was conducted in Rwanda from 15-19 Sep 2014. The preparations were initiated in July 2014, starting with the country's agreement to the joint appraisal and proposed dates. This was followed by sharing and review of documents, development of terms of reference, agreement on meetings with stakeholders and formation of the JA core team. The in-country mission was held from 15-19 Sep 14 with WHO AFRO (represented by Dr Prosper Tumusiime) and UNICEF regional office (represented by Dr Nasir Yusuf). The team was supported by the MOH/VPDP, WHO and UNICEF in-country office. The team met stakeholders from the ICC, CSO, Vaccine preventable diseases program (VPDP), Ministry of Health (MoH), Single Project Implementation Unit (SPIU), and Ministry of Finance and Economic Planning and discussed EPI program performance, challenges and way forward. The team also visited 3 districts and health facilities to observe program implementation. The report was prepared jointly with inputs from WHO, UNICEF regional & country offices. The findings were presented to the MoH/ICC on 19th Sep 2014.

This was the first time the country undertook an appraisal and it was conducted as a standalone process. The feedback from the stakeholders about the appraisal was positive and they welcomed this approach. It provided an opportunity to look closely at the program performance, discuss and resolve issues and the program managers also benefitted from the inputs provided by the appraisal team.

Immunization Program Achievements

Rwanda's immunization program is among the best in the African Region. Currently, 12 antigens are being utilized by the Routine Immunization program, including BCG, OPV, Measles (MR and MSD), Pentavalent, PCV, RCV and HPV. The country funds the traditional vaccines, while it receives support for the new and underutilized vaccines from Gavi.

Due to high routine immunization coverage and periodic Supplementary Immunization Activities (SIAs), vaccine preventable diseases have been controlled in Rwanda. In fact, the last case of wild-type poliovirus was reported in 1993, and neonatal tetanus was eliminated in 2004. Additionally, Rwanda is in the process of shifting to measles elimination mode.

Rwanda has also made tremendous progress in reducing under 5 mortality from 151 in 1990 to 55/1000 live births in 2013 (MDG target is 50/1000 live births by 2015).

Ensuring equity for all health programs including EPI has been a priority of the government of Rwanda. 97% of districts (29 out of 30) have reached immunization coverage above 80% in 2013. About 50% of the districts have coverage rates over 100%.

During the field visit it was observed that when the target was based on 4.1% (according to projections from old census of 2002), the coverage was almost 100% and after calculating target population based on 2.9% (using projection from the 2012 census), the health facilities and district coverage's are over 100% (in about 50% of the districts). This drop of 30% in number of surviving infants will also have an impact on the vaccine doses required, co-financing payments etc.

There have equally been questions about the size of the target population of (12 year old) girls used as denominator for HPV vaccination coverage in the campaigns. WHO have proposed a coverage survey on HPV vaccination to shed light on the quality coverage data.

There are no discrepancies among gender in vaccination except with regards to the HPV vaccine, which is given to young adolescent girls. All remaining antigens are universally provided to Rwandan children, and there are no hard to reach areas in Rwanda. The dropout rate BCG-Measles is 3.1 and Penta1-Penta3 is 0.9 (immunization survey 2013).

Vaccine wastage rates for new vaccines remain low (about 2%).

Immunization Program	
Areas for Improvement	**Recommendation**
Targets need to be revised following recent	Vaccine antigen targets need to be adapted

census results.	based on population targets. The country needs to evaluate its new targets precisely.
Insufficient storage capacity of vaccines due to many new vaccines introduced without expanding cold chain capacity Cold chain management capacity needs to be strengthened	Fast track installation of additional 5 cold rooms with 40m3 each with support from UNICEF, and GAVI/HSS in 2014/15 Implement the recommendations from the Cold Chain Inventory from 2013 & EVM 2014 to augment the cold chain capacity, management and monitoring
HPV vaccination targets and strategy need to be re-evaluated.	Country should consider coverage survey on HPV vaccination to shed light on the quality coverage data and integrate HPV vaccine into to the routine immunization program (static & outreach)
Low TT2+ administrative coverage: The women who have achieved 5 doses of TT are not taken into account in calculating coverage. Those women represent 20% of target	Shift to measuring PAB rather than TT2+ coverage

Programme Governance and Oversight

Rwanda has a well-functioning ICC & HSCC with a broad representation including MoH, WHO, UNICEF, USAID, Rwanda Biomedical Center (RBC), CSO and others. The committees act as advisory bodies to MoH and approve all technical decisions (like NVI, HSS implementation). The committee is supposed to meet on quarterly basis.The committee met 3 times in 2013 and once in 2014 and discussed about APR, MR campaign, IPV introduction plan and HSS workplan.

Programme Governance and Oversight	
Areas for Improvement	**Recommendation**
MoF is not represented on the ICC	Secure MoF representation on the ICC to ensure that resources to fund vaccines and operational costs have been accounted
Regularity of ICC meetings	Establish a schedule for regular ICC meetings that are led by the MoH and discuss program performance on regular basis and not just Gavi related business.
No NITAG in Rwanda	MoH will discuss merits of creating a NITAG and take a decision accordingly

Program Delivery

GAVI support to NVS and HSS has helped the country to improve RI; the process of new vaccine introduction includes the review of vaccination guidelines, data collection tools, social mobilisation and communication tools, training of immunization managers and vaccinators on the new tools and cold chain reinforcement based on the Cold Chain Assessment and EVM Improvement Plan. On the other hand, NVS had some indirect costs which should be considered in the planning stage (e.g. increased workload on the health workers).
RED/REC strategy is being implemented but is not well structured. As the country moves to achieve 100% coverage, it needs to plan, implement and monitor strategies of reaching every child at the health facility level. The health workers need to be trained and equipped to reach the remaining children.

Rwanda has about 45,000 community health workers (CHW) in 15000 villages. They play an important role in the EPI. Through home visits the CHW are able to inform the parents about the importance of immunization and also track the drop out children.
The cold chain system is well functioning at all levels, with some training and supportive supervision the gaps in the knowledge and practice amongst the health workers can be addressed easily.

Vaccine and logistics management is satisfactory overall, though there have been some instances of overstocking/under stocking of some antigens at the national and district levels. This is primarily related to changes in the target population.

Programme Delivery	
Areas for Improvement	**Recommendation**
Delay in HSS fund transfer from Gavi and subsequently within country to districts Delays in procurement	Improve financial disbursement and accountability systems to facilitate funds flow Improve and streamline the government procurement systems; Request for procurement to be transitioned to UNICEF to mitigate delays.
The RED/REC Strategy is not well structured	Improve planning, implementation and monitoring of the RED/REC Strategy to support efforts to reach 100% coverage
Overstocking of Vaccine at national level and instances of both over & under stocking at lower levels	Vaccine and logistics management needs to be streamlined to avoid overstocking and under stocking at all levels through training and regular monitoring of stocks at all levels

Program Planning, Monitoring and Evaluation

Annual plans for the EPI program exists both at the national and district level. At district and health centre levels, these are mostly operational plans (calendar of fixed and outreach activities). National and district plans are costed. These activities are funded through Gavi support. The government funds the traditional vaccines and vaccination material and it has increased its co-financing to US$ 0.35 per dose. The current plan is fully funded by government, GAVI and other partners with no significant gaps reported.

As mentioned above, the target population for the various antigens was based on projections from previous census, but with adjustment in the target population based on 2012 census (from 4.3 – 2.9%) many health facilities will achieve more than 100% coverage rate by end of year.

Supportive supervision sessions are conducted from central to district level and from district level to health centre level. There are both integrated and EPI supervisory checklists at the district hospital level. The district hospital conducts quarterly supportive supervision to health centres targeting poor performing districts. There are also monthly supervision visits to health centres to monitor the PBF. In both cases, written feedback is provided, and monitored subsequently to ensure that recommendations are implemented.
District hospital holds monthly meeting with health centres to review the status of implementation of the work plan, and to address gaps.

The M & E framework in place for the management of GAVI HSS and NVS has indicators that are aligned with those for the cMYP and HSSP. Monitoring of routine immunization data is conducted through the HMIS, which has been computerized, with the health centres transmitting their monthly

data directly to the national level. Data managers and M & E officers at the district hospital levels analyse program performance of health centres and provide feedback on their performance. During monthly meetings between the district hospital and health centre teams, the quality of data is discussed and measures to improve quality outlined. There is however a gap in the way the EPI data is analysed and reviewed in these meetings (which are sector wide reviews and hence don't go in depth for any individual program, for e.g. only BCG and measles coverage is reviewed for EPI program).

The health centre and district hospital staff participated in a number of DQS training in the past years.
All seven key recommendations from the 2011 EVMA were implemented. A follow up EVMA was conducted in June 2014 and an improvement plan has been developed for implementation.

Monitoring and Evaluation	
Areas for Improvement	**Recommendation**
Use of data for programme planning at district and health centre level is not systematic	Strengthen capacity of EPI staff in data analysis and use
EPI specific supervision visits and Review meeting not regular	Establish periodic EPI specific M&E and supervision visits and review meetings at all levels of health system

Health System Strengthening

The country was approved to receive HSS support of US$ 10,339,970 (2013-17). The first tranche of US$ 2,462,813 was received by the country in Nov 2013. Of the 31 planned activities, 3 (9.7%) have been completed, 16 (51.6%) are on-going while 12 (38.7%) have not yet been implemented. Out of the first year budget of USD 2,462,813, USD 1,642,815 (66.7%) has been disbursed by the SPIU, while, in total, USD 1,531,874 (62%) has been spent or committed. All expenditure correlates to planned activities outlined in the proposal.

There has been a delay in implementation which is partly attributed to the late receipt of GAVI HSS funds to the country (18 November 2013) for an implementation year starting July 2013. Some activities started in February 2014. Other factors in the delay in implementation include challenges related to turnaround time for procurement (goods and services) associated with the tendering processes and initial delays in transferring funds from Vaccine Preventable Disease Program (VPDP) and Rwanda biomedical centre (RBC) to District Hospitals caused by lack of an MOU (this has now been resolved). Furthermore, other delays have been associated with some activities that are sequential and depend on completion of others. Because it will not be possible to complete all activities within the period of 12 months since receipt of the GAVI HSS funds, some of the activities have been rescheduled to be completed in first quarter of 2015.

The process for selecting and engaging with CSOs is not yet finalized as the country could not directly renew the contract with the CSO that had been previously approved but instead had to undertake a transparent tendering process through the SPIU. The publication of expression of interest is for the week of the appraisal. Hence no money transfer and implementation regarding CSO activities has happened yet.

Out of the 7 outcome indicators that had targets for year one, 4 targets were achieved, 1 was not achieved while 2 others could not be measured as they are obtained from a DHS. Out of 8 intermediate result indicators that had targets for year one, 5 were achieved while 2 were not achieved and the other was not measured as there was no DQRC done. Four intermediate result indicators did not have baselines and consequently the level of achievement could not be assessed for the two that had a measure for the year. Details are available in the HSS pre-assessment report.

The country has put in place a performance based financing program supported by the Global fund and World Bank. All districts, health facilities and national programs submit annual workplan and targets and are assessed on the performance annually. If they are able to meet the targets they are given performance based incentives which can be used by the health staff for improving the facilities in their health centres as well as incentive for workers. This program has improved the service delivery, both in terms of performance (coverage) as well as quality. The EPI program has been receiving PBF since 2006.

The M&E mechanisms & framework for HSS is satisfactory.

During year one, only one activity for technical assistance was planned related to the development of the communication strategy for the health sector, funding for this has been requested. The immunization program received quality technical support from WHO and UNICEF for training mid-level health managers in M&E and for conducting an EVM and cold chain spare parts inventory. Technical assistance has been planned in year 2 for the following activities:

- An external evaluation of immunization program;
- Operational research (HMIS/EPI Data Quality Assessment and EVM) for monitoring and evaluation of EPI performance; creation of elimination model for measles/rubella surveillance; and service availability and readiness assessment.

The proposed GAVI-funded HSS activities for 2014-15 are in accordance with the approved grant activities. There is no change in objectives and no shifts in the budgets. The only change is related to the activity on allowances to five RBM provincial mentors, where the budget line will be re-allocated to PBF. The second tranche of US$ 1,977,144 has already been approved.

Health System Strengthening	
Areas for Improvement	**Recommendation**
Gavi HSS funding is not aligned to the country's planning system	Review Gavi HSS funding to determine whether it can be aligned to the country's planning cycle
Baselines for HSS support have not been established	Determine baselines for the remaining years of HSS support to ensure that the impact of the support can be adequately measured
Programme and financial reports lack details like status of completion of activities and funding spent	Ensure that programme and financial reports provide an update on the status of activities and also funds spent on activity implementation along with identification of other funding agencies (government or donors)

Financial management

The Ministry of Health is the lead recipient and implementer of Gavi support in the country. The funds are handled by SPIU (Single Project Implementation Unit) approved by the Cabinet of GoR. The SPIU provides technical support and oversight to all donor projects in the country. The SPIU in collaboration with the Directorate of MCH and the Directorate of Planning and Finance in the MOH oversees implementation of activities funded by Gavi.

For HSS funds, the sub-recipients are the Vaccine Preventable Disease Program (VPDP) and MCH division. The program divisions' prepare a quarterly workplan and budget. The ICC approves the financial statements of previous quarter and the next workplan. The SPIU then disburses the funds to the divisions.

The system appears to be functioning well; there were some delays at the start up (signing of MoU between PR and SR, between SPIU and districts and opening of Gavi fund bank accounts). The fund flow to the districts and health facilities is timely and there are no issues of delayed financial reporting.

The MoH is planning to transition all implementation work to the Rwanda Biomedical Centre (RBC), the SPIU will now report to the RBC, the financial transactions will be approved by the DG of RBC. This has implications for Gavi, in terms of changes in the management of Gavi funds (the PFA and aide-memoire may need to be amended).

The country received US$ 2,462,813 as first tranche of HSS and by 15th September the country has been able to spend/commit US$ 1,531,874 (62%). The audit for current tranche of Gavi HSS funds will be done by the office of the auditor general by end of 2014. Gavi also receives the required financial reports from the country on time. There are no pending issues related to PFA

The next tranche of US$ 1,977,144 has been approved and will be released after the country submits the reports and financial statements for the current tranche.

Rwanda planned and implemented an integrated Measles and Rubella vaccination campaign (for children under 15), including delivery of Vit A (6 months to 59 months) and HPV for 12 to 14 years females from 12-15 March 2013. The MR campaign targeted 4,278,528 under 15 children and reached 97.5% (as per the PIE). WHO received US$ 3,064,954 for the campaign and as per the financial statement received from WHO 99.6 % of funds were utilized.

This was followed by introduction of MR in the routine program in Jan 2014. The country received US$ 299,500 as VIG in Nov 2013. The country was not able to use the funds in the reporting period (till Dec 2013), but they will be utilizing the funds for activities related to printings, supervision etc.

Financial Management	
Areas for Improvement	**Recommendation**
Asset management needs to be improved	Develop an asset register for procurements undertaken with Gavi support and promote culture of keeping assets in good-condition.
Transition from the MoH to the Rwanda Biomedical Centre for implementation	Rwanda needs to submit to Gavi by Oct 2014 a note outlining the change in implementation management and transition process need to be monitored closely by MoH

New vaccines and Polio Eradication Initiative

The coverage for all antigens is over 95% and there aren't major issues related to the coverage, equity and quality of service delivery.

The Penta 3 achievement for 2013 is 100% (against the original approved target of 112%). The target for 2015 is 344,791 which is about 6 % higher than the achievement in 2013. PCV achievements are in line with Penta. Similarly, rota achievements are also in line with Penta, though slightly higher than Penta & PCV for first dose (327,728 vs. 328,645). The dropout & wastage rates are acceptable for both vaccines. The targets for PCV & rota are in 2015 are in line with Penta.

The country is requesting to switch from single dose pentavalent to 10 dose vials, for Rota to switch from 3 dose schedule to 2 dose schedule and for HPV to switch from a 3 dose schedule to 2 dose schedule starting in 2015. This needs to be carefully planned, implemented and monitored at district and health facility levels. The switch from rotateq to rotarix and can only happen in 2017, as per the current contractual obligations.

The last case of WPV in Rwanda was reported in 1993 from Nyamasheke District, Western Province. The country has been able to maintain high standards of polio surveillance, though there

are some silent areas. It was recommended to identify the silent areas and work with the districts and health facilities to ensure AFP reporting.

The country plans to introduce IPV in Aug 2015 and has already submitted an application to Gavi in Sep 2014. Some of the challenges expected before IPV introduction include possible concerns from the health care workers and the community about the multiple injections infants will receive when IPV is introduced. The country plans to conduct an operational research around multiple injections and the findings from this study will inform the type of interventions from an advocacy and communication perspective. Second, Rwanda faces some issues with cold chain capacity at both the central and district level. Lastly, training and supervision may pose a challenge on IPV introduction. To address these issues, the VPDP will hold meetings with health officials in all districts to identify and address problems found with training, supervision, and routine immunization service delivery before IPV introduction.

The AEFI surveillance and response system in the country remains weak and with high immunization coverage, the danger of having a negative impact on the program due to improper handling of any AEFI remains high.

Immunization Decision support will draft the dose calculations for 2015 for all NVS programs using the approved targets (numbers of infants & wastage). The number of doses to be allocated (and planned for shipment) for 2015 for the programmes pentavalent are based on the approved targets (2015) as well reported opening stocks (Jan 2014), shipment plan (2014) and target closing stocks (2015). For others programmes, a stock analysis is carried out to determine the right level of stock to be deducted from 2015 allocation. Syringes and safety box calculations are derived from dose calculation. All this is done in consultation with the Vaccine programme manager and (if there are any significant changes) the country, and are signed off by the SCM or Head.

New vaccines and Polio	
Areas for Improvement	**Recommendation**
AEFI surveillance system is weak	NRA including AEFI surveillance systems needs to be strengthened

Immunisation Financing and Sustainability

Rwanda is a low income country with a GNI of US$ 620 per capita (World Bank, 2013). It plans to become an intermediate income level country by 2020. In 2013 the total spending on immunization was reported to be US$ 25.55 million, out of which the government spent US$ 3.88 million (15.2%, this is an upward trend from 2012, when it was 10%, and 2011, when it was 6%), Gavi funded US$ 19.07 million (74.63%) and rest US$ 2.59 million (10.1%) was provided by WHO, UNICEF and MERCK. The overall health sector budget has increased from Rwf 66.28 billion in 2010/11 to Rwf 115.36 billion (77% increase) in 2014-15. The increase in immunization budget over the same period has been from Rwf 1.65 billion to Rwf 1.72 billion (3% increase).

EPI program has a separate line item budget in the national budget and the country fully funds the purchase of the traditional vaccines and part of operational costs.

The country has not defaulted on its' co-financing payments since 2008 and it has indicated that it uses government resources for making this payment. It has increased it's co-financing payment to US$ 0.35 per dose.

Immunisation Financing and Sustainability	
Areas for Improvement	**Recommendation**
Sustainability of the program: Many operational costs are being funded through Gavi HSS, need to increase government resources for routine activities	Increase government contribution to the immunization program, specially operational costs

Technical Assistance

The country offices of WHO and UNICEF provide coordinated assistance to the MoH/EPI on proposal development, guidelines, trainings, conducting special studies (like HPV and Rota surveillance). Rwanda is requesting technical assistance for developing financial sustainability strategies for both running day to day immunization related activities, co-financing vaccines and updating costing tool for cMYP.

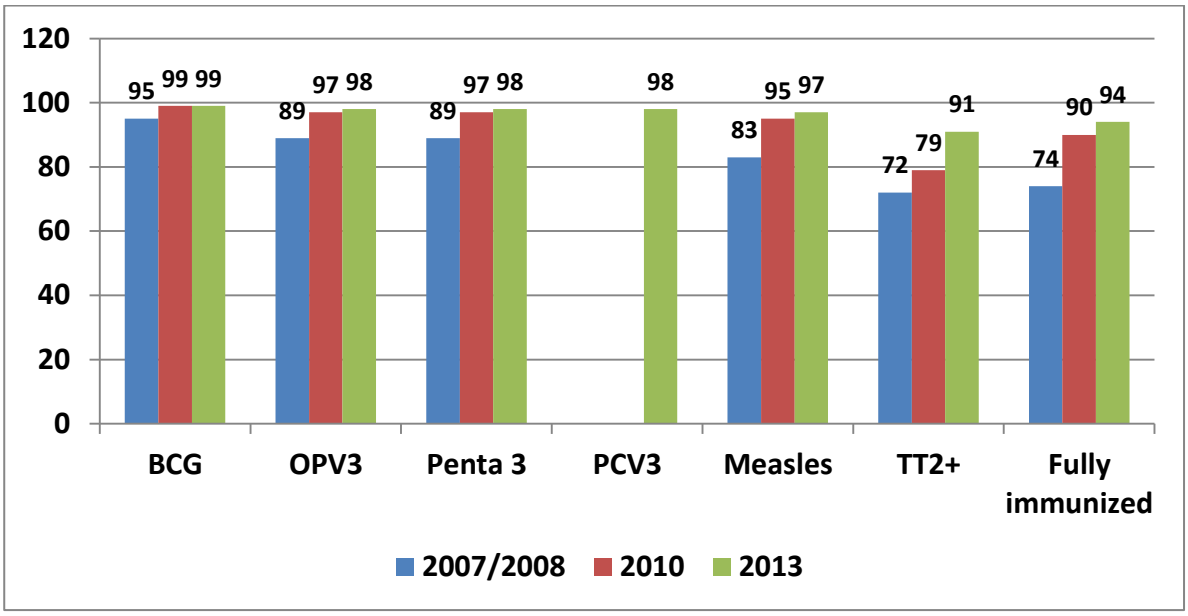
Technical Assistance	
Areas for Improvement	**Recommendation**
A range of technical assistance areas were identified	Technical support with the development of success stories from the health sector; Technical support with an external evaluation on the national immunisation programme; Technical support to develop an operational research agenda including a data quality assessment and EVM, the development of an Elimination Plan for Measles/Rubella and a Readiness Assessment for SARA. Technical assistance to enhance durable financial sustainability strategies and to update the costing tool for cMYP.

Recommendations for the Review Panel

Topic	Recommendation
NVS	Renewal of DTP-HepB-Hib, 10 dose(s) per vial, LIQUID (switch from single dose to 10 dose vial)
	Renewal of Pneumococcal (PCV13), 1 dose(s) per vial, LIQUID
	Renewal of Rotavirus, 3-dose schedule

Annexures

Trends of routine immunization coverage rate 2007-2013



Source: National Immunization Surveys and DHS

Districts reporting coverage (2013)

No of Districts	Penta 1	Penta 3	Polio3	Pneumo 1	Pneumo 3	Rotavirus1	Rotavirus last dose	MCV1
Over 100%	15	15	15	15	15	16	15	14
between 90-100%	6	5	5	6	5	5	5	7
between 80-90%	8	9	9	8	9	8	9	9
Under 80%	1	1	1	1	1	1	1	0