Comprehensive Multi Year Plan
National Immunization Program Indonesia

2010-2014

Directorate General for Disease Control and Environmental Health
Ministry of Health Republic of Indonesia
2010

Vaccinated child

for

better future

Foreword

In the name of The God Almighty, we are sincerely grateful for the acomplishment of this comprehensive Multi Year Plan (cMYP) National Immunization Program 2010 – 1014. We thank all the hard work and cooperations from all related parties which have developed this Comprehensive Plan and make it possible to be implemented in all districts in Indonesia for achieving Universal Child Immunization (UCI) in 2014.

Immunization has been proven effective in controlling diseases and support to providing quality service will encourage the most effective benefit of immunization when it is based on a well-developed plan of action.

In line with decentralization era, sustainability of immunization program is strongly influenced by the continuity of resources supply that includes funding from either central or district government. Therefore, planning that can be used as basis in advocating the committed parties in regards to the current situation is inevitably needed.

A mid-term comprehensive plan shall be developed comprising detailed points of programs to be orderly implemented by the following year. A detailed costing and financing including financial sustainability scenario and strategy shall also be included. These points are inscribed in the comprehensive Multi Year Plan (cMYP) of National Immunization Program 2010 - 2014.

This book is the revised version of the cMYP National Immunization Program 2007 - 2011 and primarily refers to Regulation Number 39 Year 2010 about Health and MoH Strategic Plan 2010 - 2014. The accomplishment and publishing of this book is expected to facilitate immunization officers in developing plans and conducting immunization program advocacy for the following 5 years. We expect that this document gives beneficial and maximum function in optimizing the immunization program implementation.

We would like to thank all the parties supporting the development process of this comprehensive plan.

Jakarta, August 2010

Director General of CDC,

Prof. Tjandra Yoga Aditama

Preface

Immunization program has been proven effective for controlling the diseases, moreover when supported by a quality service. One of the key management components in achieving quality immunization service is planning.

Planning immunization service is one phase in a cycle that comprises routine monitoring, analysis and problem solving in improving the service quality. For all these years, immunization planning has been developed apart from other programs, hence the possibility of overlapping in financing may occur. A good plan development shall be based on situation analysis followed by target setting, program implementation description and priority setting. The plan shall be integrated in to any relevant disease prevention cross sectoral/ cross program which already occupies its own financial mapping.

WHO publishes a tool for developing a mid-term immunization plan covering the details of all regular aactivities as well as campaigns to be orderly executed in the following years including its costing and financing plan. The planning shall be based on the national planning process and health sector planning. Using the WHO tool, a cMYP National Immunization Program 2010 - 2014 is hence developed. The comprehensive plan can be used as basis in advocating the increase of immunization program funding (particularly for the following 5 years). The comprehensive plan also performs as an important reference in obtaining district fund allocation related to immunization program activity, in conducting fund-raising and in assuring the sustainability of the immunization program. This plan is the renewal and continuity of the cMYP National Immunization Program 2007 - 2011 which was previously published. It is expected that this document may serve as reference for immunization officers in developing comprehensive immunization plan in the respective districts to achieve each annual targets.

We cordially acknowledge that there are many weaknesses in developing this Comprehensive Plan. Hence, we shall welcome any critics and feedback for its future improvement.

Jakarta, August 2010

Director of Immunization and Quarantine,

Dr. Andi Muhadir, MPH.

Acknowledgment

This document has been developed by the EPI team with full support from the Minister of Health, the Director General of DC and EH, as well as many others who have been involved.

We would like to thank to all stakeholders at national and subnational levels, donors as well as ICC members who have been giving full support to us, not only in developing this plan, but also in the implementation of the programs.

We also would like to thank to consultant team, DR. Mardiati Nadjib drg. MSc and dr. Nugroho Soeharno, MKes, who were intensively involved during the process of development and refinement of the cMYP 2010-2014.

We would expect that this document will be used as a refference and guidance to implement the EPI programs, not only at the central level, but also the EPI as a whole, including all provinces and all districts.

Sub Directorate Immunization

Dr. Theresia Sandra Diah Ratih

Executive Summary

Immunization is a cost-effective and life-saving intervention which prevents needless suffering through sickness, disability and death. The government of Indonesia (GOI) has a strong commitment to immunization as a priority public health intervention. The immunization program has been selected as one of the priority services in line with the global commitments as well as the national commitment. Despite the GOI has experienced a remarkable progress in implementing program, limited resources to support activities remain a problem, especially for local government with low fiscal capacity.

Expanded Program on Immunization (EPI) in Indonesia started in 1977. Immunization services in Indonesia have had a good record of past achievement. To increase coverage, primary health center provide the services closer to the community. Primary health center also extends the services from static and mobile health centers to community-based health services that involved NGO and CSO at each administration level and community. .

Even though immunization program performance has been improving from time to time, it has not yet reached its full potential as there are still cases of vaccine preventable diseases in some areas. Poor coverage has led to the recurrence of preventable diseases that were controlled in the past (reemerging disease). There are also cases of the new infectious diseases (emerging disease) in Indonesia.

The goal of EPI in Indonesia to reduce morbidity and mortality due to vaccine preventable diseases through eradication, elimination or reduction. With over 220 million people, Indonesia annually has to immunize more than 4 million children surviving to the age of one year. Basic vaccines are administered to these children as a national policy: BCG, DTP, Polio, Measles and Hepatitis B. Neonatal tetanus, maternal tetanus and measles have also been a problem in Indonesia and the GOI has adopted Maternal and Neonatal Tetanus Eradication (MNTE) and Measles Reduction Efforts (REDCAM) to reduce the spread of these diseases. The GOI has been promoting some strategic campaign activities, including MNTE, measles crash program, school base measles campaign, supplementary immunization actions (SIAs) and other activities to scale up the process of reducing the number of cases or even to eliminate them.

Immunization coverage is increasing and the achievement for the year 2009 is:

- UCI villages 69.2%
- Coverage of DTP-HB3 93%
- Coverage of Measles 92%
- TT2+ for pregnant women 79%

Decentralization and political reform in the late 1990s affected the sustainability of availability funding for immunization. District governments now take responsibility for their immunization programs however the central level is responsible for supplementary immunization activities, procurement of vaccines and syringes, technical assistance, development of guidelines, monitoring and evaluation, quality control and training. To achieve high coverage to be sustained, EPI should have strong commitment to provide well and closer services to community so that it is important to establish a stronger and more representative civil society constituency for immunization. Strengthening the capacity of the health system to minimize the “bottleneck” barriers in each level is a critical issue too, support from donors and CSOs will help the MOH overcome the problem.

The comprehensive Multi-Year Plan (cMYP) for the National Immunization Program (NIP) or the National Action Plan has been developed for 2010-2014 in line with Strategic Plan of MOH, its vision and mission.

The National Immunization Program set up the goal and objectives that focusing on the following priority targets:

- To achieve UCI village 80% in 2010 and 100% by the end of 2014.
- To achieve 80% or more of HepB Birth dose (HB 0 for newborn < 7 days) coverage by 2014.
- To increase coverage of measles second dose > 95% at primary school age.
- To maintain the use of AD syringes 100%.
- To develop and implement national policy on waste management.
- To introduce new vaccines (Hib, JE and Pneumococcal vaccines).

There are six components appointed in the milestones, those are:

a) Acceleration of UCI Villages Coverage.
b) Improving quality of the vaccines, cold chain/ logistics and safe injection.
c) Strengthening the monitoring, evaluation and of surveillance systems.
d) Demand creation for immunization.
e) Improving stakeholders support, commitment for sustainability of the funding as well as effective and efficient management.
f) New Vaccines Introduction, especially Hib, JE and Pneumococcus.

Service delivery has several objectives, including reaching the UCI target in 100% villages in 2014 (based on GAIN UCI or *Gerakan Akselerasi Imunisasi nasional* or national actions on Immunization acceleration); contributing to measles reduction and maternal neonatal tetanus elimination; and providing supplemental immunization activities for high risk groups. Advocacy and communication activities are aiming at improving access and equitable immunization coverage. Surveillance is very important for monitoring and evaluation of VPD status and monitoring AEFI. Vaccine provision, quality and logistics are also proposed to be provided and improved in the MYP.

In 2010 immunization program cost is predicted to reach USD 158.2 million in total, and will continue to increase to USD 219.6 million in 2014. During 2010 and 2011 there is an increased NIP cost, mostly for campaign and investment (10.3% - 27.5% of the total cost).

Indonesia plan to integrated Hib (Haemophilus influenzae type b) vaccine into the national immunization program to reduce morbidity, mortality and disability due to pneumonia and meningitis caused by Hib and will help accelerate the achievement of Millennium Development Goal 4, in 2013. Introducing new vaccine for socialization and procurement in 2013 – 2014, increasing the total cost as shown in table 5. Since Indonesia is a big country with many islands and high target population, the introduction will be done gradually to minimize AEFI, 20% target in year 2013, 50% target in 2014 and 2015 will cover all target. Due to the high number of target and to ensure GOI budgeting capability, Indonesia would like to ask GAVI Grant to assist for 4 years period (2013-2016), and the plan of 2015 - 2016 will come up in the next cMYP.

Vaccine supplies for year 2010-2014 accounted for 26.2% - 32.6% of total program costs, while personel cost (including share cost) is estimated around 35% - 43.3%%.

Secured funds from central budget in 2010 is approximately 59% and in 2014 will be decreased to around 37% in 2014. Contribution from province governments is predicted to decrease too, but contribution from distrct is increase. Donor contribution is expected to reach 2.6% - 4.82% of the total secured cost.

Rich districts would find no significant problem in providing support for health sector while districts with limited resources would face challenges to maintain the health programs. In addition to that,

imunization program has to compete with other program or even health program activities to obtain adequate funds from local government. Advocacy is certainly needed to convince all stakeholders to support and ensure sustainability of EPI in Indonesia.

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Abreviation

Ads	=	Auto Disable Syringes
AEFI	=	Adverse Events Following Immunization
AFP	=	Acute Flaccid Paralysis
APBN	=	Central Budget (Anggaran Pendapatan dan Belanja Negara)
APBD I/II	=	Province/District Budget (Anggaran Pendatapan dan Belanja Daerah)
BCG	=	Basil Chalmette Guerin
BIAS	=	School Immunization Program
CEA	=	Cost Effectiveness Analysis
cMYP	=	comprehensive Multi Year Plan
Coverage of Measles CUC	=	Coverage of Measles catch up campaign
CSO	=	Civil Society Organization
CFR	=	Case Fatality Rate
DC & EH	=	Disease Control & Environmental Health
DHO	=	District Health Office
DO	=	Drop Out
DPRD	=	Regional Assembly of People's Representatives (*Dewan Perwakilan Rakyat Daerah*)
DTPK	=	Remote Areas, unreach regions, border area and Islands (*Daerah Tertinggal Pinggiran dan Kepulauan*)
DQA	=	Data Quality Audit
DQS	=	Data Quality Self-assessment
DT	=	Diphtheria Tetanus
DTP	=	Diphtheria Tetanus Pertusis
EPI	=	Expanded Program on Immunization
EVSM	=	Effective Vaccine Store Management
GAVI	=	Global Alliance for Vaccine and Immunization
GAIN UCI	=	National Actions On Immunization Acceleration (*Gerakan Akselerasi Imunisasi Nasional*)
GDP	=	Gross Domestic Product
GOI	=	Government of Indonesia
HepB	=	Hepatitis B
Hib	=	Haemofilus influenza Type B
HIV/AIDS	=	Human Immune Deficiency Virus /Acquired Immune Deficiency Syndrome
HSS	=	Health System Strengthening
ICC	=	Intercountry Coordinating Committee
IEC	=	Information Education and Communication
Inpres	=	President Instruction
JE	=	Japanese Encephalitis
Kepmenkes	=	Minister Decree
LAM	=	Local Area Monitoring
LBs	=	Life Births
L-I-L	=	Complete Five Basic Immunization (Lima Imunisasi Dasar Lengkap)
LQAs	=	Lot Quality Assessments

MCH	=	Maternal Child Health
MDGs	=	Millennium Development Goals
MDV	=	Midwife Village
MNTE	=	Maternal and Neonatal Tetanus Elimination
MOH	=	Ministry of Health
NAD	=	Nangroe Aceh Darussalam
NGO	=	Non Government Organization
NHA	=	National Health Account
NIDs	=	National Immunization Days
NIHRD	=	National Institute Health Research and Development
NRA	=	National Regulatory Authority
NTB	=	Nusa Tenggara Barat (West Nusa Tenggara)
NTT	=	Nusa Tenggara Timur (Easr Nusa Tenggara)
OPV	=	Oral Polio Vaccine
ORI	=	Outbreak Response Immunization
PHE	=	Private health expenditure
PKK	=	*Pembina Kesejahteraan Keluarga*(Family welfare movement)
POA	=	Plan of Action
PP	=	Peraturan Pemerintah (Government Regulation)
Permenkes	=	Ministry of Health Regulation (Peraturan Menteri Kesehatan)
QA	=	Quality Assurance
RPJMN	=	National Middle Term Development Plan (Rencana Pembangunan Jangka Menengah Nasional)
RPJPN	=	National Long Term Development Plan (Rencana Pembangunan Jangka Panjang Nasional)
SMS	=	Stock Management System
TAG	=	Technical Advisory Group
TB	=	Tuberculosis
THE	=	Total Health Expenditure
TT	=	Toxoid Tetanus
TT 2 PW	=	2nd dose of TT for Pregnant Woman
UCI	=	Universal Child Immunization
UNICEF	=	United Nations Children Fund
UU	=	Undang-undang (Law)
VF	=	Vaccine Fund
VVM	=	Vaccine Vial Monitor
WHO	=	World Health Organization

I. Introduction

Immunization is a cost-effective and life-saving intervention which prevents needless suffering through sickness, disability and death. In the past, many children were infected with diseases such as polio, measles, pertussis and diphtheria which caused deaths and disabilities. This situation will be exacerbated when combined with malnutrition and finally could increase the Case Fatality Rate (CFR).

The government of Indonesia (GOI) has a strong commitment to immunization as a priority public health intervention. The immunization program has been selected as one of the priority services in line with the global commitments as well as the national commitment. Expanded Program on Immunization (EPI) in Indonesia started in 1977. Immunization services in Indonesia have had a good record of past achievement. To increase coverage, primary health center provide the services closer to the community. Primary health center also extends the services from static and mobile health centers to community-based health services that involved NGO and CSO at each administration level and community. The goal of EPI in Indonesia to reduce morbidity and mortality due to vaccine preventable diseases through eradication, elimination or reduction. With over 220 million people, Indonesia annually has to immunize more than 4 million children surviving to the age of one year. Basic vaccines are administered to these children as a national policy: BCG, DTP, Polio, Measles and Hepatitis B.

Various efforts have been undertaken by the Government to demonstrate its commitment and improve the achievements of Immunization program target. Polio eradication through a *PIN* (Pekan imunisasi Nasional = National Immunization Week), crash program for measles reduction, Maternal and Neonatal Tetanus Elimination (MNTE) through TT pregnant woman campaign, are part of activities to achieve the target of a global commitment. The GOI has been promoting some strategic campaign activities, including MNTE, measles crash program, school base measles campaign, supplementary immunization actions (SIAs) and other activities to scale up the process of reducing the number of cases or even to eliminate them.

Immunization coverage has been increasing and the achievement for the year 2009 is:

- UCI villages 69.2%
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Despite the GOI has experienced a remarkable progress in implementing program, limited resources to support activities remain a problem, especially for local government with low fiscal capacity. Decentralization and political reform in the late 1990s affected the sustainability of availability funding for immunization. District governments now take responsibility for their immunization programs however the central level is responsible for supplementary immunization activities, procurement of vaccines and syringes, technical assistance, development of guidelines, monitoring and evaluation, quality control and training. To achieve high coverage to be sustained, EPI should have strong commitment to provide well and closer services to community so that it is important to establish a stronger and more representative civil society constituency for immunization. Strengthening the capacity of the health system to minimize the "bottleneck" barriers in each level is a critical issue too, support from donors and CSOs will help the MOH overcome the problem.

As a reference for the National Immunization Program Strategy, this five-year comprehensive Multi-Year Plan or cMYP document is developed. The plan has been developed for 2010-2014 in line with Strategic Plan of MOH, its vision and mission. The first cMYP was developed for the year 2002 - 2006, secondly was cMYP 2007 - 2011, and now continued by this cMYP 2010-2014. The cMYP is intended as a guide to develop an annual immunization program and as a reference for policy makers to attempt to participate in the efforts of immunization activities.

II. Situation Analysis

a. Macro Economic Situation

The economic condition of a country would certainly have an impact on the level of populations' health. When the economic growth improved, the health status of its people should also be improved. Economic growth rate in Indonesia since 2002 until 2008 showed an increase of 300%, while the population growth rate per year was on average 1.33%. GDP per capita also showed an increase of about 17-20% per year.

Increased economic growth will improve country financing in the health sector. The National Health Accounts (NHA) estimates the total expenditure on health in Indonesia in many years has been amounted to 2% of the GDP in average, relatively low as compared to other neighboring countries.

Government contribution for health is significant. Data from the Ministry of Health shows an increase on health budget allocation from 2006 to 2008, i.e. from 12.3 trillion Rupiah to 15.9 trillion Rupiah, however it is much lower than increased GDP (table 1).

Table 1. Socioeconomic Indicator, 2006-2008

Indicator	2006	2007	2008
Number of Population* (000)	222,746,900	224,652,000	228,523,300
GDP (Billion Rupiah)	3,339,216.8	3,949,321.4	4,954,028.2
GDP per capita	14,991.08	17,579.73	21,678.44
Ministry of Health expenditures (Rupiah)	**12.3 trillion**	**15.5 trillion**	**15.9 trillion**

* http://www.bps.go.id/index.php?news=669

There are many sources involved in providing immunization pogram activities. The central government contribution has increased from 324 billion rupiah in 2007 to 455 billion rupiah in 2008. Donors are also contributed to the EPI program activites, such as GAVI and other donors and international NGOs including PATH, WHO, Unicef. In 2009, donors contribution significantly decreased to 3.3% while central government budget was sharply increased. However, sustainability of the program funding remain a challenge, efforts to achieve EPI target 2014 need additional resources as well as local government's strong commitment.

b. Decentralization

In April 1999 the Indonesian National Legislative issued Law No. 22 on *'Regional Government'* and Law No. 25 concerning *'Fiscal Balance between the Central and the Regional Government'*. Government stated the decentralization or autonomy areas. According to Law-22/1999, Districts (*Kabupaten*) and Municipalities (*Kota*) are autonomous areas accountable to the local *DPRD* (Regional Assembly of People's Representatives). There is a transfer of responsibilities and roles from the Central Government to the Regional Government authorities. Participation in funding and planning is expected to support the policies initiated by the Central Government. The policy provides opportunities for the Regional Government to manage their funding scheme and use as well as building plan for development of their territory. The Local Government is responsible to provide operational costs to support EPI program implementation, while Central Government is responsible for supplementary immunization activities, procurement of vaccines and syringes, technical assistance, development of guidelines, monitoring and evaluation, quality control and training.

To support and strengthen the role of provinces in an era of decentralization, in 2004 the Law No. 25 was enacted. The country has also developed a Long-Term Development Plan which is last for a period of 20 years; and Medium Term Plan is designed for a period of five years. Aside from that, the national planning process including the preparatory process of financing the whole plan, is conducted based on the Law No. 33/2004 on Fiscal Balance between the Central and the Region Government.

With the law and policies it is that the roles of provincial and district/ municipalities laws can be strengthened such as planning, coordination and implementation of activities and the funds disbursement to the regions. In fact, due to limited resources and lack of commitment, local governments' contribution to support EPI activities remains low in many regions.

c. Managing and Organizing EPI in Indonesia

Indonesia has started implementing immunization program in 1977 and the program is expanded, improved and sustained with some adjustments to the global development. Various activities and innovations were undertaken to achieve the optimal outcomes in accordance with national and global targets. Immunization services in Indonesia have had a good record of past achievement. To

increase coverage, primary health center provide the services closer to the community. Primary health center also extends the services from static and mobile health centers to community-based health services that involved NGO and CSO at each administration level and community. In general, achievements of the immunization program have increased with some decreases happened at certain times. Various concerns are related to the problems and limitations from both supply and demand sides such as human resources and budget limitations at central and local level, as well as socio-culture (acceptance) of the community.

The Government strongly supports the activities of immunization program and currently it becomes government's priorities as addressed in the following law, regulation and policies:

- Law No. 36/2009 about Health.
- Law No. 23 year 2002 on Child Protection, children have right to obtain health service including Immunization.
- Law No. 12 year 2008 about revision of Law No. 32/2004 on Governance at local level.
- Law No. 33/2004 about Fiscal Balance between Central and Local Government.
- PP RI NO.38 year 2007 about sharing of the Governmental Affairs between the Central , Provincial and District/Municipality Government.
- Inpres no.1 year 2010 about Accelleration of National Development Priorities 2010.
- Inpres no.3 year 2010 about Development Program with Justice.
- KEPMENKES No. 1611/SK/IX/2005 about Guidelines of Immunization Implementation.
- PERMENKES RI NO.741/MENKES/PER/VII/2008 → Minimum Service Standard of Health in District/Municipality.
- KEPMENKES RI NO. 828/MENKES/SK/IX/2008 → Technical Guidelines for the Health Sector Minimum Service Standards in District/Municipal.
- Vision, Mission and Strategy (Strategic Plan) of MoH and EPI National Action Plan 2010 – 2014.

However, decentralization and political reform affected the sustainability of availability funding for immunization. The central level is responsible for supplementary immunization activities, procurement of vaccines and syringes, technical assistance, development of guidelines, monitoring

and evaluation, quality control and training. District governments now take responsibility to support operational costs for running their immunization programs, while the fiscal capacity of the local governments varies and would influence secured funding for EPI. To achieve and maintain high coverage, EPI should also provide services closer to community. Therefore, it is important to set up a stronger and more representative civil society involvement for immunization. On the other hand, strengthening the capacity of the health system to minimize the "bottleneck" barriers in each level is also critical, while support from donors and CSOs would certainly help MOH to overcome the problem, both in financing and technical aspects.

Despite immunization program performance has been improving from time to time, in fact it has not yet reached its full potential as there are still cases of vaccine preventable diseases found in some areas. Poor coverage has led to the occurance of preventable diseases that were controlled in the past (reemerging disease). There are also cases of the new infectious diseases (emerging disease) in Indonesia.

Currently there are five basic immunizations, or called L-I-L (Lima Imunisasi Dasar Lengkap) that must be given to infants who are less than one year old. "Complete Five Basic Immunization, or L-I-L", is the slogan of the Government in disseminating basic immunization activities (table 2). It is expected that level of awareness and demand for basic immunization could be increased, which in turn would increase the national coverage.

Table 2. Routine Basic Immunization Schedule

STATIC COMPONENT		OUTREACH COMPONENT	
AGE (Months)	ANTIGEN	AGE (Months)	ANTIGEN
0	HepB 0	0	HepB 0
1	BCG, OPV1	1	BCG, OPV1
2	DTP-HB1, OPV2	2	DTP-HB1, OPV2
3	DTP-HB2,OPV3	3	DTP-HB2,OPV3
4	DTP-HB3, OPV4	4	DTP-HB3, OPV4
9	Measles	9	Measles

Source: EPI, CDC, MoH RI

Immunization services are provided by each health facility and outdoor activities (outreach) in the Integrated Village Post (*posyandu*) that are intended to bring the service closer and efficient to community.

In addition to program for infants less than one year, another routine immunization activity is provided for school children (DT, TT/Td, and measles). The target is children in first to third grade who receive vaccination in their school at the time of BIAS (BIAS = Bulan Imunisasi Anak Sekolah or School Based Immunization). The purpose of this immunization is to boost immunity to measles, diphtheria and provide maternal immunity against tetanus in later adulthood. The following table shows routine school-based immunization program schedule.

Table 3. Routine School-Based Immunization Program Schedule

TARGET	ANTIGEN
School children 1st grade	Measles, DT
School children 2nd grade	TT/Td
School children 3rd grade	TT/Td

Source: EPI, CDC, MoH RI

Institutional arrangement and organization of the EPI has been established for each administrative levels from central until health center level and a responsible person is assigned in each level. Number of infrastructure and personnel are as follow:

1. Health Center or *Puskesmas* (8,742)/ Hospital (1.378)
    - Vaccinator (Midwife/Nurses)
    - Cold chain/Logistics Manager
    - Supervised by Head of *Puskesmas*
2. District Health Office (475)
    - District EPI (Expanded Program for Immunization) Manager
    - Cold chain/Logistics Manager
    - Supervised by District EPI Manager

3. Provincial Health Office (33)

   - Provincial EPI Manager
   - Cold chain/Logistics Manager
   - Supervised by Provincial EPI Manager

4. Central (SubDirectorate of EPI, CDC MOH)

   - Head of SubDirectorate, 2 sections/ unit and a number of staffs
   - Cold chain/Logistics Manager

d. National Immunization Program Achievement 2006 – 2009

The goal of EPI in Indonesia is to reduce morbidity and mortality due to vaccine preventable diseases through eradication, elimination or reduction. For more than 30 years of program implementation in Indonesia, despite still many challenges to achieve the target, trend of EPI performance showed promising improvement. One key element is a good surveillance and recording reporting system, especially for country with such a huge geographical coverage, various problems as well as different fiscal capacity of the local governments accross the country. EPI reported the result of the program achievement (as per April 5, 2010) as follow:

1) Completeness and Timeliness in Reporting

i. Completeness:

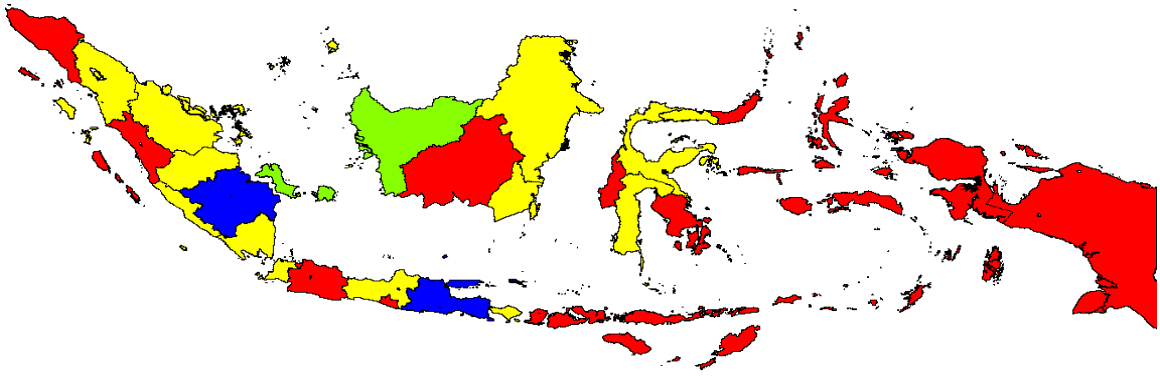
All the provinces have completely submitted reports on EPI coverage and activities in 2009 (from January to December). But this completeness is intended for reporting at the central and provinces, while for the report from the health center level to the district / municipal and from the district / municipal to the province cannot be reviewed. Therefore, looking at overall or summary report at the central level, it is possible that the report is not entirely completed as expected with some missing data from various districts.

ii. Timeliness:

Sending report on time is one of the performance's indicator, in this regard most of the provinces have not showed good preformance.

- Provinces sending reports on time every month (on day 15th of next month at the latest) are South Sumatra and East Java.
- Provinces that are not performed in terms of timeliness of the report are : Jakarta, West Java, Yogyakarta, Central Kalimantan, North Sulawesi, Southeast Sulawesi, NTB, NTT, Maluku, North Maluku, West Papua, and West Sulawesi.

Figure 1. Reporting Timeliness of EPI at Province Level



Source: EPI, MOH

The map (figure 1) shows red colors in provinces that have not performed in sending report timely.

2) Achievement of Immunization Activities

In general, performance of EPI activities has been improving. However, disparities among provinces remain. Some target are still need to be improved, especially in several provinces such as Papua and West Papua. This can be drawn as follow.

Routine Immunization

Information obtained from routine reports submitted by each province is described as follows:

i. Basic immunization coverage per Province

a) Program achievement or program coverage (with BCG coverage ≥95%).

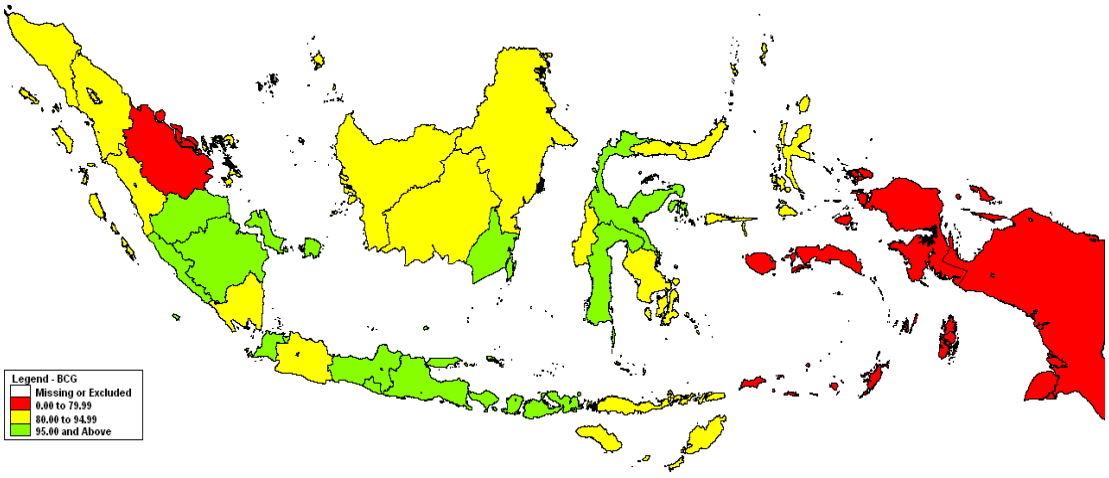
There are 19 provinces with coverage below the target, namely: Nanggroe Aceh Darussalam, North Sumatera, West Sumatera, Riau, Lampung, West Java, West Kalimantan, Central Kalimantan, East Kalimantan, North Sulawesi, Southeast Sulawesi, East Nusa Tenggara, Maluku, Papua, North Maluku, Gorontalo, West

Papua, Riau Islands and West Sulawesi. The lowest coverage is in the province of West Papua (66.7%) and Riau (70%).

On the other side, 14 provinces have reached the target coverage are DKI Jakarta, DI Yogyakarta, Central Java, East Java, Bali, Jambi, Bengkulu, Central Kalimantan, South Sumatera, Bangka Belitung, Banten, NTB, South Sulawesi and Central Sulawesi.

Figure 2 depicted that red color is found in some provinces such as Papua, West Papua, and Riau, showing low coverage of BCG immunization. The map shows that red color is not dominating the whole picture of coverage achievement, while yellow and green are found in most of the provinces. This fact has lead EPI managers to pay more attention to the provinces with red color and enhance other provinces to proceed even better.

Figure 2. Immunization Coverage Map, 2009



Source: EPI, MOH

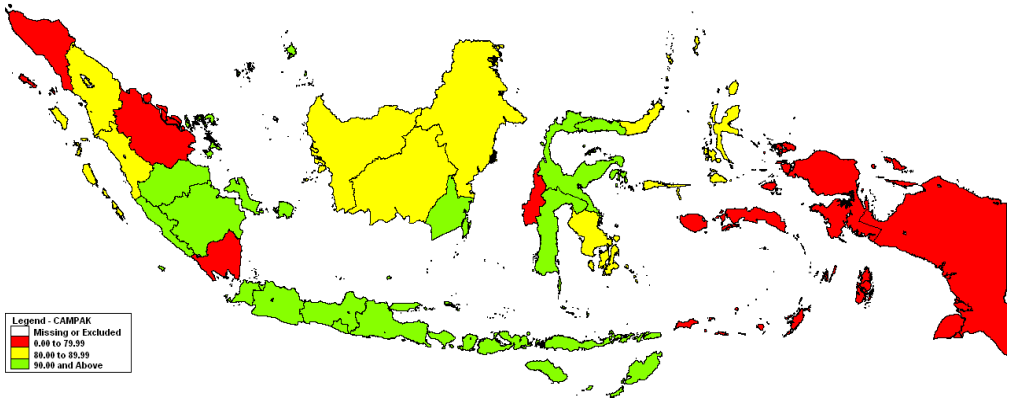
b) Level of Protection Program (Measles coverage ≥90%)

Provinces that have not reached the target are Nanggroe Aceh Darussalam, North Sumatra, West Sumatra, Riau, Lampung, West Kalimantan, Central Kalimantan, East Kalimantan, North Sulawesi, Southeast Sulawesi, Maluku, Papua, North Maluku,

West Papua and West Sulawesi. Provinces that have the lowest coverage are Maluku (72.8%) and West Papua (63.4%).

Map of the protection level (represented by Measles coverage of ≥90%) accross the country shows that it is dominated by yellow and green colors. This achievement shows a good protection level (tingkat perlindungan) despite several provinces are still need to improve their performances, especially Papua, part of Maluku and NTT.

Figure 3. Protection Level Map, 2009



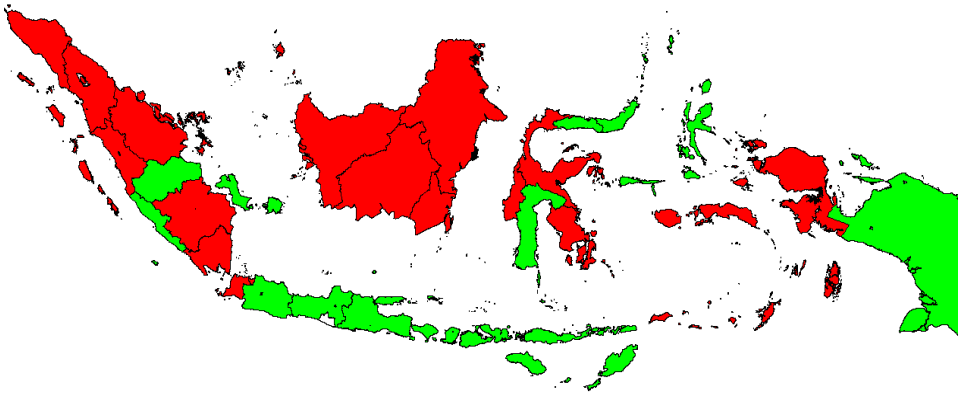
Source: EPI, MOH

There are 18 provinces which have measles coverage ≥90%: Jambi, South Sumatra, Bengkulu, DKI Jakarta, West Java, Central Java, Yogyakarta, East Java, South Kalimantan, Central Sulawesi, South Sulawesi, Bali, NTB, NTT, Banten, Gorontalo, Bangka Belitung, and Riau Islands.

c) Program Effectiveness

Effectiveness of the program is the number of dropouts DTP1 coverage minus measles coverage with a maximum target of <5%. Areas with the DO> 5% (not reached the target effectiveness of the program) are Nanggroe Aceh Darussalam, North Sumatra, West Sumatra, Riau, South Sumatra, Lampung, DKI Jakarta, West Kalimantan, Central Kalimantan, South Kalimantan, East Kalimantan, Central Sulawesi, Southeast Sulawesi, Maluku, Banten, West Papua, Riau Islands and West Sulawesi.

Figure 4. Program Effectiveness Map, 2009



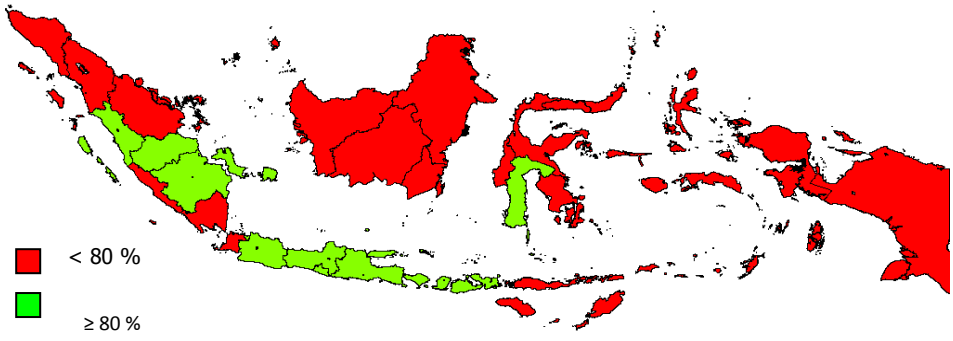
Source: EPI, MOH

d) Achievement of UCI (Universal child of immunization) Village

National UCI target in year 2009 is 80% (in the map is reflected as province with green color) and achievement of the national target in the year 2009 nationally is 69.6%. Provinces with the achievement of UCI Village are DKI Jakarta, Bangka Belitung, South Sumatera, West Sumatera, Jambi, West Java, Yogyakarta, Central Java, East Java, NTB and Bali.

The map shows that red color dominates overall picture of UCI coverage achievement, reflecting that most of the provinces are still below the target.

Figure 5. UCI Village' Achievement Map, 2009

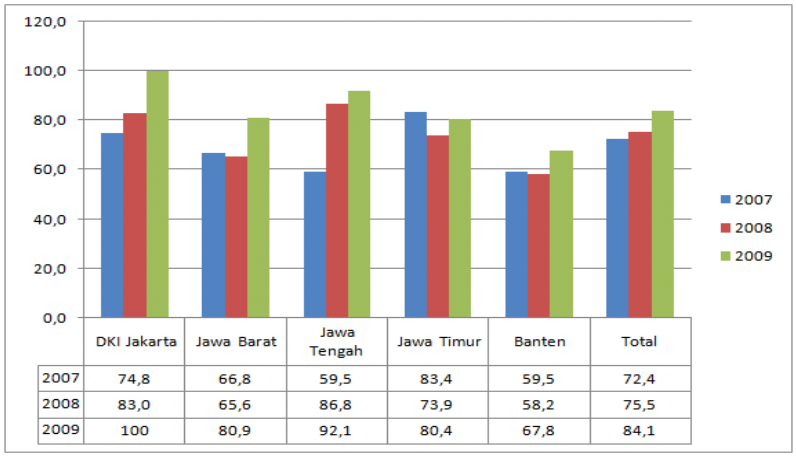


Source: EPI, MOH

e) Immunization Acceleration in Achieving UCI Village in 5 Provinces in Java Island

At the end of 2009, sub directorate of EPI was selected as one of the units within MOH to be evaluated as part of the evaluation on “100 days Cabinet performance”. The result was considered as “satisfactory” in achieving the UCI Village at the 2080 selected villages in five provinces in Java (DKI Jakarta, Banten, West Java, Central Java and East Java). Coverage of indicated antigens in each selected village were also satisfactory achieved > 80%. Graph 1 indicates trend of UCI village after implementation of program acceleration. Graph 2-5, shows improved coverage for each antigen during acceleration of the program.

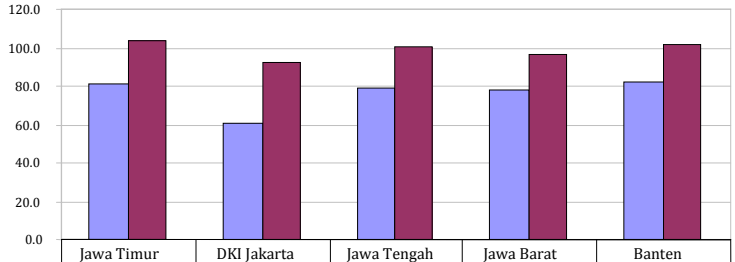
Graph 1. Accelerated UCI Village in 5 Provinces in Java Island (%)



	DKI Jakarta	Jawa Barat	Jawa Tengah	Jawa Timur	Banten	Total
2007	74,8	66,8	59,5	83,4	59,5	72,4
2008	83,0	65,6	86,8	73,9	58,2	75,5
2009	100	80,9	92,1	80,4	67,8	84,1

Source: EPI, MOH

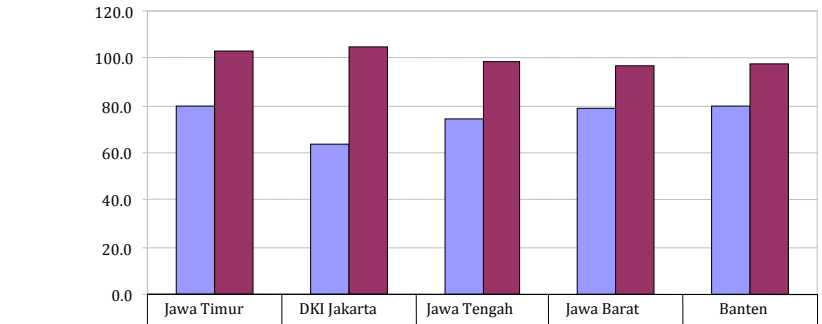
Graph 2. Accelerated BCG Coverage in 5 Provinces in Java Island (%)



	Jawa Timur	DKI Jakarta	Jawa Tengah	Jawa Barat	Banten
SD Okt 09	80.8	60.8	78.8	78.4	81.9
sd 25 Jan 10	103.5	92.1	100.9	96.3	101.3

Source: EPI, MOH

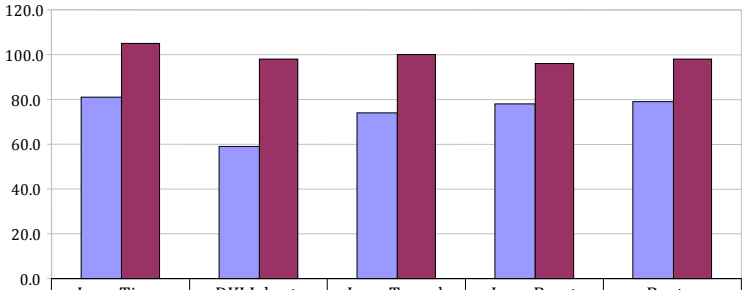
Graph 3. Accelerated DPT-HB3 Coverage in 5 Provinces in Java Island



	Jawa Timur	DKI Jakarta	Jawa Tengah	Jawa Barat	Banten
sd Okt 09	79.9	63.6	74.2	79.1	79.5
sd 25 Jan 10	103.0	104.9	98.7	96.4	97.6

Source: EPI, MOH

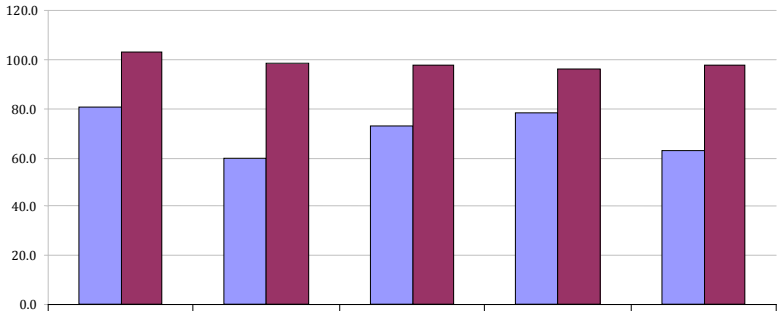
Graph 4. Polio 4 Coverage Acceleration in 5 Provinces in Java Island (%)



	Jawa Timur	DKI Jakarta	Jawa Tengah	Jawa Barat	Banten
sd Okt 09	81.0	58.7	74.1	78.1	79.4
sd 25 Jan 10	104.6	98.4	99.8	96.2	97.6

Source: EPI, MOH

Graph 5. Measles 4 Coverage Acceleration in 5 Provinces in Java Island (%)



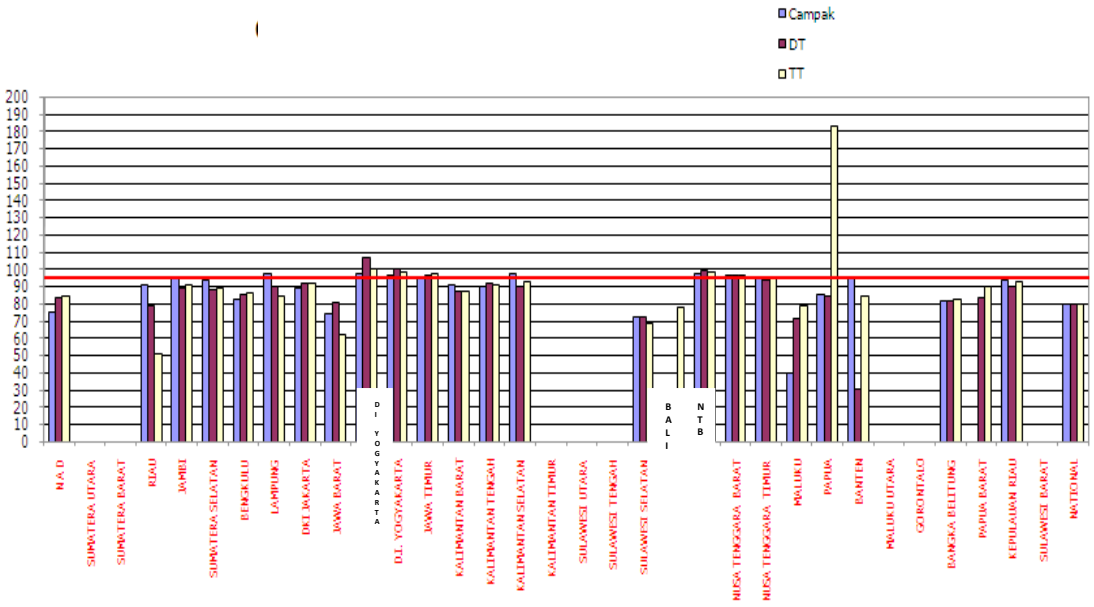
	Jawa Timur	DKI Jakarta	Jawa Tengah	Jawa Barat	Banten
sd Okt 09	80.9	59.3	72.4	77.9	62.9
sd 25 Jan 10	103.0	98.3	97.7	95.7	97.6

Source: EPI, MOH

ii. School based immunization program (*BIAS*) Coverage

BIAS implementation status report in the year of 2009 was derived from 22 provinces, while there are 11 provinces that have not reported results of BIAS coverage are: the Province of North Sumatra, West Sumatra, Bangka Belitung, Gorontalo, North Maluku, Papua, Southeast Sulawesi, North Sulawesi, Central Sulawesi and East Kalimantan.

Graph 6. BIAS Coverage (%), 2009



Source: EPI, MOH

The graph shows provinces that had reached the target of *BIAS* Measles coverage (≥ 95%) are Jambi, Lampung, Central Java, Yogyakarta, Kalimantan, Bali, NTB, NTT and Banten.

Provinces that had reached the target of BIAS DT coverage (≥ 95%) are Central Java, Yogyakarta, Bali and NTB.

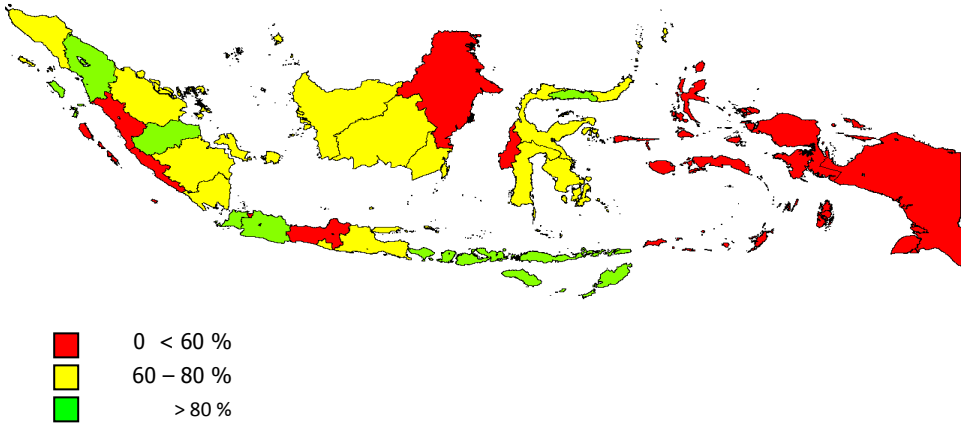
Provinces that had reached the target of TT *BIAS* in second grade class of school (≥ 95%) are Jambi, Yogyakarta, Kalimantan, Bali and NTB.

Provinces that had reached the target of TT BIAS in third grade class of school (≥ 95%) are DKI Jakarta, DI Yogyakarta, Bali and NTB.

iii. Immunization for Pregnant Women

National coverage of immunization for pregnant women is 73.5%. However, the map below depicted that most of the provinces are still not performing as expected. Number of province with green color (good performance with coverage >80%) relatively lower than number of provinces with yellow (coverage 60-80%) and red (coverage <60%) collors.

Figure 6. Coverage of Pregnant Women (%), 2009



Source: EPI, MOH

Maluku, Papua, NTT, part of Sulawesi, small part of Sumatera and Central Java are still dominated by red color, as shown in figure 6. This map is being used by EPI managers to set up targets for the coming years with special attention to provinces with red color.

Supplementary Immunization Activities (SIAs)

i. Measles and Polio Campaigns

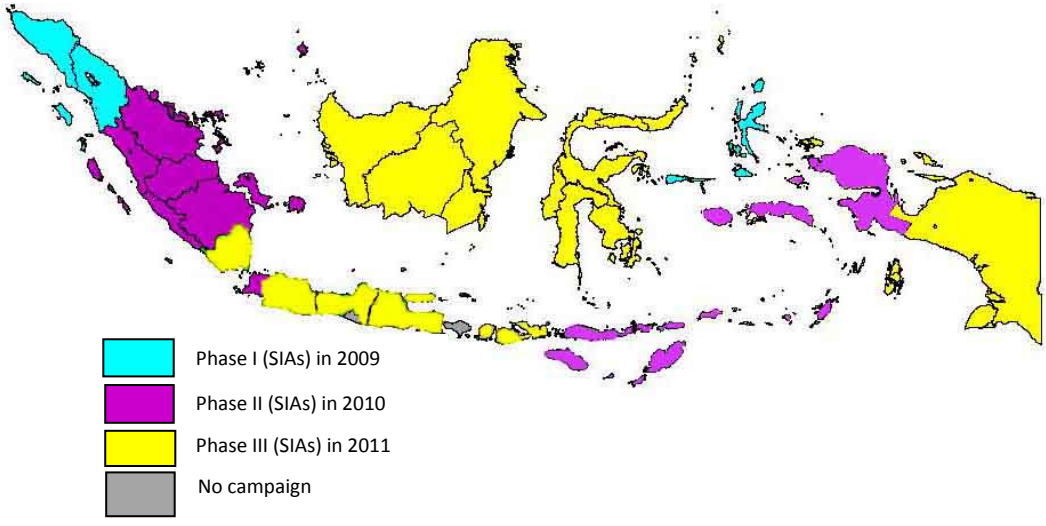
Indonesia commenced measles control in 1984, with the gradual introduction of measles vaccine in to the national immunization schedule at the age of 9 months. With the gradual expansion of the services, reported immunization coverage gradually increased over the years and reached around 80 % during early 1990s and maintained at that level. In 2000, to provide second opportunity for measles immunization, Indonesia introduced three strategies under the over all measles control plan:

- Measles Crash Programme for children less than 5 years old.
- Measles Catch-up campaign for elementary school children (6-12 years).
- Introduction of a second dose at school entry at 6 years through BIAS (School Based Immunization program).

However due to financial and other resource constraints, the above strategies were carried out in selected priority provinces based on age specific disease incidence or to response local measles outbreaks. To recommend further strategies for measles control in Indonesia in 2008, at the first meeting of South East Asia regional technical advisory group on Immunization (SEAR ITAG), the advisory group reviewed the measles phased measles catch-up campaign data, routine measles immunization coverage data, measles surveillance data up to 2008. After reviewing the data, ITAG recommended that province specific measles disease trends should be reviewed to better document the impact of immunization strategies and to determine the most appropriate strategy for conducting follow-up measles SIAs in Indonesia. Accordingly joint mission consist of WHO, UNICEF and Government of Indonesia experts were appointed and after reviewing the level of implementation of measles control strategies in the 33 provinces, in a workshop conducted from 19 to 21 January 2009, some recommendations for future measles control in Indonesia have been addressed.

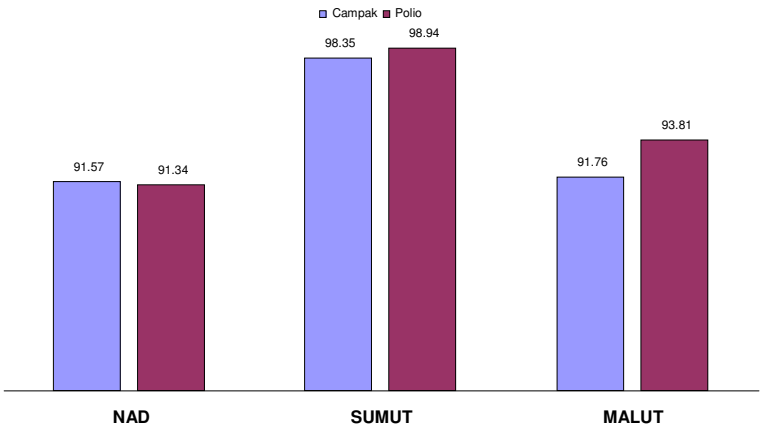
Based on the Joint Measles Mission recommendations, the Government of Indonesia has decided to conduct a follow up measles SIAs to maintain the program achievement and bridging the gap to meet the global goals, aslo as a further step to initiate measles elimination in Indonesia. The measles follow-up campaigns targeting children under five years implemented into three phases as shown as figure 7.

Figure 7 Phases of Measles Follow-up campaigns in Indonesia 2009 - 2011



Based on WHO recommendations, the follow up of measles campaign has to be integrated with OPV dose. In some area such as Aceh Tenggara and Gayo Luwes district in Aceh, TT vaccine has also given for child bearing age women (CBAW). In October 2009, supplementary Crash Measles program activities integrated with Polio campaign were carried out in the three provinces: Nanggroe Aceh Darussalam, North Sumatra and North Maluku. This program was provided for all targeted children in the province regardless of their immunization status as shown in the following graph.

Graph 7. Measles and Polio Campaign Results in 3 Provinces (%), 2009



Source: EPI, MOH

ii. MNTE Validation

Tetanus Neonatorum (TN) elimination has been initiated globally with particular target <1 case per 1000 live birth in every district/ municipality for more than 20 years. TN cases can be prevented by giving TT vaccination and clean delivery assisted by skilled birth attendant. In 2000, maternal tetanus (that is, tetanus during pregnancy or within 6 weeks following pregnancy) has been added to the programme goals and the initiative was renamed as the Global Maternal and Neonatal Tetanus (MNT) Elimination Initiative. Maternal tetanus is considered to have been eliminated when NT elimination has been achieved.

In response to the global initiative to eliminate NT, Indonesia adopted a 3-pronged immunization approach to provide protection against tetanus for mothers and their offspring:

- Short term: TT doses for pregnant women are provided through routine immunization or antenatal care services, and a "bride-to-be" TT dose for women who engaged or recently married
- Long term: 3 doses of diphtheria-tetanus-pertussis vaccine (DTP) for infants through the EPI program, 1 booster dose of diphtheria-tetanus vaccine (DT) given to students in grade 1 of primary school, and TT booster doses for students in grades 2 and 3.
- Acceleration: 3 rounds of supplementary immunization activities (SIA) for women of reproductive age (15-39 y) are provided in areas where TT immunization and clean deliveries have low coverage.

By 2000, coverage of pregnant women with a second or subsequent TT dose (TT2+) had reached 81%, estimated "protection at birth" (or PAB, that is, the proportion of newborns protected against tetanus by maternal immunization) was 82%, and mortality from NT had declined substantially in Indonesia.

In 2003-4, 2 rounds of TT SIAs targeting women of reproductive age were conducted in districts identified as at high risk for NT based on the results of the 2001 surveys. A subsequent national immunization coverage survey demonstrated PAB coverage of 77% for 2006. A district-level NT risk review in 2008 led to the identification of an additional 27 districts requiring TT SIAS, of which 23 have completed their supplemental activities. Altogether, 2 million women received $\geq$2 TT doses during SIAs conducted from 2003-9.

In 2009, a joint review by the Indonesian Ministry of Health (MOH), WHO and UNICEF concluded that MNT had likely been eliminated in Indonesia, with the exception of a few relatively small populations residing in hard-to-reach areas of provinces in the easternmost part of the country.

A second joint review committee in 2010 with representatives of the EPI and MCH departments of the MOH, as well as WHO and UNICEF (headquarters, regional and country offices) decided that because of Indonesia's large population and diversity of culture and levels of health service development, the validation process for MNT

elimination should be conducted in phases in a manner similar to the State-wise validation process under way in India. Four regions were identified as suitable for sequential validation: 1-Java and Bali; 2-Sumatra; 3-Kalimantan, Sulawesi, Nusa Tenggara Barat and Nusa Tenggara Timur; 4-Maluku and Papua. The review committee also agreed that Regions 1 and 2 had likely eliminated MNT, and were ready for confirmatory surveys. The Region 1 survey was conducted from 30 July – 5 August 2010. Based on the LQA-CS survey finding of 2 NT deaths among 3004 eligible live births, NT can be considered to have been eliminated in Lebak District, Java for the 12-month period covered by the survey. Because Lebak was purposively selected as the district at highest risk for NT, it is likely that NT elimination was attained in the districts of Java and Bali at lower risk during the same period, and therefore in Region 1 as a whole. Where NT elimination is achieved, elimination of maternal tetanus also is assumed. Because Java and Bali islands are having 59% of Indonesia's total population, the validation of MNT elimination in Region 1 is an important achievement.

3) Program Coverage and Epidemy of VPD

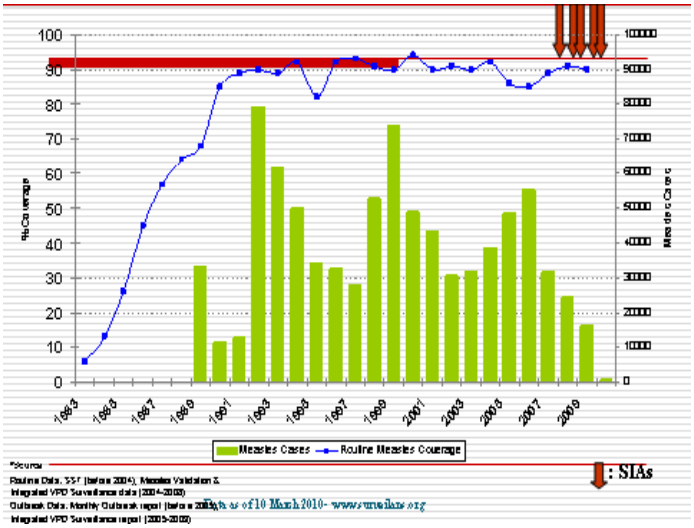
Epidemy of some VPD in Indonesia shows trend of decreasing number of cases, however for some diseases no sufficient data available.

Table 4. Incidence of VPD in Indonesia, 2005-2008

Disease	2005	2006	2007	2008
Diphteria	499	432	183	219
Pertussis	4,438	NA	10	Nil
Tetanus Neonatorum	132	118	141	183
Measles	15,833	20,422	18,488	15,266
Rubella	Nil	Nil	Nil	254
Wild Polio	303	2	0	0

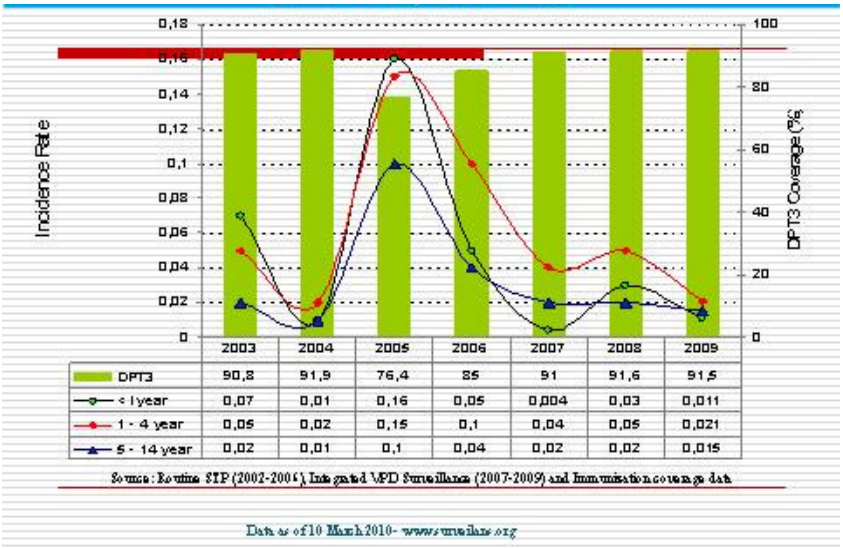
Source: EPI, MOH

Graph 8. Coverage and Number of Measles Case, Indonesia 1983-2010



Trend of improved coverage reflects tremendous improvement of the coverage of EPI program activities during last ten years as compared to condition in early 80s. On the other hand, number of VPD cases has also been decreasing significantly during last five years. Program intensification has lead to the decreasing number of Measles, but disparities accross the country remain and needs further intervention (graph 8). Number of Diphteria cases (per 10,000 population of age) as shown in graph 9 has been sharply decreasing during last 4 years, although in 2005 the trend showed an increasing number of cases, consistent with decreased coverage of EPI activities.

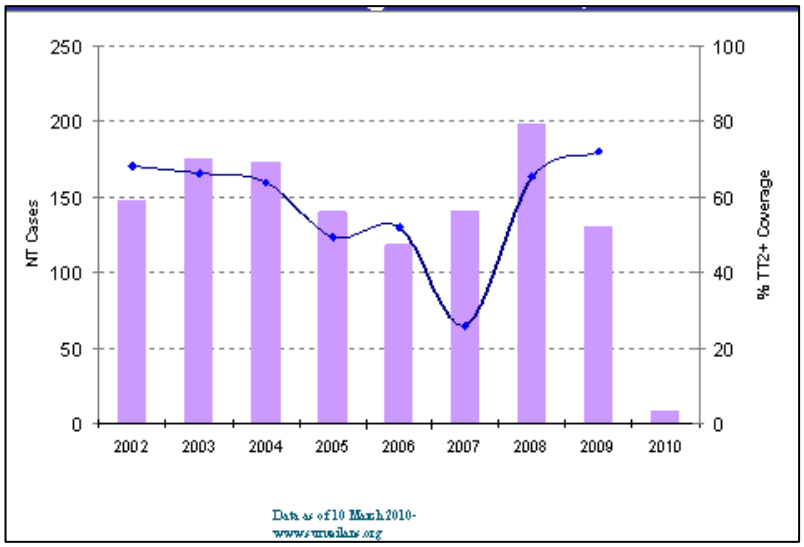
Graph 9. Incidence of Diphteria and DPT3 coverage in Indonesia 2003-2009



	2003	2004	2005	2006	2007	2008	2009
DPT3	90,8	91,9	76,4	85	91	91,6	91,5
< 1 year	0,07	0,01	0,16	0,05	0,004	0,03	0,011
1 - 4 year	0,05	0,02	0,15	0,1	0,04	0,05	0,021
5 - 14 year	0,02	0,01	0,1	0,04	0,02	0,02	0,015

Source: EPI, MOH

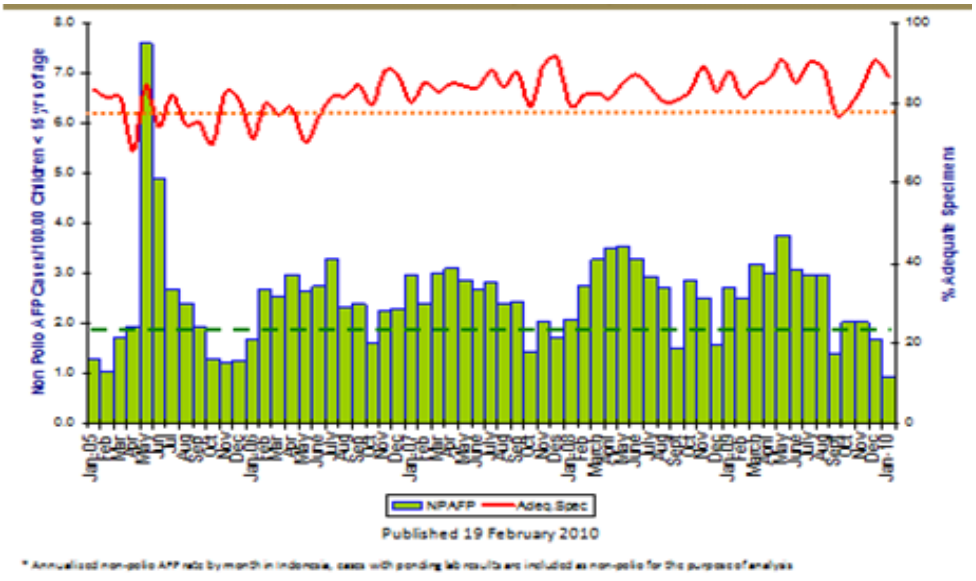
Graph 10. Tetanus Neonaturum cases and TT2+ (PW) Coverage, 2002 - 2010



Source: EPI, MOH

Graph 10 and 11 show number of Tetanus cases, TT coverage as well as trend of non Polio AFP cases in Indonesia. In general it can be concluded that number of cases is increasing when program coverage is decreasing. This would need intensification and acceleration of the program.

Graph 11. Non Polio AFP Rate* & % Adequate Specimen, January 2005 – 2010



Source: EPI, MOH

e. SWOT Analysis

SWOT analysis was conducted to understand the Strengths, Weaknesses, Opportunities and Threats, as listed below:

STRENGTHS

- Indonesia is committed to implement global commitment on MDG and PRSP.
- Immunization is part of national commitment and become priority program which is included in the national strategic plan, based on Law no 36/ 2009, Inpres no 1 and 3/ 2010 concerning acceleration of priority programs implementation, including health and EPI.
- Policies and guidelines for immunization program implementation are available (tools EVSM, DQS, DQA, SMS, and Supportive Supervision).
- Production of vaccines locally.
- Lessons learned from previous MYP about safe injection, reduce wastage, new technology: uniject, new vaccines, incinerator.
- EPI has a structured organization to implement program activities, full time staffs (EPI managers, officers and staffs).
- The services are integrated with MCH (village midwife).
- International standard for cold chain unit and management is available.
- National and Local AEFI task forces has already been established.
- Existance of policy on logistic management which includes bundling system.

WEAKNESSES

- EPI tools and instruments are not properly/ optimally used.
- High turn over and yet slow manpower replacement process, over burden (multiple tasks), lack of knowledge and skill at all level, and no systematic manpower planning.
- Excessive workload officers at district level (due to the streamlining of organizational structure).
- Limited funding causes problem on logistics supply, supervision and monitoring (Sustainability).
- Lack of competence-based training/on going training at district level.

- Limited number of cold chain equipment, many equipments are old/ out of date.
- Lack of advocacy to policy makers and stakeholders.
- Lack of IEC and social mobilization activities.
- Vaccines supply and distribution to the field cannot be guaranteed in term of quantity and continuity because of complex procurement administration process.
- Inadequate supervision and monitoring of the private immunization services.
- Inconsistency of the use of denominator and no data to define target at the local level to implement policy from central level.
- In some areas, the capacity of infrastructure including facilities and infrastructure that supports the implementation of immunization include transportation facilities, electricity supply, storage of vaccines, etc. do not meet the standard.
- Many private providers do not follow the technical standard procedures and do not report the result of immunization coverage routinely.

OPPORTUNITIES

- EPI as a priority has already explicitely written in RPJMN and MOH strategic plan 2010-2014.
- Decentralization policy (Law No. 32 and 33/2004) gives broader authority to local governments, with authority to undertake local specific interventions.
- Support from external partners.
- Immunization is now accepted as a necessity, especially in urban area, potential to increase demand.
- Existence of various community based program related to health.
- Options to choose cold chain equipment and syringes that have been registered in PIS/PQS WHO and could be adjusted with local condition.

THREATHS

- Lack of the local governments commitment to prioritize the implementation of immunization and could not be guaranteed the continuity and sustainability of funding after the expiration of donor assistance, therefore the funding for immunization activities is not optimal.
- Unexpected occurance of disasters, negative impact of conflict related to elections at subnational level, growing number of new province and district as consequence of democracy,

social conflict, unstable electrical power supply and many other problems influenced the immunization coverage.

- Geographical challenges (remote, difficult to reach) and the local culture that inhibit the immunization service, may cause no or low coverage of immunization in some areas.

This SWOT analysis is in line with the vision, mission, strategy and goal of the MOH and provides lesson learned to develop action plan of the EPI Indonesia.

III. Vision, Mission, and Strategy of MOH and EPI, 2010-2014

Strategy and action plan of immunization in Indonesia refers to Vision and Mission of MoH and strategic plan for 2010-2014. The Vision and Mission of MoH are:

VISION

Self reliance healty people, within a just health care system

MISSION

1. To improve health status of the community through community empowerment, including private sector and civil societies.
2. To guard health status of the community by ensuring the availability of comprehensive, equitable, and just health care.
3. To ensure the availability and equity of health resources.
4. To create good governance.

MOH Strategies

1. Improvement community, private sector, and civil society empowerement in health development through national and global cooperation.
2. Enchancement of equitable, affordable, eminent, just, and evidence-based health services by prioritizing promotive and preventive care.
3. Increasing of budget for health developments, particularly to finance the National Social Health Insurance.
4. Improvement of eqally-distributed & high quality development and empowerment of health human resources.
5. Improvement of the availability, equity, and affordability of drugs and medical equipment as well as ensuring the safety, efficacy, and quality of the pharmaceutical stocks, medical equipment and food.

6. Improvement of accountable, transparent, efficient and effective health management to establish liable health decentralization.

Today Indonesia has entered a second stage of the period of the Long Term National Development Plan (RPJPN) 2005-2025 or the Mid Term National Development Plan (RPJMN) 2010-2014. Each Ministry has RPJMN respectively as supporting institutional development guidelines. The RPJMN of the Ministry of Health 2010-2014 is stated in the Ministry of Health Strategic Plan 2010-2014 (Minister of Health of the Republic of Indonesia No.HK.03.01 / 60 / I / 2010).

There are 12 major issues stated in the MoH RPJMN 2010-2014:

1. Limited access to quality health services.
2. Limited Maternal and Child Services that meets the standard.
3. Overall nutritional problems are not yet solved.
4. Persistent high morbidity due to communicable and non-communicable diseases.
5. No social protection and financial protection against health problems.
6. Inadequate human resource in health in terms of quantity and quality, maldistribution of manpower and no manpower regulatory frameworks.
7. Availability, equity, and affordability of essential drugs are not yet optimal.
8. Limited ability in management and health information.
9. Poor coordination between planning policies, programs and budgets, and cross-sectoral coordination.
10. Disparities among regions, socio-econimic status and urban-rural.
11. Community empowerment in health development is not yet optimal.
12. Inadequate operational costs in the health center.

The 12 key issues is translated into 8 MOH strategic targets:

1. Increasing public health and nutrition status.
2. Reducing the morbidity of communicable diseases.

3. Reducing disparities in health and nutrition status between regions, socio-economic status and gender across the areas.
4. Increasing health budget to reduce financial risk due to health problems for all, especially for the poor.
5. Increased Healthy Living Behavior (PHBS) at the household level from 50% to 70%.
6. Health workers assigment in Remote Areas, unreach regions, border area and Islands (DTPK).
7. All of provinces implement non-communicable diseases control program.
8. All of districts/municipalities implement non-communicable diseases control program.

There are 8 focus of health development priorities:

1. Improved maternal and child health, as wellas Family Planning.
2. Improved community nutrion.
3. Communicable and non-communicable diseases control as well as enviromental health.
4. Health manpower development.
5. Improved availability, access, equity, safety, quality and use of drug, as well as food and drug control.
6. Social Health Security especially for the poor (Jamkesmas).
7. Community empowerment, disaster and crisis management/ control.
8. Improved primary, secondary and tertiary health care.

Goals and Objectives of Indonesia National Immunization Program 2010-2014

In line with MOH's strategy and plan, EPI set up goal and objectives as follow.

Goal

In general, the goal of the NIP in Indonesia is to reduce morbidity and mortality due to vaccine preventable diseases (VPD) through eradication, elimination or reduction.

Objectives of the NIP 2010 – 2014 are:

a. To achieve the UCI (Universal Child Immunization) village.

b. To achieve the termination of poliomyelitis transmission chain and certification of polio free.

c. To achieve the elimination of Maternal and Neonatal Tetanus (incidence below 1 per 1000 live births in one year).

d. To achieve Measles Mortality.

e. To implement the introduction of new vaccines, especially Hib, JE and Pneumococc gradually as part of efforts to reduce morbidity, mortality and disability by VPD.

f. To achieve the quality immunization services according to WHO standards.

The National Immunization Program target

1. To achieve the UCI village target 80% in 2010 and 100% by the end of 2014.
2. To achieve coverage of 80% Hep-B Birth dose (HB-0 for infants age less than 7 days) by 2014.
3. To increase coverage of measles second dose > 95% at primary school age.
4. To maintain the use of Auto Disable Syringe 100%.
5. To develop and implement national policy on waste management

UCI village is defined as one indicator of success to assess the implementation of a complete basic immunization services accross the country, with the target of 100% in 2014. In the last five years (2005-2009) UCI village coverage has not reach yet the target, this fact was confirmed by Riskesdas (Basic Health Research) 2007 results which showed a complete basic immunization was only reached 46.2%, while according to the scope of routine reports from the province of UCI village in 2009 was only 69.2%.

NIP Strategies

1. Accelerating attainment of the UCI village through the GAIN UCI (Gerakan Akselerasi Imunisasi Nasional UCI).
2. Improving the quality of vaccines, cold chain / logistics and safe injection.
3. Improving monitoring, evaluation and surveillance systems (coverage survey, EVSM, VPD and AEFI).
4. Implementing efforts to increase demand of society to immunization.
5. Increasing the support of stakeholders, sustainability of the program commitments including funding, as well as effective and efficient management.
6. Conducting the initiation of new vaccine introduction, Hib, particularly JE and Pneumococc.

Each of these goals are translated into activities in detail per year (see the following milestones/ timeline).

IV. National Action Plan EPI

Riskesdas 2007 (Basic Health Research, MOH) monitoring and evaluation results showed that the activities of routine immunization services for infants under one year were less satisfactory. According to the reports, achievement of UCI Village in 2008 and 2009 was 68.2% and 69.2%. It was predicted that it is difficult to reach the 100% UCI villages target in 2010. The government determines in the RPJMN and Strategic Plan MoH 2010-2014 that the target of UCI villages target is 100% in 2014.

Indonesia plan to integrated Hib (Haemophilus influenzae type b) vaccine into the national immunization program to reduce morbidity, mortality and disability due to pneumonia and meningitis caused by Hib and will help accelerate the achievement of Millennium Development Goal. Since Indonesia is a big country with many islands and high target population, the introduction will be done gradually to minimize AEFI Introduction of Hib new vaccine as a pentavalent has been decided to start in 2013, and from the past experience and the geographical situation, will start for 20% population in the area that had achieved high coverage, well program managed and including AEFI management. The strategy of implementation is:

- 1st year (2013) : 20% population (West Java, Bali, West Nusa Tenggara and DIY Province)
- 2nd year (2014) : 50% population (all Java, South Sulawesi, Bangka Belitung, North Sumatera, South Sumatera, Jambi and Lampung)
- 3rd year (2015) : 100% population at the whole country

The policy of new vaccine introduction in Indonesia, has been on line with the availability of the domestic product vaccine by PT. Biofarma manufacture. Since, PT Biofarma prediction of the DPT-HB-Hib vaccine production will be licensed for the market at mid year of 2012. Indonesia will start the introduction of new vaccine at 2013 and will buy the vaccine from PT. Biofarma.

To ensure the achievement of the target by the year 2014, the government established policy to accelerate UCI target or known as GAIN 2010-2014 UCI.

Definition of GAIN UCI

National Immunization Acceleration UCI 2010 - 2014 (GAIN UCI 2014) is an effort to accelerate the achievement of UCI in all villages by the year 2014. The government would ask society and various

stakeholders in an integrated manner at all levels of administration to work together to ensure the success of this movement.

Activities to accelerate the implementation of routine immunization is strengthened through:

1. Enhancing the Local Area Monitoring or *PWS* to map each region based on the coverage, problem analysis and arranging follow-up measurement to solve the local problems. This would be directed primarily at low coverage areas, without degrading the performance of the previous year in the area with good performance. It would also intended to maintain service quality according to the standards.

2. Setting up the required resources including manpower, logistics, funding and service facilities.

3. Empowering communities through community and religious leader (TOGA, Toma) village officials and cadres.

4. Improving equity of access in all villages in remote areas .

The movement is a joint government effort involving the communities, NGOs and private sectors in an integrated and coordinated way effort to scale up implementation of the program in all regions.

Indicator of Successful GAIN UCI

Indicators of success CAIN UCI refers to the RPJMN Year 2010-2014 with annual target as follow:

1. Year 2010
    a. Achieve UCI village 80%.
    b. 80% of infants aged 0-11 months would receive full basic immunization.
2. Year 2011
    a. Achieve UCI village 85%.
    b. 82% of infants aged 0-11 months would receive full basic immunization.
3. Year 2012
    a. Achieve UCI village 90%.

b. 85%of infants aged 0-11 months would receive full basic immunization

4. Year 2013
   a. Achieve UCI village 95%.
   b. 88% of infants aged 0-11 months would receive full basic immunization

5. Year 2014
   a. Achieve UCI village 100%.
   b. 90%of infants aged 0-11 months would receive full basic immunization.

GAIN UCI Activities is part of national planning immunization activities that are divided into specific objectives as already presented earlier, and translated into activities to be carried out over five years (2010-2014). The output would be:

1. Report on UCI Village Coverage achievements.
2. Report of the achievement in the immunization coverage of infants who receive complete basic immunization.
3. Report of elementary school-aged children immunized.
4. Certification of Immunization Trained Manpower.
5. Report of TT coverage achievement for childbearing age woman (CBAW/ WUS).
6. Norm, Standard, Procedure and Criteria or NSPC for Immunization Program.
7. Procurement of equipment to improve Immunization Services

Immunization activities were translated into the subcomponent activities for year 2010-2014 as follow:

- Availability of Norms, Standards, Procedures, and Criteria (NSPC) for routine and supplementary immunization activities (SIAs)

- The achievement of routine and additional immunization coverage that was equitable and quality.
- Implementation of an effective immunization reporting, efficient, timely and complete.
- Monitoring and evaluation of immunization activities to strengthen the immunization activities.
- Improving data validity in all administrative levels.
- Improving the procurement and logistics management of immunization.
- Improving the quality of vaccines and safe injection.
- Improving surveillance AEFI and VPD.
- Planning the vaccines needs for global epidemic preparedness.
- Improving the IEC to enhance commitment and support from stakeholders (government and community/ society).
- Increasing the human resources capacity on service provision, managing routine and SIAs
- Ensuring the sustainability and effectiveness of the use of new vaccine technology.

V. MILESTONES AND TIMELINE

a. Acceleration of UCI Villages and SIAs Coverage

Goals	Activities/ target				
	2010	2011	2012	2013	2014
1. Achieving high coverage of GAIN UCI through routine and strenghtining supplementary immunization actions (SIAs) with good quality and equitable	• Coverage of UCI villages≥ 80% • Coverage of the complete basic immunization 80%, • Coverage of HB birth dose ≥ 80% • Coverage of Measles 80% • Drop-out DPT1 DPT3 5% -10% • Coverage of immunization for the Elementary school children ≥ 95% • Sweeping (based on local area monitoring or PWS) in 100% of the village with low coverage	• Coverage of UCI villages≥ 85% • Coverage of Complete basic immunization 82%, • Coverage of HB birth dose ≥ 80% • Coverage of Measles 85% • Drop-out DPT1 DPT3 <5% • Coverage of immunization for the Elementary school children ≥ 95% • Sweeping (based on local area monitoring or PWS) in 100% of the village with low coverage	• Coverage of UCI villages 90% • Coverage of complete basic immunization 85% • Coverage of HB birth dose ≥ 80% • Coverage of Measles 88% • Drop-out DPT1 DPT3 ≤5% • Coverage of immunization for the Elementary school children ≥ 95% • Sweeping (based on local area monitoring or PWS) in 100% of the village with low coverage	• Coverage of UCI villages 95% • Coverage of Complete basic immunization 88% • Coverage of HB birth dose ≥ 80% • Coverage of Measles 90% • Drop-out DPT1 DPT3 ≤5% • Coverage of immunization for the Elementary school children ≥ 95% • Sweeping (based on local area monitoring or PWS) in 100% of the village with low coverage	• Coverage of UCI villages 100% • Coverage of Complete basic immunization 90% • Coverage of HB birth dose ≥ 80% • Coverage of Measles 92% • Drop-out DPT1 DPT3 ≤5% • Coverage of immunization for the Elementary school children ≥ 95% • Sweeping (based on local area monitoring or PWS) in 100% of the village with low coverage
	• Implementation of the measles campaigns integrated with polio and vitamin A in 12 provinces	• Implementation of the measles campaigns integrated with polio and vitamin A in 17provinces	• Prevention of measles outbreak by implementing crash program in high risk villages	• Prevention of measles outbreak by implementing crash program in high-risk villages.	• Conducting serological surveys in three regions (30 clusters each)

	• Implementation of the CBAW TT sweeping in high risk villages in selected districts at Papua and West Papua province • Implemention of studies on MNTE validation in two selected regions	• Implementation of CBAW TT sweeping in all high risk villages in selected districts at East Kalimantan, West Kalimantan, West Sulawesi, and North Sulawesi. • Implementation of studies on MNTE validation in 3rd region (Kalimantan, Sulawesi and Nusa Tenggara)	• Implementation of studies on MNTE validation in 4th region (Papua and Maluku)	• Strengthening integrated activities of EPI and MCH to maintain the MNTE in all regions	• Prevention of measles outbreak by implementing crash program in high risk villages
2. Health Systems Strengthening (HSS)	• Implementation of HSS activities in five selected provinces • Integration of Malaria and Immunization activities in all provinces of Kalimantan and Sulawesi, selected in 47 districts with medium endemic malaria • Development of the regional action plan (RAD) to achieve the MDGs target and desimination to district level at 3 provinces (East Java, South Sulawesi and Kepulauan Riau)	• Implementation of HSS activities in five selected provinces • Integration of Malaria and Immunization activities in all provinces of Kalimantan and Sulawesi, selected in 47 districts with medium endemic malaria • Development of the regional action plan (RAD) to achieve the MDGs target and desimination to district level at all provinces	• Integration of Malaria and Immunization activities in all provinces of Kalimantan and Sulawesi, in selected districts with medium endemic malaria • Implementation and evaluation of regional action plans (RAD) to achieve the MDGs target	• Integration of Malaria and Immunization activities in all provinces of Kalimantan and Sulawesi, in selected districts with medium endemic malaria • Implementation and evaluation of regional action plans (RAD) to achieve the MDGs target	• Integration of Malaria and Immunization activities in all provinces of Kalimantan and Sulawesi, in selected districts with medium endemic malaria • Implementation and evaluation of regional action plans (RAD) to achieve the MDGs target

3. Acceleration and maintenance of the MNTE	• Coordination with other sectors/ programs in achieving MNTE validation • Facilitation for MNTE implementation and lifetime TT • Technical Assistance for MNTE Validation Survey	• Coordination with other sectors/ programs in achieving MNTE validation • Facilitation for MNTE implementation and lifetime TT • Technical Assistance for MNTE Validation Survey • Strengthening integrated activities of EPI and MCH to maintain the regional validation MNTE 2010 and 2011	• Coordination with other sectors/ programs in achieving MNTE validation • Facilitation for MNTE implementation and lifetime TT • Technical Assistance for MNTE Validation Survey • Strengthening integrated activities of EPI and MCH to maintain the regional validation MNTE 2010 and 2012	• Facilitation for MNTE implementation and lifetime TT • Technical Assistance for MNTE Validation Survey • Strengthening integrated activities of EPI and MCH to maintain the regional validation MNTE	• Facilitation for MNTE implementation and lifetime TT • Technical Assistance for MNTE Validation Survey • Strengthening integrated activities of EPI and MCH to maintain the regional validation MNTE
4. Improving the implementation of school based immunization program (*BIAS)* in several provinces with low performance	• Coordination and integration with other sectors/ programs in implementing *BIAS* • Monitoring the implementation of province with problems in achieving school based immunization program (*BIAS)*	• Coordination and integration with other sectors/ programs in implementing *BIAS* • Monitoring the implementation of province with problems in achieving school based immunization program (*BIAS)*	• Coordination and integration with other sectors/ programs in implementing *BIAS*	• Coordination and integration with other sectors/ programs in implementing *BIAS* • Monitoring the implementation of province with problems in achieving school based immunization program (*BIAS)*	• Coordination and integration with other sectors/ programs in implementing *BIAS*

b. *Improving quality of the vaccines, cold chain / logistics & safe injection*

Goals	Activities/ Target				
	2010	2011	2012	2013	2014
1. Availability of Norms, Standards, Procedures and Criteria (NSPK) for routine and supplementary immunization activities (SIAs)	• Development and refinement of the *NSPK* to correspond and updated with VPD epidemiology	• Development and refinement of the *NSPK* to correspond and updated with VPD epidemiology	• Development and refinement of the *NSPK* to correspond and updated with VPD epidemiology	• Development and refinement of the *NSPK* to correspond and updated with VPD epidemiology	• Development and refinement of the *NSPK* to correspond and updated with VPD epidemiology
2. Improving quality of the vaccines and safe injection	• Using the domestic vaccines production with Standard Manufacture and certificate of release from the Food and Drug Control Agency or BPOM • Ensuring the quality of vaccines, all distribution for all level must use VAR form. • Ensuring good estimation of vaccine needed by increasing managerial capacity through supportive supervision in all provinces	• Using the domestic vaccines production with Standard Manufacture and certificate of release from the Food and Drug Control Agency or BPOM • Ensuring the quality of vaccines, all distribution for all level must use VAR form. • Ensuring good estimation of vaccine needed by increasing managerial capacity through supportive supervision in all provinces	• Using the domestic vaccines production with Standard Manufacture and certificate of release from the Food and Drug Control Agency or BPOM • Ensuring the quality of vaccines, all distribution for all level must use VAR form. • Ensuring good estimation of vaccine needed by increasing managerial capacity through supportive supervision in all provinces	• Using the domestic vaccines production with Standard Manufacture and certificate of release from the Food and Drug Control Agency or BPOM • Ensuring the quality of vaccines, all distribution for all level must use VAR form. • Ensuring good estimation of vaccine needed by increasing managerial capacity through supportive supervision in all provinces	• Using the domestic vaccines production with Standard Manufacture and certificate of release from the Food and Drug Control Agency or BPOM • Ensuring the quality of vaccines, all distribution for all level must use VAR form. • Ensuring good estimation of vaccine needed by increasing managerial capacity through supportive supervision in all provinces
3. Ensuring the implementation of safe injection and waste disposal	• All immunization injection are using 100% ADS	• All distributed vaccines are using 100% ADS • Establishing the national policies on sharp waste disposal (by the National Committee on Waste Disposal)	• All distributed vaccines are using 100% ADS • 50% of districts/ municipalities implement/apply the standard for waste disposal management	• All distributed vaccines are using 100% ADS • 75% of districts/ municipalities implement/apply the standard for waste disposal management	• All distributed vaccines are using 100% ADS • 100% of districts/ municipalities implement/apply the standard for waste disposal management

4. Maintaining routine reporting on cold chain inventory by level, replacing new equipment and spare part etc. to ensure 90% cold chain well functioning	• 85% of all cold chain equipment in each level are well functioning	• Review cold chain availability and national cold chain inventory • 90 % of all cold chain equipmentint each level are well functioning • Proviancila cold chain officers are trained (in accredited cold chain training)	• 95 % of all cold chain equipment in each level are well functioning	• 100 % of all cold chain equipmentin each level are well functioning • District old chain officers are trained (in accredited cold chain training)	• Review cold chain availability and national cold chain inventory • 100 % of all cold chain equipment in each level are well functioning • All cold chain officers are trained (in accredited cold chain training)
5. Planning of vaccine needs for global epidemic preparedness	• Working closely with the Technical Working Group / TAG on Immunization, vaccine producer (PT BioFarma), NIHRD (Research and Development), in developing the plan and introduction of seasonal influenza vaccine, H1N1, H5N1, etc.	• Working closely with the Technical Working Group / TAG on Immunization, vaccine producer (PT BioFarma), NIHRD (Research and Development), in developing the plan and introduction of seasonal influenza vaccine, H1N1, H5N1, etc.	• Working closely with the Technical Working Group / TAG on Immunization, vaccine producer (PT BioFarma), NIHRD (Research and Development), in developing the plan and introduction of seasonal influenza vaccine, H1N1, H5N1, etc.	• Working closely with the Technical Working Group / TAG on Immunization, vaccine producer (PT BioFarma), NIHRD (Research and Development), in developing the plan and introduction of seasonal influenza vaccine, H1N1, H5N1, etc.	• Working closely with the Technical Working Group / TAG on Immunization, vaccine producer (PT BioFarma), NIHRD (Research and Development), in developing the plan and introduction of seasonal influenza vaccine, H1N1, H5N1, etc.
6. Empowering EPI Officers'		• Training for DQS and Immunization EVSM Officer at national and province level	• Training for DQS and Immunization EVSM Officer at districts in middle regional province	• Training for DQS and Immunization EVSM Officer at districts in estern regional province	• Training for DQS and Immunization EVSM Officer at districts in western regional province

c. *Strengthening monitoring, evaluation and surveillance systems*

Goals	Activities/ Target				
	2010	2011	2012	2013	2014
1. Establishing the effective, efficient, timely and complete immunization reporting system	• All reports are received complete and timely, from health centers to the central level • Feedback is given to the stakeholders, in the form of map with colors • Developing Software for EPI recording and reporting (RR) web based, trial aplication in DIY (Jogja) Province	• All reports are received complete and timely, from health centers to the central level • Feedback is given to the stakeholders, in the form of map with colors • Evaluating the implementation of aplication software EPI RR web based at DIY (Jogja) Province • Implementation of aplication software EPI RR web based in selected districts in West Java	• All reports are received complete and timely, from health centers to the central level • Feedback is given to the stakeholders, in the form of map with colors • Implementation of aplication software EPI RR web based in all district in West Java	• All reports are received complete and timely, from health centers to the central level • Feedback is given to the stakeholders, in the form of map with colors • Implementation of aplication software EPI RR web based in 6 provinces in Java	• All reports are received complete and timely, from health centers to the central level • Feedback is given to the stakeholders, in the form of map with colors • Implementation of aplication software EPI RR web based in 10 provinces in Sumatera
2. Monitoring and Evaluation of Routine and Supplementry Immunization Actions (SIAs)	• Implementation of regular supportive supervision in 70% of health center with low coverage • Periodically, at all levels of administration conduct an internal evaluation (using EVSM, DQS, survey coverage and streamlining approach) or equal with external evaluation (National Health Survey, coverage survey, LQAS, etc.)	• Implementation of regular supportive supervision in 70% of health center with low coverage • Periodically, at all levels of administration conduct an internal evaluation (using EVSM, DQS, survey coverage and streamlining approach) or equal with external evaluation (National Health Survey, coverage survey, LQAS, etc.)	• Implementation of regular supportive supervision in 80% of health center with low coverage • Periodically, at all levels of administration conduct an internal evaluation (using EVSM, DQS, survey coverage and streamlining approach) or equal with external evaluation (National Health Survey, coverage survey, LQAS, etc.)	• Implementation of regular supportive supervision in 80% of health center with low coverage • Periodically, at all levels of administration conduct an internal evaluation (using EVSM, DQS, survey coverage and streamlining approach) or equal with external evaluation (National Health Survey, coverage survey, LQAS, etc.)	• Implementation of regular supportive supervision in 80% of health center with low coverage • Periodically, at all levels of administration conduct an internal evaluation (using EVSM, DQS, survey coverage and streamlining approach) or equal with external evaluation (National Health Survey, coverage survey, LQAS, etc.)

	• Monitoring the Implementation of new vaccines introduction for 20% of infants • Monitoring the implementation of Measles and Polio Crash Program in 12 provinces	• Monitoring the Implementation of new vaccines introduction for 50% of infants • Monitoring the implementation of Measles and Polio Crash Program in the 15 provinces	• Monitoring the Implementation of new vaccines introduction in all province	• Monitoring the Implementation of new vaccines introduction in all province	• Monitoring the Implementation of new vaccines introduction in all province
3. Improving data validity at all administrative levels	• Implementing the POA in the district/ municipalities • Validation of data in 80% villages	• Implementing the POA in 90% district/ municipalities • Validation of data in 85% villages	• Implementing the POA in 95% district/ municipalities • Validation of data in 90% villages	• Implementing the POA in 100% district/ municipalities • Validation of data in 95% villages	• Implementing the POA in 100% district/ municipalities • Validation of data in 100% villages
4. Providing the Planning and Budgeting Document Including for VPD Control	• Integrated Assessment on Planning and Budgetin for VPD Control • Planning and Budgeting arrangement	• Integrated Assessment on Planning and Budgetin for VPD Control • Planning and Budgeting arrangement	• Integrated Assessment on Planning and Budgetin for VPD Control • Planning and Budgeting arrangement	• Integrated Assessment on Planning and Budgetin for VPD Control • Planning and Budgeting arrangement	
5. Increasing the immunization programs through epidemiological analysis	• Field Investigation and Control of VPD Outbreak • Conducting epidemiological analysis to support EPI improvement	• Field Investigation and Control of VPD Outbreak • Conducting epidemiological analysis to support EPI improvement	• Field Investigation and Control of VPD Outbreak • Conducting epidemiological analysis to support EPI improvement	• Field Investigation and Control of VPD Outbreak • Conducting epidemiological analysis to support EPI improvement	• Field Investigation and Control of VPD Outbreak • Conducting epidemiological analysis to support EPI improvement
6. Epidemiology Surveillance Activities	• Assisting National Commission to strengthen local AEFI comission • Investigation and managing AEFI Cases • Auditing AEFI Cases	• Assisting National Commission to strengthen local AEFI comission • Investigation and managing AEFI Cases • Auditing AEFI Cases	• Assisting National Commission to strengthen local AEFI comission • Investigation and managing AEFI Cases • Auditing AEFI Cases	• Assisting National Commission to strengthen local AEFI comission • Investigation and managing AEFI Cases • Auditing AEFI Cases	• Assisting National Commission to strengthen local AEFI comission • Investigation and managing AEFI Cases • Auditing AEFI Cases

	• National Coordination meeting on establising network to handle AEFI cases	• National Coordination meeting on establising network to handle AEFI cases	• National Coordination meeting on establising network to handle AEFI cases	• National Coordination meeting on establising network to handle AEFI cases	• National Coordination meeting on establising network to handle AEFI cases

d. *Demand Creation*

Goals	Activities				
	2010	2011	2012	2013	2014
1. Increasing community demand for immunization	• Improving health promotion, involving communities, NGOs and other players in conducting advocacy and implementation • Communicating all plans and common problems found to the ICC members as well as NGOs and private sectors at all administrative levels • Collaborating with Center for Health Promotion in preparing and printing IEC materials on basic immunization to support GAIN UCI • Improving public relation and hotline service through Puskomlik (Center of Public Communication)	• Improving health promotion, involving communities, NGOs and other players in conducting advocacy and implementation • Communicating all plans and common problems found to the ICC members as well as NGOs and private sectors at all administrative levels • Developing, printing and distribution IEC materials on basic immunization based on Behaviour survey in Jawa and Bali region • Improving public relation and hotline service through Puskomlik (Center of Public Communication)	• Improving health promotion, involving communities, NGOs and other players in conducting advocacy and implementation • Communicating all plans and common problems found to the ICC members as well as NGOs and private sectors at all administrative levels • Developing a systematic and accessible immunization program service as needed (alert village) • Printing and distribution IEC materials on basic immunization based on Behaviour survey in Sumatera and Kalimantan middle region • Improving public relation and hotline service through Puskomlik (Center of Public Communication)	• Improving health promotion, involving communities, NGOs and other players in conducting advocacy and implementation • Communicating all plans and common problems found to the ICC members as well as NGOs and private sectors at all administrative levels • Developing a systematic and accessible immunization program service as needed (alert village) • Printing and distribution IEC materials on basic immunization based on Behaviour survey in Sulawesi and Nusa Tenggara region • Improving public relation and hotline service through Puskomlik (Center of Public Communication)	• Improving health promotion, involving communities, NGOs and other players in conducting advocacy and implementation • Communicating all plans and common problems found to the ICC members as well as NGOs and private sectors at all administrative levels • Strengthening a systematic and accessible immunization program service as needed (alert village) • Printing and distribution IEC materials on basic immunization based on Behaviour survey in Maluku and Papua region • Improving public relation and hotline service through Puskomlik (Center of Public Communication)

	• Empowering communities by involving all society elements such as key persons/ community leaders, PKK, NGOs, Boy scout (pramuka) and involving local media	• Empowering communities by involving all society elements such as key persons/ community leaders, PKK, NGOs, Boy scout (pramuka) and involving local media	• Empowering communities by involving all society elements such as key persons/ community leaders, PKK, NGOs, Boy scout (pramuka) and involving local media	• Empowering communities by involving all society elements such as key persons/ community leaders, PKK, NGOs, Boy scout (pramuka) and involving local media	• Empowering communities by involving all society elements such as key persons/ community leaders, PKK, NGOs, Boy scout (pramuka) and involving local media

e. *Improving stakeholders support, commitment for sustainability of the the funding as well as effective and efficient management*

Goals	Activities				
	2010	2011	2012	2013	2014
1. Socialization of GAIN UCI	• Coordination Meeting on GAIN UCI Implementation: Central government, Local government and external partners • National Coordination Meeting on GAIN UCI Planning and Evaluation • Socialization of GAIN UCI at each administrative level • Strengthening PWS (Local Area Monitoring) • Preparing resource needed at each level of administration • Collaborating with local government and other stakeholders to improve equity of access to immunization in all villages, especially in remote areas (DTPK)	• Coordination Meeting on GAIN UCI Implementation: Central government, Local government and external partners • National Coordination Meeting on GAIN UCI Planning and Evaluation • Socialization of GAIN UCI at each administrative level • Strengthening PWS (Local Area Monitoring) • Preparing resource needed at each level of administration • Collaborating with local government and other stakeholders to improve equity of access to immunization in all villages, especially in remote areas (DTPK)	• Coordination Meeting on GAIN UCI Implementation: Central government, Local government and external partners • National Coordination Meeting on GAIN UCI Planning and Evaluation • Socialization of GAIN UCI at each administrative level • Strengthening PWS (Local Area Monitoring) • Preparing resource needed at each level of administration • Collaborating with local government and other stakeholders to improve equity of access to immunization in all villages, especially in remote areas (DTPK)	• Coordination Meeting on UCI GAIN Implementation: Central government, Local government and external partners • National Coordination Meeting on GAIN UCI Planning and Evaluation • Socialization of GAIN UCI at each administrative level • Strengthening PWS (Local Area Monitoring) • Preparing resource needed at each level of administration • Collaborating with local government and other stakeholders to improve equity of access to immunization in all villages, especially in remote areas (DTPK)	• Coordination Meeting on GAIN UCI Implementation: Central government, Local government and external partners • National Coordination Meeting on GAIN UCI Planning and Evaluation • Socialization of GAIN UCI at each administrative level • Strengthening PWS (Local Area Monitoring) • Preparing resource needed at each level of administration • Collaborating with local government and other stakeholders to improve equity of access to immunization in all villages, especially in remote areas (DTPK)

	• Monitoring Implementation of GAIN UCI in 80% of villages • Improving Communication and Information Dissemination to support stakeholders commitment	• Monitoring Implementation of GAIN UCI in 85% of villages • Improving Communication and Information Dissemination to support stakeholders commitment	• Monitoring Implementation of GAIN UCI in 90% of villages • Improving Communication and Information Dissemination to support stakeholders commitment	• Monitoring Implementation of GAIN UCI in 95% of villages • Improving Communication and Information Dissemination to support stakeholders commitment	• Monitoring Implementation of GAIN UCI in 100% of villages • Improving Communication and Information Dissemination to support stakeholders commitment

f. *Introduction of New Vaccines, especially Hib, JE and Pneumococcus*

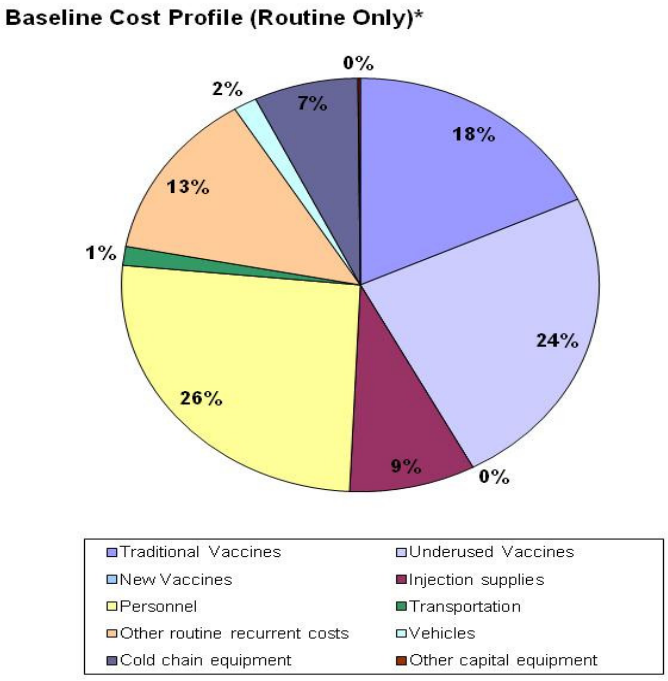
Goals	Activities				
	2010	2011	2012	2013	2014
1. Strengthening capacity of the country to set up policies and priorities for new vaccines and new technologies	• The EPI Technical Advisory Group (TAG) actively review the data and information needed for vaccines introduction and new technologies, (Hib, JE, Influenza, Pneumococ, Rotavirus, Typhoid Fever)	• The EPI Technical Advisory Group (TAG) actively review the data and information needed for vaccines introduction and new technologies, (Hib, JE, Influenza, Pneumococ, Rotavirus, Typhoid Fever)	• The EPI Technical Advisory Group (TAG) actively review the data and information needed for vaccines introduction and new technologies, (Hib, JE, Influenza, Pneumococ, Rotavirus, Typhoid Fever)	• The EPI Technical Advisory Group (TAG) actively review the data and information needed for vaccines introduction and new technologies, (Hib, JE, Influenza, Pneumococ, Rotavirus, Typhoid Fever)	• The EPI Technical Advisory Group (TAG) actively review the data and information needed for vaccines introduction and new technologies, (Hib, JE, Influenza, Pneumococ, Rotavirus, Typhoid Fever)
2. Ensuring sustainability and effectiveness of new technology and new vaccines	• Obtaining support for EPI from relevant stakeholders before the use of new vaccines and technologies, including training and systematic phases of implementation. • Implementation (continuation) of IPV pilot in DI.Yogyakarta • Multicenter Study for third phase of DPT / HB / Hib vaccine • Strengthening surveillance in Bali (zoonosis + research & development unit)	• Obtaining support for EPI from relevant stakeholders before the use of new vaccines and technologies, including training and systematic phases of implementation. • Implementation (continuation) of IPV pilot in DI.Yogyakarta • Multicenter Study for third phase of DPT / HB / Hib vaccine • Strengthening the surveillance in Bali (zoonoses + research & development unit) • Finding partner and donors for JE vaccine introduction	• Obtaining support for EPI from relevant stakeholders before the use of new vaccines and technologies, including training and systematic phases of implementation. • Implementation (continuation) of IPV pilot in DI.Yogyakarta • Clinical trial and sutdy CEA of JE vaccine	• Obtaining support for EPI from relevant stakeholders before the use of new vaccines and technologies, including training and systematic phases of implementation. • Implementation (continuation) of IPV pilot in DI.Yogyakarta • Integration of DTP/HB/HIB in 20% national target • JE campaign in Bali Province	• Obtaining support for EPI from relevant stakeholders before the use of new vaccines and technologies, including training and systematic phases of implementation. • Implementation (continuation) of IPV pilot in DI.Yogyakarta • Integration of DTP/HB/HIB in 50% national target • Catch Up campaign in other provinces (Jakarta, Central Java, West Kalimantan) • JE routine immunization in Bali

	• Policy adjustment for TT and DT vaccine delivery for school aged children with Td vaccine. This would give protection against two diseases: Tetanus and Diphteria. • Increasing surveillance on pandemic influenza • Developing the plan for logistics distribution and vaccination of H1N1 • Socialization the use of new vaccine and technologies for program managers, cross-sector, NGO and private sector	• Increasing surveillance on pandemic influenza • Socialization the use of new vaccine and technologies for program managers, cross-sector, NGO and private sector	• Study on Penumococcus vaccine in 6 hospitals • Clinical trial on Pneumococcal vaccine in high risk area • Increasing surveillance of pandemic influenza • Socialization the use of new vaccine and technologies for program managers, cross-sector, NGO and private sector	• Typhoid Study with the target of 100.000 children in 6 subdistricts in North Jakarta • Clinical trial and CEA Study for Pneumokokus vaccine • Increasing surveillance of pandemic influenza • Socialization the use of new vaccine and technologies for program managers, cross-sector, NGO and private sector	• Clinical trial and CEA Study for Pneumococcal vaccine • Increasing surveillance of pandemic influenza • Socialization the use of new vaccine and technologies for program managers, cross-sector, NGO and private sector

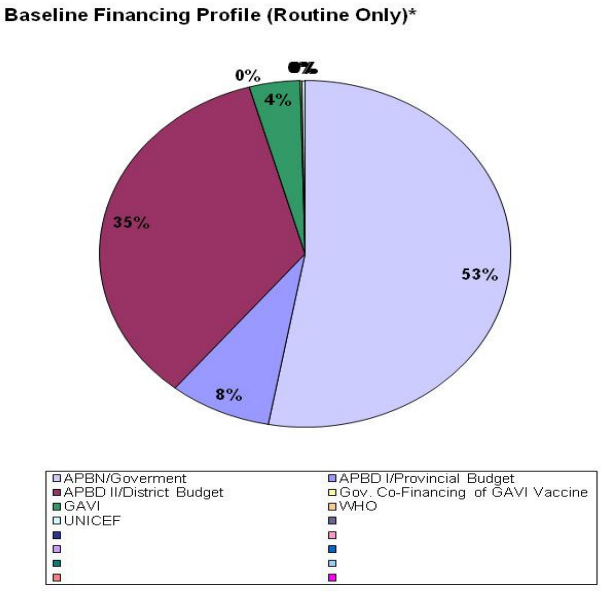
VI. EPI Program Cost and Financing

To estimate resource needed and its potential sources, a projection of 2010-2014 EPI program cost is developed. The following graphs reflect cost for EPI by component (graph 12) and by source (graph 13) in 2009 as the baseline.

Graph 12. Cost component for immunization activities year 2009



Graph 13. Cost for immunization activities by sources year 2009



Total cost was USD 138.8 million with highest proportion was dedicated for recurrent costs. More than 50% of the funds contributed by central government (APBN).

In 2010 immunization program cost is predicted to reach USD 158.2 million in total, and will continue to increase to USD 219.6 million in 2014. During 2010 and 2011 there is an increased NIP cost, mostly for campaign and investment (10.3% - 27.5% of the total cost). Introducing new vaccine for socialization and procurement in 2013 – 2014, increasing the total cost also(table 5).

Table 5. Estimated NIP costs 2010-2014

Cost Indicators	2010	2011	2012	2013	2014
Total NIP Cost (million US$)	158.3	198.9	175.9	200.3	219.6
Total Routine Cost (Fixed and Outreach) (Million US$)	152.5	187.3	139.6	200.3	219.6
Total Campaign Cost (Million US$)	5.7	11.6	36.2	0	0
Total Resource Requirement (Routine Only) (million US$)	146.7	162.7	175.9	200.3	219.6
Percapita routine only (US$)	0.6	0.7	0.7	0.8	0.9
% Vaccines and supplies (routine only)	33%	26%	29%	30%	31%
Total Secured Financing (Million US$)	158.3	207.6	133.1	151.1	163.7
Central (Million US$)	60.3	74.2	52.6	53.0	59.5
Province (Million US$)	12.3	15.5	4.4	4.7	4.8
District (Million US$)	81.7	114.1	75.7	83.8	87.0
Donor Agency (Million US$)	3.9	3.8	0.5	9.7	12.3
Funding Gap (with secured funds only) (Million US$)	0.0	-8.7	42.8	49.2	55.9
% of Total Needs	0	-4	24	25	25
Total Probable Financing (Million US$)	0.0	27.5	42.8	49.2	55.9
Central (Million US$)	0.0	0.8	9.9	10.9	11.9
Province (Million US$)	0.0	9.0	13.7	16.0	18.3
District (Million US$)	0.0	16.0	19.2	22.3	25.6
Donor Agency (Million US$)	0.0	1.7	0.0	0.0	0.0
Funding Gap with secured&probable funds) (Million US$)	0.0	-36.2	0.0	0.0	0.0

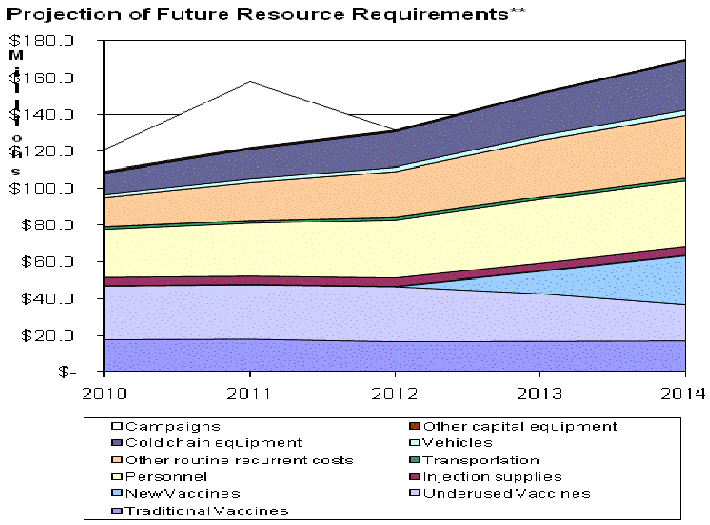
Vaccine supplies for year 2010-2014 accounted for 26% - 33% of total program costs, while personel cost (including share cost) is estimated around 35% - 43.3%. Proportion of shared cost is relatively high because at the health center level the program is run by the midwives (in total there are 145,000 midwives) who have multi tasks and responsibilities inlcuding MCH and other public health program activities.

Secured funds from central budget in 2010 is approximately 38.1 % and in 2014 will be decreased to around 27.1%. Contribution from province governments is predicted to decrease. Provincial government contribution will decrease from 7.8 % to 2.2 % also district government contribution

will decrease from 51.6% to 31.6% in 2010-2014. Donor contribution is expected to reach 2.5% - 5.6% of the total secured cost.

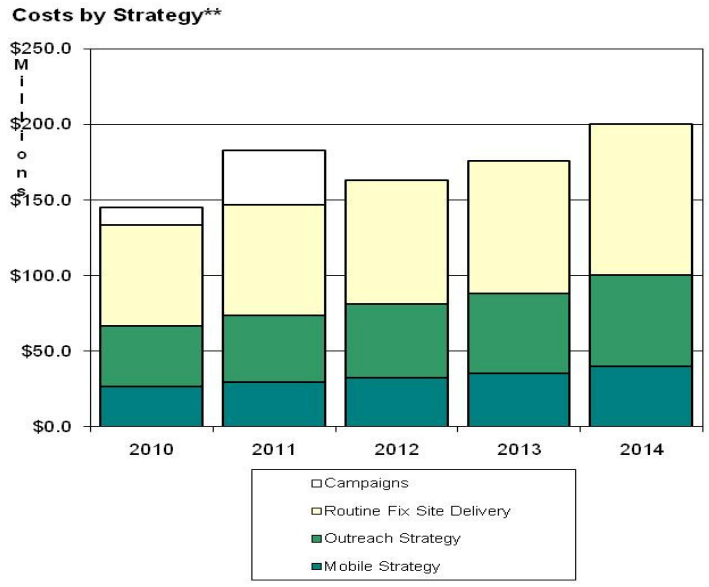
Graph 14 shows projection of future resource needed for the next 5 year.

Graph 14. Estimated cost for EPI 2010-2014



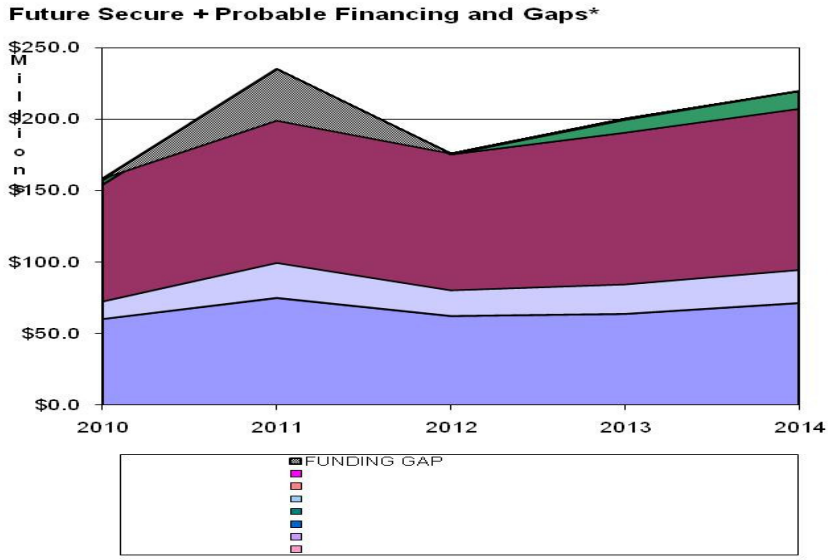
Additional support is expected because in 2013 the Government plans to introduce the new vaccines in stages: DTP/HB/ Hib (pentavalent), while underused vaccines, such as HB Uniject is still maintained. Most of the activities for the introduction of new vaccines are conducting studies (disease burden and CEA) and pilot project in several provinces.

Graph 15. Estimated cost needed for EPI by type of activity 2010-2014



With prospect of receiving more funds (or 'probable'), funding gap still remain (graph 16). Obviously systematic advocacy and socialization of the program are critical to achieve the goal of EPI .

Graph 16. Estimated cost (secure + probable) for EPI and funding gap



The main source would be government, both central and sub-national. GAVI funds is also expected to support introduction of new vaccine (Hib). Assessment on Hib has been done for many years in various region. To support routine activities (operational and handling costs), local government is expected to provide adequate funds. However, variation of the fiscal capacity amongst the district/ municipality would affect availability of the funds. Rich districts would find no significant problem in providing support for health sector while districts with limited resources would face challenges to maintain the health programs. In addition to that, imunization program has to compete with other program or even health program activities to obtain adequate funds from local government. Advocacy is certainly needed to convince all stakeholders to support and ensure sustainability of EPI in Indonesia.

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ANNEX

Annex 1. Past and Future Financing of Multi Year Plan EPI Indonesia, 2009 - 2014

	Costs	Future Cost Projections				
Cost Category	**2009**	**2010**	**2011**	**2012**	**2013**	**2014**
Routine Recurrent Costs	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**
Vaccines (routine vaccines only)	$40,987,540	$47,357,457	$48,002,411	$46,962,339	$55,034,080	$63,748,369
Traditional	$17,677,171	$18,300,739	$18,540,657	$17,168,468	$17,395,195	$17,656,948
Underused	$23,310,369	$29,056,718	$29,461,753	$29,793,870	$25,728,961	$19,414,783
New					$11,909,924	$26,676,638
Injection supplies	$8,286,424	$4,159,201	$4,213,072	$4,251,715	$4,301,934	$4,362,287
Personnel	$25,065,526	$26,306,817	$29,172,292	$32,039,553	$34,984,619	$36,413,067
Transportation	$1,432,421	$1,461,069	$1,490,291	$1,520,097	$1,550,499	$1,581,509
Maintenance and overhead	$4,403,255	$6,921,480	$9,788,575	$12,133,202	$14,520,982	$17,193,910
Short-term training			$350,451		$757,458	
IEC/social mobilization	$1,689,979	$1,896,156	$2,127,487	$3,161,717	$4,269,337	$4,576,735
Disease surveillance	$2,848,242	$3,195,728	$3,585,606	$4,057,413	$4,587,167	$5,159,332
Programme management	$3,866,445	$4,338,151	$4,867,405	$5,461,229	$6,127,499	$6,875,054
Other routine recurrent costs		$18,140	$20,353	$22,836	$25,622	$28,748
Subtotal	**$88,579,832**	**$95,654,199**	**$103,617,943**	**$109,610,101**	**$126,159,195**	**$139,939,010**
Routine Capital Costs						
Vehicles	$1,547,274	$1,744,640	$2,120,127	$2,469,889	$2,815,531	$3,039,546
Cold chain equipment	$6,863,409	$11,560,168	$15,795,985	$19,019,846	$22,859,046	$26,843,872
Other capital equipment	$154,737	$645,606	$645,606	$645,606	$645,606	$645,606
Subtotal	**$8,565,420**	**$13,950,415**	**$18,561,719**	**$22,135,341**	**$26,320,184**	**$30,529,024**
Campaign Costs						
Polio Campaign for 0 - 59 months	$3,568,456	$5,039,121	$16,923,257			
Measles Campaign for 9 - 59 months	$2,157,145	$5,558,763	$19,294,472			
MNT Campaign		$1,006,294				
Subtotal	**$5,725,601**	**$11,604,178**	**$36,217,729**			
Shared Health Systems Costs						
Shared personnel costs	$34,278,032	$35,328,861	$38,761,674	$42,314,293	$45,995,826	$47,313,181
Shared transportation costs						
Construction of new buildings	$1,689,768	$1,723,564	$1,758,035	$1,793,196	$1,829,060	$1,865,641
Subtotal	**$35,967,800**	**$37,052,425**	**$40,519,709**	**$44,107,488**	**$47,824,886**	**$49,178,821**
GRAND TOTAL	**$138,838,653**	**$158,261,217**	**$198,917,100**	**$175,852,931**	**$200,304,264**	**$219,646,855**
Routine Immunization	**$133,113,052**	**$146,657,039**	**$162,699,370**	**$175,852,931**	**$200,304,264**	**$219,646,855**
Supplemental Immunization Activities	**$5,725,601**	**$11,604,178**	**$36,217,729**			

ANNEX 2. Financing of Multi Year Plan EPI Indonesia 2009

Cost Category	APBN/Goverment	APBD I/Provincial Budget	APBD II/District Budget	Gov. Co-Financing of GAVI Vaccine	GAVI	WHO	UNICEF
Routine Recurrent Costs	US$	US$	US$	US$	US$	US$	US$
Vaccines (routine vaccines only)							
Traditional	$ 17,677,171						
Underused	$ 22,158,369				$ 1,152,000		
New	$ -						
Injection supplies	$ 6,629,139	$ 828,642	$ 828,642				
Personnel							
Salaries of full-time NIP health workers (immunization specific)	$ 48,243	$ 494,495	$ 5,487,693				
Per-diems for outreach vaccinators/mobile teams	$ 15,488	$ 464,654	$ 14,233,898		$ 774,423		
Per-diems for supervision and monitoring	$ 31,920	$ 379,490	$ 2,425,896		$ 709,326		
Transportation							
Fix site strategy (incl. vaccine distribution)		$ 79,579	$ 716,211				
Outreach and mobile strategy		$ 127,326	$ 509,305				
Maintenance and overhead							
Cold chain maintenance and overheads	$ 1,874,592	$ 647,247	$ 647,247		$ 67,149		
Maintenance of other capital equipment	$ 2,095	$ 7,333	$ 36,636		$ 6,313		
Building overheads (electricity, water...)	$ 22,293	$ 178,343	$ 914,007				
Short-term training							
IEC/social mobilization	$ 74,359	$ 349,826	$ 1,096,796				$ 168,998
Disease surveillance	$ 569,648	$ 854,473	$ 1,424,121				
Programme management	$ 541,302	$ 811,953	$ 1,146,687		$ 1,159,933	$ 142,976	$ 63,593
Other routine recurrent costs							
Subtotal	**$ 49,644,621**	**$ 5,223,361**	**$ 29,467,139**	**$ -**	**$ 3,869,145**	**$ 142,976**	**$ 232,591**
Routine Capital Costs							
Vehicles	$ 309,455	$ 464,182	$ 773,637				
Cold chain equipment	$ 1,372,682	$ 2,059,023	$ 3,431,705				
Other capital equipment	$ 30,375	$ 46,421	$ 77,368		$ 572		
Subtotal	**$ 1,712,512**	**$ 2,569,626**	**$ 4,282,710**	**$ -**	**$ 572**	**$ -**	**$ -**
Campaign Costs							
Polio Campaign for 0 - 59 months							
Vaccines and Injection Supplies	$ 1,794,799						
Operational costs		$ 354,731	$ 24,039			$ 1,394,887	
Measles Campaign for 9 - 59 months							
Vaccines and Injection Supplies	$ 2,157,145						
Operational costs							
MNT Campaign							
Vaccines and Injection Supplies							
Operational costs							
Subtotal	**$ 3,951,944**	**$ 354,731**	**$ 24,039**	**$ -**	**$ -**	**$ 1,394,887**	**$ -**
Shared Health Systems Costs							
Shared personnel costs	$ 1,371	$ 97,692	$ 34,178,969				
Shared transportation costs							
Construction of new buildings	$ 168,977	$ 506,931	$ 1,013,861				
Subtotal Optional	**$ 170,348**	**$ 604,623**	**$ 35,192,830**	**$ -**	**$ -**	**$ -**	**$ -**
GRAND TOTAL	**$ 55,479,424**	**$ 8,752,341**	**$ 68,966,717**	**$ -**	**$ 3,869,717**	**$ 1,537,863**	**$ 232,591**
Routine Immunization	**$ 51,527,480**	**$ 8,397,610**	**$ 68,942,678**	**$ -**	**$ 3,869,717**	**$ 142,976**	**$ 232,591**
Supplemental Immunization Activities	**$ 3,951,944**	**$ 354,731**	**$ 24,039**	**$ -**	**$ -**	**$ 1,394,887**	**$ -**

Total Secure Funding	**$ 55,479,424**	**$ 8,752,341**	**$ 68,966,717**	**$ -**	**$ 3,869,717**	**$ 1,537,863**	**$ 232,591**
Total Probable Funding	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

Annex 3. Future Financing of Multi Year Plan EPI Indonesia 2010

Cost Category	APBN/Goverment	APBD I/Provincial Budget	APBD II/District Budget	Gov. Co-Financing of GAVI Vaccine	GAVI	WHO	UNICEF
Routine Recurrent Costs	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**
Vaccines (routine vaccines only)							
Traditional	$ 18,300,739						
Underused	$ 29,056,718						
New	$ -						
Injection supplies	$ 3,327,361	$ 415,920	$ 415,920				
Personnel							
Salaries of full-time NIP health workers (immunization specific)	$ 51,125	$ 524,034	$ 5,815,503				
Per-diems for outreach vaccinators/mobile teams	$ 16,175	$ 485,264	$ 14,865,268		$ 808,774		
Per-diems for supervision and monitoring	$ 33,666	$ 400,252	$ 2,558,620		$ 748,135		
Transportation							
Fix site strategy (incl. vaccine distribution)		$ 81,171	$ 730,535				
Outreach and mobile strategy		$ 129,873	$ 519,491				
Maintenance and overhead							
Cold chain maintenance and overheads	$ 3,225,598	$ 1,075,199	$ 1,075,199				
Maintenance of other capital equipment	$ 16,342	$ 57,197	$ 335,008				
Building overheads (electricity, water...)	$ 22,739	$ 181,910	$ 932,288				
Short-term training							
IEC/social mobilization	$ 83,431	$ 392,504	$ 1,230,605				$ 189,616
Disease surveillance	$ 639,146	$ 958,718	$ 1,597,864				
Programme management	$ 607,341	$ 911,012	$ 1,375,377		$ 1,301,445	$ 142,976	
Other routine recurrent costs			$ 18,140				
Subtotal	**$ 55,380,381**	**$ 5,613,054**	**$ 31,469,818**	**$ -**	**$ 2,858,354**	**$ 142,976**	**$ 189,616**
Routine Capital Costs							
Vehicles	$ 348,928	$ 523,392	$ 872,320				
Cold chain equipment	$ 2,312,034	$ 3,468,050	$ 5,780,084				
Other capital equipment	$ 129,121	$ 193,682	$ 322,803				
Subtotal	**$ 2,790,083**	**$ 4,185,124**	**$ 6,975,207**	**$ -**	**$ -**	**$ -**	**$ -**
Campaign Costs							
Polio Campaign for 0 - 59 months							
Vaccines and Injection Supplies	$ 731,038						
Operational costs		$ 861,617	$ 2,946,467			$ 300,000	$ 200,000
Measles Campaign for 9 - 59 months							
Vaccines and Injection Supplies	$ 1,250,679						
Operational costs		$ 861,617	$ 3,246,467			$ 200,000	
MNT Campaign							
Vaccines and Injection Supplies		$ 37,535	$ 150,139				
Operational costs		$ 163,724	$ 654,897				
Subtotal	**$ 1,981,716**	**$ 1,924,492**	**$ 6,997,969**	**$ -**	**$ -**	**$ 500,000**	**$ 200,000**
Shared Health Systems Costs							
Shared personnel costs	$ 1,413	$ 100,687	$ 35,226,761				
Shared transportation costs	$ -	$ -	$ -				
Construction of new buildings	$ 172,356	$ 517,069	$ 1,034,138				
Subtotal Optional	**$ 173,770**	**$ 617,756**	**$ 36,260,899**	**$ -**	**$ -**	**$ -**	**$ -**
GRAND TOTAL	**$ 60,325,950**	**$ 12,340,427**	**$ 81,703,894**	**$ -**	**$ 2,858,354**	**$ 642,976**	**$ 389,616**
Routine Immunization	**$ 58,344,233**	**$ 10,415,935**	**$ 74,705,925**	**$ -**	**$ 2,858,354**	**$ 142,976**	**$ 189,616**
Supplemental Immunization Activities	**$ 1,981,716**	**$ 1,924,492**	**$ 6,997,969**	**$ -**	**$ -**	**$ 500,000**	**$ 200,000**

Total Secure Funding	**$ 60,325,950**	**$ 12,340,427**	**$ 81,703,894**	**$ -**	**$ 2,858,354**	**$ 642,976**	**$ 389,616**
Total Probable Funding	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

Total Secure Funding (excl. shared costs/financing)	**$ 60,152,180**	**$ 11,722,671**	**$ 45,442,995**	**$ -**	**$ 2,858,354**	**$ 642,976**	**$ 389,616**
Total Probable Funding (excl. shared costs/financing)	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

Annex 4. Future Financing of Multi Year Plan EPI Indonesia 2011

Cost Category	APBN/Goverment	APBD I/Provincial Budget	APBD II/District Budget	Gov. Co-Financing of GAVI Vaccine	GAVI	WHO	UNICEF
Routine Recurrent Costs	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**
Vaccines (routine vaccines only)							
Traditional	$ 18,540,657						
Underused	$ 29,461,753						
New	$ -						
Injection supplies	$ 3,370,458	$ 421,307	$ 421,307				
Personnel							
Salaries of full-time NIP health workers (immunization specific)	$ 54,331	$ 556,893	$ 6,180,158				
Per-diems for outreach vaccinators/mobile teams	$ 18,455	$ 553,641	$ 16,959,872		$ 922,735		
Per-diems for supervision and monitoring	$ 35,336	$ 420,104	$ 2,685,525		$ 785,241		
Transportation							
Fix site strategy (incl. vaccine distribution)		$ 82,794	$ 745,145				
Outreach and mobile strategy		$ 132,470	$ 529,881				
Maintenance and overhead							
Cold chain maintenance and overheads	$ 4,345,865	$ 1,448,622	$ 1,448,622				
Maintenance of other capital equipment	$ 55,432	$ 194,011	$ 1,136,349				
Building overheads (electricity, water…)	$ 23,193	$ 185,548	$ 950,933				
Short-term training	$ 350,451						
IEC/social mobilization	$ 93,609	$ 440,390	$ 1,380,739				$ 212,749
Disease surveillance	$ 717,121	$ 1,075,682	$ 1,792,803				
Programme management	$ 681,437	$ 1,022,155	$ 1,703,592		$ 1,460,222		
Other routine recurrent costs			$ 20,353				
Subtotal	**$ 57,748,099**	**$ 6,533,617**	**$ 35,955,280**	**$ -**	**$ 3,168,198**	**$ -**	**$ 212,749**
Routine Capital Costs							
Vehicles	$ 424,025	$ 636,038	$ 1,060,064				
Cold chain equipment	$ 3,159,197	$ 4,738,796	$ 7,897,993				
Other capital equipment	$ 129,121	$ 193,682	$ 322,803				
Subtotal	**$ 3,712,344**	**$ 5,568,516**	**$ 9,280,859**	**$ -**	**$ -**	**$ -**	**$ -**
Campaign Costs							
Polio Campaign for 0 - 59 months							
Vaccines and Injection Supplies	$ 2,413,826						
Operational costs		$ 2,901,886	$ 11,099,715			$ 362,736	$ 145,094
Measles Campaign for 9 - 59 months							
Vaccines and Injection Supplies	$ 4,274,847						
Operational costs		$ 3,003,925	$ 11,490,013			$ 375,491	$ 150,196
MNT Campaign							
Vaccines and Injection Supplies							
Operational costs							
Subtotal	**$ 6,688,672**	**$ 5,905,811**	**$ 22,589,729**	**$ -**	**$ -**	**$ 738,226**	**$ 295,291**
Shared Health Systems Costs							
Shared personnel costs	$ 1,550	$ 110,471	$ 38,649,652				
Shared transportation costs							
Construction of new buildings	$ 175,804	$ 527,411	$ 1,054,821				
Subtotal Optional	**$ 177,354**	**$ 637,881**	**$ 39,704,473**	**$ -**	**$ -**	**$ -**	**$ -**
GRAND TOTAL	**$ 68,326,469**	**$ 18,645,826**	**$ 107,530,341**	**$ -**	**$ 3,168,198**	**$ 738,226**	**$ 508,039**
Routine Immunization	**$ 61,637,796**	**$ 12,740,014**	**$ 84,940,613**	**$ -**	**$ 3,168,198**	**$ -**	**$ 212,749**
Supplemental Immunization Activities	**$ 6,688,672**	**$ 5,905,811**	**$ 22,589,729**	**$ -**	**$ -**	**$ 738,226**	**$ 295,291**

Total Secure Funding	**$ 74,240,665**	**$ 15,514,327**	**$ 114,071,794**	**$ -**	**$ 1,707,976**	**$ 1,476,453**	**$ 590,581**
Total Probable Funding	**$ 774,476**	**$ 9,037,310**	**$ 16,048,276**	**$ -**	**$ 1,460,222**	**$ -**	**$ 212,749**

Total Secure Funding (excl. shared costs/financing)	**$ 74,063,311**	**$ 14,876,445**	**$ 74,367,321**	**$ -**	**$ 1,707,976**	**$ 1,476,453**	**$ 590,581**
Total Probable Funding (excl. shared costs/financing)	**$ 774,476**	**$ 9,037,310**	**$ 16,048,276**	**$ -**	**$ 1,460,222**	**$ -**	**$ 212,749**

Annex 5. Future Financing of Multi Year Plan EPI Indonesia 2012

Cost Category	APBN/Goverment	APBD I/Provincial Budget	APBD II/District Budget	Gov. Co-Financing of GAVI Vaccine	GAVI	WHO	UNICEF
Routine Recurrent Costs	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**
Vaccines (routine vaccines only)							
Traditional	$ 17,168,468						
Underused	$ 29,793,870						
New	$ -						
Injection supplies	$ 3,401,372	$ 425,172	$ 425,172				
Personnel							
Salaries of full-time NIP health workers (immunization specific)	$ 57,448	$ 588,843	$ 6,534,721				
Per-diems for outreach vaccinators/mobile teams	$ 20,762	$ 1,660,921	$ 19,079,835				
Per-diems for supervision and monitoring	$ 36,873	$ 1,257,786	$ 2,802,363				
Transportation							
Fix site strategy (incl. vaccine distribution)		$ 84,450	$ 760,048				
Outreach and mobile strategy		$ 135,120	$ 540,479				
Maintenance and overhead							
Cold chain maintenance and overheads	$ 5,183,648	$ 1,727,883	$ 1,727,883				
Maintenance of other capital equipment	$ 92,437	$ 323,529	$ 1,894,955				
Building overheads (electricity, water...)	$ 23,657	$ 189,259	$ 969,952				
Short-term training							
IEC/social mobilization	$ 139,116	$ 654,475	$ 2,051,954				$ 316,172
Disease surveillance	$ 811,483	$ 1,217,224	$ 2,028,707				
Programme management	$ 1,092,246	$ 2,457,553	$ 1,768,454			$ 142,976	
Other routine recurrent costs			$ 22,836				
Subtotal	**$ 57,821,380**	**$ 10,722,214**	**$ 40,607,359**	**$ -**	**$ -**	**$ 142,976**	**$ 316,172**
Routine Capital Costs							
Vehicles	$ 493,978	$ 740,967	$ 1,234,945				
Cold chain equipment	$ 3,803,969	$ 5,705,954	$ 9,509,923				
Other capital equipment	$ 129,121	$ 193,682	$ 322,803				
Subtotal	**$ 4,427,068**	**$ 6,640,602**	**$ 11,067,671**	**$ -**	**$ -**	**$ -**	**$ -**
Campaign Costs							
Polio Campaign for 0 - 59 months							
Vaccines and Injection Supplies							
Operational costs							
Measles Campaign for 9 - 59 months							
Vaccines and Injection Supplies							
Operational costs							
MNT Campaign							
Vaccines and Injection Supplies							
Operational costs							
Subtotal	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**
Shared Health Systems Costs							
Shared personnel costs	$ 1,693	$ 120,596	$ 42,192,004				
Shared transportation costs	$ -	$ -	$ -				
Construction of new buildings	$ 179,320	$ 537,959	$ 1,075,917				
Subtotal Optional	**$ 181,012**	**$ 658,554**	**$ 43,267,922**	**$ -**	**$ -**	**$ -**	**$ -**
GRAND TOTAL	**$ 62,429,460**	**$ 18,021,371**	**$ 94,942,952**	**$ -**	**$ -**	**$ 142,976**	**$ 316,172**
Routine Immunization	**$ 62,429,460**	**$ 18,021,371**	**$ 94,942,952**	**$ -**	**$ -**	**$ 142,976**	**$ 316,172**
Supplemental Immunization Activities	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

Total Secure Funding	**$ 52,558,176**	**$ 4,355,364**	**$ 75,701,545**	**$ -**	**$ -**	**$ 142,976**	**$ 316,172**
Total Probable Funding	**$ 9,871,284**	**$ 13,666,007**	**$ 19,241,407**	**$ -**	**$ -**	**$ -**	**$ -**

Total Secure Funding (excl. shared costs/financing)	**$ 52,377,163**	**$ 3,696,809**	**$ 32,433,623**	**$ -**	**$ -**	**$ 142,976**	**$ 316,172**
Total Probable Funding (excl. shared costs/financing)	**$ 9,871,284**	**$ 13,666,007**	**$ 19,241,407**	**$ -**	**$ -**	**$ -**	**$ -**

Annex 6. Future Financing of Multi Year Plan EPI Indonesia 2013

Cost Category	APBN/Goverment	APBD I/Provincial Budget	APBD II/District Budget	Gov. Co-Financing of GAVI Vaccine	GAVI	WHO	UNICEF
Routine Recurrent Costs	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**	**US$**
Vaccines (routine vaccines only)							
Traditional	$ 17,395,195						
Underused	$ 25,728,961						
New	$ 3,222,853				$ 8,687,071		
Injection supplies	$ 3,268,278	$ 408,535	$ 408,535		$ 216,586		
Personnel							
Salaries of full-time NIP health workers (immunization specific)	$ 60,736	$ 622,548	$ 6,908,768				
Per-diems for outreach vaccinators/mobile teams	$ 23,134	$ 1,850,733	$ 21,260,297				
Per-diems for supervision and monitoring	$ 38,326	$ 1,307,329	$ 2,912,747				
Transportation							
Fix site strategy (incl. vaccine distribution)		$ 86,139	$ 775,249				
Outreach and mobile strategy		$ 137,822	$ 551,288				
Maintenance and overhead							
Cold chain maintenance and overheads	$ 6,219,352	$ 2,073,117	$ 2,073,117				
Maintenance of other capital equipment	$ 117,955	$ 412,842	$ 2,418,073				
Building overheads (electricity, water…)	$ 24,131	$ 193,044	$ 989,351				
Short-term training						$ 757,458	
IEC/social mobilization	$ 187,851	$ 883,753	$ 3,197,733				
Disease surveillance	$ 917,433	$ 1,376,150	$ 2,293,584				
Programme management	$ 1,225,500	$ 2,757,374	$ 2,144,625				
Other routine recurrent costs			$ 25,622				
Subtotal	**$ 58,429,705**	**$ 12,109,387**	**$ 45,958,989**	**$ -**	**$ 8,903,657**	**$ 757,458**	**$ -**
Routine Capital Costs							
Vehicles	$ 563,106	$ 844,659	$ 1,407,766				
Cold chain equipment	$ 4,571,809	$ 6,857,714	$ 11,429,523				
Other capital equipment	$ 129,121	$ 193,682	$ 322,803				
Subtotal	**$ 5,264,037**	**$ 7,896,055**	**$ 13,160,092**	**$ -**	**$ -**	**$ -**	**$ -**
Campaign Costs							
Polio Campaign for 0 - 59 months							
Vaccines and Injection Supplies							
Operational costs							
Measles Campaign for 9 - 59 months							
Vaccines and Injection Supplies							
Operational costs							
MNT Campaign							
Vaccines and Injection Supplies							
Operational costs							
Subtotal	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**
Shared Health Systems Costs							
Shared personnel costs	$ 1,840	$ 131,088	$ 45,862,898				
Shared transportation costs	$ -	$ -	$ -				
Construction of new buildings	$ 182,906	$ 548,718	$ 1,097,436				
Subtotal Optional	**$ 184,746**	**$ 679,806**	**$ 46,960,334**	**$ -**	**$ -**	**$ -**	**$ -**
GRAND TOTAL	**$ 63,878,488**	**$ 20,685,248**	**$ 106,079,414**	**$ -**	**$ 8,903,657**	**$ 757,458**	**$ -**
Routine Immunization	**$ 63,878,488**	**$ 20,685,248**	**$ 106,079,414**	**$ -**	**$ 8,903,657**	**$ 757,458**	**$ -**
Supplemental Immunization Activities	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**
Total Secure Funding	**$ 53,015,389**	**$ 4,653,461**	**$ 83,754,691**	**$ -**	**$ 8,903,657**	**$ 757,458**	**$ -**
Total Probable Funding	**$ 10,863,099**	**$ 16,031,787**	**$ 22,324,723**	**$ -**	**$ -**	**$ -**	**$ -**
Total Secure Funding (excl. shared costs/financing)	**$ 52,830,643**	**$ 3,973,655**	**$ 36,794,357**	**$ -**	**$ 8,903,657**	**$ 757,458**	**$ -**
Total Probable Funding (excl. shared costs/financing)	**$ 10,863,099**	**$ 16,031,787**	**$ 22,324,723**	**$ -**	**$ -**	**$ -**	**$ -**

Annex 7. Future Financing of Multi Year Plan EPI Indonesia 2014

Cost Category	APBN/Goverment	APBD I/Provincial Budget	APBD II/District Budget	Gov. Co-Financing of GAVI Vaccine	GAVI	WHO	UNICEF
Routine Recurrent Costs	US$	US$	US$	US$	US$	US$	US$
Vaccines (routine vaccines only)							
Traditional	$ 17,656,948						
Underused	$ 19,414,783						
New	$ 14,665,220				$ 12,011,418		
Injection supplies	$ 3,221,853	$ 402,732	$ 402,732		$ 334,971		
Personnel							
Salaries of full-time NIP health workers (immunization specific)	$ 64,384	$ 659,931	$ 7,323,629				
Per-diems for outreach vaccinators/mobile teams	$ 23,929	$ 1,914,283	$ 21,990,321				
Per-diems for supervision and monitoring	$ 39,929	$ 1,362,034	$ 3,034,629				
Transportation							
Fix site strategy (incl. vaccine distribution)		$ 87,862	$ 790,754				
Outreach and mobile strategy		$ 140,579	$ 562,314				
Maintenance and overhead							
Cold chain maintenance and overheads	$ 7,292,550	$ 2,430,850	$ 2,430,850				
Maintenance of other capital equipment	$ 152,360	$ 533,260	$ 3,123,383				
Building overheads (electricity, water…)	$ 24,613	$ 196,905	$ 1,009,138				
Short-term training							
IEC/social mobilization	$ 201,376	$ 947,384	$ 3,427,974				
Disease surveillance	$ 1,031,866	$ 1,547,800	$ 2,579,666				
Programme management	$ 1,375,011	$ 3,093,774	$ 2,406,269				
Other routine recurrent costs			$ 28,748				
Subtotal	**$ 65,164,822**	**$ 13,317,393**	**$ 49,110,406**	**$ -**	**$ 12,346,389**	**$ -**	**$ -**
Routine Capital Costs							
Vehicles	$ 607,909	$ 911,864	$ 1,519,773				
Cold chain equipment	$ 5,368,774	$ 8,053,162	$ 13,421,936				
Other capital equipment	$ 129,121	$ 193,682	$ 322,803				
Subtotal	**$ 6,105,805**	**$ 9,158,707**	**$ 15,264,512**	**$ -**	**$ -**	**$ -**	**$ -**
Campaign Costs							
Polio Campaign for 0 - 59 months							
Vaccines and Injection Supplies							
Operational costs							
Measles Campaign for 9 - 59 months							
Vaccines and Injection Supplies							
Operational costs							
MNT Campaign							
Vaccines and Injection Supplies							
Operational costs							
Subtotal	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**
Shared Health Systems Costs							
Shared personnel costs	$ 1,893	$ 134,843	$ 47,176,445				
Shared transportation costs	$ -	$ -	$ -				
Construction of new buildings	$ 186,564	$ 559,692	$ 1,119,385				
Subtotal Optional	**$ 188,457**	**$ 694,535**	**$ 48,295,830**	**$ -**	**$ -**	**$ -**	**$ -**
GRAND TOTAL	**$ 71,459,083**	**$ 23,170,635**	**$ 112,670,748**	**$ -**	**$ 12,346,389**	**$ -**	**$ -**
Routine Immunization	**$ 71,459,083**	**$ 23,170,635**	**$ 112,670,748**	**$ -**	**$ 12,346,389**	**$ -**	**$ -**
Supplemental Immunization Activities	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**	**$ -**

Total Secure Funding	**$ 59,523,172**	**$ 4,827,687**	**$ 87,032,827**	**$ -**	**$ 12,346,389**	**$ -**	**$ -**
Total Probable Funding	**$ 11,935,911**	**$ 18,342,947**	**$ 25,637,922**	**$ -**	**$ -**	**$ -**	**$ -**

Total Secure Funding (excl. shared costs/financing)	**$ 59,334,715**	**$ 4,133,153**	**$ 38,736,997**	**$ -**	**$ 12,346,389**	**$ -**	**$ -**
Total Probable Funding (excl. shared costs/financing)	**$ 11,935,911**	**$ 18,342,947**	**$ 25,637,922**	**$ -**	**$ -**	**$ -**	**$ -**