

**Role of national and sub-national level preparedness.
Surveillance system for border region**

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- I. Introduction
- II. Role of national and sub-national level prepared and stockpile (PH&VH)
- III. Surveillance system for border region
 - Cambodia
 - Myanmar
 - Thailand
 - Vietnam

Mission

Features

Faculty

About us

Introduction

Purpose



I. Introduction

- The emerging and re-emerging disease pose a major threat to the world population.
- There is no single country in the world who can deal with those emerging and re-emerging disease alone.
- In this context, the Mekong Basin Disease Surveillance (MBDS) network renewed and signed a Memorandum of Understanding (MoU) to enhance disease surveillance and response across the border in 2015.

I. Introduction

- The biosafety manual to enhance biosafety procedures at Points of Entry (POE) includes the topics as below:
 - Basic knowledge for Biosafety
 - Infection Prevention Control (IPC) of Health Care Facility in Cross Border
 - Waste disposal
 - Incident, accident preparedness and response
 - Role of national / sub national level Preparedness and Stockpile
 - Surveillance system for border region (WHO-DO- What-When)
 - Biosafety poster for Sub-National Health Care Personnel

I. Introduction

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 - Basic knowledge for Biosafety
 - Infection Prevention Control (IPC) of Health Care Facility in Cross Border
 - Waste disposal
 - Incident, accident preparedness and response
 - **Role of national / sub national level Preparedness and Stockpile**
 - **Surveillance system for border region (WHO-DO- What-When)**
 - Biosafety poster for Sub-National Health Care Personnel

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II. Role of national and sub-national level

- The role of national and sub-national to support the work at cross border check point is vital.
- The annual planning at national and sub national level should incorporate the needs in terms of materials and reagents used at the cross border check point.

II. Role of national and sub-national level

- The national and sub national level should establish a system monitoring the stockpile of reagents, drugs, PPE need to be used at the cross border check point.
- The use of materials, reagents as well as expenditures at the health unit of the cross border check point should be incorporated into the planning and procurement unit/division at national and sub-national levels.

SURVEILLANCE

III. Surveillance system for border region **Cambodia**

Mechanism:

- The existing focal points of the surveillance of each province shall be responsible to report the public health events required by the International Health Regulation (2005).
- They shall also report as well the events with high or very high risk to their partners as well.
- The information sharing shall be formal or informal ways.

III. Surveillance system for border region **Cambodia**

Mechanism:

- The information sharing should follow the national policy or authorized by the senior Ministry of Health or provincial governor depending on the internal rule of each country.
- The information shall content level of risk (risk assessment), time, place and person and public health actions.

III. Surveillance system for border region **Cambodia**

- The diseases that are mentioned in the IHR shall be included like measles, anthrax, yellow fever, small pox, Zika virus, Mers-CoV,.....
- For example, one case of measles in Cambodia shall be reported and investigated as Cambodia already got the measles elimination certificate from WHO.

III. Surveillance system for border region **Cambodia**

List of some diseases:

- Influenza of new subtype: Positive results from polymerase chain reaction (PCR), virus isolation, or paired acute and convalescent serologic tests
- Poliomyelitis (Wild-type): A suspected case is defined as a child under 15 years of age presenting with acute flaccid paralysis (AFP2), or as any person at any age with paralytic illness if poliomyelitis is suspected

III. Surveillance system for border region **Cambodia**

List of some diseases:

- Yellow fever:

Suspected: A case that is characterized by acute onset of fever followed by jaundice within two weeks of the onset of the first symptoms

Confirmed: A suspected case that is laboratory-confirmed or epidemiologically linked to a laboratory-confirmed case or outbreak

III. Surveillance system for border region **Cambodia**

List of some diseases:

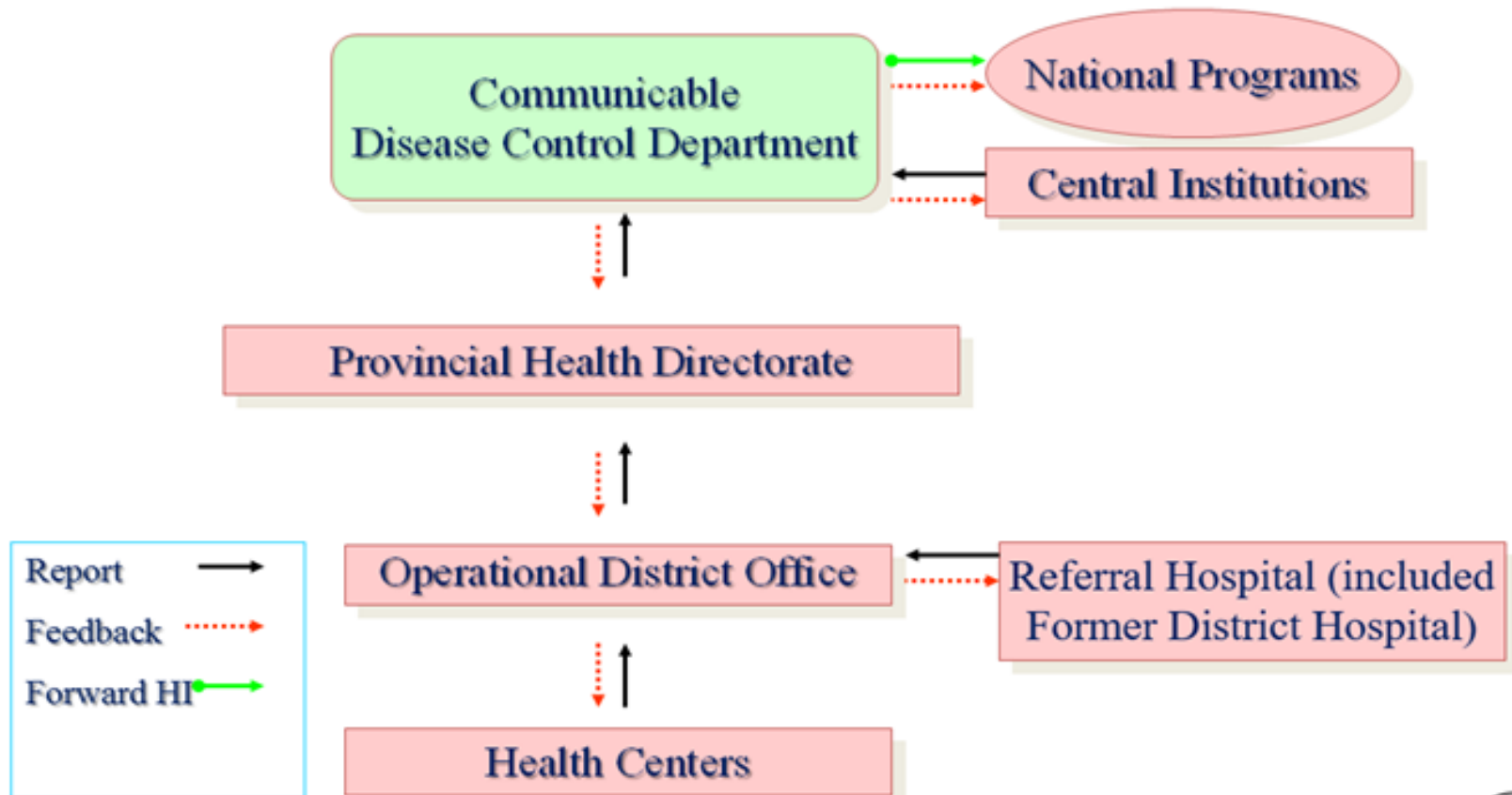
- Zika virus:

Suspected case: A person presenting with rash and/or fever and at least one of the following signs or symptoms: arthralgia; or arthritis; or conjunctivitis (non-purulent/hyperaemic).

Confirmed case: A person with laboratory confirmation of recent Zika virus infection.

III. Surveillance system for border region Cambodia

Flow of Alert Report (Cambodia)



III. Surveillance system for border region Myanmar

Mechanism:

- The guidance from the Ministry of Health and Sports, the Central Epidemiology Unit (CEU), acts as the National Focal Point for the Communicable Disease Surveillance and Response in collaboration with related ministries, departments and organizations.
- National Surveillance System focuses on surveillance of the epidemic prone communicable diseases, Diseases Under National Surveillance (DUNS), emerging infectious diseases, post disaster communicable diseases, climate related communicable diseases and vaccine preventable diseases.

III. Surveillance system for border region Myanmar

Mechanism:

- Diseases Surveillance and response by Central Epidemiology Unit include Preparedness and Response to emergence and re-emergence of infectious diseases and biology surveillance including Ebola Virus Disease, H7N9 and MERS-CoV.
- Under the technical supervision from Central Epidemiology Unit (CEU) each state/ regional levels have Special Disease Control Teams and Myanmar have 17 SCDU teams and focal points for diseases surveillance at State and Regional Levels.

III. Surveillance system for border region Myanmar

List of some diseases:

- Diarrhoea

Diarrhoea (mild) referred to patients with history of passage of 3 or more loose or liquid stool in the past 24 hours without dehydration or with some dehydration.

Diarrhoea (severe) referred to patients passing watery stools with symptoms of severe dehydration, such as thirst, sunken eyes, reduced urine output and very slow skin pinch.

- Dysentery referred to patients with bloody or mucoid stools and abdominal cramps.

III. Surveillance system for border region

Myanmar

List of some diseases:

- Food poisoning referred to occurrence of within a variable but usually short time period after consumption of contaminated food presenting with severe nausea, abdominal cramps, vomiting and prostration accompanied by diarrhea and dizziness, shock, unconsciousness and death.
- Typhoid fever is a systemic bacterial disease with insidious onset of sustained fever with constipation more often than diarrhea, abdominal discomfort, altered mental status, intestinal haemorrhage with black tarry stool or bloody diarrhea (dark or fresh blood in the stool).

III. Surveillance system for border region Myanmar

List of some diseases:

- Measles: referred to patients with following symptoms: fever; generalized maculopapular (i.e. non-vesicular) rash; cough, coryza (i.e. runny nose) or conjunctivitis (i.e. red eyes)
- Diphtheria: referred to patients with following symptoms: fever (sometimes high fever); loss of appetite and sore throat; grayish white membrane with surrounding inflammation spreading over soft palate and hard palate and posterior portion of the pharynx; difficulty in swallowing and breathing

III. Surveillance system for border region

Myanmar

List of some diseases:

- Neonatal Tetanus: referred to patients with following symptoms: a newborn infant sucks and cries well for the first two days; develops progressive difficulty and then inability to feed between 3-28 days; trismus, generalized stiffness with spasms or convulsions and opisthotonus; death
- Tetanus is characterized by painful muscular contractions, primarily of the masseters and neck muscles, secondarily of trunk muscles, with typical risus sardonicus and opisthotonus and death may occur. History of an injury or abortion or delivery may be present.

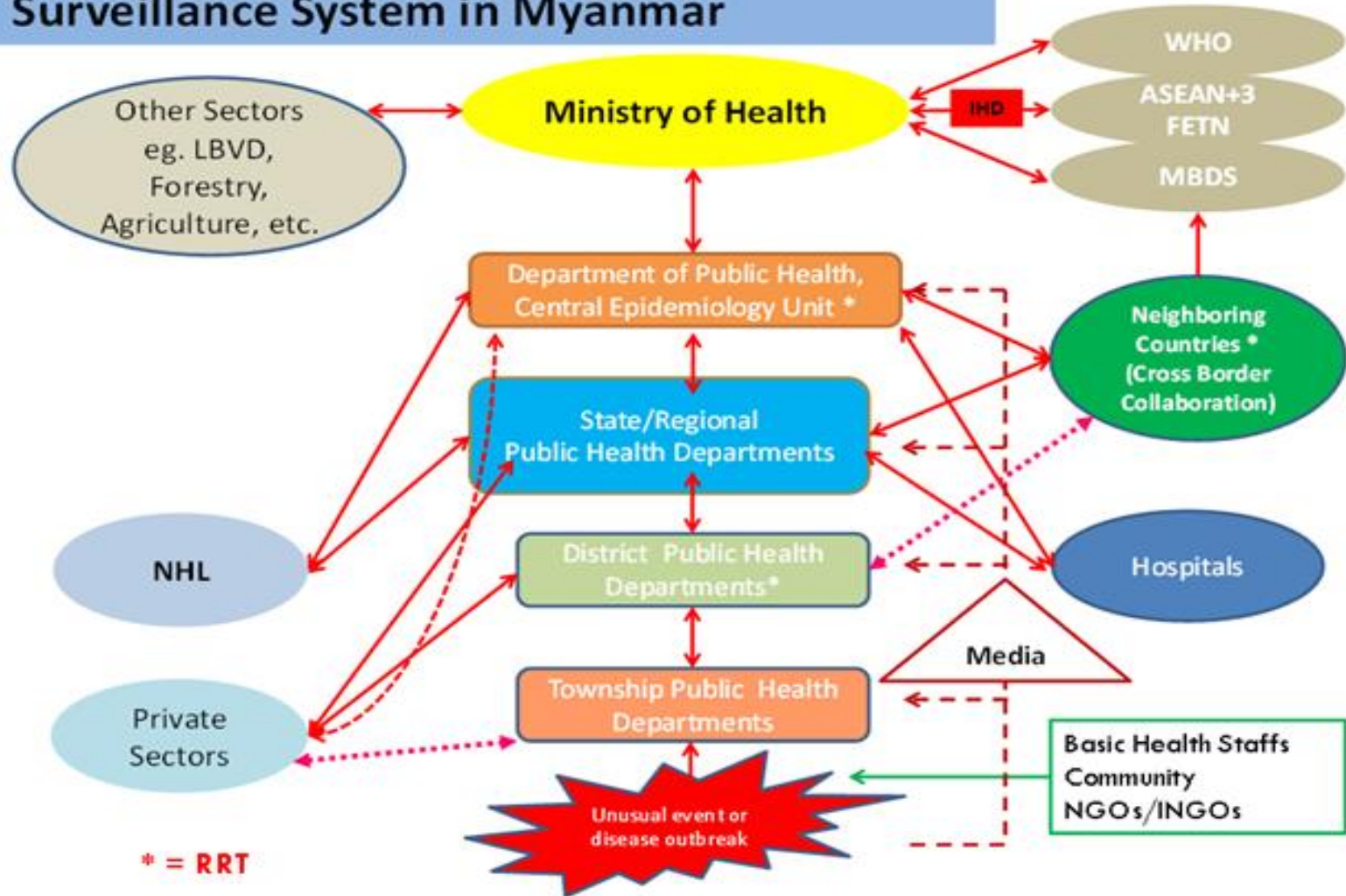
III. Surveillance system for border region Myanmar

List of some diseases:

- Meningitis is characterized by fever, neck stiffness, severe unexplained headache, neck pain and photophobia, nausea, vomiting, bulging fontanelle in children and delirium and unconscious.
- Hepatitis is an illness typically including acute jaundice, dark urine, anorexia, malaise, extreme fatigue and right upper quadrant of the abdomen tenderness and may also have fever, loss of appetite, constipation, arthralgias and clay colored stools.

III. Surveillance system for border region Myanmar

Surveillance System in Myanmar



III. Surveillance system for border region

Thailand

List of some diseases:

- Dangerous communicable disease: Plague (Bubonic plague, Septicemic plague, Pneumonic plague); Smallpox; Crimean - Congo hemorrhagic fever; West Nile Fever; Yellow fever; Lassa fever; Nipah virus disease; Marburg virus disease; Ebola virus disease - EVD); Handra virus disease; Severe Acute Respiratory Syndrome – SARS; Middle East Respiratory Syndrome – MERS

III. Surveillance system for border region Thailand

List of some diseases:

- Respiratory diseases: Influenza; Pneumonia; TB
- Vector borne diseases: Malaria; Filariasis; Dengue: DF, DHF, DSS; Zika virus disease; Chikungunya fever; Lishmaniasis; Scrub Typhus
- Food and water borne diseases: Cholera; Diarrhea; Food Poisoning
- Dysentery / non specific dysentery / Amoebic Dysentery: Typhoid / Paratyphoid; Hepatitis
- Neurological infection: Encephalitis, JE; Meningitis; Eosinophilic meningitis

III. Surveillance system for border region Thailand

List of some diseases:

- Vaccine preventable diseases: Measles; Diphtheria; Tetanus; Pertussis; Hepatitis B; Mumps; Rubella; Poliomyelitis; Adverse Event Following Immunization: AEFI; Chickenpox
- Zoonosis: Rabies; Avian Influenza; Melioidosis; Leptospirosis; Streptococcus suis infection; Brucellosis; Anthrax; Trichinosis

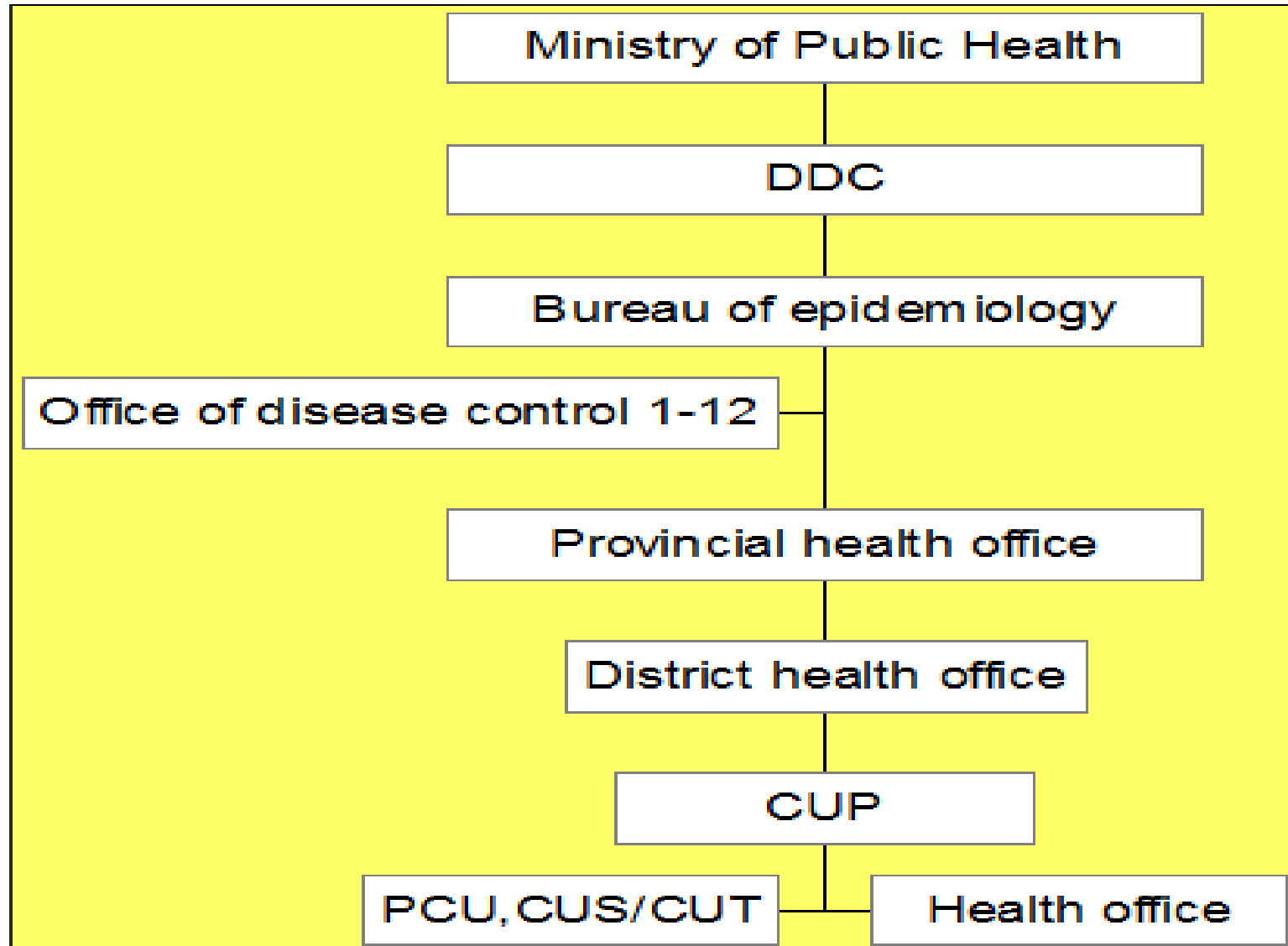
III. Surveillance system for border region

Thailand

List of some diseases:

- Sexual transmitted disease and Direct contact transmitted diseases: Lymphogranuloma Venereum (Granuloma Inguinale); Syphilis; Chancroid; Vaginal Trichomoniasis; Anogenital Herpes; Gonorrhoea; Non Gonococcal Urethritis; Genital Molluscum Contagiosum; Condyloma Acuminata or Venereal Warts; Leprosy; Hand foot mouth and enterovirus disease; Viral conjunctivitis; Pyrexia of Unknown origin (Fever of Unknown Origin)

III. Surveillance system for border region Thailand – flow of information



III. Surveillance system for border region Vietnam

Mechanism:

Surveillance on CDs is collecting information continuously and systematically on the situation and trends of CDs, analyzing, interpreting and providing information for planning, implementation and effectiveness evaluation of prevention and control CDs.

III. Surveillance system for border region Vietnam

Responsibilities of surveillance

- Early detection of communicable disease cases in the hospital and community.
- Testing to determine the positive cases.
- Sharing information, conducting rapid report on communicable disease cases and implementing action timely.
- Analyze the long-term surveillance lead to determine the epidemiology distribution of communicable diseases in each geographic region.

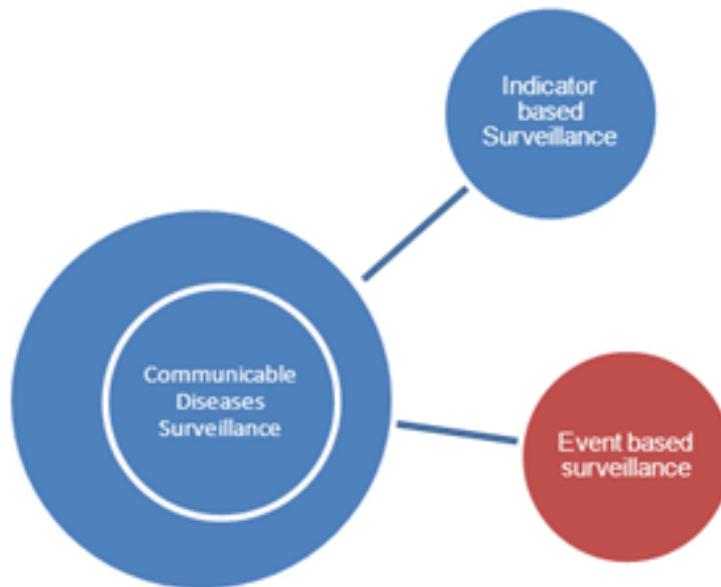
III. Surveillance system for border region Vietnam

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III. Surveillance system for border region Vietnam

Surveillance performance: Based on Circular 13/2013/TT-BYT on communicable disease surveillance guideline



III. Surveillance system for border region Vietnam

Indicator based surveillance

- Based on Circular 54/2015/TT-BYT for 42 communicable diseases
- Sentinel Surveillance: 5 diseases in sentinel surveillance (Influenza, Dengue fever, HFMD, Plague and Japanese encephalitis).

Circumstances that require reporting

- Upon detection of a human case of communicable diseases regulated in Appendix 1 promulgated under this Circular.

III. Surveillance system for border region Vietnam

Circumstances that require reporting

- Upon detection of a communicable disease outbreak, when the communicable disease outbreak is active and when the outbreak terminates.
- When communicable disease prevention and control activities are implemented.
- Upon a requirement by a higher level agency for reporting to support surveillance, inspection and direction on communicable disease prevention and control activities.

III. Surveillance system for border region Vietnam

Reporting Performance

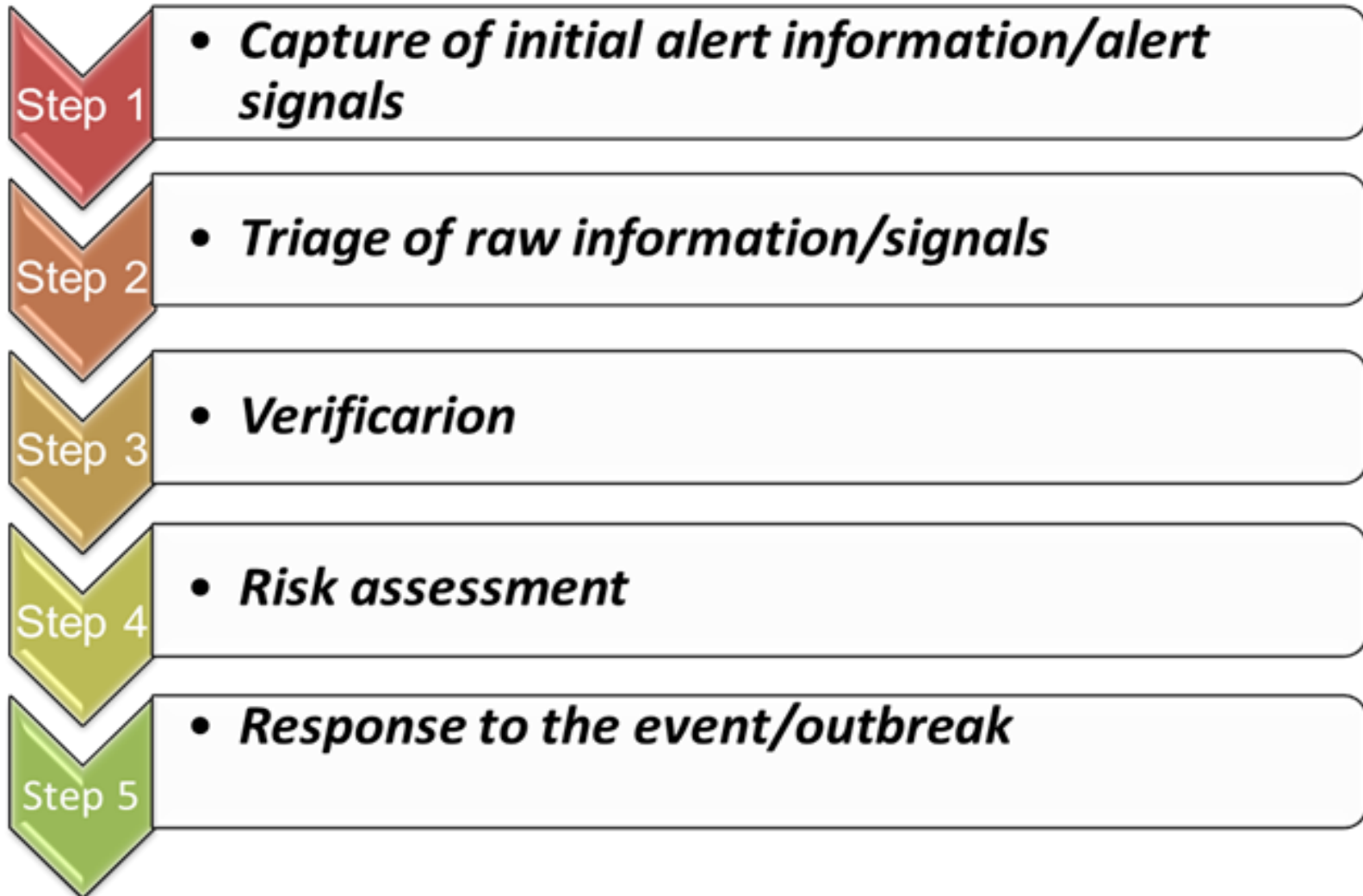
- Routine report
- Weekly report
- Monthly report
- Yearly report
- Rapid report:
- Case reporting: within 24 hours and 72 hours
- Outbreak detection report
- Outbreak update report
- Outbreak ending report
- Urgent report: for dangerous outbreak
- Was required from leader

III. Surveillance system for border region Vietnam

Event based Surveillance

- Early detection on risk potential event for disease, outbreak early detection, risk factors affecting public health. Based on Decision 134/QĐ-DP by GDPM
- Objective: Early detection on risk potential event for disease, outbreak early detection, risk factors affecting public health. Providing information to operate rapid response properly with emidemic and event situation. Promoting the colaboration between health authorities in disease surveillance and prevention

III. Surveillance system for border region Vietnam



III. Surveillance system for border region Vietnam

List of some disease:

- Dangerous communicable diseases for which each individual case must be reported immediately after diagnosis and no later than 24 hours: Poliomyelitis; Diphtheria; Streptococcus suis in humans; Avian influenza A(H5N1); Avian influenza A(H7N9); Plague; Ebola; Lassa; Marburg; Rubella; West Nile fever; Yellow fever; Dengue haemorrhagic fever; Measles; Cholera; Hand, foot, and mouth disease; Anthrax; Middle East Respiratory Syndrome caused by coronavirus (MERS CoV); Meningococcal meningitis; Dangerous emerging infectious diseases and new diseases of unknown causes

III. Surveillance system for border region Vietnam

List of some disease:

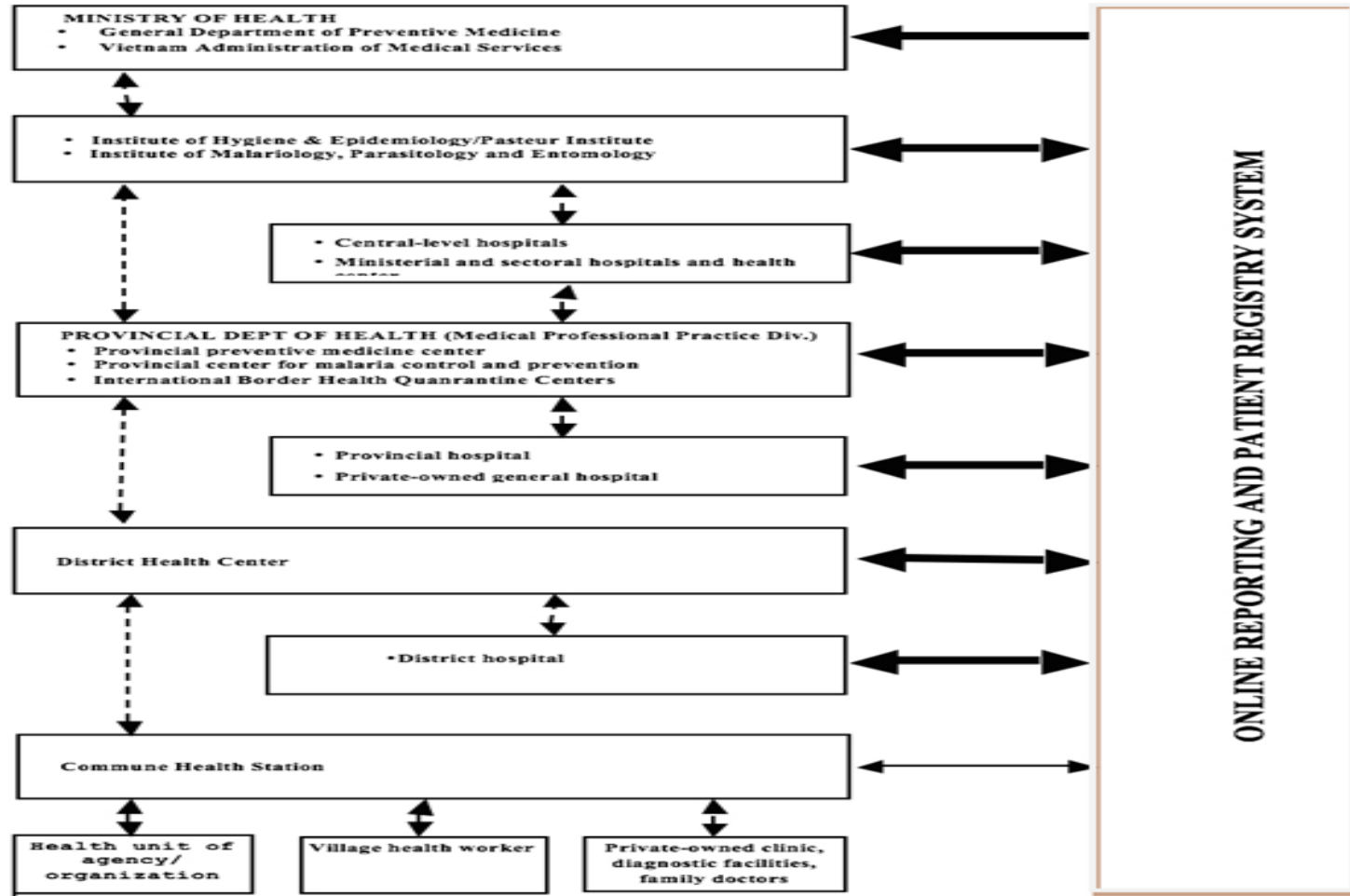
- Dangerous communicable diseases for which each individual case must be reported after diagnosis and no later than 48 hours: Rabies; Whooping-cough (pertussis); Acute flaccid paralysis with suspected poliomyelitis; Pulmonary tuberculosis; Malaria; Typhoid; Neonatal tetanus; Other tetanus; Viral Hepatitis A; Viral Hepatitis B; Viral Hepatitis C; Japanese encephalitis; Other viral encephalitis; Leptospirosis

III. Surveillance system for border region Vietnam

List of some disease:

- Communicable diseases for which number of cases and deaths must be reported on a monthly basis: Adenovirus disease; Influenza; Amoebic dysentery; Bacillary dysentery; Parotitis (mumps); Chickenpox; Diarrhea; Other viral hepatitis (or without virus typing).

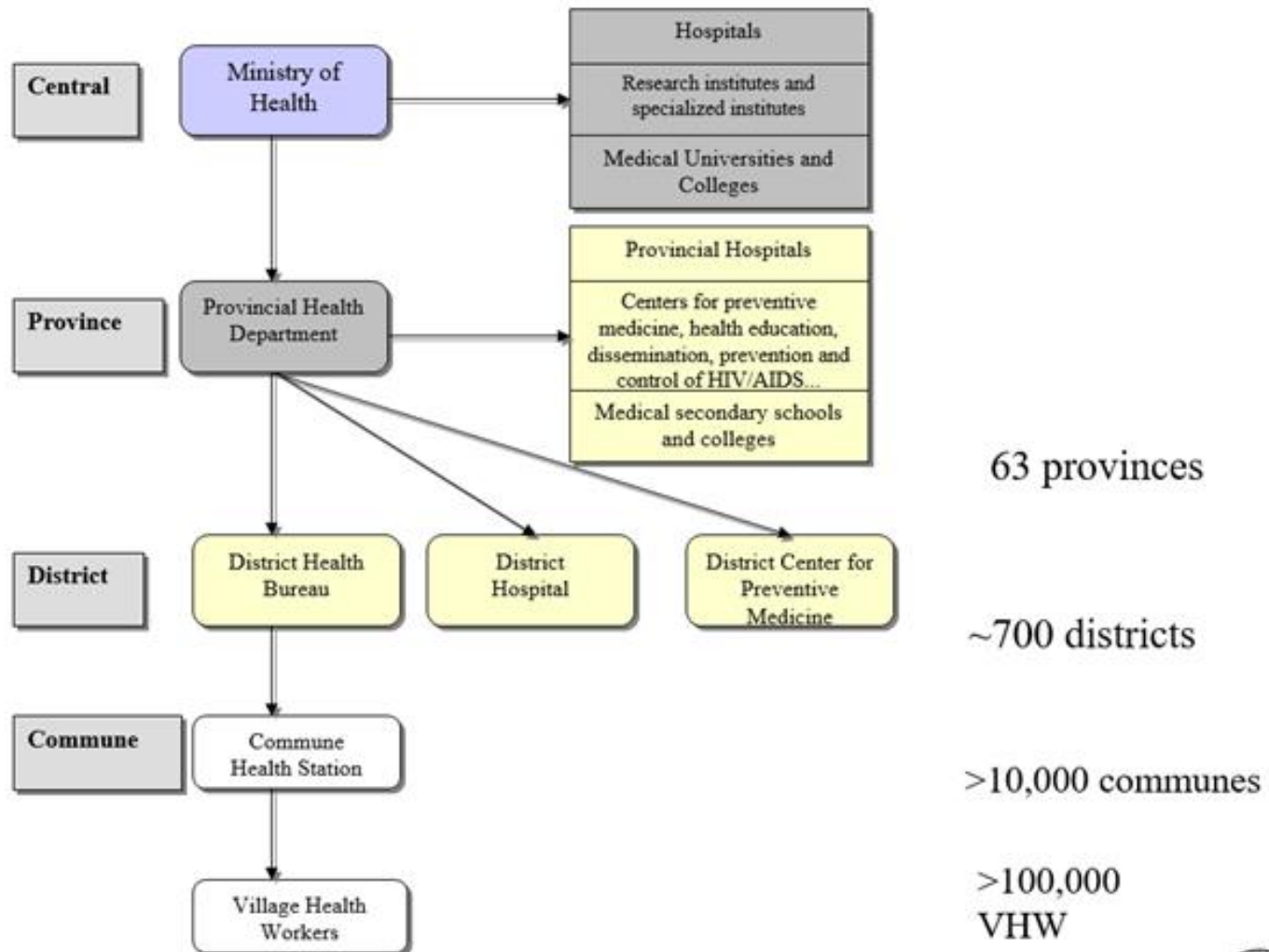
III. Surveillance system for border region Vietnam



Notes: ———> Online reporting channel
 - - - -> Offline reporting channels (if unable to perform online reporting)

III. Surveillance system for border region Vietnam

Health system and information flow



Thank You!

