



國家衛生研究院
National Health Research Institutes

Asia-Pacific Network for Enterovirus Surveillance (APNES)

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WPRO webpage

The screenshot shows the WHO Western Pacific Region (WPRO) webpage. The header includes the WHO logo and the text 'World Health Organization Western Pacific Region'. Below the header is a navigation bar with links: Home, Health topics, Data and statistics, Media centre, Publications, Programmes and projects, Countries and areas, and WHO in the Western Pacific. The main content area is titled 'WHO Health Emergencies Programme' and features a section for 'Hand, Foot and Mouth Disease (HFMD)' dated '20 September 2018'. The text states: 'Through the Regional Event-based Surveillance System, WHO monitors HFMD in the region to detect outbreaks and other significant events. However, the WHO Western Pacific Regional Office will no longer produce the bi-weekly Western Pacific Region Hand, Foot and Mouth Disease Surveillance Summary.' Below this, there is a 'Past situation updates' section with a list of dates and links to PDF documents: 20 August 2018 (pdf, 877kb), 14 August 2018 (pdf, 864kb), 31 July 2018 (pdf, 425kb), 17 July 2018 (pdf, 431kb), 3 July 2018 (pdf, 529kb), and 19 June 2018. On the right side, there are 'Related links' (Health topic: Hand, Foot and Mouth Disease (HFMD); Fact sheet on HFMD) and 'Documents and publications' (A Guide to Clinical Management and Public Health Response for Hand, Foot and Mouth Disease (HFMD)).

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Purpose

- The purposes of APNES focus on the applications and issues surrounding the epidemiology, virology, monitoring and vaccine development of Enterovirus in the Asia-Pacific region

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ASEAN: Association of Southeast Asian Nations PIC/S: Pharmaceutical Inspection Convention and Pharmaceutical Inspection Co-operation Scheme	Country	Characteristics
	Cambodia	1. Seroprevalence of EV-A71 neutralizing antibody: 92% 2. 400,000 newborns/year 3. Member of ASEAN
	Malaysia	1. Seroprevalence of EV-A71 neutralizing antibody: 60% 2. 500,000 newborns/year 3. Ongoing vaccine development 4. Member of ASEAN and PIC/S
	Taiwan	1. Seroprevalence of EV-A71 neutralizing antibody: 56-58% 2. 200,000 newborns/year 3. Ongoing vaccine development
	Thailand	1. Seroprevalence of neutralizing antibody: CV-A (31.2%), EV-A71 (9.1%) 2. 765,600 newborns/year 3. Member of ASEAN and PIC/S
	Vietnam	1. Seroprevalence of EV-A71 neutralizing antibody: 56-58% 2. 1,558,600 newborns/year 3. Ongoing vaccine development 4. Member of ASEAN
	Philippines	1. Detection rate: EV-D68 (0.23%) 2. 1,700,618 newborns/year 3. Member of ASEAN

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APNES members (since 2017)

1. Cambodia: Pasteur Institute
2. Malaysia: University of Malaya, Kuala Lumpur
3. Malaysia: University of Malaysia, Sarawak
4. Taiwan: National Health Research Institutes
5. Vietnam: Pasteur Institute, HCMC
6. Vietnam: Children Hospital No. 1, HCMC
7. Thailand: Chulalongkorn University, Faculty of Medicine
8. Member Recruitment Goal 2019: Research Institute for Tropical Medicine in the Philippines



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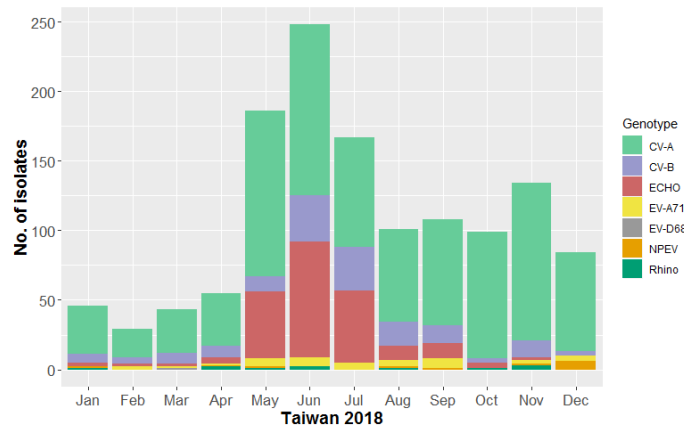
APNES activities 2019

Date	Nation	Institutions
March	Vietnam	The Children's Hospital No. 1 of Ho Chi Minh City (CH1), Pasteur Institute of Ho Chi Minh City (PI-HCMC)
March	Philippines	Research Institute for Tropical Medicine (RITM), Department of Health
April	Taiwan	Bio-medical meeting in Taiwan
May	Taiwan	Symposium meeting of WHO/NIBSC International standard EV71 inactivated vaccine

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EV surveillance report 2018 - Taiwan



Data from: Taiwan CDC

- 1300 enterovirus isolates
- 36 with severe complications
- Among the severe cases:
 - 12 (33.3%) ECHO11
 - 8 (22.2%) EV-A71
 - CV-A4, CV-A9, CV-A10, CV-A16, CV-B1, CV-B2, CV-B3, CV-B5 and EV-D68
 - 8 deaths reported- 7 were related to ECHO11.

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Achievements in 2017 and 2018

- Discussed detection technologies of enterovirus with some organizations in other countries
- Establishing EV71 vaccine reference antigens and rapid serotyping of enteroviruses
- NHRI 2017 International Workshop on Enterovirus Surveillance and Vaccine Development

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<http://enterovirus.nhri.org.tw/>



Asia-Pacific Network for Enterovirus Surveillance

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ENTEROVIRUS LAB DIAGNOSIS PUBLICATIONS NEWS NHRI ENGLISH

2018 WORKSHOP: OPENING REMARK



RECENT POSTS

Meeting Minutes from APNES Meeting (Sep 29, 2018)

Staff 2018-10-24 No Comments



This document is the summary of enterovirus surveillance updates from the APNES meeting held on September 29, 2018 in Taipei, Taiwan.

Download : Meeting Minutes from APNES Meeting (Sep 29, 2018)

Surveillance Report

< Surveillance Systems in US

Happy Holidays from APNES! >

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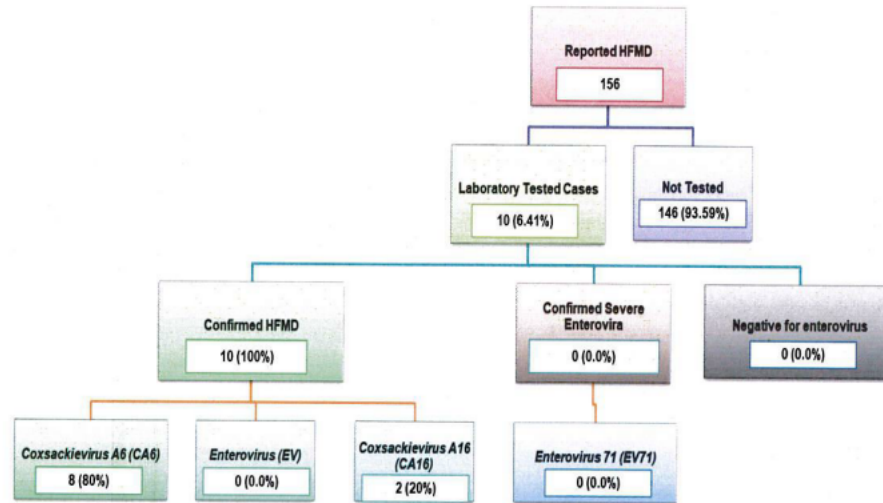
Demographics of the Philippines

- The 0-14 years age group represents 33.8% and those aged 65 years and above comprises only 4.4%
- 1,700,618 newborns/year
- Tuberculosis is among the leading causes of morbidity and mortality
- Coxsackievirus (CV) B, ECHO6, ECHO11, ECHO13 and D68 were the frequent isolates.

WHO & UN; (Apostol et al, 2012),
(Imamura et al, 2011)

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Fig. 3 Classification of Reported Hand, Foot and Mouth Disease Cases, Philippines, as of January 1-March 3, 2018 (N=156)



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EV in the Philippines 2012 -2019

Result	2012	2013	2014	2015	2016	2017	2018	2019	Total
ENTEROVIRUS RNA DETECTED	864	310	120	302	89	547	192	44	2468
EV-71 RNA DETECTED	35	11	4	1	6	5	0	0	62
CA 6 RNA DETECTED	140	98	86	229	66	482	104	38	1243
CA 16 RNA DETECTED	34	29	13	39	8	5	40	1	169
UNTYPED ENTEROVIRUS	51	24	17	33	9	55	48	5	242
ENTEROVIRUS NEGATIVE	269	109	42	146	47	176	123	30	942
NOT TESTED	82	12	15	6	14	24	24	3	180
Total	611	283	177	454	150	747	339	77	2838
Total Tested	1133	419	162	448	136	723	315	74	3410
Sampling	226	152							

Result	2012	2013	2014	2015	2016	2017	2018	2019
ENTEROVIRUS RNA DETECTED	76.3%	74.0%	74.1%	67.4%	65.4%	75.7%	61.0%	59.5%
EV-71 RNA DETECTED	4.1%	3.5%	3.3%	0.3%	6.7%	0.9%	0.0%	0.0%
CA 6 RNA DETECTED	61.9%	43.4%	71.7%	75.8%	74.2%	88.1%	54.2%	86.4%
CA 16 RNA DETECTED	22.4%	19.1%	10.8%	12.9%	9.0%	0.9%	20.8%	2.3%
UNTYPED ENTEROVIRUS	22.6%	15.8%	14.2%	10.9%	10.1%	10.1%	25.0%	11.4%
ENTEROVIRUS NEGATIVE	23.7%	26.0%	25.9%	32.6%	34.6%	24.3%	39.0%	40.5%
NOT TESTED	82	12	15	6	14	24	24	3
Total	1215	431	177	454	150	747	339	77
Total Tested (denominator)	1133	419	162	448	136	723	315	74



Source from:
Dr. Lea Necitas G.
Apostol at RITM

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