

Review of The Preparedness for Establishing And Maintaining Core Capacities at Port of Kaohsiung by IHR External Experts, 2018

Jheng-Guang Jhong*, Yen-Chang Tuan, Shu-Chen Tseng,
Min-Nan Hung, Hui-Chen Lin, and Chiou-Yueh You

Abstract

Since 2011 to 2013, Port of Kaohsiung had established core capacities for IHR designated port and had been assessed by experts from Japan and Australia. In 2017, the Executive Yuan issued “Project for Operation and Maintenance of Core Capacities at IHR Designated Port”, which regulated that external assessment be conducted every 5 years.

In 2018, European Union experts were invited to conduct the assessment, which included not only regular documents and sites review, but also evaluation of the capabilities of integration and responses of all authorities at Port of Kaohsiung. In responding to the experts’ assessment, Port of Kaohsiung conducted series of improvements. These measures included correction of algorithm of incident reporting at port, assured notification of vector surveillance results and feedback from affected units, expansion of isolation and evacuation capacity, reinforcement of notification and return mechanism for radioactive containers, and a bunkered water safety plan including periodic residual chlorine and *Legionella* monitoring.

After the improvement results were submitted to the panel experts as a required reference for final scoring, Port of Kaohsiung received full marks and was certified as a port with sustainable development and recognized its core capacities.

Keywords: International Health Regulations (IHR), Port of Kaohsiung, core capacities of the designated port of entry

Kaohsiung-Pintung Regional Center,
Centers for Disease Control, Ministry
of Health and Welfare, Taiwan
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Corresponding author: Jheng-Guang Jhong*
E-mail: biohikaru@gmail.com
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Weekly Data of Notifiable Infectious Diseases (by week of diagnosis)

Case diagnosis year		Week 51★		Week 1-51			
Classification	Disease Diagnosed	2020	2019	2020		2019	
				Total cases★	Imported cases	Total cases★	Imported cases
Category I	Plague	0	0	0	0	0	0
	Rabies	0	0	0	0	0	0
	SARS	0	0	0	0	0	0
	Smallpox	0	0	0	0	0	0
Category II	Acute Flaccid Paralysis	3	1	34	0	60	1
	Acute Viral Hepatitis type A	2	4	75	8	103	26
	Amoebiasis	6	8	242	121	340	189
	Anthrax	0	0	0	0	0	0
	Chikungunya Fever	0	0	3	3	114	93
	Cholera	0	0	1	0	0	0
	Dengue Fever	1	9	142	69	635	535
	Diphtheria	0	0	0	0	0	0
	Enterohemorrhagic E. coli Infection	0	0	0	0	1	0
	Epidemic Typhus Fever	0	0	0	0	0	0
	Hantavirus Pulmonary Syndrome	0	0	0	0	0	0
	Hemorrhagic Fever with Renal Syndrome	0	0	11	0	2	1
	Malaria	0	0	2	2	8	8
	Measles	0	1	2	2	138	56
	Meningococcal Meningitis	0	0	7	0	7	0
	Paratyphoid Fever	0	1	0	0	8	6
	Poliomyelitis	0	0	0	0	0	0
	Rubella	0	1	0	0	25	18
Shigellosis	3	4	152	24	141	44	
Typhoid fever	0	0	9	3	24	20	
West Nile Fever	0	0	0	0	0	0	
Zika virus infection	0	0	2	2	4	4	
Category III	Acute Viral Hepatitis type B	2	2	108	2	111	4
	Acute Viral Hepatitis type C	14	9	589	4	609	4
	Acute Viral Hepatitis type D	0	0	0	0	0	0
	Acute Viral Hepatitis type E	0	0	8	0	9	4
	Congenital Syphilis	0	0	0	0	0	0
	Congenital Rubella Syndrome	0	0	0	0	0	0
	Enteroviruses Infection with Severe Complications	0	2	7	0	67	1
	Haemophilus Influenza type b Infection	0	0	3	0	3	0
	Japanese Encephalitis	0	0	21	0	21	2
	Legionnaires' Disease	8	9	285	8	266	16
	Mumps	13	12	480	6	578	9
	Neonatal Tetanus	0	0	0	0	0	0
Pertussis	0	0	9	0	28	0	
Tetanus	0	1	7	0	6	1	
Category IV	Botulism	0	0	1	0	0	0
	Brucellosis	0	0	0	0	0	0
	Complicated Varicella	0	0	48	0	57	1
	Endemic Typhus Fever	0	1	21	0	30	3
	Herpesvirus B Infection	0	0	0	0	0	0
	Influenza Case with Severe Complications	0	56	548	6	2189	8
	Invasive Pneumococcal Disease	5	11	235	0	433	2
	Leptospirosis	0	0	84	0	115	1
	Listeriosis	5	4	135	0	169	1
	Lyme Disease	1	0	1	1	1	1
	Melioidosis	1	0	18	1	46	1
	Q Fever	0	0	14	0	23	5
Scrub Typhus	5	4	411	1	454	6	
Toxoplasmosis	0	1	16	0	18	4	
Tularemia	0	0	0	0	0	0	
Category V	Ebola Virus Disease	0	0	0	0	0	0
	Lassa Fever	0	0	0	0	0	0
	Marburg Hemorrhagic Fever	0	0	0	0	0	0
	Middle East Respiratory Syndrome	0	0	0	0	0	0
	Coronavirus Infections	0	0	0	0	0	0
	Novel Influenza A Virus Infections	0	0	0	0	0	0
	Rift Valley Fever	0	0	0	0	0	0
Severe Pneumonia with Novel Pathogens	30	-	763	708	-	-	
Yellow Fever	0	0	0	0	0	0	

- ★The weekly and cumulative total numbers include indigenous and imported cases of notifiable infectious diseases.
- MDR-TB, Tuberculosis, Syphilis, Gonorrhoea, HIV Infection, AIDS, Hansen's Disease and Creutzfeldt-Jakob Disease are excluded from the table.
- Numbers of mumps and tetanus cases are summed up by the week of report.
- Since 2020/1/15, "Severe Pneumonia with Novel Pathogens" was listed as a Notifiable Infectious Disease.

Suspected Clusters

- Thirty-seven clusters related to diarrhea (24), tuberculosis (8), upper respiratory tract infection (2), varicella (2), and enterovirus (1) were reported during week 51.

Imported Infectious Diseases

- There were 32 imported cases from 6 countries during week 51.

Diseases \ Countries	Countries						Total
	Indonesia	Russia	USA	Philippines	India	Myanmar	
Severe Pneumonia with Novel Pathogens	8	8	7	5	1	1	30
Dengue Fever				1			1
Lyme Disease			1				1
Total	8	8	8	6	1	1	32

- As of week 51, there were 965 imported cases from 57 countries. The top three countries are Indonesia (298), USA (127), and Philippines (118).
- The three notifiable diseases with the highest number of imported cases are Severe Pneumonia with Novel Pathogens (708), Amoebiasis (121), and Dengue Fever (69).

Summary of Epidemic

- **Severe Pneumonia with Novel Pathogens** : The COVID-19 pandemic is still critical and the number of returning Taiwanese citizens is increasing, therefore it is expected that the number of imported cases and the risk for local transmission will raise.
- **Dengue Fever** : The peak of dengue fever season has passed. The risk of infection in the community decrease.
- **Influenza-like illness** : The influenza activity is expected to continue. The number of respiratory syncytial virus (RSV) positive specimens decrease.
- **Enterovirus** : The epidemic status is similar to previous weeks.

Weekly Data of Notifiable Infectious Diseases (by week of diagnosis)

Case diagnosis year		Week 52★		Week 1-52			
Classification	Disease Diagnosed	2020	2019	2020		2019	
				Total cases★	Imported cases	Total cases★	Imported cases
Category I	Plague	0	0	0	0	0	0
	Rabies	0	0	0	0	0	0
	SARS	0	0	0	0	0	0
	Smallpox	0	0	0	0	0	0
Category II	Acute Flaccid Paralysis	0	2	34	0	62	1
	Acute Viral Hepatitis type A	2	1	77	8	104	26
	Amoebiasis	4	5	246	124	345	192
	Anthrax	0	0	0	0	0	0
	Chikungunya Fever	0	2	3	3	116	95
	Cholera	0	0	1	0	0	0
	Dengue Fever	0	10	142	69	645	545
	Diphtheria	0	0	0	0	0	0
	Enterohemorrhagic E. coli Infection	0	0	0	0	1	0
	Epidemic Typhus Fever	0	0	0	0	0	0
	Hantavirus Pulmonary Syndrome	0	0	0	0	0	0
	Hemorrhagic Fever with Renal Syndrome	0	0	11	0	2	1
	Malaria	0	0	2	2	8	8
	Measles	0	2	2	2	140	58
	Meningococcal Meningitis	0	0	7	0	7	0
	Paratyphoid Fever	0	0	0	0	8	6
	Poliomyelitis	0	0	0	0	0	0
	Rubella	0	0	0	0	25	18
Shigellosis	3	2	155	24	143	44	
Typhoid fever	1	0	10	3	24	20	
West Nile Fever	0	0	0	0	0	0	
Zika virus infection	0	0	2	2	4	4	
Category III	Acute Viral Hepatitis type B	1	1	109	2	112	4
	Acute Viral Hepatitis type C	16	20	604	4	629	4
	Acute Viral Hepatitis type D	0	0	0	0	0	0
	Acute Viral Hepatitis type E	0	0	8	0	9	4
	Congenital Syphilis	0	0	0	0	0	0
	Congenital Rubella Syndrome	0	0	0	0	0	0
	Enteroviruses Infection with Severe Complications	0	0	7	0	67	1
	Haemophilus Influenza type b Infection	0	0	3	0	3	0
	Japanese Encephalitis	0	0	21	0	21	2
	Legionnaires' Disease	18	11	303	8	277	16
	Mumps	15	13	495	6	591	9
	Neonatal Tetanus	0	0	0	0	0	0
	Pertussis	0	0	9	0	28	0
Tetanus	0	0	7	0	6	1	
Category IV	Botulism	0	0	1	0	0	0
	Brucellosis	0	0	0	0	0	0
	Complicated Varicella	0	1	48	0	58	1
	Endemic Typhus Fever	0	0	21	0	30	3
	Herpesvirus B Infection	0	0	0	0	0	0
	Influenza Case with Severe Complications	0	62	548	6	2251	8
	Invasive Pneumococcal Disease	1	15	236	0	448	2
	Leptospirosis	0	1	84	0	116	1
	Listeriosis	2	0	137	0	169	1
	Lyme Disease	0	0	1	1	1	1
	Melioidosis	2	0	20	1	46	1
	Q Fever	0	0	14	0	23	5
	Scrub Typhus	3	5	414	1	459	6
Toxoplasmosis	0	1	16	0	19	4	
Tularemia	0	0	0	0	0	0	
Category V	Ebola Virus Disease	0	0	0	0	0	0
	Lassa Fever	0	0	0	0	0	0
	Marburg Hemorrhagic Fever	0	0	0	0	0	0
	Middle East Respiratory Syndrome	0	0	0	0	0	0
	Coronavirus Infections	0	0	0	0	0	0
	Novel Influenza A Virus Infections	0	0	0	0	0	0
	Rift Valley Fever	0	0	0	0	0	0
Severe Pneumonia with Novel Pathogens	20	-	783	727	-	-	
Yellow Fever	0	0	0	0	0	0	

1. ★The weekly and cumulative total numbers include indigenous and imported cases of notifiable infectious diseases.
2. MDR-TB, Tuberculosis, Syphilis, Gonorrhoea, HIV Infection, AIDS, Hansen's Disease and Creutzfeldt-Jakob Disease are excluded from the table.
3. Numbers of mumps and tetanus cases are summed up by the week of report.
4. Since 2020/1/15, "Severe Pneumonia with Novel Pathogens" was listed as a Notifiable Infectious Disease.

Suspected Clusters

- Twenty-five clusters related to diarrhea (13), tuberculosis (6), upper respiratory tract infection (3), varicella (2), and enterovirus (1) were reported during week 52.

Imported Infectious Diseases

- There were 22 imported cases from 5 countries during week 52.

Diseases \ Countries	Countries					Total
	Indonesia	Philippines	USA	Pakistan	Air craft	
Severe Pneumonia with Novel Pathogens	6	9	2	1	1	19
Amoebiasis	3					3
Total	9	9	2	1	1	22

- As of week 52, there were 987 imported cases from 58 countries. The top three countries are Indonesia (307), USA (128), and Philippines (127).
- The three notifiable diseases with the highest number of imported cases are Severe Pneumonia with Novel Pathogens (727), Amoebiasis (124), and Dengue Fever (69).

Summary of Epidemic

- **Severe Pneumonia with Novel Pathogens** : The global COVID-19 pandemic is still critical and the number of returning Taiwanese citizens is increasing, therefore it is expected that the number of imported cases and the risk for local transmission will raise.
- **Dengue Fever** : The peak of dengue fever season has passed. The risk of infection in the community decrease.
- **Influenza-like illness** : The influenza activity is expected to increase gradually because the temperature drops.
- **Enterovirus** : The epidemic status is expected similar to previous weeks.

Weekly Data of Notifiable Infectious Diseases (by week of diagnosis)

Case diagnosis year		Week 53★		Week 1-53			
Classification	Disease Diagnosed	2020	2019	2020		2019	
				Total cases★	Imported cases	Total cases★	Imported cases
Category I	Plague	0	0	0	0	0	0
	Rabies	0	0	0	0	0	0
	SARS	0	0	0	0	0	0
	Smallpox	0	0	0	0	0	0
Category II	Acute Flaccid Paralysis	0	0	34	0	62	1
	Acute Viral Hepatitis type A	0	0	77	8	104	26
	Amoebiasis	8	0	253	129	345	192
	Anthrax	0	0	0	0	0	0
	Chikungunya Fever	0	0	3	3	116	95
	Cholera	0	0	1	0	0	0
	Dengue Fever	0	0	142	69	645	545
	Diphtheria	0	0	0	0	0	0
	Enterohemorrhagic E. coli Infection	0	0	0	0	1	0
	Epidemic Typhus Fever	0	0	0	0	0	0
	Hantavirus Pulmonary Syndrome	0	0	0	0	0	0
	Hemorrhagic Fever with Renal Syndrome	0	0	11	0	2	1
	Malaria	0	0	2	2	8	8
	Measles	0	0	2	2	140	58
	Meningococcal Meningitis	0	0	7	0	7	0
	Paratyphoid Fever	0	0	0	0	8	6
	Poliomyelitis	0	0	0	0	0	0
	Rubella	0	0	0	0	25	18
	Shigellosis	1	0	156	24	143	44
Typhoid fever	0	0	10	3	24	20	
West Nile Fever	0	0	0	0	0	0	
Zika virus infection	0	0	2	2	4	4	
Category III	Acute Viral Hepatitis type B	1	0	110	3	112	4
	Acute Viral Hepatitis type C	9	0	613	4	629	4
	Acute Viral Hepatitis type D	0	0	0	0	0	0
	Acute Viral Hepatitis type E	0	0	8	0	9	4
	Congenital Syphilis	0	0	0	0	0	0
	Congenital Rubella Syndrome	0	0	0	0	0	0
	Enteroviruses Infection with Severe Complications	0	0	7	0	67	1
	Haemophilus Influenza type b Infection	0	0	3	0	3	0
	Japanese Encephalitis	0	0	21	0	21	2
	Legionnaires' Disease	13	0	315	8	277	16
	Mumps	10	0	505	6	591	9
	Neonatal Tetanus	0	0	0	0	0	0
	Pertussis	0	0	9	0	28	0
Tetanus	0	0	7	0	6	1	
Category IV	Botulism	0	0	1	0	0	0
	Brucellosis	0	0	0	0	0	0
	Complicated Varicella	0	0	48	0	58	1
	Endemic Typhus Fever	2	0	23	0	30	3
	Herpesvirus B Infection	0	0	0	0	0	0
	Influenza Case with Severe Complications	1	0	549	6	2251	8
	Invasive Pneumococcal Disease	3	0	239	0	448	2
	Leptospirosis	0	0	84	0	116	1
	Listeriosis	1	0	138	0	169	1
	Lyme Disease	0	0	1	1	1	1
	Melioidosis	1	0	20	1	46	1
	Q Fever	0	0	14	0	23	5
	Scrub Typhus	7	0	421	1	459	6
	Toxoplasmosis	0	0	16	0	19	4
Tularemia	0	0	0	0	0	0	
Category V	Ebola Virus Disease	0	0	0	0	0	0
	Lassa Fever	0	0	0	0	0	0
	Marburg Hemorrhagic Fever	0	0	0	0	0	0
	Middle East Respiratory Syndrome	0	0	0	0	0	0
	Coronavirus Infections	0	0	0	0	0	0
	Novel Influenza A Virus Infections	0	0	0	0	0	0
	Rift Valley Fever	0	0	0	0	0	0
	Severe Pneumonia with Novel Pathogens	25	-	808	752	-	-
Yellow Fever	0	0	0	0	0	0	

5. ★The weekly and cumulative total numbers include indigenous and imported cases of notifiable infectious diseases.
6. MDR-TB, Tuberculosis, Syphilis, Gonorrhoea, HIV Infection, AIDS, Hansen's Disease and Creutzfeldt-Jakob Disease are excluded from the table.
7. Numbers of mumps and tetanus cases are summed up by the week of report.
8. Since 2020/1/15, "Severe Pneumonia with Novel Pathogens" was listed as a Notifiable Infectious Disease.

Suspected Clusters

- Thirty clusters related to diarrhea (15), tuberculosis (10), upper respiratory tract infection (4), and varicella (1) were reported during week 53.

Imported Infectious Diseases

- There were 31 imported cases from 6 countries during week 53.

Diseases \ Countries	Countries						Total
	Indonesia	UK	Philippines	USA	India	Uganda	
Severe Pneumonia with Novel Pathogens	6	8	6	4	1		25
Amoebiasis	5						5
Acute Hepatitis B						1	1
Total	11	8	6	4	1	1	31

- As of week 53, there were 1,018 imported cases from 58 countries. The top three countries are Indonesia (318), Philippines (133), and USA (132).
- The three notifiable diseases with the highest number of imported cases are Severe Pneumonia with Novel Pathogens (752), Amoebiasis (129), and Dengue Fever (69).

Summary of Epidemic

- **Severe Pneumonia with Novel Pathogens** : The global COVID-19 pandemic is still critical, therefore it is expected that the number of imported cases will raise.
- **Influenza-like illness** : The influenza activity is expected to increase gradually because the temperature drops.
- **Enterovirus** : The epidemic status is expected to increase slightly.

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Address: No.6, Linsen S. Rd, Jhongjheng District, Taipei City 10050, Taiwan (R.O.C.)

Telephone No: +886-2-2395-9825

Website: <https://www.cdc.gov.tw/En>

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