

# Risk Assessment for International Dissemination of COVID-19 to the ASEAN Region

ASEAN Biodiaspora Virtual Center (ABVC)

as of April 29, 2020 (2:00 PM GMT+8)



## COVID-19: Highlights and Situation Overview

- World Health Organization (WHO) has called on countries to ensure that usual immunization is maintained wherever possible and surveillance for vaccine-preventable diseases is not disrupted during the ongoing pandemic.
- WHO Director-General Dr. Tedros, in his regular media briefing, highlighted "As lockdowns in Europe ease with declining numbers of new cases, we continue to urge countries to find, isolate, test and treat all cases of COVID-19 and trace every contact, to ensure these declining trends continue".
- Cambodia reports no new COVID-19 case/s since April 12.
- Laos reports no new COVID-19 case/s since April 12.
- Brunei reports no new COVID-19 case/s since April 19.
- Vietnam reports no new COVID-19 case/s since April 24.
- West Java (Indonesia) Governor has extended the large-scale social restrictions (PSBB) period of the affected cities and regencies of Bogor, Depok and Bekasi by two weeks to May 13, 2020, from the initial end date of April 29. Jakarta Governor also extended the city's PSBB status from April 23 to May 22, 2020.
- Singapore is rapidly building bed space for coronavirus patients in cavernous exhibition halls and other temporary facilities as it faces a surge in cases, mainly among its large community of migrant workers. At the new Changi isolation center, each room has blood-pressure monitors and other medical equipment for patients to conduct their own health checks three times daily, while remote-controlled robots provide meals and teleconferencing services to reduce human-to-human contact.
- Thailand will extend a state of emergency over COVID-19 until May 31, but will consider easing some restrictions on businesses and public activities as the number of new cases has eased. It also recommends a continued restriction on travel between provinces and large-scale public activities, extended work from home policy, and delaying four public holidays in May.
- Vietnam starts easing its nationwide lockdown due to COVID-19. Ho Chi Minh City (Vietnam) authorities removed sports centers and indoor sports businesses from the list of suspended businesses due to COVID-19 allowing gyms to reopen. In addition, the public gathering limit has been raised to 30 people from the previous 20. Likewise, schools in Hanoi and Ho Chi Minh City are expected to gradually resume classes on May 4.

### Travel Advisories (new update/s)

- Malaysia: AirAsia Malaysia resumes domestic flights operations starting today (April 29, 2020), but passengers will need to follow COVID-19 safety measures. Each passenger will need wear mask before, during, and after the flight including during check-in and bag collection. Any guest without a mask will be denied boarding in the aircraft.
- Thailand: The Civil Aviation Authority of Thailand extended a ban on all incoming international passenger flights until May 31. The flight ban exempts state and military aircraft, and aircraft/s making an emergency landing without disembarkation. The decision will affect international airlines planning to resume commercial flights to Thailand, including Philippines AirAsia, which has announced the resumption of its Manila-Bangkok flights from May 1.
- Vietnam: Ministry of Transport has allowed the increase in the frequency of domestic flights on the Hanoi-Ho Chi Minh City route as well as the reopening

of other domestic routes. However, this will depend on demand, and travelers should still confirm travel details with the airlines. Taxis, buses, Grab services and inter-provincial transport have also resumed though with restrictions as per the transport authorities.

### Cases and Deaths as of 29 April 2020

- As of April 29 (2PM, GMT+8), worldwide, there were **3,055,896** confirmed cases, including **216,350** deaths. Globally, Case Fatality Ratio (CFR)\* is **7.08**.
- In **China**, there were **84,348** confirmed cases with **4,643** deaths, including deaths in Hong Kong (4) and Taiwan (6). Confirmed cases in China include confirmed cases in Hong Kong (1,038), Macau (45), and Taiwan (429).
- **2,971,548 confirmed cases** of COVID-19 have been reported in **210 countries/states** (other than China, Hong Kong, Taiwan and Macau):

REGION	COUNTRY	FIRST CONFIRMED CASE(S)	LATEST CONFIRMED CASE(S)	CONFIRMED CASES/ (Deaths)	CASE FATALITY RATIO*
ASIA PACIFIC	Thailand	13 Jan 2020	28 Apr 2020	2,938 (54)	1.84
	Vietnam	23 Jan 2020	24 Apr 2020	270	0.00
	Singapore	23 Jan 2020	28 Apr 2020	14,951 (14)	0.09
	Malaysia	25 Jan 2020	28 Apr 2020	5,851 (100)	1.71
	Cambodia	27 Jan 2020	12 Apr 2020	122	
	Philippines	30 Jan 2020	28 Apr 2020	7,958 (530)	6.66
	Indonesia	02 Mar 2020	28 Apr 2020	9,511 (773)	8.13
	Brunei	10 Mar 2020	24 Apr 2020	138 (1)	0.72
	Myanmar	23 Mar 2020	28 Apr 2020	149 (5)	3.36
	Lao PDR	24 Mar 2020	13 Apr 2020	19	
	Japan	16 Jan 2020	28 Apr 2020	14,320 (392)	2.74
	South Korea	20 Jan 2020	28 Apr 2020	10,752 (244)	2.27
	Nepal	24 Jan 2020	28 Apr 2020	54	0.00
	Australia	25 Jan 2020	28 Apr 2020	6,731 (84)	1.25
	Sri Lanka	27 Jan 2020	28 Apr 2020	596 (7)	1.17
	India	30 Jan 2020	28 Apr 2020	31,168 (977)	3.13
	Afghanistan	24 Feb 2020	28 Apr 2020	1,828 (58)	3.17
	Pakistan	26 Feb 2020	28 Apr 2020	14,514 (312)	2.15
	New Zealand	28 Feb 2020	28 Apr 2020	1,472 (19)	1.29
	Bhutan	05 Mar 2020	23 Apr 2020	7	
	Maldives	07 Mar 2020	28 Apr 2020	245	
Bangladesh	08 Mar 2020	28 Apr 2020	6,462 (155)	2.40	
Mongolia	10 Mar 2020	26 Apr 2020	38		
Turkey	10 Mar 2020	28 Apr 2020	112,261 (2,900)	2.58	

	<b>French Polynesia</b>	12 Mar 2020	28 Apr 2020	58	
	<b>Guam</b>	15 Mar 2020	28 Apr 2020	144 (5)	3.47
	<b>New Caledonia</b>	17 Mar 2020	02 Apr 2020	18	
	<b>Fiji</b>	18 Mar 2020	20 Apr 2020	18	
	<b>Papua New Guinea</b>	21 Mar 2020	22 Apr 2020	8	
	<b>Timor Leste</b>	21 Mar 2020	25 Apr 2020	24	
	<b>Northern Mariana Islands</b>	28 Mar 2020	17 Apr 2020	14 (2)	14.29
<b>AMERICAS</b>	<b>USA</b>	21 Jan 2020	28 Apr 2020	1,029,179 (58,568)	5.69
	<b>Canada</b>	25 Jan 2020	28 Apr 2020	49,815 (2,852)	5.73
	<b>Brazil</b>	26 Feb 2020	28 Apr 2020	68,188 (4,674)	6.85
	<b>Mexico</b>	28 Feb 2020	28 Apr 2020	15,529 (1,434)	9.23
	<b>Saint Martin</b>	01 Mar 2020	23 Apr 2020	38 (2)	5.26
	<b>Ecuador</b>	01 Mar 2020	28 Apr 2020	24,258 (871)	3.59
	<b>Dominican Republic</b>	01 Mar 2020	28 Apr 2020	6,416 (286)	4.46
	<b>Chile</b>	03 Mar 2020	27 Apr 2020	13,813 (198)	1.43
	<b>Argentina</b>	03 Mar 2020	28 Apr 2020	4,003 (197)	4.92
	<b>Peru</b>	05 Mar 2020	28 Apr 2020	28,699 (782)	2.72
	<b>Costa Rica</b>	06 Mar 2020	28 Apr 2020	697 (6)	0.86
	<b>Colombia</b>	06 Mar 2020	28 Apr 2020	5,597 (253)	4.52
	<b>French Guiana</b>	06 Mar 2020	28 Apr 2020	124 (1)	0.81
	<b>Martinique</b>	06 Mar 2020	26 Apr 2020	175 (14)	8.00
	<b>Paraguay</b>	07 Mar 2020	28 Apr 2020	230 (9)	3.91
	<b>Panama</b>	10 Mar 2020	28 Apr 2020	6,021 (167)	2.77
	<b>Bolivia</b>	10 Mar 2020	28 Apr 2020	1,014 (53)	5.23
	<b>Honduras</b>	11 Mar 2020	28 Apr 2020	702 (64)	9.12
	<b>Cuba</b>	11 Mar 2020	29 Apr 2020	1,389 (56)	4.03
	<b>Guyana</b>	11 Mar 2020	26 Apr 2020	74 (8)	10.81
	<b>Jamaica</b>	12 Mar 2020	28 Apr 2020	364 (7)	1.92
	<b>St Vincent and the Grenadines</b>	12 Mar 2020	27 Apr 2020	15	
	<b>Saint Lucia</b>	13 Mar 2020	11 Apr 2020	15	
	<b>Trinidad and Tobago</b>	13 Mar 2020	27 Apr 2020	116 (8)	6.90
	<b>Venezuela</b>	13 Mar 2020	28 Apr 2020	329 (10)	3.04
	<b>Guatemala</b>	13 Mar 2020	28 Apr 2020	530 (15)	2.83
	<b>Uruguay</b>	13 Mar 2020	28 Apr 2020	620 (15)	2.42
	<b>Curacao</b>	13 Mar 2020	25 Apr 2020	16 (1)	6.25
	<b>Puerto Rico</b>	13 Mar 2020	27 Apr 2020	1,388 (53)	3.82
	<b>Suriname</b>	13 Mar 2020	08 Apr 2020	10 (1)	10.00
	<b>Antigua and Barbuda</b>	13 Mar 2020	22 Apr 2020	24 (3)	12.50
	<b>Guadeloupe</b>	13 Mar 2020	24 Apr 2020	149 (12)	8.05
	<b>Cayman Islands</b>	13 Mar 2020	25 Apr 2020	70 (1)	1.43
	<b>Aruba</b>	14 Mar 2020	23 Apr 2020	100 (2)	2.00

<b>Bahamas</b>	15 Mar 2020	27 Apr 2020	80 (11)	13.75
<b>US Virgin Islands</b>	16 Mar 2020	23 Apr 2020	54 (3)	5.56
<b>Sint Maarten</b>	17 Mar 2020	27 Apr 2020	74 (11)	14.86
<b>Montserrat</b>	17 Mar 2020	25 Apr 2020	11 (1)	9.09
<b>Barbados</b>	17 Mar 2020	28 Apr 2020	80 (6)	7.50
<b>El Salvador</b>	18 Mar 2020	28 Apr 2020	345 (8)	2.32
<b>Nicaragua</b>	18 Mar 2020	27 Apr 2020	13 (3)	23.08
<b>Bermuda</b>	18 Mar 2020	28 Apr 2020	110 (6)	5.45
<b>Haiti</b>	19 Mar 2020	28 Apr 2020	76 (6)	7.89
<b>Dominica</b>	22 Mar 2020	11 Apr 2020	16	
<b>Grenada</b>	22 Mar 2020	26 Apr 2020	18	
<b>Belize</b>	23 Mar 2020	14 Apr 2020	18 (2)	11.11
<b>Turks and Caicos Islands</b>	23 Mar 2020	28 Apr 2020	12 (1)	8.33
<b>Saint Kitts and Nevis</b>	24 Mar 2020	20 Apr 2020	15	
<b>British Virgin Islands</b>	25 Mar 2020	26 Apr 2020	6 (1)	16.67
<b>Anguilla</b>	26 Mar 2020	03 Apr 2020	3	
<b>Caribbean Netherlands</b>	01 Apr 2020	19 Apr 2020	5	
<b>Falkland Islands</b>	03 Apr 2020	24 Apr 2020	13	
<b>Saint Pierre and Miquelon</b>	05 Apr 2020	05 Apr 2020	1	
<b>EUROPE</b>				
<b>France</b>	24 Jan 2020	28 Apr 2020	126,835 (23,660)**	18.65
<b>Germany</b>	27 Jan 2020	28 Apr 2020	159,513 (6,237)	3.91
<b>Finland</b>	29 Jan 2020	28 Apr 2020	4,740 (193)	4.07
<b>Italy</b>	30 Jan 2020	28 Apr 2020	201,505 (27,359)	13.58
<b>Russian Federation</b>	31 Jan 2020	28 Apr 2020	93,558 (867)	0.93
<b>Spain</b>	31 Jan 2020	28 Apr 2020	232,128 (23,822)	10.26
<b>Sweden</b>	31 Jan 2020	28 Apr 2020	19,621 (2,355)	12.00
<b>United Kingdom of Great Britain</b>	31 Jan 2020	28 Apr 2020	161,145 (21,678)	13.45
<b>Belgium</b>	05 Feb 2020	28 Apr 2020	47,334 (7,331)	15.49
<b>Switzerland</b>	25 Feb 2020	28 Apr 2020	29,264 (1,677)	5.73
<b>Austria</b>	25 Feb 2020	28 Apr 2020	15,357 (569)	3.71
<b>Croatia</b>	25 Feb 2020	28 Apr 2020	2,047 (63)	3.08
<b>Norway</b>	26 Feb 2020	28 Apr 2020	7,599 (206)	2.71
<b>Romania</b>	26 Feb 2020	28 Apr 2020	11,616 (663)	5.71
<b>Estonia</b>	26 Feb 2020	28 Apr 2020	1,660 (50)	3.01
<b>Georgia</b>	26 Feb 2020	28 Apr 2020	511 (6)	1.17
<b>North Macedonia</b>	26 Feb 2020	28 Apr 2020	1,421 (71)	5.00
<b>Greece</b>	26 Feb 2020	28 Apr 2020	2,566 (138)	5.38
<b>Denmark</b>	27 Feb 2020	28 Apr 2020	8,851 (434)	4.90
<b>San Marino</b>	27 Feb 2020	26 Apr 2020	538 (41)	7.62

<b>Lithuania</b>	27 Feb 2020	28 Apr 2020	1,344 (44)**	3.27
<b>Netherlands</b>	27 Feb 2020	28 Apr 2020	38,416 (4,566)	11.89
<b>Azerbaijan</b>	27 Feb 2020	28 Apr 2020	1,717 (22)	1.28
<b>Belarus</b>	28 Feb 2020	28 Apr 2020	12,208 (79)	0.65
<b>Iceland</b>	28 Feb 2020	26 Apr 2020	1,792 (10)	0.56
<b>Ireland</b>	28 Feb 2020	28 Apr 2020	19,648 (1,102)	5.61
<b>Monaco</b>	29 Feb 2020	28 Apr 2020	95 (4)	4.21
<b>Czech Republic</b>	01 Mar 2020	28 Apr 2020	7,449 (223)	2.99
<b>Luxembourg</b>	01 Mar 2020	27 Apr 2020	3,729 (88)	2.36
<b>Armenia</b>	01 Mar 2020	28 Apr 2020	1,867 (30)	1.61
<b>Latvia</b>	02 Mar 2020	28 Apr 2020	836 (13)	1.56
<b>Portugal</b>	02 Mar 2020	28 Apr 2020	24,322 (948)	3.90
<b>Andorra</b>	02 Mar 2020	28 Apr 2020	743 (40)	5.38
<b>Liechtenstein</b>	03 Mar 2020	27 Apr 2020	82 (1)	1.22
<b>Ukraine</b>	03 Mar 2020	28 Apr 2020	9,410 (239)	2.54
<b>Slovenia</b>	04 Mar 2020	28 Apr 2020	1,408 (86)	6.11
<b>Hungary</b>	04 Mar 2020	28 Apr 2020	2,649 (291)	10.99
<b>Poland</b>	04 Mar 2020	28 Apr 2020	12,218 (596)	4.88
<b>Faroe Islands</b>	04 Mar 2020	23 Apr 2020	187	
<b>Bosnia and Herzegovina</b>	05 Mar 2020	28 Apr 2020	1,585 (63)	3.97
<b>Gibraltar</b>	05 Mar 2020	27 Apr 2020	141	
<b>Slovakia</b>	06 Mar 2020	28 Apr 2020	1,384 (20)	1.45
<b>Serbia</b>	06 Mar 2020	28 Apr 2020	8,497 (168)	1.98
<b>Vatican City</b>	06 Mar 2020	10 Apr 2020	9	
<b>Malta</b>	07 Mar 2020	28 Apr 2020	458 (4)	0.87
<b>Moldova</b>	07 Mar 2020	28 Apr 2020	3,638 (103)	2.83
<b>Bulgaria</b>	08 Mar 2020	28 Apr 2020	1,387 (58)	4.18
<b>Albania</b>	09 Mar 2020	28 Apr 2020	750 (30)	4.00
<b>Cyprus</b>	09 Mar 2020	27 Apr 2020	822 (14)	1.70
<b>Channel Islands</b>	09 Mar 2020	28 Apr 2020	530 (35)	6.60
<b>Jersey</b>	10 Mar 2020	05 Apr 2020	126 (3)	2.38
<b>Kazakhstan</b>	13 Mar 2020	28 Apr 2020	3,027 (25)	0.83
<b>Kosovo</b>	13 Mar 2020	28 Apr 2020	780 (22)	2.82
<b>Uzbekistan</b>	15 Mar 2020	28 Apr 2020	1,939 (8)	0.41
<b>Greenland</b>	16 Mar 2020	05 Apr 2020	11	
<b>Montenegro</b>	17 Mar 2020	26 Apr 2020	321 (7)	2.18
<b>Kyrgyzstan</b>	18 Mar 2020	28 Apr 2020	708 (8)	1.13
<b>Isle of Man</b>	19 Mar 2020	28 Apr 2020	308 (20)	6.49
<b>MIDDLE EAST</b>				
<b>UAE</b>	29 Jan 2020	28 Apr 2020	11,380 (89)	0.78
<b>Iran</b>	19 Feb 2020	28 Apr 2020	92,584 (5,877)	6.35
<b>Israel</b>	21 Feb 2020	28 Apr 2020	15,589 (208)	1.33
<b>Lebanon</b>	21 Feb 2020	28 Apr 2020	717 (24)	3.35
<b>Kuwait</b>	24 Feb 2020	28 Apr 2020	3,440 (23)	0.67
<b>Oman</b>	24 Feb 2020	28 Apr 2020	2,131 (10)	0.47
<b>Bahrain</b>	24 Feb 2020	28 Apr 2020	2,810 (8)	0.28
<b>Iraq</b>	24 Feb 2020	28 Apr 2020	1,847 (88)	4.76

	<b>Qatar</b>	29 Feb 2020	28 Apr 2020	11,921 (10)	0.08
	<b>Saudi Arabia</b>	02 Mar 2020	28 Apr 2020	20,077 (152)	0.76
	<b>Jordan</b>	02 Mar 2020	28 Apr 2020	449 (7)**	1.56
	<b>Palestine</b>	05 Mar 2020	28 Apr 2020	501 (4)	0.80
	<b>Syria</b>	22 Mar 2020	27 Apr 2020	43 (3)	6.98
	<b>Yemen</b>	10 Apr 2020	10 Apr 2020	1	
<b>AFRICA</b>	<b>Egypt</b>	14 Feb 2020	28 Apr 2020	5,042 (359)	7.12
	<b>Algeria</b>	25 Feb 2020	28 Apr 2020	3,649 (437)	11.98
	<b>Nigeria</b>	28 Feb 2020	28 Apr 2020	1,337 (40)	2.99
	<b>Tunisia</b>	02 Mar 2020	28 Apr 2020	967 (39)	4.03
	<b>Morocco</b>	02 Mar 2020	28 Apr 2020	4,246 (163)	3.84
	<b>Senegal</b>	02 Mar 2020	28 Apr 2020	823 (9)	1.09
	<b>South Africa</b>	05 Mar 2020	28 Apr 2020	4,793 (90)	1.88
	<b>Cameroon</b>	06 Mar 2020	28 Apr 2020	1,705 (58)	3.40
	<b>Togo</b>	06 Mar 2020	28 Apr 2020	99 (6)	6.06
	<b>Burkina Faso</b>	09 Mar 2020	28 Apr 2020	635 (42)	6.61
	<b>Democratic Republic of Congo</b>	10 Mar 2020	28 Apr 2020	471 (30)	6.37
	<b>Ivory Coast</b>	11 Mar 2020	28 Apr 2020	1,164 (14)	1.20
	<b>Reunion</b>	11 Mar 2020	28 Apr 2020	418	
	<b>Ghana</b>	13 Mar 2020	26 Apr 2020	1,550 (11)	0.71
	<b>Guinea</b>	13 Mar 2020	28 Apr 2020	1,163 (7)	0.60
	<b>Gabon</b>	13 Mar 2020	28 Apr 2020	211 (3)	1.42
	<b>Sudan</b>	13 Mar 2020	28 Apr 2020	275 (22)	8.00
	<b>Kenya</b>	13 Mar 2020	28 Apr 2020	374 (14)	3.74
	<b>Ethiopia</b>	13 Mar 2020	28 Apr 2020	126 (3)	2.38
	<b>Central African Republic</b>	14 Mar 2020	28 Apr 2020	50	
	<b>Seychelles</b>	14 Mar 2020	06 Apr 2020	11	
	<b>Rwanda</b>	14 Mar 2020	28 Apr 2020	207	
	<b>Namibia</b>	14 Mar 2020	05 Apr 2020	16	
	<b>Swaziland</b>	14 Mar 2020	28 Apr 2020	71 (1)	1.41
	<b>Mauritania</b>	14 Mar 2020	14 Apr 2020	7 (1)	14.29
	<b>Mayotte</b>	14 Mar 2020	28 Apr 2020	460 (4)	0.87
	<b>Equatorial Guinea</b>	15 Mar 2020	26 Apr 2020	258 (1)	0.39
	<b>Republic of Congo</b>	15 Mar 2020	28 Apr 2020	207 (8)	3.86
	<b>Benin</b>	16 Mar 2020	27 Apr 2020	64 (1)	1.56
	<b>Liberia</b>	16 Mar 2020	28 Apr 2020	133 (16)	12.03
	<b>Tanzania</b>	16 Mar 2020	25 Apr 2020	299 (10)	3.34
	<b>Somalia</b>	16 Mar 2020	27 Apr 2020	480 (26)	5.42
	<b>Gambia</b>	17 Mar 2020	20 Apr 2020	10 (1)	10.00
	<b>Zambia</b>	17 Mar 2020	28 Apr 2020	95 (3)	3.16
	<b>Mauritius</b>	18 Mar 2020	24 Apr 2020	334 (10)	2.99
	<b>Djibouti</b>	18 Mar 2020	28 Apr 2020	1,035 (2)	0.19
	<b>Niger</b>	19 Mar 2020	26 Apr 2020	684 (27)	3.95
	<b>Chad</b>	19 Mar 2020	26 Apr 2020	46	
	<b>Zimbabwe</b>	20 Mar 2020	28 Apr 2020	32 (4)	12.50
	<b>Cape Verde</b>	20 Mar 2020	28 Apr 2020	114 (1)	0.88
	<b>Madagascar</b>	20 Mar 2020	28 Apr 2020	128	
	<b>Uganda</b>	21 Mar 2020	27 Apr 2020	79	
	<b>Eritrea</b>	21 Mar 2020	19 Apr 2020	39	
	<b>Angola</b>	21 Mar 2020	28 Apr 2020	27 (2)	7.41
	<b>Mozambique</b>	22 Mar 2020	27 Apr 2020	76	
	<b>Libya</b>	24 Mar 2020	25 Apr 2020	61 (2)	3.28
	<b>Guinea-Bissau</b>	25 Mar 2020	28 Apr 2020	73 (1)	1.37
<b>Mali</b>	25 Mar 2020	28 Apr 2020	408 (23)	5.64	

	<b>Botswana</b>	30 Mar 2020	23 Apr 2020	22 (1)	4.55
	<b>Sierra Leone</b>	31 Mar 2020	28 Apr 2020	99 (4)	4.04
	<b>Burundi</b>	31 Mar 2020	22 Apr 2020	11 (1)	9.09
	<b>Malawi</b>	02 Apr 2020	27 Apr 2020	36 (3)	8.33
	<b>South Sudan</b>	05 Apr 2020	26 Apr 2020	6	
	<b>Sao Tome and Principe</b>	06 Apr 2020	28 Apr 2020	8	
				<b>2,971,548</b>	
				<b>(211,707)</b>	

The calculated CFR is based on reported deaths and reported case counts, and does not account for recovered cases over time or rate of testing in a particular region.

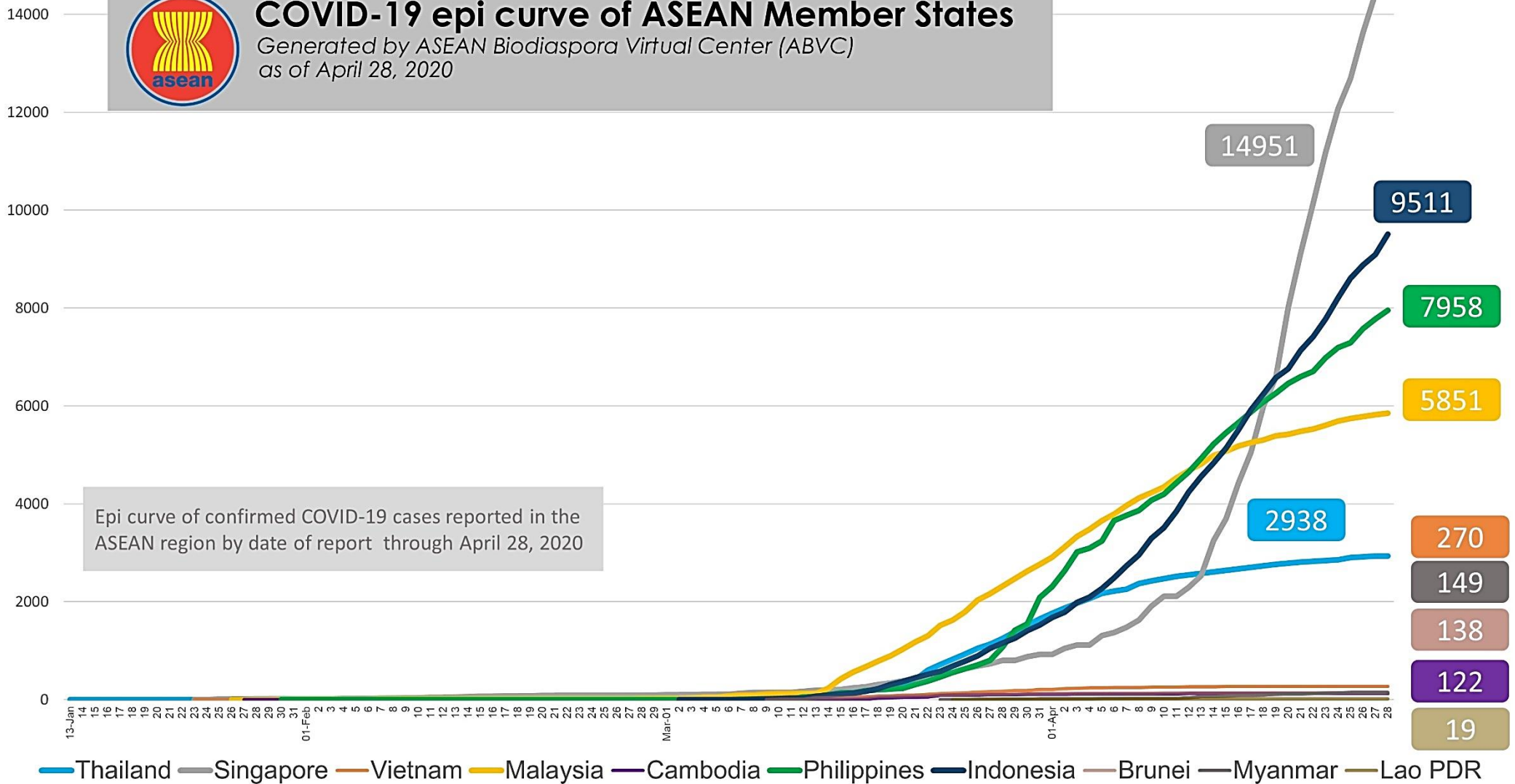
\*\*adjusted cumulative count from last report



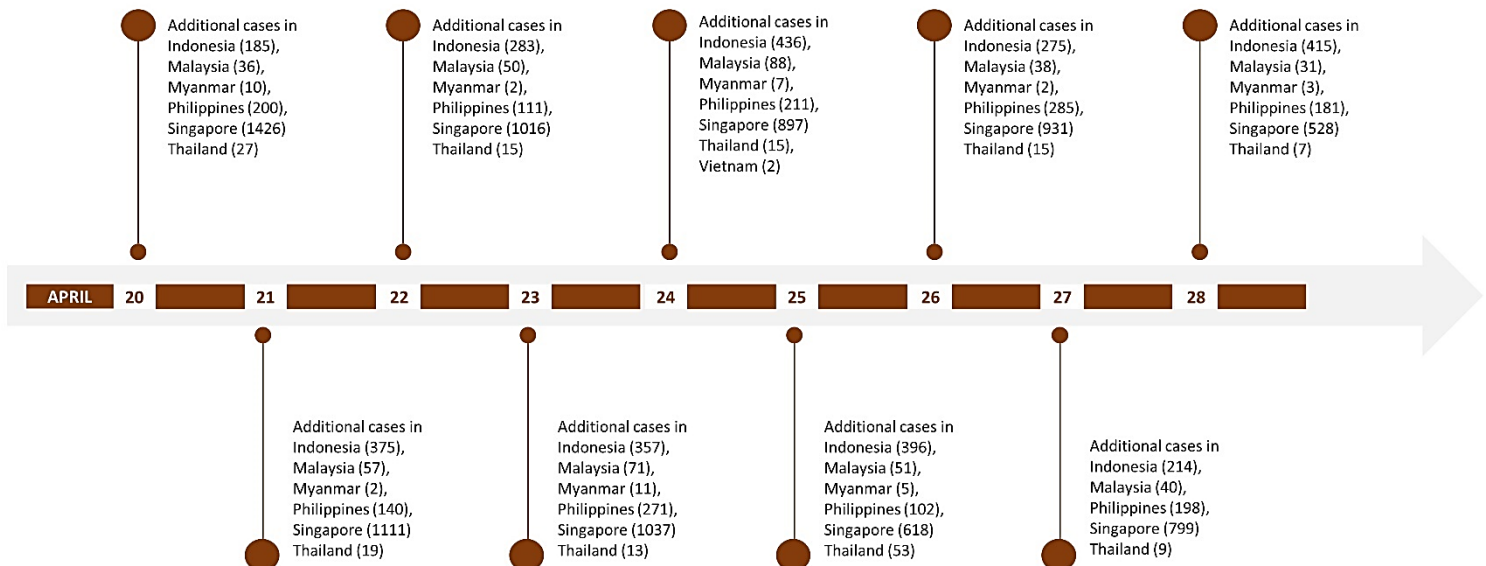
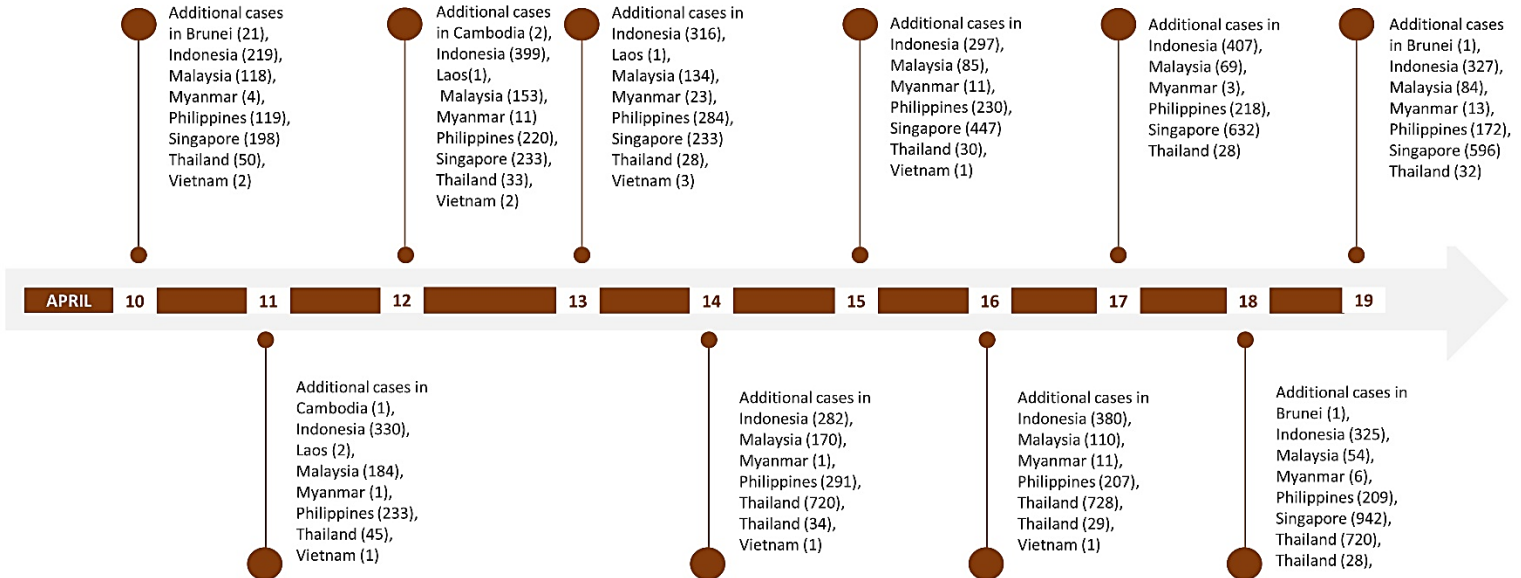


# COVID-19 epi curve of ASEAN Member States

Generated by ASEAN Biodiaspora Virtual Center (ABVC)  
as of April 28, 2020



## Timeline of COVID-19: ASEAN (continuation)



## Transmission Category of COVID-19 Affected Countries

BlueDot has classified countries worldwide into categories based on the observed rate of COVID-19 transmission using data generated by BlueDot's global epidemic surveillance system, as of 9:00AM EST on 28 April 2020. To contextualize each country's current situation, BlueDot calculated: (1) each country's rate of change for COVID-19 case reports over 7 days, (2) case fatality ratios (CFR) for each country, (3) each country's COVID-19 case burden, per 1,000 population and (4) each country's case doubling time (in days). We also utilized the Infectious Disease Vulnerability Index as a measure of each country's public health capacity to detect, respond, and/or control a COVID-19 outbreak.

The following report includes the following figures and table:

Map 1: Map depicting countries by the corresponding COVID-19 transmission category, as defined below.

Map 2: Map depicting the total number of COVID-19 cases reported per 1,000 population at a national level since the beginning of the pandemic. This case count includes active cases, resolved cases, and fatalities.

Table: Summary of country categorizations, IDVI value, and COVID-19 cases per 1,000 population

- A** **Countries reporting <100 cases and a slowly increasing rate of COVID-19 transmission**
  - These countries have reported <100 cases of COVID-19, a CFR  $\leq 4\%$ , and have a favorable IDVI suggesting adequate capacity to detect, respond, and/or control an epidemic.
  - Interpretation: These countries may be in an early phase of the epidemic, with limited community-based transmission.
- B** **Countries reporting a steadily increasing OR stabilizing rate of COVID-19 transmission**
  - These countries have reported  $\geq 100$  cases of COVID-19 and have a steadily increasing OR stabilizing rate of COVID-19 transmission (i.e. the number of new cases reported each day is consistent, or increasing at a low rate).
  - Interpretation: These countries may be in an early stage of the epidemic with either steadily increasing community-based transmission, OR demonstrating early evidence of effective epidemic control measures, OR have incomplete testing/reporting.
- C** **Countries reporting a rapidly increasing rate of COVID-19 transmission**
  - These countries have reported  $\geq 100$  cases of COVID-19 and have a rapidly accelerating rate of COVID-19 transmission.
  - Interpretation: These countries may be in the most aggressive stages of the epidemic and are experiencing widespread community-based transmission and likely have sufficient testing capacity.
- D** **Countries reported a negative rate of COVID-19 transmission**
  - These countries have reported  $\geq 100$  cases of COVID-19 and have a decelerating rate of COVID-19 transmission.
  - Interpretation: These countries may be in the mid- or later stages of the epidemic, with a negative rate of transmission (i.e. fewer new cases reported each day) due to robust and effective control measures.
- E** **Countries where insufficient information is available on COVID-19 transmission**
  - These countries have not reported imported or local cases of COVID-19

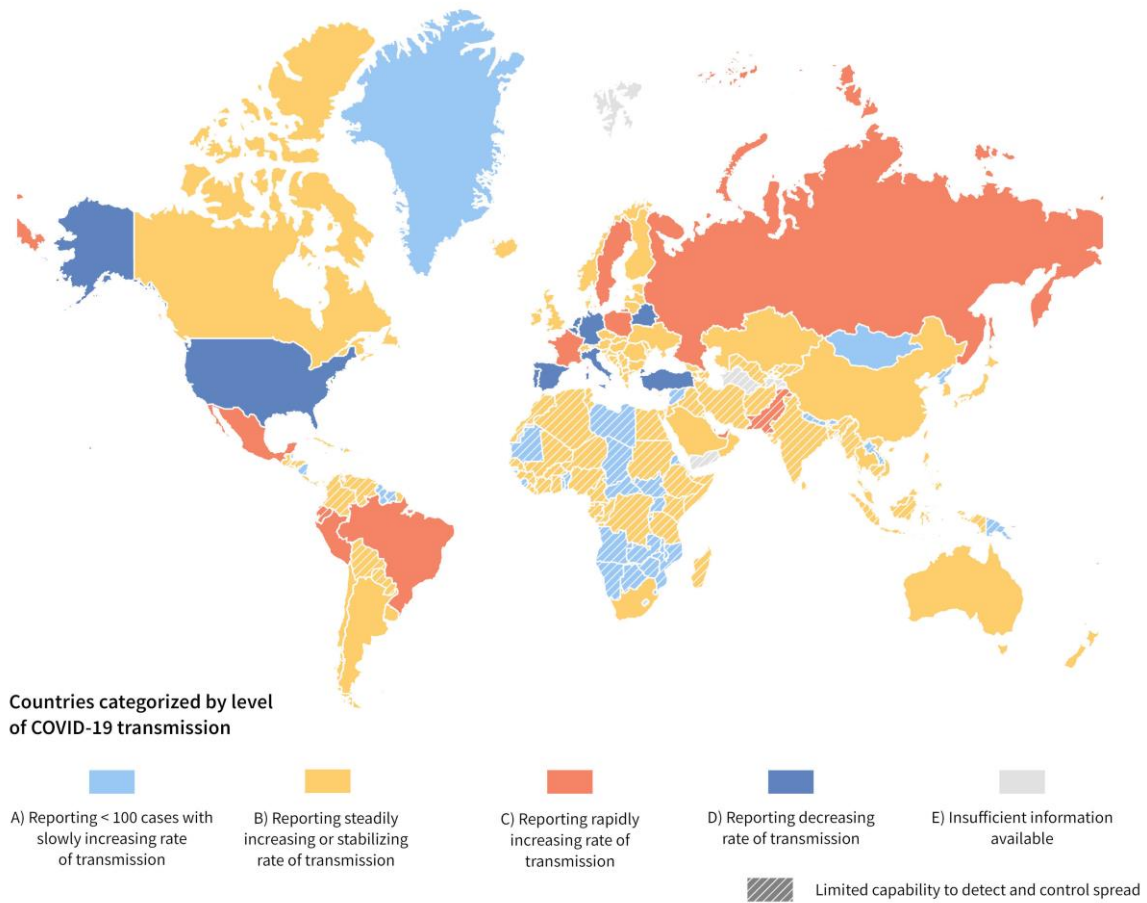


Figure 1. Map depicting countries by the corresponding COVID-19 transmission category

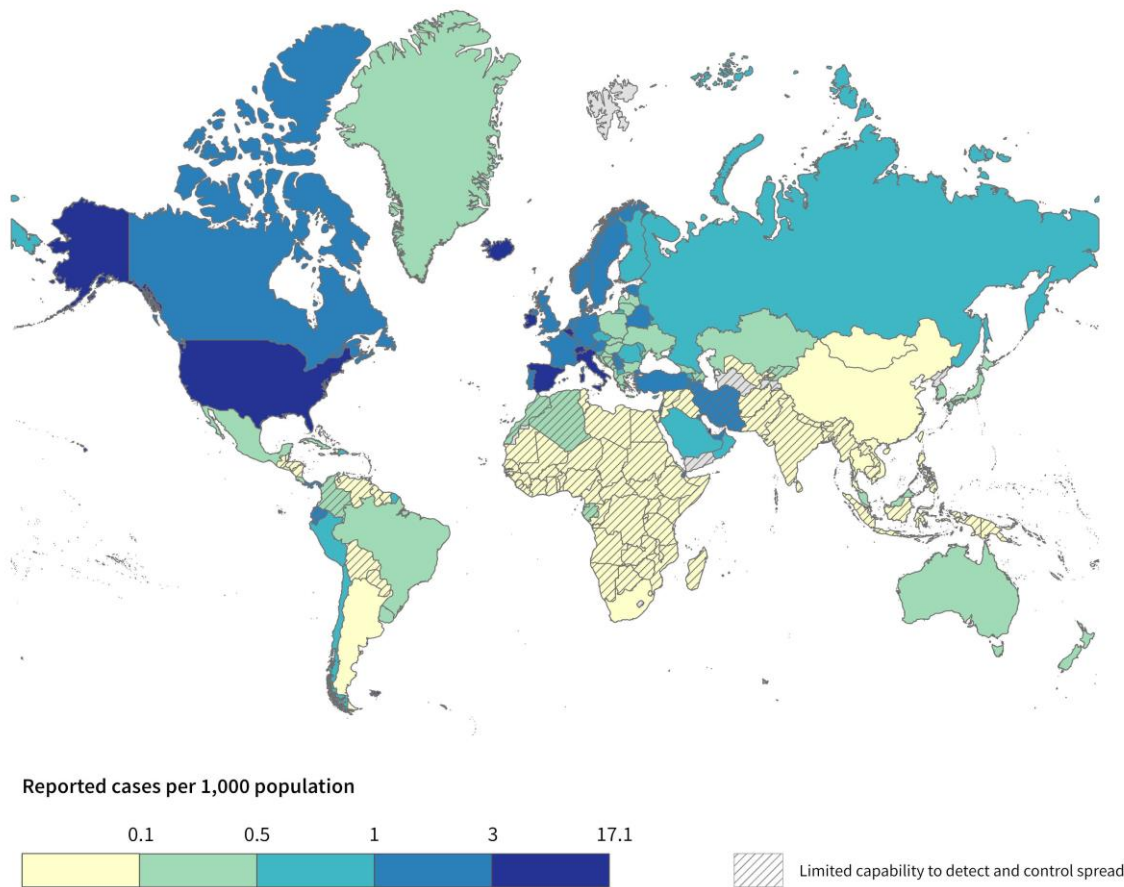


Figure 2. Map depicting the total number of COVID-19 cases reported per 1,000 population at a national level since the beginning of the pandemic. This include active cases, resolved cases, and fatalities

Table 1. Summary of ASEAN Member States' country categorization, IDVI value, and COVID-19 cases per 1,000 population as of 28 April 2020

Country	COVID-19 Category As of April 3 <sup>1</sup>	COVID-19 Category As of April 7 <sup>1</sup>	COVID-19 Category As of April 9 <sup>1</sup>	COVID-19 Category As of April 15 <sup>1</sup>	COVID-19 Category As of April 17 <sup>1</sup>	COVID-19 Category As of April 21 <sup>1</sup>	COVID-19 Category As of April 24 <sup>1</sup>	COVID-19 Category As of April 28 <sup>1</sup>	IDVI Score	Doubling Time (days) <sup>4</sup>	Confirmed COVID-19 cases per 1,000 Population
Brunei	B	B	B	B	B	B	B	B	0.763	37	0.349
Cambodia	B	B	B	B	B	B	B	B	0.355	21	0.008
Indonesia	B	B	B	B	B	B	B	B	0.563	15	0.037
Laos	E	E	A	A	A	A	A	A	0.355	13	0.003
Malaysia	B	B	B	B	B	B	B	B	0.761	26	0.206
Myanmar	E	E	A	A	A	B	B	B	0.448	12	0.003
Philippines	D	B	B	B	B	B	B	B	0.545	19	0.078
Singapore	B	B	B	C	C	C	B	B	0.878	8	4.065
Thailand	B	B	B	B	B	B	B	B	0.711	29	0.044
Vietnam	B	B	B	B	B	B	B	B	0.626	31	0.003

(refer to additional file for country categorization globally)

\* Categorized based on suspected cases of COVID-19. Confirmed COVID-19 cases count & cases per 1,000 population unavailable.

<sup>1</sup> Categorization determined based on the 7-day rate-of-change in new case reports.

<sup>2</sup> Doubling time is calculated retrospectively based on cumulative case reports as of April 28, 2020 at 9:00AM EST.



Report generated by  
**ASEAN Biodiaspora Virtual Center (ABVC)**  
 in collaboration with **Bluedot Inc.**  
 Email: [support@biodiaspora.org](mailto:support@biodiaspora.org)

