





Monthly summary report

Hospital Based Human Influenza Surveillance in Bangladesh

October 2021

Hospital based influenza surveillance Monthly enrollment by different wards (Medicine, Pediatrics and CCU) October 2021

| Hospital | District | ſ | Medicine ward | d | Pediatric | :s ward (≤12 ye | ears of age) | Coronary Care Unit (CCU) | | | |
|----------|-------------|--------|---------------|-------|-----------|------------------------|--------------|--------------------------|-----|-------|--|
| | | Sample | Flu | Flu % | Sample | Flu | Flu % | Sample | Flu | Flu % | |
| JIMCH | Kishoregonj | 23 | 4 | 17 | 14 | 2 | 14 | 1 | 0 | 0 | |
| RMCH | Rajshahi | 25 | 6 | 24 | 9 | 0 | 0 | 1 | 0 | 0 | |
| CuMCH | Cumilla | 21 | 13 | 62 | 11 | 4 | 36 | 1 | 0 | 0 | |
| КМСН | Khulna | 21 | 10 | 48 | 9 | 1 | 11 | 0 | 0 | 0 | |
| JGH | Jashore | 13 | 5 | 38 | 13 | 3 | 23 | 1 | 1 | 100 | |
| JRRMCH | Sylhet | 16 | 10 | 63 | 11 | 1 | 9 | 0 | 0 | 0 | |
| SBMCH | Barishal | 14 | 10 | 71 | 25 | 12 | 48 | 1 | 1 | 100 | |
| СМСН | Chattogram | 35 | 15 | 43 | 9 | 2 | 22 | 2 | 2 | 100 | |
| MARMCH | Dinajpur | 1 | 0 | 0 | 14 | 2 | 14 | 1 | 0 | 0 | |
| | | 169 | 73 | 43 | 115 | 27 | 23 | 8 | 4 | 50 | |

Hospital based influenza surveillance Monthly hospitalwise influenza lab results October 2021

| Hospital | District | Sample | Flu | Flu % | Flu A | Flu B | Flu A+B | Flu A/H1 | Flu A/H3 | Flu A/H5 | Flu A/H7 | Flu A/ (H1N1)pdm09 | Flu B Yamagata lineage | Flu B Victoria lineage |
|----------|-------------|--------|-----|-------|-------|-------|---------|----------|----------|----------|----------|-----------------------|------------------------------|------------------------------|
| JIMCH | Kishoregonj | 38 | 6 | 16 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 6 | 0 | 0 |
| RMCH | Rajshahi | 35 | 6 | 17 | 6 | 0 | 0 | 0 | 0 | 0 | 0 | 6 | 0 | 0 |
| CuMCH | Cumilla | 33 | 17 | 52 | 17 | 0 | 0 | 0 | 0 | 0 | 0 | 17 | 0 | 0 |
| КМСН | Khulna | 30 | 11 | 37 | 11 | 0 | 0 | 0 | 3 | 0 | 0 | 8 | 0 | 0 |
| JGH | Jashore | 27 | 9 | 33 | 9 | 0 | 0 | 0 | 1 | 0 | 0 | 8 | 0 | 0 |
| JRRMCH | Sylhet | 27 | 11 | 41 | 11 | 0 | 0 | 0 | 0 | 0 | 0 | 11 | 0 | 0 |
| SBMCH | Barishal | 40 | 23 | 58 | 23 | 0 | 0 | 0 | 0 | 0 | 0 | 23 | 0 | 0 |
| СМСН | Chattogram | 46 | 19 | 41 | 19 | 0 | 0 | 0 | 1 | 0 | 0 | 18 | 0 | 0 |
| MARMCH | Dinajpur | 16 | 2 | 13 | 2 | 0 | 0 | 0 | 0 | 0 | 0 | 2 | 0 | 0 |
| | | 292 | 104 | 36 | 104 | 0 | 0 | 0 | 5 | 0 | 0 | 99 | 0 | 0 |

Hospital based influenza surveillance Monthly enrollment by different surveillance groups October 2021

| Hospital | District | SA | ARI (aged ≥ 5 year | rs) | SA | SARI (aged < 5 years) | | | | | | |
|----------|-------------|--------|--------------------|-------|--------|-----------------------|-------|--|--|--|--|--|
| | | Sample | Flu | Flu % | Sample | Flu | Flu % | | | | | |
| JIMCH | Kishoregonj | 27 | 6 | 22 | 11 | 0 | 0 | | | | | |
| RMCH | Rajshahi | 26 | 6 | 23 | 9 | 0 | 0 | | | | | |
| CuMCH | Cumilla | 25 | 15 | 60 | 8 | 2 | 25 | | | | | |
| КМСН | Khulna | 23 | 11 | 48 | 7 | 0 | 0 | | | | | |
| JGH | Jashore | 18 | 9 | 50 | 9 | 0 | 0 | | | | | |
| JRRMCH | Sylhet | 19 | 10 | 53 | 8 | 1 | 13 | | | | | |
| SBMCH | Barishal | 30 | 22 | 73 | 10 | 1 | 10 | | | | | |
| СМСН | Chattogram | 37 | 17 | 46 | 9 | 2 | 22 | | | | | |
| MARMCH | Dinajpur | 8 | 1 | 13 | 8 | 1 | 13 | | | | | |
| | | 213 | 97 | 46 | 79 | 7 | 9 | | | | | |

Hospital based influenza surveillance Influenza results by different age groups October 2021

| | October 2021 | | | | | | | Initiation - October 2021 | | | | | | | | | |
|-------------|-----------------------|-----|-------|---------|----------|--------|--------|---------------------------|--------|--------|------------------|-------|---------|----------|--------|--|--|
| Age groups | SARI (aged ≥ 5 years) | | | SARI (a | aged < 5 | years) | SARI (| aged ≥ 5 | years) | | ILI [‡] | | SARI (a | aged < 5 | years) | | |
| | Sample | Flu | Flu % | Sample | Flu | Flu % | Sample | Flu | Flu % | Sample | Flu | Flu % | Sample | Flu | Flu % | | |
| <1 Year | - | - | - | 59 | 3 | 5 | - | - | - | 2665 | 189 | 7 | 8,099 | 481 | 6 | | |
| 1-4 Years | - | - | - | 20 | 4 | 20 | - | - | - | 4217 | 601 | 14 | 3,118 | 463 | 15 | | |
| 5-14 Years | 42 | 22 | 52 | - | - | - | 3814 | 878 | 23 | 2317 | 547 | 24 | - | - | - | | |
| 15-24 Years | 22 | 10 | 45 | - | - | - | 4379 | 1022 | 23 | 2167 | 413 | 19 | - | - | - | | |
| 25-39 Years | 26 | 12 | 46 | - | - | - | 4722 | 920 | 19 | 1916 | 299 | 16 | - | - | - | | |
| 40-59 Years | 56 | 20 | 36 | - | - | - | 5932 | 975 | 16 | 1245 | 201 | 16 | - | - | - | | |
| ≥ 60 Years | 67 | 33 | 49 | - | - | - | 5911 | 960 | 16 | 400 | 46 | 12 | - | - | - | | |
| | 213 | 97 | 46 | 79 | 7 | 9 | 24,758 | 4,755 | 19 | 14,927 | 2,296 | 15 | 11,217 | 944 | 8 | | |

[‡]Outpatient ILI surveillance discontinued in October 2017.

Hospital based influenza surveillance Hospitalwise influenza lab results Surveillance initiation - October 2021

| Hospital | District | Initiation | Sample | Flu | Flu % | Flu A [♥] | Flu B ^x | Flu A+B [∓] | Flu A/H1 | Flu A/H3 | Flu A/H5 | Flu A/H7 | Flu A/ (H1N1)pdm09 | Flu B Yamagata lineage | Flu B Victoria lineage |
|---------------------|-------------|------------|--------|-------|-------|--------------------|--------------------|----------------------|----------|----------|----------|----------|-----------------------|------------------------------|------------------------------|
| DNMCH ^Y | Dhaka | Jun 2007 | 2061 | 312 | 15 | 201 | 111 | 0 | 15 | 84 | 0 | 0 | 102 | 13 | 7 |
| CBMCH ^Y | Mymensingh | Oct 2007 | 2053 | 302 | 15 | 206 | 96 | 0 | 7 | 107 | 1 | 0 | 91 | 16 | 10 |
| JIMCH | Kishoregonj | Sep 2007 | 6150 | 1187 | 19 | 794 ^î | 393 | 0 | 9 | 408 | 0 | 0 | 375 | 64 | 159 |
| RMCH | Rajshahi | May 2007 | 4199 | 526 | 13 | 348 ^î | 178 | 0 | 14 | 194 | 0 | 0 | 138 | 39 | 78 |
| SZRMCH ^Y | Bogura | Sep 2007 | 3865 | 653 | 17 | 439 | 213 | 1 | 12 | 256 | 0 | 0 | 170 | 29 | 39 |
| LAMB [†] | Dinajpur | Oct 2007 | 1171 | 112 | 10 | 72 | 40 | 0 | 7 | 41 | 0 | 0 | 24 | 1 | 0 |
| BBMH [†] | Chattogram | Aug 2007 | 1440 | 157 | 11 | 118 | 39 | 0 | 13 | 42 | 0 | 0 | 63 | 3 | 0 |
| CuMCH [⊤] | Cumilla | Oct 2007 | 5588 | 692 | 12 | 460* | 229 | 3 | 9 | 229 | 0 | 0 | 221 | 28 | 51 |
| КМСН | Khulna | Jul 2007 | 3580 | 496 | 14 | 349* ^î | 147 | 0 | 16 | 166 | 0 | 0 | 163 | 17 | 69 |
| JGH ^{YI} | Jashore | Sep 2007 | 4412 | 890 | 20 | 558 | 331 | 1 | 10 | 275 | 0 | 0 | 273 | 26 | 167 |
| JRRMCH | Sylhet | Jul 2007 | 4439 | 733 | 17 | 462 ^î | 270 | 1 | 16 | 222 | 0 | 0 | 223 | 34 | 93 |
| SBMCH | Barishal | Aug 2007 | 6391 | 955 | 15 | 617 ^î | 334 | 4 | 9 | 294 | 0 | 0 | 312 | 56 | 129 |
| СМСН | Chattogram | Apr 2014 | 3406 | 595 | 17 | 412 | 180 | 3 | 0 | 149 | 0 | 0 | 263 | 41 | 119 |
| MARMCH ² | Dinajpur | Apr 2014 | 2147 | 385 | 18 | 247 ^ï | 138 | 0 | 0 | 122 | 0 | 0 | 122 | 28 | 89 |
| | | | 50,902 | 7,995 | 16 | 5,283 | 2,699 | 13 | 137 | 2,589 | 1 | 0 | 2,540 | 395 | 1,010 |

¹Influenza B typing initiated in January 2016.

 ${}^{\Psi}$ rRT-PCR result of four samples were equivocal positive for Influenza A.

^vOne sample collected in June 2013 and another sample collected in June 2017 were co-infected with both A(H3) and A(H1N1)pdm09.

^xThree samples were co-infected with both Influenza B (Yamagata lineage) and Influenza B (Victoria lineage), another ten samples were unsubtypeable.

⁺Three samples were co-infected with both Influenza A(H1N1)pdm09 and Influenza B (Victoria lineage).

ⁱOne sample collected in May 2019 was co-infected with both Influenza A(H3) and Influenza B (Victoria lineage).

[†]Surveillance activities ended at LAMB (Dinajpur) and BBMH (Chittagong) in May 2016.

^ŸSurveillance activities ended at DNMCH (Dhaka), CBMCH (Mymensingh), SZRMCH (Bogra) and JGH (Jessore) in October 2017.

[†]Surveillance activities reinitiated at Cumilla Medical College Hospital (CuMCH), Cumilla in January 2018.

[†]Surveillance activities reinitiated at Jashore 250 bed General Hospital (JGH), Jashore in December 2018.

²Dinajpur Medical College Hospital (DjMCH) has been renamed as M Abdur Rahim Medical College Hospital (MARMCH).

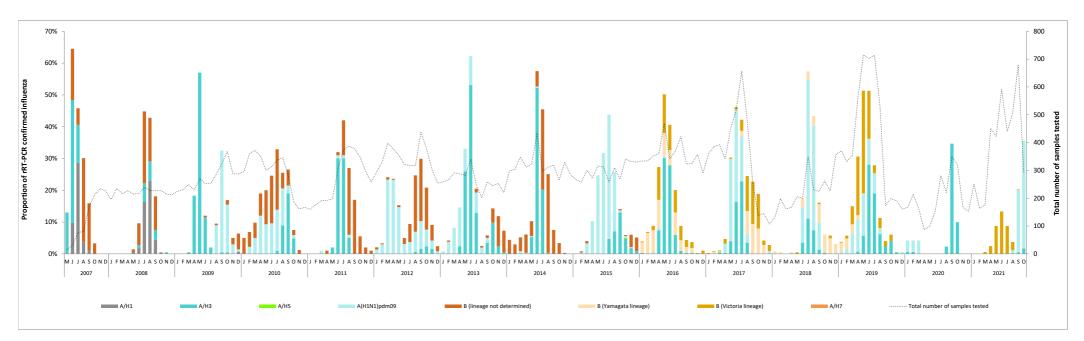
Note: Surveillance activities extended to the intensive care units (ICU) and coronary care unit (CCU) of the participating hospitals in January 2018.

^(*) Intensive care units (ICU) surveillance discontinued in January 2019.

*One sample from CuMCH (Cumilla) and two samples from KMCH (Khulna) collected in November 2019 were not true positive for influenza A and were considered as inconclusive result. The result will be confirmed with further test through viral culture.

^îNine samples (one each from JIMCH, JRRMCH and MARMCH and two each from RMCH, KMCH and SBMCH) collected in December 2019 were not true positive for influenza A and were considered as inconclusive result. The result will be confirmed with further test through viral culture.

Hospital based influenza surveillance Influenza seasonality graph May 2007 - October 2021



Note: Influenza B typing initiated in January 2016

Hospital based influenza surveillance Influenza seasonality graph Week 44 of 2020 to week 43 of 2021

