***Epidemiology and Infection***

**Impact of implementing free varicella vaccination policy on incidence in Wuxi city, China: An interrupted time-series analysis**

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*Supplementary Material*

Figure S1. Wuxi city in China

Figure S2. Varicella incidence and vaccination coverage

Table S1. Results of autocorrelation

Table S2. Effect of the inclusion of varicella vaccine in the EPI on varicella incidence

Figure S3. Decomposing of varicella incidence from 2017 to 2021



**Figure S1. Wuxi city in China**



**Figure S2. Varicella incidence and vaccination coverage#**

# Coverage by month was calculated by dividing the number of children aged 12 months to 84 months (eligible for varicella vaccination) getting vaccination by the total age-specific number of children at a given month.

**Table S1. Results of autocorrelation**

|  |  |  |
| --- | --- | --- |
| Modelling | Original D-W statistic | Transformed D-W statistic after prais-Winsten  |
| Total population | 0.757 | 1.139 |
| Age | ≤7 years old | 0.838 | 1.330 |
| 8-14 years old | 0.788 | 1.159 |
| >14 years old | 0.657 | 1.003 |
| Before the COVID-19 pandemic | Total population | 0.768 | 1.150 |
| ≤7 years old | 0.858 | 1.308 |
| 8-14 years old | 0.743 | 1.118 |
| >14 years old | 0.709 | 1.083 |
| Excluding seasonality | Total population | 0.602 | 1.183 |
| ≤7 years old | 0.757 | 1.398 |
| 8-14 years old | 0.588 | 1.141 |
| >14 years old | 0.569 | 1.460 |

**Table S2. Effect of the inclusion of varicella vaccine in the EPI on varicella incidence**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Subgroup | Variable | $β$-value  | t-value | *P-*value |
| Before the COVID-19 pandemic | Total population | β1 | 0.009 | 1.908 | 0.065 |
| β2 | -0.149 | -2.044 | 0.049 |
| β3 | -0.001 | -0.101 | 0.920 |
| ≤7 years old | β1 | 0.056 | 1.975 | 0.057 |
| β2 | -0.815 | -1.668 | 0.105 |
| β3 | -0.077 | -0.974 | 0.338 |
| 8-14 years old | β1 | 0.063 | 1.970 | 0.058 |
| β2 | -1.296 | -2.570 | 0.015 |
| β3 | 0.039 | 0.442 | 0.662 |
| >14 years old | β1 | 0.002 | 1.483 | 0.148 |
| β2 | -0.031 | -1.703 | 0.098 |
| β3 | 0.002 | 0.467 | 0.644 |
| Excluding seasonality | Total population | β1 | 0.006 | 2.459 | 0.017 |
| β2 | -0.037 | -1.162 | 0.250 |
| β3 | -0.012 | -3.740 | <0.001 |
| ≤7 years old | β1 | 0.037 | 2.244 | 0.029 |
| β2 | -0.358 | -1.457  | 0.151 |
| β3 | -0.078 | -3.613 | 0.001 |
| 8-14 years old | β1 | 0.046 | 2.383 | 0.020 |
| β2 | -0.350 | -1.447 | 0.153 |
| β3 | -0.084 | -3.251 | 0.002 |
| >14 years old | β1 | 0.001 | 2.113 | 0.039 |
| β2 | 0.000 | -0.029 | 0.977 |
| β3 | -0.003 | -3.737 | <0.001 |



**Figure S3. Decomposing of varicella incidence from 2017 to 2021**