**Supplementary Table 1:** Mean weekly incidence rate (GPIH), mean weekly percentage consultations (GPOOH) and mean weekly percentage ED attendances calculated over rotavirus seasons (defined as week 1-22 of each season) and compared between pre- and post-vaccine years for A) gastroenteritis B) diarrhoea and C) vomiting. Unpaired, Student’s t-test performed at 95% CI.

A) Gastroenteritis

|  |  |  |  |
| --- | --- | --- | --- |
| Age group | GPIH gastroenteritis mean weekly incidence rates over rotavirus seasona, pre – post vaccine year (p value) | GPOOH gastroenteritis mean weekly % consultations over rotavirus season, pre – post vaccine year (p value) | EDSSS gastroenteritis mean weekly % attendances over rotavirus season, pre – post vaccine year (p value) |
| < 1 | 837.7-599.4 (0.001) | 16.8-11.9 (0.0001) | 5.0-3.3 (0.001) |
| 1 - 4 | 333.1-245.7 (0.01) | 10.9-7.6 (0.0001) | 3.6-2.7 (0.001) |
| 5 - 14 | 74.8-64.8 (0.05) | 5.5-4.7 (0.0001) | 1.0-1.1 (0.01) |
| 15 - 64 | 55.4-54.1 (0.2) | 3.7-3.5 (0.2) | 0.6-0.7 (0.1) |
| ≥65 | 114.7-112.1 (0.2) | 4.8-4.3 (0.1) | 0.7-0.6 (0.1) |

B) Diarrhoea

|  |  |  |
| --- | --- | --- |
| Age group | GPIH diarrhoea mean weekly incidence rates over rotavirus seasona, pre – post vaccine year (p value) | GPOOH diarrhoea mean weekly % consultations over rotavirus season, pre – post vaccine year (p value) |
| < 1 | 387.4-279.0 (0.001) | 3.3-2.6 (0.0001) |
| 1 - 4 | 140.6-105.7 (0.01) | 1.6-1.2 (0.0001) |
| 5 - 14 | 27.4-24.3 (0.07) | (0.6-0.6) 0.4 |
| 15 - 64 | 31.0-31.7 (0.2) | 0.9-0.9 (0.2) |
| ≥65 | 74.0-76.1 (0.1) | 1.8-1.7 (0.01) |

C) Vomiting

|  |  |  |
| --- | --- | --- |
| Age group | GPIH vomiting mean weekly incidence rates over rotavirus seasona, pre – post vaccine year (p value) | GPOOH vomiting mean weekly % consultations over rotavirus season, pre – post vaccine year (p value) |
| < 1 | 309.8-228.6 (0.005) | 5.1-4.5 (0.0001) |
| 1 - 4 | 126.4-86.8 (0.009) | 3.1-2.5 (0.0001) |
| 5 - 14 | 30.4-24.3 (0.01) | 1.7-1.6 (0.001) |
| 15 - 64 | 13.4-12.3 (0.01) | 1.1-1.1 (0.1) |
| ≥65 | 26.4-23.7 (0.01) | 1.8-1.7 (0.001) |

Abbreviations: GPIH, GP in hours; GPOOH, GP out of hours; EDSSS, Emergency Department Syndromic Surveillance System. a Mean weekly GPIH incidence rates and *p* values were calculated using data from weeks 14-22 only (see methods for explanation).

**Supplementary Table 2:** Incidence rate ratios for gastroenteritis in GPIH by age group during the rotavirus seasons (comparing pre- and post-vaccine years). CI at 95% were calculated via the Taylor approximation method [[25](#_ENREF_25)] with the assumption that there was independence between the years so that the covariance term was zero. An equivalent ratio for the GPOOH and EDSSS termed ‘percentage ratio’ was also calculated and shown for rotavirus (defined as week 1-22) and non-rotavirus seasons.

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Incidence rate ratio (CI 95%)** | | **Percentage ratio (CI 95%)** | | | | |
|  | GPIH gastroenteritis | GPOOH gastroenteritis | | | EDSSS gastroenteritis | |
| Age group | Rotavirus seasona | Non-rotavirus season |  | Rotavirus season | Non-rotavirus season | Rotavirus season |
| < 1 | 0.74 (0.37-1.12) | 0.95 (0.69-1.22) |  | 0.70 (0.44-0.97) | 0.88 (0.24-1.51) | 0.67 (0.28-1.07) |
| 1 - 4 | 0.77 (0.26-1.29) | 0.94 (0.66-1.22) |  | 0.69 (0.34-1.05) | 0.69 (0.20-1.19) | 0.74 (0.27-1.22) |
| 5 - 14 | 0.92 (0.32-1.51) | 1.03 (0.70-1.36) |  | 0.89 (0.59-1.19) | 0.92 (0.04-1.80) | 1.16 (0.40-1.93) |
| 15 - 64 | 1.02 (0.65-1.39) | 0.95 (0.78-1.11) |  | 0.92 (0.77-1.07) | 0.80 (0.32-1.29) | 1.12 (0.64-1.61) |
| ≥65 | 1.04 (0.71-1.36) | 0.90 (0.77-1.03) |  | 0.88 (0.73-1.02) | 0.68 (0.11-1.24) | 0.87 (0.36-1.38) |
| All ages | 0.94 (0.56-1.31) | 0.93 (0.76-1.11) |  | 0.81 (0.58-1.03) | 0.78 (0.35-1.21) | 0.91 (0.49-1.32) |

Abbreviations: GPIH, GP in hours; GPOOH, GP out of hours; EDSSS, Emergency Department Syndromic Surveillance System. a Incidence rate ratios for GPIH were calculated using data from weeks 14-22 only (see methods for explanation).