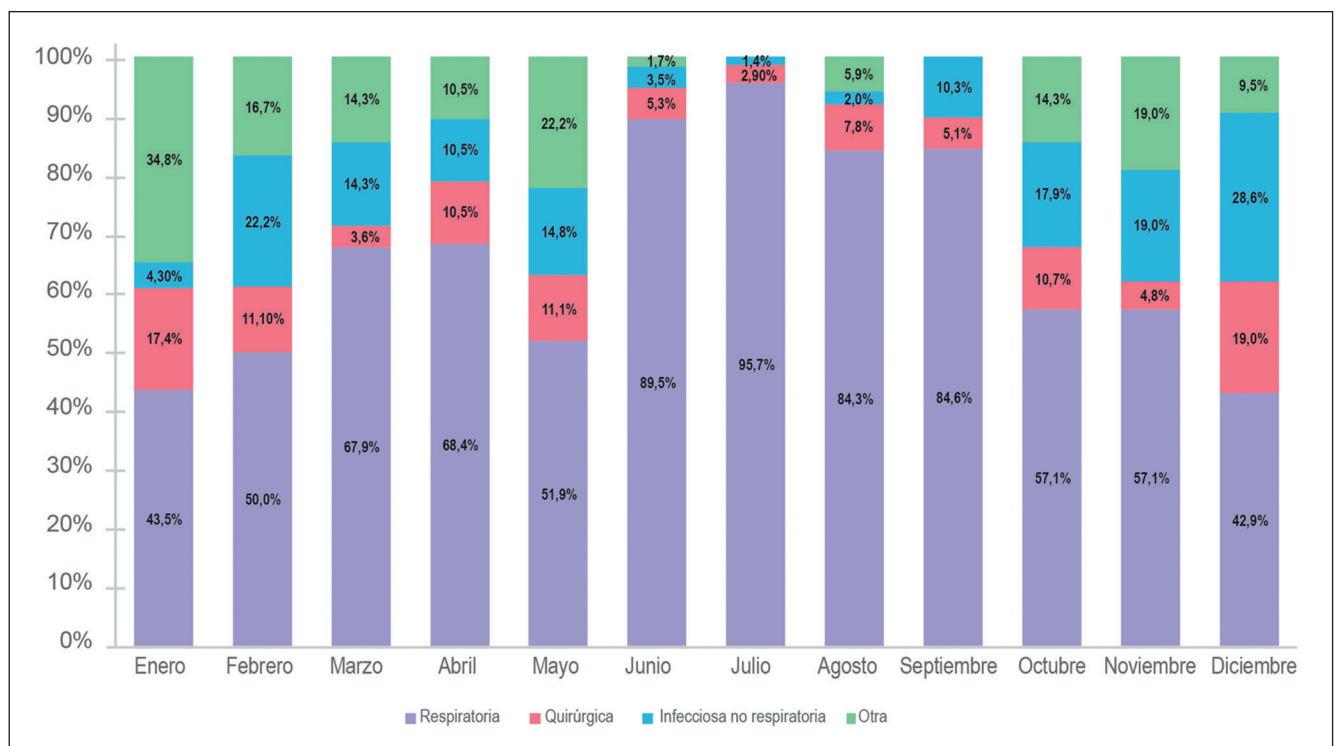


## Rehospitalization of preterm infants below 32 weeks of gestational age in the first 2 years post discharge

Rehospitalización en prematuros menores de 32 semanas o menores de 1.500 g en los primeros 2 años posteriores al alta



**Supplementary figure 1.** First re-hospitalization cause by month of the year. Chile, 2009-2017. First re-hospitalization cause by month of the year. Chile, 2009-2017. Respiratory conditions were the main cause of re-hospitalization all year round, increasing in winter season (June to September). Sections with no level refers to less than 2 percent of the month's cases.

**Supplementary Table 1. General description and perinatal characteristics of newborns by period under study. Chile, 2009-2017**

|                                                 | Period I<br>2009-2011<br>(n = 324) | Period II<br>2012-2014<br>(n = 390) | Period III<br>2015-2017<br>(n = 275) | Total<br>2009-2017<br>(n = 989) | P value                |
|-------------------------------------------------|------------------------------------|-------------------------------------|--------------------------------------|---------------------------------|------------------------|
| Newborn descriptives                            | 43.5                               | 45.4                                | 41.1                                 | 43.6                            | 0.546                  |
| Male sex, %                                     | 29.3 (2.4)                         | 29.2 (2.4)                          | 29.5 (2.2)                           | 29.3 (2.3)                      | 0.226                  |
| GA (weeks), mean (SD)                           | 34.9                               | 34.1                                | 30.5                                 | 33.4                            | 0.494                  |
| GA ≤ 28 weeks, %                                | 1256 (336)                         | 1279 (355)                          | 1287 (349)                           | 1274 (347)                      | 0.510                  |
| Weight at birth (g), mean (SD)                  | 12.3                               | 17.9                                | 20.4                                 | 16.8                            | 0.023 <sup>(a)</sup>   |
| Twin, %                                         | 81.1                               | 76.1                                | 76.4                                 | 77.8                            | 0.232                  |
| Cesarean birth, %                               | 14.2                               | 16.8                                | 16.5                                 | 15.8                            | 0.593                  |
| 1-min Apgar score ≤ 3, %                        | 1.6                                | 0.8                                 | 0.7                                  | 1.0                             | 0.524                  |
| 5-min Apgar score ≤ 3, %                        |                                    |                                     |                                      |                                 |                        |
| Descriptivos maternos                           |                                    |                                     |                                      |                                 |                        |
| Age (years), mean (SD)                          | 27.1 (7.2)                         | 27.1 (7)                            | 28.6 (6.3)                           | 27.5 (6.9)                      | 0.012 <sup>(b)</sup>   |
| Pregnancy control, %                            | 95.9                               | 97.0                                | 96.3                                 | 96.5                            | 0.713                  |
| Number of siblings, mean (SD)                   | 0.68 (0.93)                        | 0.95 (1.19)                         | 1.02 (1.12)                          | 0.89 (1.1)                      | < 0.001 <sup>(c)</sup> |
| Primiparous, %                                  | 52.0                               | 45.9                                | 40.7                                 | 46.4                            | 0.024 <sup>(d)</sup>   |
| Prenatal steroids, %                            | 84.8                               | 88.1                                | 89.6                                 | 87.4                            | 0.201                  |
| Neonatal stay                                   |                                    |                                     |                                      |                                 |                        |
| Length of stay (days), median (range)           | 50 (20-307)                        | 51 (13-313)                         | 53 (15-224)                          | 52 (13-313)                     | 0.818                  |
| Sepsis, %                                       | 37.7                               | 35.4                                | 39.8                                 | 37.4                            | 0.539                  |
| MV, %                                           | 52.4                               | 46.8                                | 49.4                                 | 49.2                            | 0.384                  |
| Days of MV, median (range)                      | 5 (1-179)                          | 5 (1-173)                           | 6 (1-80)                             | 5 (1-179)                       | 0.801                  |
| CPAP, %                                         | 73.8                               | 78.7                                | 79.3                                 | 77.2                            | 0.205                  |
| Bronchopulmonary dysplasia, %                   | 23.5                               | 20.7                                | 18.2                                 | 20.9                            | 0.293                  |
| Oxygen at discharge, %                          | 14.2                               | 13.4                                | 11.3                                 | 13.1                            | 0.563                  |
| Surgical ductus, %                              | 6.5                                | 2.4                                 | 1.1                                  | 3.3                             | 0.001 <sup>(e)</sup>   |
| Surgical enterocolitis, %                       | 7.3                                | 6.0                                 | 5.9                                  | 6.3                             | 0.761                  |
| Surgical rethiopathy, %                         | 3.3                                | 2.5                                 | 1.1                                  | 2.2                             | 0.258                  |
| Hemorragia intracraniana, %                     | 35.1                               | 31.3                                | 28.3                                 | 31.6                            | 0.225                  |
| Severe intracranial hemorrhage, %               | 3.5                                | 4.4                                 | 4.6                                  | 4.2                             | 0.786                  |
| Leukomalacia, %                                 | 8.2                                | 11.9                                | 5.7                                  | 8.9                             | 0.026 <sup>(f)</sup>   |
| Presence of Seizures, %                         | 12.8                               | 14.0                                | 10.7                                 | 12.6                            | 0.469                  |
| Palivizumab use, %                              | 17.9                               | 13.1                                | 28.4                                 | 18.9                            | < 0.001 <sup>(g)</sup> |
| Weight at discharge (g), mean (SD)              | 2580 (724)                         | 2557 (657)                          | 2656 (597)                           | 2593 (665)                      | 0.160                  |
| Length at discharge (cm), mean (SD)             | 45.8 (3.2)                         | 46 (3.3)                            | 46.8 (3.1)                           | 46.2 (3.3)                      | 0.001 <sup>(h)</sup>   |
| Head circumference at discharge (cm), mean (SD) | 33.41 (2.63)                       | 0.95 (1.19)                         | 33.43 (1.92)                         | 33.34 (2.34)                    | 0.385                  |
| GA at discharge (weeks), mean (SD)              | 38.3 (4.4)                         | 38.2 (4.3)                          | 38.2 (3.5)                           | 38.2 (4.2)                      | 0.962                  |
| Breastfeeding at discharge, %                   | 42.6                               | 47.2                                | 65.4                                 | 51.4                            | < 0.001 <sup>(i)</sup> |

CPAP: Continuous positive airway pressure, GA: gestational age, MV: mechanical ventilation, SD: standard deviation. <sup>(a)</sup>Significant differences across group I to III; <sup>(b)</sup>Group III significantly different from I and II; <sup>(c)</sup>Group I significantly different from II and III; <sup>(d)</sup>Group I significantly different from III; <sup>(e)</sup>Group I significantly different from II; <sup>(f)</sup>Group II significantly different from III; <sup>(g)</sup>Group III significantly different from I and II; <sup>(h)</sup>Group III significantly different from I and II; <sup>(i)</sup>Group III significantly different from I and II.