

## Caesarean sections

Caesarean sections can be a lifesaving and necessary procedure. Nonetheless, caesarean delivery continues to result in increased maternal mortality, maternal and infant morbidity, and increased complications for subsequent deliveries. This raises concerns over the growing rates of caesarean sections performed across OECD countries since 2000, in particular among women at low risk of a complicated birth who have their first baby by caesarean section for non-medical reasons. The World Health Organization concludes that caesarean sections are effective in saving maternal and infant lives, but that caesarean section rates higher than 10% are not associated with reductions in maternal and newborn mortality rates at the population level. Nevertheless, caesarean sections should be provided based on need, rather than striving to achieve a specific rate.

In 2017, caesarean section rates remain lowest in Nordic countries (Iceland, Finland, Sweden and Norway), Israel and the Netherlands, with rates ranging from 15% to 17% of all live births (Figure 9.16). They were highest in Korea, Chile, Mexico and Turkey, with rates ranging from 45% to 53% of all births. Across OECD countries, 28% of live births were performed as caesarean sections.

Caesarean rates have increased since 2000 in most OECD countries, with the average rising from 20% in 2000 to 28% in 2017, although the rate of growth has slowed over the past five years (Figure 9.17). Growth rates have been particularly rapid in the Slovak Republic and Czech Republic, Slovenia and Austria, which have historically had relatively low rates. There have also been large increases over the past decade in Chile, Korea, Mexico and Turkey – countries that already had high caesarean rates. In Italy, caesarean rates have come down significantly in recent years, although they remain among the highest in Europe.

Variations in caesarean section rates across countries have been attributed to a number of factors, including financial incentives, malpractice liability concerns, differences in the availability and training of midwives and nurses, and the proportion of women who access private maternity care. For example, there is evidence that private hospitals tend to perform more caesarean sections than public hospitals. In Switzerland, caesarean sections were found to be substantially higher in private clinics (41%) than in public hospitals (30.5%) (OFSP, 2013[1]).

Furthermore, divergences exist for preferences among women for a caesarean section for a healthy birth across countries, which can be linked to the institutional arrangements of the maternal health system and cultural attitudes towards labour and birth. For example, in Iceland, the rate of preference for a caesarean section in the context of a healthy birth was 9.2% of women, compared to 16% in

Australia. Preference for a caesarean section in young women can also be linked to psychological reasons, including fear of uncontrollable pain and fear of physical damage (Stoll et al., 2017[2]).

Public reporting, provider feedback, the development of clearer clinical guidelines, and adjustments to financial incentives have been used to try to reduce the inappropriate use of caesarean sections. In Australia, where caesarean section rates are high relative to most OECD countries, a number of states have developed clinical guidelines and required reporting of hospital caesarean section rates, including investigation of performance against the guidelines. These measures have discouraged variations in practice and contributed to slowing down the rise in caesarean sections. Other countries have reduced the gap in hospital payment rates between a caesarean section and a normal delivery, with the aim of discouraging the inappropriate use of caesareans (OECD, 2014[3]).

### Definition and comparability

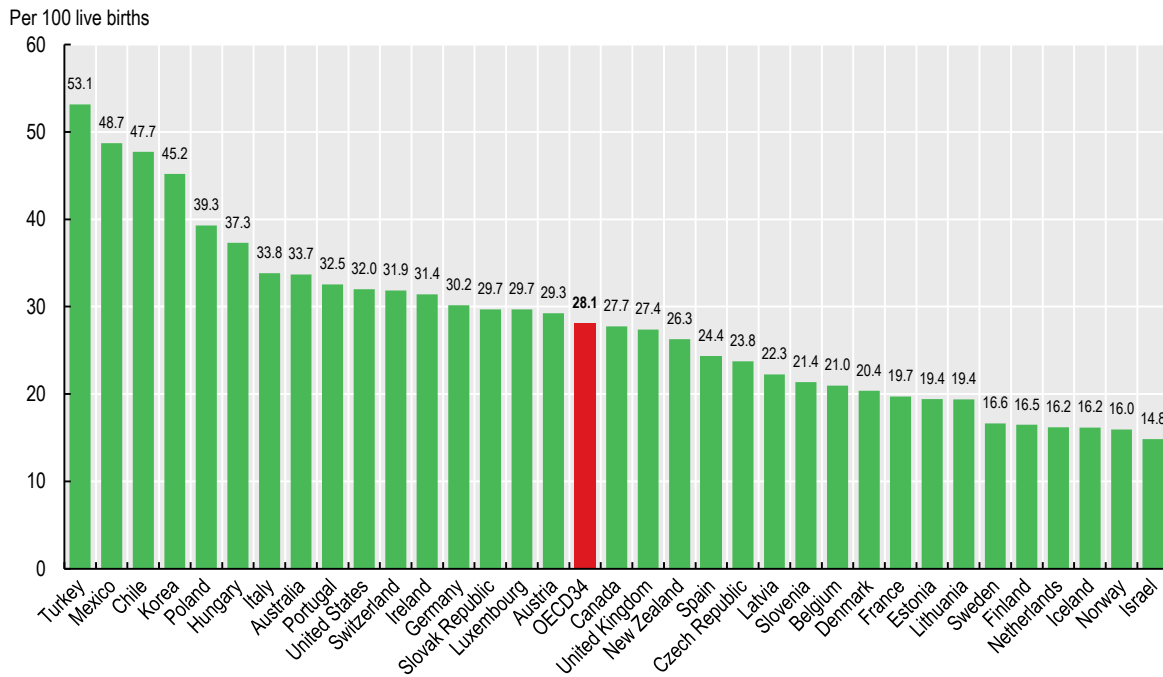
The caesarean section rate is the number of caesarean deliveries performed per 100 live births.

In Ireland, Mexico, New Zealand and the United Kingdom, the data only include activities in publicly funded hospitals (though for Ireland all maternity units are located in publicly funded hospitals and for New Zealand the number of privately funded births is negligible). This may lead to an underestimation of caesarean section rates in these countries, since there is some evidence that private hospitals tend to perform more caesarean sections than public hospitals.

### References

- [3] OECD (2014), *Geographic Variations in Health Care: What Do We Know and What Can Be Done to Improve Health System Performance?*, OECD Health Policy Studies, OECD Publishing, Paris, <https://dx.doi.org/10.1787/9789264216594-en>.
- [1] OFSP – Office fédéral de la santé publique (2013), *Accouchements par césariennes en Suisse* [Births by caesareans in Switzerland], Bern.
- [2] Stoll, K. et al. (2017), “International Childbirth Attitudes- Prior to Pregnancy (ICAPP) Study Team - Preference for cesarean section in young nulligravid women in eight OECD countries and implications for reproductive health education”, *Reproductive Health*, Vol. 14/1, <http://dx.doi.org/10.1186/s12978-017-0354-x>.

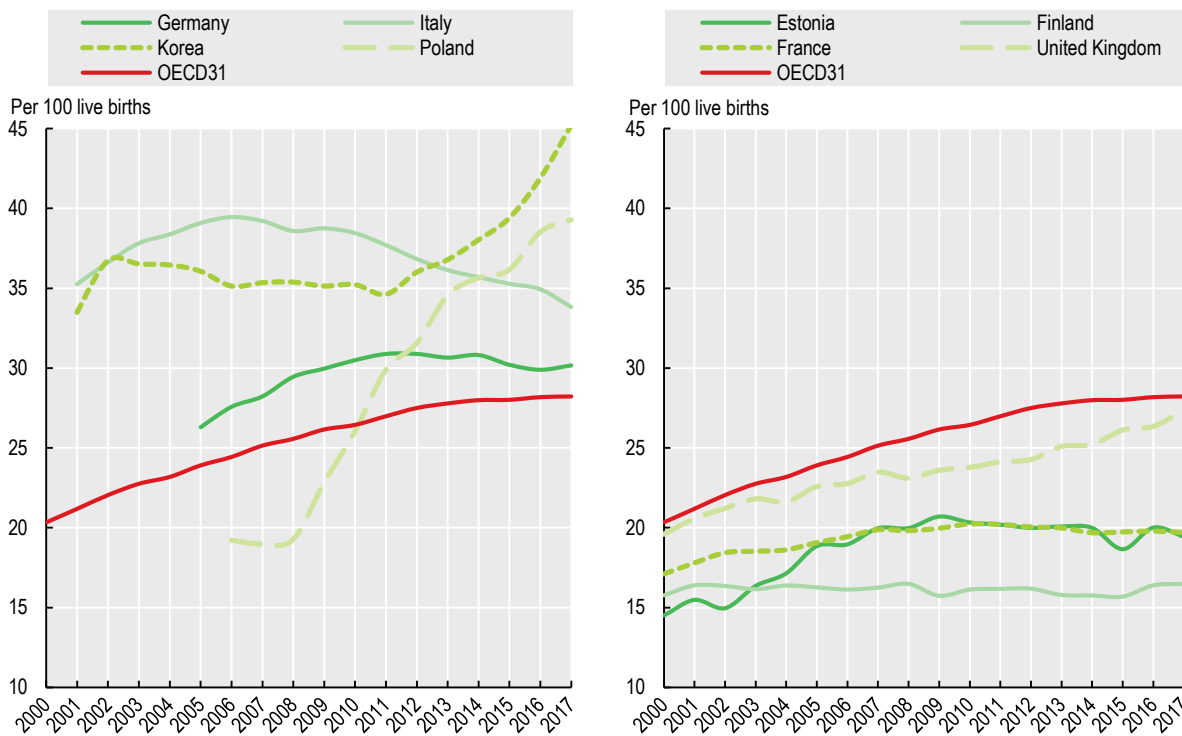
Figure 9.16. Caesarean section rates, 2017 (or nearest year)



Source: OECD Health Statistics 2019.

StatLink <https://doi.org/10.1787/888934017918>

Figure 9.17. Caesarean section trends in selected OECD countries, 2000-17



Source: OECD Health Statistics 2019.

StatLink <https://doi.org/10.1787/888934017937>



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