

# Addressing socio economic challenges of declining birth rates in MEDCs



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### **Overview**

The decline in birth rates in MEDCs (More Economically Developed Countries) poses significant socio-economic challenges and issues which function at deeper levels within societies. While the birth rates continue to decrease, the greater population grows older resulting in less people being able to actively work. This could create problems for social security systems such as healthcare since there will be less number of younger people who are employed to support the rapidly growing number of people who are retired. [10][16]

The major issue remaining is the pressure of aging on the social welfare and health care system of society. The improvements in medicine, living standards, and life expectancy have caused an increase in the number of elderly and those who require care facilitated by healthcare services. This increases the expenses of the state to provide quality healthcare to an elderly population while there is a decreasing number of taxpayers available in the working age group. Japan and Germany are also suffering from these problems because their birth rate is one of the lowest in the world. Without intervention, the economy runs a high risk of stagnating due to an ever widening gap between those needing healthcare and those qualified to give it. [4]

Another problem is the capped potential for economic growth and innovation stemming from the scarcity of people willing to work, which was previously caused by a low birth rate. A country with pulling, industries, and taxpayers able to sustain the economy is in economic recession, which also leads to worsened public services provisions, all of which put an economy in a difficult position. Some MEDCs have started to consider immigration as a valid option to reduce the employment void, but that opens a whole new need for paying attention to integration solutions to reassure social communication and long term demographic issues. [16]

A smaller workforce can also affect economic growth. If there are not enough people to fill positions, businesses may face shortages of skilled workers, which may hinder innovation and productivity. The overall economic output may decline. In some instances, changes in the composition of families, such as fewer siblings and more singles, can alter social support systems and community life. Communities may need to consider increasing immigration to fill the labour gaps which raises different social and cultural issues. In the end, weakening birth rates compel societies to review the economic structures they have in place, as well as social services and support systems to the elderly. [13][20]



## **Definitions of important terms**

#### Crude birth rate

the number of live births occurring during the year, per 1,000 population estimated at midyear. [5]

#### **Demographic Transition Model (DTM)**

A model that shows population changes over time, demonstrating the change from high birth and death rates to low birth and death rates as a country develops economically. [16]

#### **Opportunity Cost**

The opportunity cost of any given action or decision is typically defined as the value of the forgone alternative action or decision. That is opportunity cost is the loss of potential gain from other alternatives when one alternative is chosen. In this agenda, it can be described as the cost of having children, particularly for women, in terms of lost wages and career advancement opportunities when they leave the workforce to raise children.

#### **Pro-natalist Policy**

Government initiatives designed to encourage the higher birth rates, such as providing financial incentives and childcare support.

#### Life Expectancy

The average number of years of life a person who has attained a given age can expect to live (usually within a specific area and under specific circumstances). It is based on several factors, including sex, country of origin, country of residence and lifestyle. [15]

#### **Rate of Natural Increase (RNI)**

A measure of how quickly a population is increasing or decreasing without counting the number of immigration or emigration. It is determined by the difference between birth and death rates in a region. Rate of Natural Increase (RNI) is used to estimate a country's stage within the demographic transition model (DTM). To calculate the RNI, subtract the death rate (number of deaths per 1,000 people/year) from the birth rate (number of births per 1,000 people/year) and convert the answer to a percentage. [2]



#### Equation for calculating RNI (BirthRate/1,000) – (DeathRate/1000) = (BR-DR)/1000 = RNI %

E.g.: In Nicaragua, the birth rate is 20/1000 (birth rate) - 5/1000 (Death rate) = 15/100015/1000 = 0.015 = 1.5%

Therefore, Nicaragua's rate of natural increase is 1.5%.

Positive percentage of RNI indicates a growing population, a negative RNI indicates a decreasing population size. [2]

### **Timeline of key events**

#### **1980s-1990s: Changes in Population**

During this period, MEDCs start noticing the shifts in birth rate. In Europe, the countries with higher female participation in labour had a higher birth rate. However, imbalance between work and family life worked as a significant factor in the decrease in birth rate. Rapid urbanization, and economic growth leads to more competitive job opportunities, causes stress in MEDCs, and discourages forming families.

#### **2000s: Policies For Low Birth Rates**

Countries in Europe started to introduce possible methods to solve the issues of low birth rates, such as flexible working hours and subsidies for childcare. The purpose of this solution is to make it easier for people to balance their careers with raising children. [16]



#### 2005: Basic Act on Low Birth Rate and Aging Society

In 2005, South Korea introduced the policy to address the challenges with decrease in birth rate, including aging population. This was the first all-inclusive policy that responses to significant issues occurring in East Asia.

#### 2010-2019: Focus on Aging Population Issue

A lot of MEDCs were able to focus on the issue of lower birth rate and aging population, since issues such as higher dependency ratios and strain on healthcare came to the forefront. Some countries like Germany, were able to experience negative population growth due to the birth rates falling below death rates. [16]

#### 2016: Economic Risk Report

The report emphasized that an aging population and decrease in birth rate would cause reduction in workforce size and increase in welfare burdens. It highlights the urgency of addressing decreasing birth rates and long term negative consequences.

#### 2020-2024: Policy Innovation

During this period, MEDCs government focused on innovating policies for the aging population and decrease in birth rate. Government offered subsidies for childcare and tax incentives for larger families to encourage higher birth rates. The purpose of these policies was to reduce a burden for raising children, to create a better environment for parenthood. [16]



## **Position of key nations**

#### China

Rapid economic development is causing China to experience significant changes in population structure, including slowing population growth, increasing aging population, and declining birth rates. The Chinese government has shifted from the previous one-child policy to encouraging childbirth. China's action also includes developing fertility policies, enhancing health levels and education, addressing income distribution and wealth disparities. The purpose is to improve overall well-being and productivity of the population while addressing the challenges of low birth rate. [19]

#### Germany

Germany is facing a significant decline in birth rate due to the economic instability, the COVID-19 pandemic, inflation, and war in Ukraine. The eastern regions of Germany have been affected as young women are seeking better job opportunities in the west side of Germany. Even though these challenges affected Germany, the government has made progress in the policies for families, such as expansion of childcare facilities and improvements of childcare options, which led to an increase in the birth rate between 2010 to 2021. [6] However, the high cost of raising children, which is approximately 180,000 euros (nearly 29,000,000 yen) per child over the age of 18, discourages families from having more children and creating large families. Government is seeking strategies to mitigate the economic impact on the declining and aging workforce, such as expanding employment for older workers. [19]

#### Italy

Significant decrease in the birth rate is demonstrated in Italy, which is just 1.2 children per woman as of 2023 due to the economic stagnation, high youth unemployment, and unstable job conditions that prevent people from forming families. In the major cities such as Rome and Malia, rapid urbanization and high costs of living has been a notable issue. However the rural areas are facing a decrease in population. Italy's aging population is putting a burden on its healthcare systems, which it is estimated that the population could decrease by approximately one million by 2030. Although the government has tried policies such as increased parental leave benefits and tax exemptions for mothers with multiple children, these policies are less effective compared to other European nations. Addressing this issue requires not only economic reforms but also cultural shifts to make parenthood more accessible and appealing. [1][14][18]



#### Japan

Japan has one of the lowest birth rates in the world, along with an aging population. Japan has been using a multi-pronged strategy, but so far this approach has left much to be desired. The Japanese government has launched several policies to encourage childbirth, including economic perks for having children, child allowances, tax reductions for families with children, and improving childcare services to aid working parents by raising the number of daycare centers and the operating hours of such centers. Additionally, the government has advocated for employees' work-life balance through such policies as "Premium Friday", which allows and encourages workers to leave the office early on the last Friday of the month. The aforementioned measures notwithstanding, there are deeply rooted cultural issues of long working hours, rigid gender roles, and high standards of child rearing that are plaguing the country and aggravating the declining birthrate issue. Japan's position remains tenuous due to fears of labor shortages, rising healthcare expenditure as a result of an older population, and the growing burden for the pension system. In light of the persisting demographic problems, Japan is seemingly ready to take bolder steps such as revision of its immigration policy that has traditionally been very strict. [7]

#### South Korea

South Korea is facing the lowest birth rate in the world with 0.72 in 2023. This extremely low birth rate is caused by exponential increases in the cost of living, intense work culture, and the high financial burden of raising children. The South Korean government recognizes this issue as a "national emergency", and has introduced different methods to solve this problem, such as monthly allowance for the children under the age of two, increase in housing support for families with newborns. Additionally, cultural changes have been made such as flexible working hours and conditions, workplace childcare facilities. However, with these methods, the result is not impactful enough to solve the issue. South Korea's long term birth rate outlook is concerning, it is suggested that population would decrease to 36 million by 2070, with over 40% of the population with the age of over 65 or older by 2050. [8][9]



### **Suggested solutions**

Implementation of supportive and adaptable birth rates policies that work for the individual, family, and societal levels is one of the key strategies. These policies include reducing the economic cost of child raising and assisting individuals in balancing their work and family responsibilities. This may involve subsidies for childcare, flexible working hours, and extended parental leave. For example, some European countries have looked into policies aimed at reconciling work-family balance by offering subsidized child care and flexible maternity leave. These initiatives aim to mitigate the imbalance between work and family life, which has become one of the major causes of declining birth rates. [11]

Another policy further focuses on improving social well-being and productivity at the same time. This requires improving educational attainment and health at the national level through more equitable distribution of educational opportunities and investment in public health infrastructure. More countries may work towards fostering a more enabling context for family formation. There are also some advances in recognizing the need for addressing income distribution and reducing the extremes of wealth, especially the deep rural urban strife and the narrow middle class income. These economic conditions are important in influencing people's decisions about family formation and can affect total birth rates.

Removing barriers to population mobility and fostering urbanization is another method that can help deal with decreasing birth rates. This method assists with the efficient distribution of human resources and economic development and is likely to improve conditions for family formation. Additionally, mitigating the long term negative impacts of capital substitution on labour income shares requires establishing and strengthening comprehensive social security systems and corresponding institutional frameworks. These policies can act as an economic buffer that allows people to have children without worrying about financial difficulties. [21]

Other countries have introduced more direct pro-natalist policies as well. South Korea, for example, enacted the *Basic Act on Low Birth Rate and Aging Society* in 2005 to proactivate tackle demographic issues. Other MEDCs have provided tax breaks for bigger families and have increased maternity leave in an attempt to increase the birth rate. It is also essential to keep in mind that such policies, especially in the long run, can produce varying degrees of effectiveness with a tendency to be more short term. [8]



# **Bibliography**

- "Analyses." Analyses, 3 June 2024, https://eurohealthobservatory.who.int/monitors/health-systems-monitor/analyses/hspm/ita ly-2023/italian-policies-aim-to-address-low-birth-rates. Accessed 9 March 2025.
- Bailey, Lindsey. "What is Rate of Natural Increase (RNI)?" *Population Education*, 29 August 2019, https://populationeducation.org/what-is-rate-of-natural-increase-rni/. Accessed 6 March 2025.
- "Declining fertility rates put prosperity of future generations at risk." OECD, 20 June 2024, https://www.oecd.org/en/about/news/press-releases/2024/06/declining-fertility-rates-put-prosperity-of-future-generations-at-risk.html. Accessed 9 March 2025.
- "The Economic Factors for the Declining Birthrate." *Review of Population and Social Policy, No. 7, 1998, 129–144*, Naohiro Yashiro, 1998, https://www.ipss.go.jp/publication/e/R\_s\_p/No.7\_P129.pdf. Accessed 5 March 2025.
- "Glossary." *Glossary* | *DataBank*, https://databank.worldbank.org/metadataglossary/gender-statistics/series/SP.DYN.CBRT. IN. Accessed 5 March 2025.
- Goldenberg, Rina. "Germany: Birth rate drops, confirms dramatic prediction DW 07/31/2020." DW, 31 July 2020, https://www.dw.com/en/demography-german-birthrate-down-in-coronavirus-pandemic/a-54395345. Accessed 9 March 2025.
- Japan (J) Times. "Japan Enacts Bill to Expand Measures for Tackling Low Birth Rate." *The Japan Times*, 5 June 2024, https://www.japantimes.co.jp/news/2024/06/05/japan/society/child-care-law-enacted/. Accessed 9 March 2025.
- Kantis, Caroline, and Susan Kreimer. "South Korea's Plan to Avoid Population Collapse." *Think Global Health*, 5 September 2024, https://www.thinkglobalhealth.org/article/south-koreas-plan-avoid-population-collapse. Accessed 9 March 2025.



- Khandelwal, Kavya. "South Korea's bold policies to boost birth rate amid demographic crisis." *India Today*, 3 December 2024, http://indiatoday.in/information/story/south-koreas-bold-policies-to-boost-birth-rate-amid -demographic-crisis-2643975-2024-12-03. Accessed 9 March 2025.
- "The Long-Term Decline in Fertility—and What It Means for State Budgets." *The Pew Charitable Trusts*, 5 December 2022, https://www.pewtrusts.org/en/research-and-analysis/issue-briefs/2022/12/the-long-term-d ecline-in-fertility-and-what-it-means-for-state-budgets. Accessed 9 March 2025.
- Nargund, G. "Declining birth rate in Developed Countries: A radical policy re-think is required." *National Library of Medicine*, https://pmc.ncbi.nlm.nih.gov/articles/PMC4255510/. Accessed 9 March 2025.
- 12. "NVSS Life Expectancy." *CDC*, https://www.cdc.gov/nchs/nvss/life-expectancy.htm. Accessed 6 March 2025.
- Ono, Yoshikuni, and Fumiya Uchikoshi. ""Lowest-low Fertility" & Gender Inequality: Japan from a Comparative Perspective." *RIETI*, Japan Economic Foundation, January 2023, https://www.rieti.go.jp/en/papers/contribution/ono-yoshikuni/02.html. Accessed 9 March 2025.
- Orlandi, Giorgia. "Italy's falling birth rate is a crisis that's only getting worse." *Euronews*, 10 May 2024, https://www.euronews.com/my-europe/2024/05/10/italys-falling-birth-rate-is-a-crisis-that s-only-getting-worse. Accessed 9 March 2025.
- 15. "Population change in MEDCs." *Internet Geography*, https://www.internetgeography.net/topics/population-change-in-medcs/#google\_vignette. Accessed 9 March 2025.
- 16. "Population structure CCEA." *BBC*, https://www.bbc.co.uk/bitesize/articles/zvjrqyc#zh9ykhv. Accessed 6 March 2025.
- 17. "Response to Concerns about Low Birth Rates." *Population Media Center*, 5 March 2024,



https://www.populationmedia.org/the-latest/response-to-concerns-about-low-birth-rates. Accessed 9 March 2025.

- Šerić, Matija. "Italian Demographic Decline: A Threat To Italy's Future Analysis." *Eurasia Review*, 8 September 2024, https://www.eurasiareview.com/08092024-italian-demographic-decline-a-threat-to-italysfuture-analysis/. Accessed 9 March 2025.
- 19. Strack, Christoph. "Germany's birth rate drops to 10-year record-low DW 11/05/2024." *DW*, 5 November 2024, https://www.dw.com/en/germanys-birth-rate-drops-to-10-year-record-low/a-70634645. Accessed 9 March 2025.
- Su, Binbin. "The Impact of Low Fertility Rates on Labor Demand and Socioeconomic Development in China." *China CDC Weekly*, 7 July 2023, https://weekly.chinacdc.cn/en/article/doi/10.46234/ccdcw2023.115. Accessed 9 March 2025.
- 21. "World Population Policies 2021: Policies related to fertility." *the United Nations*, https://www.un.org/development/desa/pd/sites/www.un.org.development.desa.pd/files/un desa\_pd\_2021\_wpp-fertility\_policies.pdf. Accessed 9 March 2025.