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321 Report by Valeriia Heidemann and Sabine Zinn

Mothers' living conditions shape health and early development, while refugee experience has little impact

- No differences at birth, but refugee children show early delays in language, motor, and social skills
- Delays are associated with maternal mental health as well as social and structural factors, not refugee status
- Investment in education, labor market integration, and early childcare supports equal development opportunities

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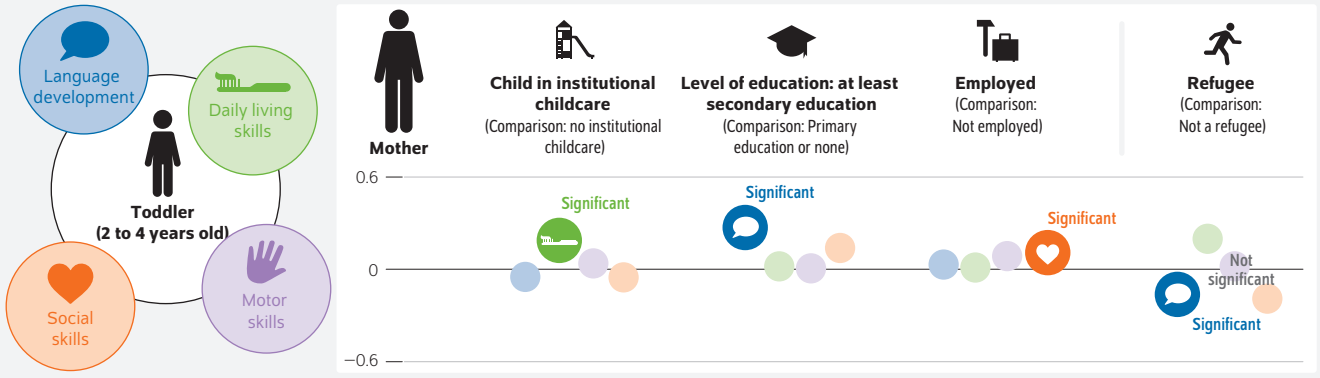
AT A GLANCE

Mothers' living conditions shape health and early development, while refugee experience has little impact

By Valeriia Heidemann and Sabine Zinn

- No differences between children of refugees and children from other groups in terms of birth weight, birth length, c-section frequency, and nursing behavior
- Children of refugees display developmental delays in language, motor, and social skills during early childhood
- Developmental differences are linked to maternal mental health as well as social and structural factors, but not the mother's refugee experience
- Issues with weight during childhood development vary across family contexts; key areas of improvement include education, integration, and early institutional childcare
- Investments in education, labor market integration, and early childhood care for refugee families support equal opportunities in children's development

The maternal living situation is more closely reflected in the development of their children born in Germany than their experience of being a refugee



Note: This evaluation is based on linear regression models. The dependent variable is the mean of the corresponding scale values in the four development domains observed with a value range of 1 to 3. Displayed here are the estimated deviations from the comparison groups of various factors regarding the mothers and the development of toddlers (two to four years old). In this study, we use data from 2015 through 2023.

Source: Authors' calculations using Socio-Economic Panel (SOEP v40) data, weighted data.

FROM THE AUTHORS

"After ten years, most refugee men have integrated into the labor market. Refugee women, in contrast, are significantly less frequently employed. Most refugees want to naturalize. However, there are still structural barriers that make participation harder, especially a lack of targeted education and labor market integration."

— Sabine Zinn —

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Mothers' living conditions shape health and early development, while refugee experience has little impact

By Valeriia Heidemann and Sabine Zinn

ABSTRACT

Around 200,000 children were born to refugees in Germany between 2014 and 2022. This Weekly Report investigates how the health and development of children born in Germany to refugees are affected by their parent's experience of being a refugee. An analysis using representative data from the Socio-Economic Panel (SOEP) and data from the IAB-BAMF-SOEP Survey of Refugees shows that there are no significant differences at birth between the children of refugee mothers and of other mothers in terms of birth weight, birth size, c-section frequency, and nursing behavior. However, there are differences at toddler age: Children of refugees score worse in the domains of language skills, motor skills, and social skills. These differences are largely explained by variations in maternal mental health status, level of education, employment status, and access to institutional childcare. Furthermore, children of refugee and other migrant mothers are more frequently classified as overweight than children of women without a migration background. However, this difference becomes statistically insignificant for children of refugees once factors such as maternal education and employment status are included. The results show that it is not the refugee experience itself but rather the social and structural living conditions of the mothers that influence their children's development. Therefore, investments in education, employment integration, and early childhood care for refugee families are important starting points for ensuring their social participation and equal opportunity in health.

Around 200,000 children were born in Germany to refugees[1] between 2014 and 2022, about three to four percent of all births during this period.[2] Many of these children grow up and attend school in Germany and become a part of German society. Thus, their development not only affects their families, but society as a whole.

According to the UN Convention on the Rights of the Child,[3] every child has the right to health and a standard of living that ensures their development. Healthy early childhood development is a prerequisite for becoming a capable, socially integrated adult. Therefore, policymakers and the health, social, and education systems have a mandate to ensure the structural conditions for all children to grow up healthy, without losing sight of the special needs of specific groups.

Children of refugee mothers have a higher risk of being born and growing up under adverse conditions, even if their mothers are living in Germany at the time of birth. Risk factors include an uncertain residence status, precarious living and income conditions, difficulties in navigating the health system, language barriers, a low level of education, or a lack of social networks.[4] In addition, there are systematic barriers in accessing integration courses, which place women

1 Refugee mothers are women who have experienced displacement personally or who came to Germany to join a refugee partner as part of family reunification. Mothers with a migration background are women who were not born in Germany, but did not experience displacement and are not refugees. Women who were born in Germany to two parents who were also born in Germany are mothers without a migration background.

2 This value is based on extrapolations from the IAB-BAMF-SOEP Survey of Refugees, according to which around 200,000 children have been born to refugees in Germany since 2014/2015. During the same period, around 5.7 million children were born overall. Cf. the website of the Federal Statistical Office (in German; available online. Accessed on August 20, 2025. This applies to all other online sources in this report unless stated otherwise). This results in around 3.5 percent of all births being to at least one refugee parent.

3 Germany ratified the UN Convention on the Rights of the Child in 1992 (in German; available online).

4 WHO, *Report on the health of refugees and migrants in the WHO European Region* (2018) (available online).

DOI: https://doi.org/10.18723/diw_dwr:2025-47-1

at a particular disadvantage.[5] Mental health issues such as post-traumatic stress disorder or depression—usually due to war, flight from their home country, or displacement[6]—can also have a negative impact on the health and development of children of refugees.

The health conditions of refugee children not only differ from the average for the population as a whole but also show parallels with other vulnerable groups, such as children from socio-economically disadvantaged or educationally deprived families or children from families with a migration background. Such comparisons help distinguish between generally precarious influences and factors specific to the refugee experience.

This Weekly Report investigates how the refugee experience affects the health and development of children born in Germany, with a focus on physical characteristics at birth; c-section frequency; language, daily living, motor, and social skills in the first years of life (two to four); and weight development (Body Mass Index/BMI in two groups: from age one to five and from age six to ten). The data used is from the Socio-Economic Panel (SOEP) from 2016 to 2023 with its integrated IAB-SOEP Migration Sample[7] as well as the integrated IAB-BAMF-SOEP Survey of Refugees[8] who came to Germany between 2013 and 2020. Using this data,[9] a differentiated comparison can be made of the lives and developmental opportunities of children of refugee mothers and of mothers with and without a migration background, as well as an evidence-based classification in a broader social context.

Access to healthcare for refugee mothers depends on contextual factors

Although the law provides for basic medical care for refugee mothers and their children (Box 1), numerous barriers remain, with language being a key one. Even after several years in Germany, many refugee women still have limited German skills—due to lower levels of education, less social contact with German speakers, and low rates of participation

Box 1

Legal regulations for accessing the health system for refugees

Health care for pregnant refugees, refugee women, and their children born in Germany is laid out in the Asylum Seekers' Benefits Act (*Asylbewerberleistungsgesetz*, AsylbLG). According to Section 4 of the AsylbLG, they are legally entitled to medical help if they are acutely ill or in pain. They are also legally entitled to vaccinations and preventative medical checkups. In addition, medical and nursing care, midwifery services, as well as remedies and medicines are also provided for expectant mothers and women who have recently given birth.

Following birth, the AsylbLG applies to the children as long as they have no other residence status. During the first years of life—up to 36 months since a change in the law in February 2024, previously up to 18 months—they are entitled to basic medical services as regulated in Section 4. Further health services may be provided on an individual basis according to Section 6 of the AsylbLG as long the services are vital to ensuring health. Generally, the local social welfare offices or social welfare authorities of the municipalities or districts in which the refugees live are responsible for approving or denying applications for further health services.

However, this regulation is not clearly defined and leaves the authorities considerable discretion in determining whether a requested service is considered medically "essential." In practice, this leads to approval practices differing starkly between regions, a lack of transparency, and, in some cases, considerable delays. Applications must be submitted in writing and justified on medical grounds, often with a doctor's note. It can take several weeks for a decision to be made and the process usually requires the applicants to be supported by social services, counseling centers, or other volunteer aid. This poses a considerable barrier for refugee families, especially in acute health situations, as it can jeopardize their care.

Only after the 18- or 36-month period has expired can the *Analogleistungen* (Section 2 of the AsylbLG) be claimed under certain conditions. The *Analogleistungen* correspond in scope to the benefits provided by statutory health insurances under the Social Code Book V. Children with recognized protection status (e.g., as asylum seekers or granted subsidiary protection) are granted immediate entitlement—they receive regular access to statutory health insurance. All children covered empirically in this Weekly Report have full statutory health insurance coverage.

5 Bundesamt für Migration und Flüchtlinge, "Hürden beim Zugang zum Integrationskurs: Alltagserfahrungen geflüchteter Frauen mit Kleinkindern," *BAMF-Kurzanalyse* 03 (2021) (in German; available online).

6 Yuriy Nesterko et al., "Post-traumatic stress disorder and its predictors in recently resettled Syrian refugees in Germany: A cross-sectional study," *BMC Psychiatry* 20, no. 1 (2020): 1–10.

7 Herbert Brücker et al., "The new IAB-SOEP Migration Sample: an introduction into the methodology and the contents," *SOEP Survey Paper* no. 216 (2014) (available online); Jan Goebel et al., *Socio-Economic Panel (SOEP), data from 1984-2023, (SOEP-Core, v40, EU Edition)* (2025: German Institute for Economic Research (available online).

8 Herbert Brücker et al., "Exploring integration and migration dynamics: the research potentials of a large-scale longitudinal household study of refugees in Germany," *European Sociological Review* (2025) (available online).

9 The analyses use survey data from 2016 to 2023 and use a cross-sectional design. To describe the characteristics of newborns, all mother/child pairs are included in which the children were born between 2014 and 2022 in Germany and information on the relevant characteristics are available. For the analysis of early childhood development, all children born in Germany are included who were between the ages of two and four between 2014 and 2022 and whose parents filled out one of the age-specific questionnaires. Since the parents surveyed arrived in Germany in 2013 or later, the earliest children in this age group only appear in the data from 2015/2016 onward. For calculating BMI, all observations of children aged one to ten are included.

Figure 1

Living situation of mothers without a migration experience, migrant mothers without refugee experience, and refugee mothers

Shares in percent

Notes: The values are the average values of the respective groups. The vertical lines indicate the 95-percent confidence interval, which reflect the statistical accuracy of the underlying sample. A 95-percent confidence interval means that in 95 percent of cases, the actual value is within this interval. Survey years 2016 to 2023 were investigated.

Source: Authors' calculations using Socio-Economic Panel data (SOEP v40), weighted data.

The share of mothers who have a high level of education (tertiary degree) is the lowest among refugee mothers.

in integration and language courses.[10] At the same time, it is obvious and common practice that the health system of a country is primarily targeted to the language and needs of the majority population. A lack of services increases the risk of incomplete medical advice or medical advice that is not understood. For this reason, some women either seek medical help too late or not at all.[11]

Structural living conditions such as cramped, noisy, and unhygienic accommodation have a particularly negative impact on mental well-being during pregnancy and early parenthood. Uncertainties regarding the asylum process, having to move frequently, financial emergencies, or conflicts within partnerships also negatively affect mental health. As a result, many women report sleep problems, chronic stress, and worries about their children's future.[12]

Qualitative studies show that social support from professionals such as midwives, doctors, or social workers improves health care. When communication is successful, trust is built, and cultural differences are respected, refugee women report positive experiences in the health system, often in contrast with experiences in their home country.[13] Coping strategies, such as religious beliefs or personal resilience, also help make health care experiences positive despite barriers.[14]

Living situation differs between refugee mothers and other mothers

Between 2016 and 2023, an estimated 114,000 refugee women who had applied for asylum in Germany between January 2013 and June 2019, gave birth to a child in Germany. At the time of birth of the first, second, and further children, they were marginally younger on average than women without or with a migration background who were not refugees (Figure 1).

There are considerable differences in the level of education: Thirty-six percent of refugee women have a low level of education, 45 percent a medium level of education, and 19 percent a high level of education,[15] surveyed at the time of birth or at the time of the survey on their two- to four-year-old children. In comparison, only three percent of mothers without a migration background and only eight percent of mothers with a migration background had a low level of education.

The partner situation also differs: Seventy-nine percent of refugee mothers live with a partner in Germany, compared to 73 percent of women without a migration background and 81 percent of women with a migration background. In regard to the living situation, 22 percent of refugee mothers were living in shared accommodation at the time of birth, while 78 percent were already living in apartments or houses.

Regional differences[16] are apparent in regard to location as well: At the time of birth or the survey, ten percent of refugee mothers lived in eastern Germany and 90 percent in western Germany. In comparison, 25 percent of mothers without a migration background lived in the east, while 75 percent lived in the west. Twelve percent of mothers with a migration background lived in eastern Germany and 88 percent in western Germany.

There are also considerable differences in language skills. Thirty-seven percent of refugee mothers evaluated their German skills as very good or good at the time of birth, 32 percent as sufficient, and 31 percent as bad or very bad. In comparison, 69 percent of mothers with a migration background estimated their German skills as very good or good, 21 percent as sufficient, and ten percent as bad or very bad.

Health of newborns born to refugees barely differs from health of other children

Health can be measured using various indicators. This Weekly Report uses key anthropometric values of newborns, such as birth weight, birth size, head circumference, as well as c-section frequency and nursing behavior. These values help monitor the development of a child and recognize any abnormalities early on.

Between 2016 and 2023, an average of 31 percent of all births in Germany were via c-section. The differences between refugee mothers and mothers without a migration background were low and not statistically relevant. Therefore, it is not expected that these indicators will result in any notable differences in the children's health at birth or have a long-term impact on the children's health.

The average birth weight of newborns of women without a migration background was 3,389 grams. The average birth weight of children of refugee women who applied for asylum between January 2013 and June 2019 was 3,241 grams. Despite this difference, no significant difference between the groups can be detected within the margin of error.

10 Jan Eckhardt, "Deutschkenntnisse von geflüchteten Frauen und Männern: Entwicklung, Unterschiede und Hintergründe," *BAMF Kurzanalyse* 01 (2024) (available online).

11 Julia Henry, Christian Beruf, and Thomas Fischer, "Access to health care for pregnant Arabic-speaking refugee women and mothers in Germany," *Qualitative health research* 30, no. 3 (2020): 437–447.

12 Sandra Claudia Gewalt et al., "Psychosocial health of asylum seeking women living in state-provided accommodation in Germany during pregnancy and early motherhood: A case study exploring the role of social determinants of health," *PloS one* 13, no. 12 (2018): e0208007.

13 Louise Biddle et al., "The patient journey of newly arrived asylum seekers and responsiveness of care: A qualitative study in Germany," *PloS one* 17, no. 6 (2022): e0270419.

14 Catherine Panter-Brick and Mark Eggerman, "Understanding culture, resilience, and mental health: The production of hope," In *The social ecology of resilience: A handbook of theory and practice* (New York, NY: Springer New York, 2011): 369-386.

15 The classification of educational levels is based on the International Standard Classification of Education ISCED-11. A low level of education means either they did not complete primary education or that is the highest level they achieved; medium level of education means they completed secondary school; and a high level of education means they have a Bachelor's, Master's or a Ph.D.

16 Refugees in Germany who are not from Ukraine are generally subject to a *Residenzpflicht* during the asylum process, which means that they are not permitted to leave the area they have been assigned to, usually a district or federal state. Once recognized as a refugee or granted subsidiary protection, an individual is also subject to a *Wohnsitzauflage* under Section 12a of the Residence Act (*Aufenthaltsgesetz*, AufenthG), which requires they live in the federal state to which they have been assigned for three years, although exceptions are possible, for example, if they take up employment, study, or begin training.

Figure 2

Estimated associations between different factors and the development of toddlers (two to four years old)
In scale points, deviation from the mean of the comparison group

Notes: This evaluation is based on linear regression models, whereby the dependent variable is the mean value of the corresponding scale values in the four developmental domains considered, with values ranging from 1 to 3. Depicted here are the estimated deviations from the control group for the respective factors. The horizontal lines indicate the 95-percent confidence interval. A 95-percent confidence interval means that in 95 percent of cases, the actual value is within this interval. The narrower the interval, the more accurate the estimated value. If the confidence interval does not touch or cross the zero line, the coefficients are statistically significant at the five-percent level at least. The sample sizes for the different developmental domains are N(language)=1094, N(daily living)=1105, N(social)=1802, and N(motor)=1100. A * indicates values that are statistically significant at the five percent level.

Source: Authors' calculations using Socio-Economic Panel data (SOEP v40), weighted data.

When considering sociodemographic and contextual factors, the daily living skills of children of refugee mothers are 0.2 points higher on a scale of 1 to 3 than those of children born to mothers without a migration background.

The average body length at birth was 51 cm for all groups, while the head circumference was 35 cm. Overall, there are no signs of a worse physical constitution of newborns of refugee women compared to the other groups. There are no discernible effects of reduced access to healthcare. However, it should be noted that refugee women are two years younger on average at the time of birth than mothers without a migration background. This factor can potentially have a compensating effect.

There are also no relevant differences in nursing behavior: Seventy-two percent of mothers without a migration background breastfeed their child, 72 percent of refugee women, and 74 percent of women with a migration background. Within the margin of error, there are no differences between the three groups.

Box 2

Calculating health and early childhood development

Early childhood development: Vineland Adaptive Behavior Scale

An abridged version of the Vineland Adaptive Behavior Scale has been used in the SOEP to capture early childhood development since 2005. The scale is designed for parents of children aged two to three years old with the purpose of capturing the parents' estimates of their children's daily behavior and development-related skills. No direct tests are conducted with the children. Instead, a standardized survey process is used in which a person the child trusts (usually a parent) describes concrete observations of the child's behavior. This makes it possible to capture the development of the child in the context of their daily life.

The scale used is a German-language adaptation of the original Vineland Adaptive Behavior Scales.[1] For use in the SOEP, it was abridged to a total of 20 questions in order to be able to integrate it into the survey design.[2] The scale includes four key developmental domains (Table), each with five questions. The domains are (1) language skills, (2) daily living skills, (3) motor skills, and (4) social relationships. For each question, parents answer if the behavior applies to their child, partially applies, or does not apply. The answer scale has three options: Yes, partially, or no. The survey begins with the sentences, "For parents, it is always a major event when your child can do something new. Please indicate which things your child can do." It is important that the survey does not refer specifically to language skills in a specific language (such as only German). For the evaluation, average values are calculated from the five questions in each domain. These domain-specific averages form the base of the analyses in this Weekly Report. As the answer scale includes values of 1 (does not apply to my child) to 3 (applies to my child), the averages move within this range, with higher values indicating a higher development status.

Calculating children's BMI

This Weekly Report uses a measure developed by the World Health Organization (WHO) to assess the nutritional status of children that standardizes body mass index (BMI) according to age and gender. The raw BMI value is not used for this purpose; instead, a so-called Z-score is calculated. This score indicates how much the BMI of a child deviates from the median value of an international reference group of children of the same age and gender. This way, the physical development of children is made comparable, regardless of whether they are two, ten, or 17 years old. The calculations use the official WHO growth standards (for children under five) as well as the WHO growth reference (for children and youth between five and 19). A Z-score of 0 means that a child's BMI corresponds to the median of the reference group. Positive Z-scores indicate an above-average BMI, while negative scores indicate a below-average BMI. The WHO's defined thresholds are used to classify the results: for children under five years of age, a Z-score above +2 is considered an indication of being overweight, and a child with a Z-score above +3 is considered obese. A Z-score below −2 is classified as being underweight, under −3 as being seriously underweight. For older children and youth (five to ten years old), the threshold for being overweight begins at a Z-score of +1, being obese at +2, and being underweight at −2. These standardized approaches consider the natural growth and gender-specific differences in childhood development.

1 Sara S. Sparrow, D. A. Balla und Domenic V. Cicchetti, *Vineland Adaptive Behavior Scale. A revision of the Vineland Social Maturity Scale by Edbar A. Dll. Survey Form Manual.* (Circle Pines, Minnesota: American Guidance Service, 1984).

2 Nicole Schmiade, C. Katharina Spieß, and Wolfgang Tietze, "Zur Erhebung des adaptiven Verhaltens von zwei- und dreijährigen Kindern im Sozio-oekonomischen Panel (SOEP)," *SOEP Survey Papers* 232, Series C (2008) (in German; available online).

Table

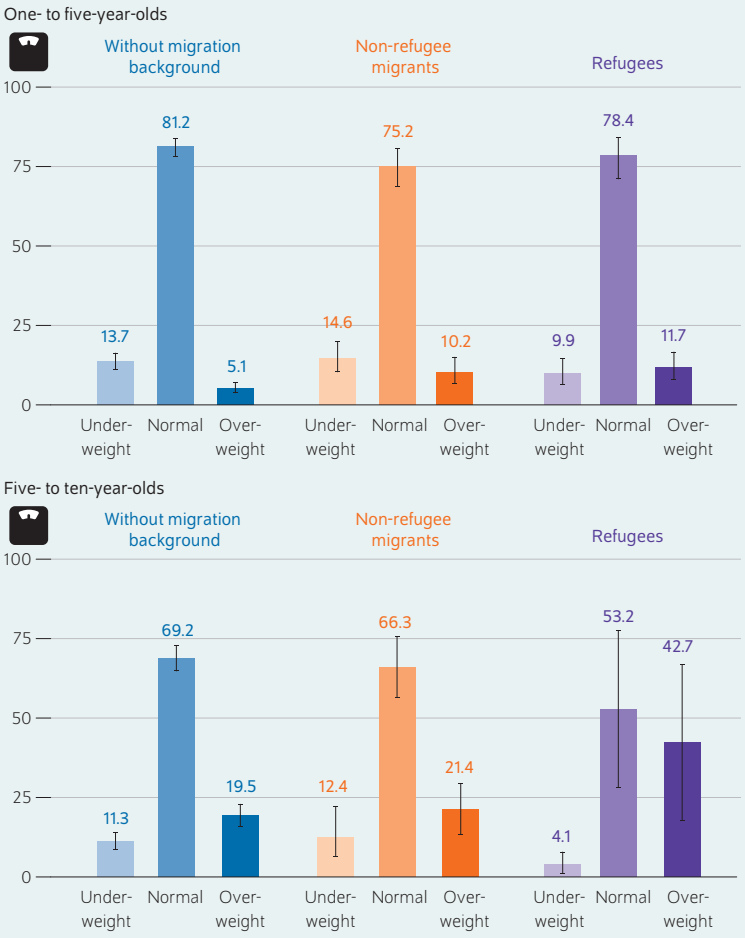
Four key domain areas according to the Vineland Adaptive Behavior Scales

(1) Language	(2) Daily living skills	(3) Movement	(4) Social relationships
Speaks in full sentences (with four+ words)	Eats independently with a spoon without spilling	Walks down the stairs facing forward	Participates in games with other children
Delivers simple messages, e.g., "Dinner is ready"	Blows his/her nose without assistance	Climbs on jungle gyms and other high play equipment	Gets involved in role-playing games ("playing pretend")
Follows instructions (heard five minutes before)	Uses the toilet to do "number two"	Can use a pair of scissors to cut paper	Shows preference for certain playmates or friends
Tells his/her first and last name when asked for it	Puts on pants and underwear the right way around	Draws recognizable shapes on paper	Names their own feelings, e.g., "sad," "happy," "scared"
Listens attentively to stories for at least 15 minutes	Brushes teeth independently	Holds pen correctly (not with a fist) to draw	Takes turns with others when playing without having to be asked

Source: Authors' depiction.

Figure 3

Share of children born in Germany who are underweight, average weight, and overweight per group
Shares in percent



Notes: The values are the average values of the respective groups. The vertical lines indicate the 95-percent confidence interval, which reflect the statistical accuracy of the underlying sample. A 95-percent confidence interval means that in 95 percent of cases, the actual value is within this interval. Survey years 2016 to 2023 were investigated.

Source: Authors' calculations using Socio-Economic Panel data (SOEP v40), weighted data.

The share of overweight children of refugee mothers increases with age.

Available resources influence development more than mother's refugee experience

The development of motor, language, daily living, and social skills in the early childhood years is a key requirement for successfully participating in society later on as an adult.[17] However, refugee children are more frequently exposed to adverse living conditions in their family and social environment, which may hinder age-appropriate development in these domains.

The Vineland Adaptive Behavior Scale was used to capture the state of development of children of toddler age (two to four years old) (Box 2). The results show a differentiated picture: When it comes to general language skills (not relating to any specific language), there are significant differences between children of refugee mothers and children of mothers without a migration background: Their average scale values on a scale of 1 to 3 are around 0.24 scale points lower. In contrast, children of mothers with a migration background do not differ significantly from children of mothers without a migration background in terms of general language skills.

The differences in daily living skills are very small overall, even tending toward a reverse trend: Children of refugee women have an average value that is around 0.03 scale points higher than children of mothers without a migration background. At around 0.09 points, children of mothers with a migration background scored slightly higher than children of mothers without a migration background. In contrast, children of refugee women score considerably lower values in the area of social skills: On average, they score 0.22 scale points lower than children of mothers without a migration background. The score is also marginally lower (by nearly 0.1 scale points) compared to children of mothers with a migration background. In terms of motor development, children of refugee mothers (adjusted for age) scored values just as low as children from mothers with and without a migration background; the difference is about 0.12 scale points.

In a further step, different characteristics of the mother and her child (migration/refugee background, age, mental health, gender, education, employment) as well as contextual characteristics (such as siblings, a partner in the household, or use of institutional childcare) are considered as explanatory factors. This largely relativizes the differences described above. The multivariate analyses show (Figure 2) that the age of the child as well as their gender in particular play a key role: Older children and girls have consistently higher development values in all domains. A further significant factor is the mother's mental health. The greater the strain on the mother's mental health, the poorer the child's developmental outcomes, especially in the language and social domains. In contrast, the mother's level of education has a positive effect on childhood development, with the strongest link observed in the language domain. Furthermore, maternal employment is also related to better development outcomes, especially in the social and motor domains. Slight positive associations are observed for children attending institutional childcare, such as a nursery, preschool, or who are cared for by a day nanny. This appears to benefit daily living skills in particular. In contrast, how well the mother understands, speaks, and writes German has no additional influence on the childhood development beyond the characteristics analyzed.[18]

17 Jack P. Shonkoff et al., "An Integrated Scientific Framework for Child Survival and Early Childhood Development," *Pediatrics February* 129 (2012) (available online).

18 The analysis of the influence of the mother's language skills are not shown here separately. They are based on a comparison that excludes mothers without a migration background, but includes (as previously) socio-demographic characteristics and contextual factors.

Overall, the results show that children of refugee mothers perform worse in the language, social relationships, and motor skills domains in a bivariate comparison, while they tend to score slightly higher for daily living skills. When considering the age and gender of the child as well as structural characteristics, these differences are markedly reduced: For children of refugee mothers, there are no significant differences compared to children without a migration background. Children of women with a migration background differ only marginally from children without a migration background in a direct, bivariate comparison and even have slightly higher scale values for daily living skills. After accounting for the above characteristics, significant differences remain in terms of social skills and daily living skills. Overall, the model indicates that the observed differences are extensively due to social resources and contextual factors, and not to the mother's experience of being a refugee.

Children of refugees and of women with a migration background are more often overweight

In addition to a child's language, social, and motor development, their physical constitution also plays a key role in their well-being, health, and further development. An evaluation of the body mass index (BMI) of children (Box 2) shows that children with a refugee background are more frequently overweight than average. Here, too, the differences are first observed without the explanatory factors. In a second step, the differences are analyzed considering the additional socio-economic characteristics of the families.

In the age group of one- to five-year-olds, 12 percent of the children of refugee mothers, ten percent of the children of women with a migration background, and five percent of children of women without a migration background are overweight. The difference is more marked for the six- to ten-year-olds: Forty-three percent of children of refugee mothers and 21 percent of children of women with a migration background are overweight, while 20 percent of children of women without a migration background are overweight (Figure 3).

The situation is different for underweight children. In the group of one- to five-year-olds, ten percent of the children of refugee women and 15 percent of the children of women without a migration background are underweight, compared to 14 percent of children of women without a migration background. For the six- to ten-year-olds, the share of underweight children is four percent for refugee women, 12 percent for women with a migration background, and 11 percent for women without a migration background.

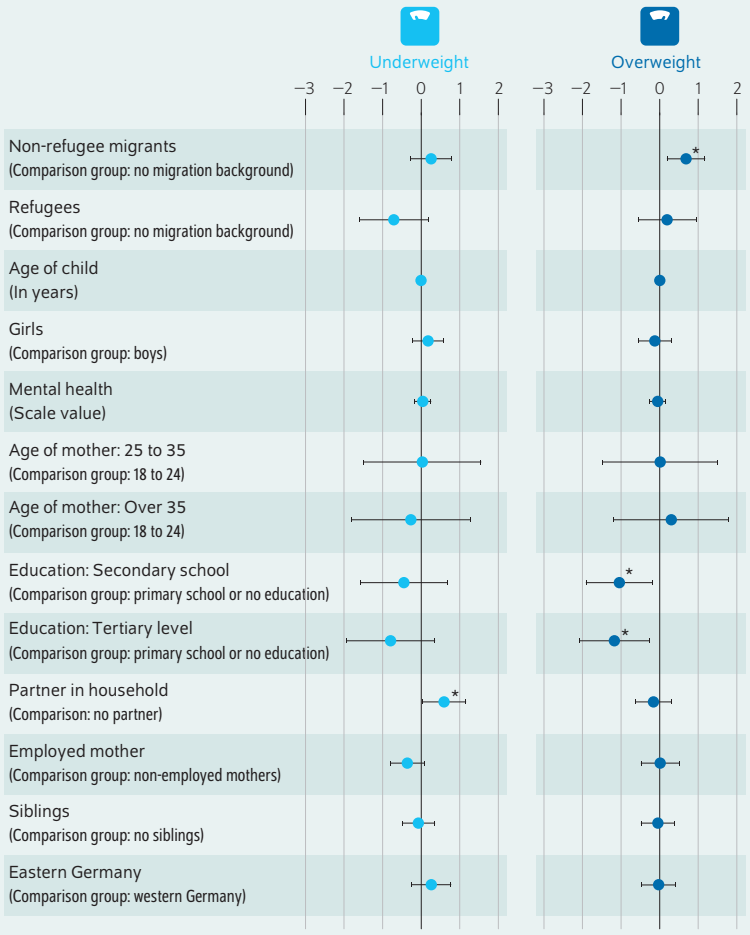
When considering (as in the previous analyses) characteristics of the mother (such as level of education, employment status, partnership, mental health) as well as child-related and contextual factors, the differences in obesity between the children of refugees and of mothers without a migration background become less pronounced (Figure 4). The previously visible association between having a migration background and an increased risk of obesity loses its statistical significance in the multivariate observation. The situation is different for children of women with a migration background: Here, the risk of obesity compared to children of women without a migration background is also significantly high, even when relevant influencing variables are accounted for.

An especially strong and significant influence can be seen in the level of education of the mother: Children of mothers with a medium or high level of education have a significantly lower risk of obesity. This link is one of the clearest in the analysis.

Figure 4

Analysis of possible influencing factors for being underweight or overweight

Deviation from the average of the comparison group



Notes: This evaluation is based on two logistical regressions, in which being overweight (yes/no) and being underweight (yes/no) are dependent variables. The horizontal lines indicate the 95-percent confidence interval. A 95-percent confidence interval means that in 95 percent of cases, the actual value is within this interval. The narrower the interval, the more accurate the estimated value. If the confidence interval does not touch or cross the zero line, the coefficients are statistically significant at the five-percent level at least. The sample size for both models is N=3477. A * indicates values that are statistically significant at the five percent level.

Source: Authors' calculations using Socio-Economic Panel data (SOEP v40), weighted data.

The share of overweight children of refugee mothers increases with age.

In terms of children being underweight, there are fewer pronounced differences between the groups overall. Here, too, having a migration background or being a refugee is not significantly related to the risk of being underweight. However, it is noticeable that children of single mothers have a significantly higher risk of being underweight than children who grow up with both parents.[19] This correlation is independent of being born to a refugee mother, mother with a migration background, or a mother without a migration background.

Conclusion: Early support is crucial

Settling in a new country is a major challenge for all who do it, whether as immigrants or refugees. This experience becomes especially difficult when one has to navigate an unfamiliar system, such as the healthcare system or public authorities. Refugee women who give birth to and raise children in Germany face particular challenges. Many of them came to Germany without any relevant human or social capital. Although they are legally entitled to statutory health insurance, they encounter structural barriers that not only complicate giving birth, but also hinder access to health care and social services for their children.

Until now, there has been barely any robust empirical data on the health and development situation of the children of refugees in Germany. Thus, the goal of this Weekly Report is to provide initial information on this topic. The results on physical constitution at birth, such as c-section frequency, birth weight, birth length, head circumference, and nursing behavior, do not show any significant differences between children of refugee mothers and children of mothers with or without a migration background. Effects of limited access to healthcare cannot be recognized in children of refugee women.

However, the situation is different in regard to early childhood development. Children of refugees perform worse than children from the two other groups in the domains of language, social, and motor skills from the ages of two to four. However, these differences can be explained almost entirely, especially by the mental health of the mothers, their level of education, and their employment status. Attending institutional childcare (day nanny, nursery, or preschool) also has a positive effect.

A notable finding relates to the children's daily living skills: Here, children of refugees and of mothers with a migration background score better than the children of women without a migration background. This could indicate these children have more pronounced independence in daily life, such as performing simple housework tasks such as cleaning up, setting the table, or getting dressed on their own.

In regard to physical development (measured by body mass index (BMI)), it can be seen that the children of refugees and women with a migration background are more frequently overweight. For children of refugees, however, this difference disappears once socio-demographic and family-related factors are accounted for. The mother's level of education appears to be decisive: The higher a mother's level of education, the lower the risk of her child being overweight. For the risk of being underweight, primarily children of single mothers are at risk, regardless of whether or not the mother has a migration background.

The results make it clear: Family resources play a key role in the healthy mental and physical development of children of refugees, just like for other children. If children of refugees grow up under similar conditions as other children, they develop just as well as they. However, this also means that if they grow up in precarious living situations, – for example, with mothers who experience psychological distress, have low levels of education, or are not employed, the risk of developmental disadvantages increases significantly. These deficits are difficult to compensate for later on in life and may, in the long term, prevent affected children from fully participating in social life.

To counteract this, targeted investments are needed: In educating refugee mothers, in their integration into the labor market, and getting them access to high-quality institutional childcare early on. Only in this way can genuine participation be made possible.

19 The birth mother can be clearly identified in the data. The second parent is coded as the partner of the mother, making it impossible to differentiate between the partner being the birth father or another partner.

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