

# Young Children Living Below the Poverty Line

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### Introduction

There is broad scholarly consensus across a range of disciplines that poverty in early childhood can harm child development in multiple areas, including cognition, language, and socio-emotional skills, and that these subsequently affect a broad range of socioeconomic outcomes at the individual and societal levels (Bradley & Corwyn, 2002; Johnson et al., 2016; Lee, 2014). The results of a series of studies in Israel by the Taub Center are consistent with this general pattern. Extremely low family income in the first 1,000 days, the period from pregnancy through the child's second birthday, is negatively associated with lower performance on standardized tests in fifth grade across a range of subjects, including Hebrew, mathematics, science, and English as a second language (Shavit et al., 2018; Shay & Shavit 2022).

Understanding the magnitude and scope of poverty among young children is particularly important in Israel since it has one of the highest rates of individuals living below the poverty line<sup>1</sup> in the OECD — the 5th highest in 2018 (17%), following Romania, Latvia, the United States, and Costa Rica, and the 4th highest in 2019 and 2020. Yet, even though the NII (National Insurance Institute) releases an annual in-depth poverty report that includes information on children ages birth to 17 living below the poverty line, to our knowledge the only statistics about those below the poverty line in early childhood in Israel relate to families with at least two children up to age six (CBS, 2020).

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<sup>1</sup> The poverty line is in Israel is a relative measure and is defined at 50% of median per capita net income and is not a measure of the lack of basic needs (absolute poverty).

The current paper fills this gap. We provide descriptive information on those below the poverty line among Israel's youngest, from birth to four-years-old, and help identify those populations most at risk. We also describe some of the differences in the standard of living between children living above and below the poverty line, which may affect their developmental trajectories and their future life outcomes.

### **Definitions and methodology**

This study utilizes the CBS (Central Bureau of Statistics) Household Expenditure Survey. To compare the statistics to those in the NII Poverty Report, we used data from 2018 (Endeweld et al., 2019). The CBS sampled 8,792 households, 1,948 of which included children in this age range (birth through age four — around 2,850 children) using a two-stage probability sampling method, based on a sampling frame that covered more than 97% of the Israeli population. The descriptive analyses presented here employ the surveys' statistical weights, which allow for approximate population estimations.

Definitions for the terms poverty line, wage earner, and head of household used in the current paper are those used in the CBS and NII Poverty Report of 2018:

- Poverty line a monthly disposable income<sup>5</sup> of NIS 2,875 per capita adjusted for household size (according to the NII Poverty Report of 2018).<sup>6</sup>
- 2 The 2019 NII report (the last before COVID-19) was based on National Insurance Institute data instead of CBS data; therefore, in order to ensure the numbers presented here are comparable to the NII numbers we analyse 2018 data.
- 3 The sampling population does not include Bedouins living in unrecognized towns as well as individuals living in kibbutzim that have not been privatized.
- 4 The representation of the East Jerusalem Arab population is apparently biased upward in a way that slightly lowers the poverty rates. While the NII calculates poverty rates with and without East Jerusalem, the Public Use File does not allow for identification of this population, and thus the analysis here includes this group as well.
- 5 Income after compulsory payments (income tax, NII payments, health tax) and transfer payments.
- 6 Since some household expenditures do not increase linearly as the number of household members increase (rent, for instance), it is common when calculating per capita income to adjust by household size. This adjusted number is also in the database that we used.

- Wage earner a household member who worked for payment at least one day in the three months before the survey.
- Head of household the primary wage earner the individual who worked the most hours in the same three month period.

It is worth noting that the head of household is not necessarily a parent of the child or of the children of interest. The child's relation to the head of household is a variable we generated for our report by combining information on the child's relationship to the first respondent, the adult household member who responded to the CBS interviewer, and the head of household relation to the first respondent.

The data allows identification of the relationship to the head of household (parent, grandparent, sibling, or other related adult) for most of the children. In at least 91% of households with a child under age four, the head or their spouse was a parent of the focal child. In the remaining cases, it was either a sibling (2%), grandparent (2%), uncle, aunt, or other adult related to the focal child (up to 5%).<sup>7</sup> For this reason, we focused the analyses on head-of-household characteristics.

Most of the following analyses are based on reported income after taxation and government benefits, per the NII Poverty Report since these are the actual available family resources. It is important to emphasize that because the income and benefits data used here are reported, as is standard practice in the literature on poverty both in Israel and in other countries, they may under-represent what people actually earn or receive from working, benefits, or other sources.

Our report is divided into four main sections. In the first, we look at household characteristics that are likely to be related to families falling below the poverty line. In the second, we estimate some multivariate regressions that combine these characteristics to identify characteristics of families with young children that are more strongly related to living below the poverty line. The third section compares the effects of transfer payments on the share of children below the poverty line across Israel's main subpopulations. The fourth section briefly describes some implications of living below the poverty line, with a particular emphasis on early childhood. The paper ends with a discussion and conclusions.

<sup>7</sup> In 5% of the cases, the child-household head relationship is not clear, and in some of these the household head may be a parent of the focal child.

### Background characteristics — Bivariate correlations

### Young children living below the poverty line

Our calculation suggests that in about a third (32%) of all households who lived below the poverty line in 2018, almost 150,000 households, there was a child under age four. Figure 1 further highlights the fact that families with young children are more likely than other families to live below the poverty line. About a quarter of households with young children lived below the poverty line, in comparison to about 15% of households without children and about 18% with children aged five to 17.

100% 90% 80% 70% 60% 50% 40% 30% 20% 10% 30% 18% 30% 15% 25% 0% Households Children Households Children Households

Figure 1. Share of households and children below the poverty line, by age of child, 2018

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

Children aged 5-17

No children

Children from birth to age 4

Households living below the poverty line generally tend to be larger. Specifically, in the year of the study, households with young children below the poverty line had an average of 1.7 children under age four, compared to 1.4 children among households not below the poverty line. Consequently, when moving from the share of households below the poverty line to the share of children overall below the poverty line, the poverty rates are even higher – with 30% of the children from birth to four (more than 250,000 children) falling below the poverty line.<sup>8</sup>

The calculation is based on the weighted sum of children up to age four in the surveyed households. It is important to note that it is not completely accurate. According to the annual statistical publication of the CBS, in 2018, there were 905,000 children under the age of four — about 45,000 children more than our calculation result. As noted in Footnote 3 previously, the survey does not include non-privatized kibbutzim and Bedouin living in towns that are not recognized by the State — two groups that totalled about 29,000 children in 2018 according to the annual publication (Table 2.2, Statistical Abstract of Israel 2019, CBS).

In 2018, approximately 23% of the 2.6 million households in Israel had a child under the age of four. We now examine these households in more detail to see which characteristics of these households are more likely to be associated with living below the poverty line.

### Share of young children below the poverty line by population group

Relative poverty among young children is not equally distributed across the population. Figure 2 shows that more than half of Arab and Haredi households with a child under age four were below the poverty line, compared to 8% of non-Haredi Jewish households. Again, when moving from households to children, the rates are even higher — 63% of Haredim, 58% of Arabs, and 9% of non-Haredi Jewish children under age four.

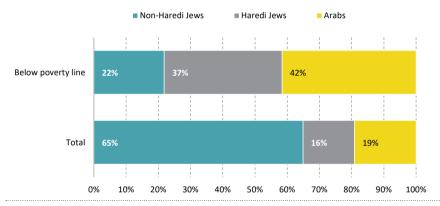
Overall, almost 100,000 Arab children, and around 110,000 Haredi children under age four, lived below the poverty line in 2018. Although the proportion of young non-Haredi Jewish children living under the poverty line is relatively low, their absolute number was high — almost 50,000 — due to the large share of non-Haredi families in the population, both at the time of the survey and today.

Figure 2. Share of households with children from birth to age four below the poverty line, by sector, 2018

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

Figure 3 compares the distribution of population groups (Haredim, Arabs, and non-Haredi Jews)<sup>10</sup> among households with children under four to their distribution among households with children under four below the poverty line. Non-Haredim accounted for 65% of all households, but only about a fifth (22%) of households below the poverty line. In contrast, while Arabs and Haredim comprised only 19% and 16%, respectively, of households with children under four, these groups comprised 42% and 37%, respectively, of the households below the poverty line with children under four.

Figure 3. Distribution of households with children from birth to age four out of all households in Israel and out of households below the poverty line, by sector, 2018



Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

The gap between the poverty line and actual household income reflects the household depth of relative poverty. Thus, an index of the depth of relative poverty for each sector is the gap between the average income per capita per sector and the poverty line. As noted, the 2018 poverty line was NIS 2,875 per capita per month. Table 1 shows the average depth of relative poverty for children under age four in the various sectors. The figures are quite similar

<sup>10</sup> Israel's population includes an additional group — those with no religious classification — which is classified in CBS publications as "others." In statistical calculations this group is, for the most part, combined with the non-Haredi Jewish population. In our analyses, this group was not included since it is quite small (less than 3% of the population) and with different characteristics than the non-Haredi Jewish population.

across sectors, though relative poverty was somewhat deeper among Arab children compared to their Jewish peers.

Table 1. Depth of relative poverty among children from birth to age four below the poverty line, by sector, 2018

| Sector          | Average per capita income | Depth of poverty |
|-----------------|---------------------------|------------------|
| Poverty line    | NIS 2,875                 |                  |
| Non-Haredi Jews | NIS 2,043                 | 29%              |
| Haredim         | NIS 1,977                 | 31%              |
| Arabs           | NIS 1,893                 | 34%              |
|                 |                           |                  |

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

### The relationship between household characteristics and the likelihood of living below the poverty line

We will now look more closely at other characteristics of households with children aged birth to four and explore which are related to the likelihood of living below the poverty line.

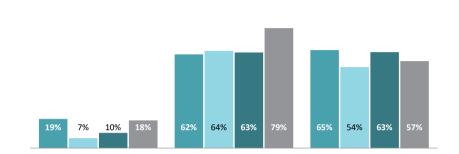
### Age of head of household

Among Arabs, no consistent relationship between the age of the head of household and the likelihood of children living below the poverty line was found (Figure 4). Among Haredim, by contrast, the share of children below the poverty line was fairly constant when the head of household was in the 20-49 age range, but when the head of household was over 50, the rate was higher.<sup>11</sup> Among non-Haredi Jews, a young head of household (20–29) correlates with a higher probability of being below the poverty line — about 20% of children lived below the poverty line, as compared to 7% and 10% for those in a household where the head of household was in their 30s and 40s, respectively. One apparent reason for this is that younger head of household parents (those in their 20s), who are in the early stages of entering the labor market, have not yet reached their full earning potential. It could also be that they may be older siblings in some cases rather than the parents or other adult relatives of the child.

<sup>11</sup> The number of observations among Haredi heads of households over 50 is very small.

**■**20-29 **■**30-39 **■**40-49 **■**50+

Figure 4. Share of children from birth to age four below the poverty line, by age group of head of household and sector, 2018



Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

Haredi Jews

Arabs

### Family status of head of household

Non-Haredi Jews

The vast majority of young children in Israel live in households where the head of household is married. Estimates according to the survey indicate that in that year, 93% of children ages from birth to four had a married head of household, 4% lived in households headed by an individual who was never married, 2% with a divorced head of household, and 1% lived with a widowed or separated household head. It is important to note that among the Arab and Haredi populations, non-married households are such a small share of the sample that it is impossible to draw any conclusions about these groups. This is also the case for widowed individuals among non-Haredi household heads with young children.

Figure 5 shows relative poverty by marital status among non-Haredi Jewish heads of households. It suggests that in this group, relative poverty is more prevalent among children living in a household where the head is not married. <sup>12</sup> Thus, only about 8% of young children in households with a married head of household lived below the poverty line; that figure increases to 34%, 11%, and 13% among those led by a divorced, separated, or single head of household, respectively.

<sup>12</sup> The results are similar if we include only the 91% of children whose parents are the household head or their spouse (see the section *Definitions and methodology*.)

Figure 5. Share of children from birth to age four below the poverty line, by the family status of head of household, non-Haredi Jews, 2018

#### Number of wage earners in the household

As work income is the main source of funds for most families, we now look at the relationship between the number of wage earners in the household and the likelihood of being below the poverty line. As expected, Figure 6 shows that the share of young children below the poverty line declines as the number of wage earners in the household increases. It should be noted that some households choose to have only one wage earner so that the other adult can stay home and take care of young children, and as such, the condition may be temporary. This is not to diminish the impact of life below the poverty line on young children. Nevertheless, one adult remaining at home to care for a young child reduces childcare and education costs, and for some, reduces the financial burden on the household and allows the funneling of resources to other developmental needs of the child. Despite the negative relationship between number of wage earners and the share of young children living below the poverty line, it is important to note that even among children who live in households with two working household members, 11% of young children lived below the poverty line in 2018. That is, two wage earners in a household do not provide a sure safeguard against living below the poverty line. We return to this group in more detail later on in this paper.

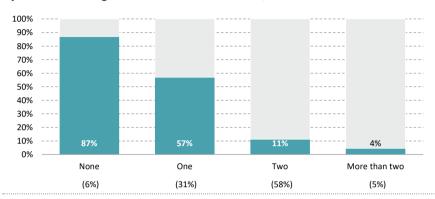


Figure 6. Share of children from birth to age four below the poverty line, by number of wage earners in the household, 2018

Note: The percent in parenthesis represents the share of children from birth to age four out of all households. Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

Given gender differences in labor market participation and wages, we were also interested in exploring differences between paternal and maternal working status and the relationship to relative poverty among children. Figure 7 presents the share of children below the poverty line by the working status of each parent and by sector.<sup>13</sup> In all sectors, children of two working parents were the least likely to be below the poverty line, though the share was still 21% among Arabs, and even higher — 39% — among Haredim. Among both Haredim and Arabs, in households with only one employed parent, the gender of the working parent does not significantly affect the poverty rate among the children. For both of these groups, 72–76% of children with only one employed parent lived below the poverty line. In contrast, for non-Haredi Jews, a child had a 51% probability of being below the poverty line if the father was not working, and only a 23% chance with a non-working mother.<sup>14</sup> A possible explanation may be related to gender wage gaps which among non-Haredi Jews are greater than among the other two groups (Debowy et al., 2023).

<sup>13</sup> The figure reflects about 86% of the sample for which we concluded that the household head is the child's parent (see previous section on *Definitions and methodology*), and for which there is data regarding the employment status of both the household head and their spouse (single-headed households are not in the analysis).

<sup>14</sup> In this population, an unemployed father is fairly uncommon and generally indicates difficulties in finding work, illness, or disability. Employment rates among mothers are also high in this group (Fuchs & Bowers, 2016), although, due to cultural norms, in many cases where the mother is not employed it reflects a choice to extend maternity leave or a choice to remain at home for childcare. At times, this may be related to a good financial state.

■ Working parents ■ Working mother ■ Working father ■ Non-working parents 4% 51% 23% 39% 75% 72% 21% 72% 76% Non-Haredi Jews Haredi Jews Arabs

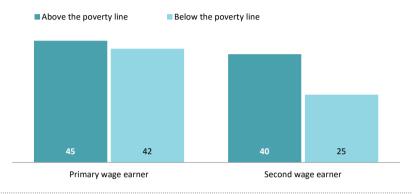
Figure 7. Share of children from birth to age four below the poverty line in households with two parents, by parent employment status and sector, 2018

### Households with two wage earners

Although parents' employment has an important effect on the likelihood of relative poverty, the data indicate that 22% of children living below the poverty line lived in households with at least two working household members. It would appear that for this group, policies that encourage parents to enter the labor market are insufficient to keep their children above the poverty line.

In order to understand the circumstances wherein the presence of two working household members is still not enough to prevent child relative poverty, we explore the characteristics of such households separately. Figure 8 shows that in households below the poverty line, the wage earners — and particularly the secondary wage earner — worked fewer hours compared to wage earners in households above the poverty line. Half of the second wage earners of children below the poverty line worked 25 hours or less, while for children above the poverty line, the median hours worked by the second provider was 40 hours. In other words, in at least half of the households below the poverty line with two wage earners, one of the wage earners was in part-time employment.

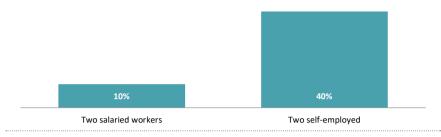
Figure 8. Median number of work hours of wage earners in households above and below the poverty line with children from birth to age four, in households with two wage earners, 2018



An additional analysis was conducted on the relationship between the likelihood of children from birth to age four living in a two-wage-earner household below the poverty line and the employment status of the wage earners (salaried employed/self-employed). As shown in Figure 9, the likelihood of relative poverty was much lower among two-salaried households than in households with two self-employed wage earners. The reason for this gap is unclear. This could stem from differences in reported income between the two groups, or less stable income levels among the self-employed. However, in general, the self-employed tend to be concentrated at the tail ends of the distribution, either poorer or richer, while salaried workers tend to fall more in the middle.

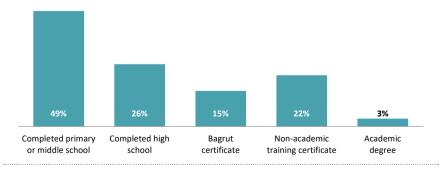
<sup>15</sup> It should be taken into consideration that as taxes for self-employed individuals are based on self-report, these reports may be downwardly biased, even in an anonymous survey.

Figure 9. Share of children from birth to age four living below the poverty line, by the employment status of the household wage earners, in households with two or more wage earners, 2018



Finally, we examined the share of relative poverty among young children in households with two or more wage earners by the education level of the working members. As expected, the likelihood of relative poverty among children in households with two (or more) working household members is greater the lower the education level of these working household members. Figure 10 shows that when at least one of the household wage earners has an academic degree, the share of young children below the poverty line is especially low, 3%. In contrast, the rates in households where the wage earners did not complete high school were nearly 50%, and in households with wage earners in the category of other type of education, about one-fifth.

Figure 10. Share of children from birth to age four below the poverty line, by highest education level reached by a wage earner in households with two or more wage earners, 2018



Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

### Multivariate regression of the likelihood of living in relative poverty

Many of the factors associated with poverty described thus far are highly correlated. To uncover which of these factors are the most important predictors of relative poverty, we used multivariate logistic regression, the results are presented in Table 2. The first model includes only sector affiliation, which, as seen in Figure 2, plays a major role in predicting living below the poverty line. When other factors are introduced (model 2 in column 2), model fit improves substantially — the pseudo-R² rises from 0.24 to 0.55. Here, being Haredi is no longer a significant factor, but being an Arab definitely is: the likelihood that young children in Arab households will live below the poverty line is almost six times higher than their Jewish counterparts.

The main household characteristics that were found to increase the likelihood of young children being below the poverty line, and that help explain the gap between Haredi and non-Haredi children, are the number of children in the household, and employment status (part-time or no employment) of the household head and their spouse (or another second wage earner). Another factor that explains some of the gap between the sectors is the academic education of the household head and their spouse that is higher among non-Haredi Jews and reduces the likelihood of relative poverty significantly.

The age of the head of household has a U-shaped association with the odds of young children living below the poverty line, as seen in Figure 4 for non-Haredi Jews. Interestingly, when controlling for the other factors in the model, having a female primary wage earner or where the head of household is not married has no significant correlation to this likelihood.<sup>16</sup>

We should note that conducting a separate model for each of the sectors could provide useful data, though dividing the sample by sector and then breaking them down by each characteristic would have resulted in very small groups that would not necessarily be representative of the relevant population group, and ultimately would cause a bias in the conclusions drawn from the data.

Table 2. Logit regression: odds-ratio of being below the poverty line

|                              | 1               |            |                | 2          |           |                |  |
|------------------------------|-----------------|------------|----------------|------------|-----------|----------------|--|
|                              | Odds ratio      | 95% confi  | dence interval | Odds ratio | 95% confi | dence interval |  |
| Constant                     | 0.115***        | 0.095      | 0.138          | 0.713      | 0.087     | 5.827          |  |
| Haredim                      | 12.27***        | 9.385      | 16.040         | 1.501      | 0.870     | 2.588          |  |
| Arabs                        | 11.66***        | 8.566      | 15.882         | 5.771***   | 3.631     | 9.170          |  |
| Number of children in house  | hold            |            |                | 1.780***   | 1.541     | 2.056          |  |
| Education of primary wage ea | arner (academi  | c = 1)     |                | 0.328***   | 0.180     | 0.600          |  |
| Female head of household     |                 |            |                | 0.723      | 0.374     | 1.397          |  |
| Education of female head of  | household (aca  | demic = 1) |                | 1.701      | 0.708     | 4.091          |  |
| Education of second wage ea  | rner (academic  | = 1)       |                | 0.245***   | 0.148     | 0.405          |  |
| Weekly work hours of primar  | ry wage earner  |            |                |            |           |                |  |
| No wage earner               | 5.647***        | 2.065      | 15.443         |            |           |                |  |
| Less than 22 hours           | 4.722***        | 1.868      | 11.932         |            |           |                |  |
| 22-35 hours                  |                 |            |                | 4.099***   | 1.993     | 8.430          |  |
| 50 hours or more             |                 |            |                | 0.661      | 0.385     | 1.135          |  |
| Weekly work hours of female  | e primary wage  | earner     |                |            |           |                |  |
| Female household head who    | o does not worl | <          |                | 1.521      | 0.319     | 7.254          |  |
| Less than 22 hours           |                 |            |                | 0.720      | 0.198     | 2.620          |  |
| 22-35 hours                  |                 |            |                | 0.330**    | 0.123     | 0.888          |  |
| 50 hours or more             |                 |            |                | 1.334      | 0.187     | 9.542          |  |
| Weekly work hours of second  | d wage earner   |            |                |            |           |                |  |
| No second wage earner        |                 |            |                | 19.52**    | 9.535     | 39.944         |  |
| Less than 22 hours           |                 |            |                | 5.487***   | 2.312     | 13.025         |  |
| 22–35 hours                  |                 |            |                | 2.430*     | 1.035     | 5.704          |  |
| 50 hours or more             |                 |            |                | 0.571      | 0.049     | 6.602          |  |
| Unmarried head of househol   | d               |            |                | 1.016      | 0.571     | 1.805          |  |
| Age group of head of househ  | old             |            |                | 0.774***   | 0.688     | 0.869          |  |
| Age group of head of househ  | old squared     |            |                | 1.003***   | 1.002     | 1.005          |  |
| Pseudo R <sup>2</sup>        |                 | 0.24       |                |            | 0.55      |                |  |
| Number of observations       |                 | 1,889      |                |            | 1,889     |                |  |

Significance levels: \*p < 0.10; \*\*p < 0.05; \*\*\*p < 0.01.

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

Having examined some of the relevant factors that correlate with the likelihood of families with young children living below the poverty line, we turn to measuring the effect of transfer payments on the share of children below the poverty line.

### Government transfers and their effect on poverty rates

Government transfers are primarily a mechanism of social protection intended to assist the welfare state in reducing inequality and the incidence of poverty in society. Indeed, the NII poverty report for 2018 indicates a reduction in the incidence of poverty following transfer payments. In the overall population, it declined by 24%, and among children (aged birth to 17) by 11%. In our analyses, we found a similar reduction of about 11% among young children (under age four) in 2018.

These transfers, however, are not equally effective in moving young children from different sectors out of relative poverty. Table 3 shows that they moved 27% of non-Haredi Jewish young children above the poverty line, but only 12% of Haredi children. This is likely due to the large size of Haredi households, in which government benefits are divided by a greater number of people. Of greater concern, however, is the impact of transfer payments on young children in Arab society. As can be clearly seen in the table, after taxes and transfers the share of young Arab children living below the poverty line essentially grew by 2%. We will try to examine the underlying mechanism for this next.

Table 3. Children from birth to age four living below the poverty line, before and after transfer payments, by sector, 2018

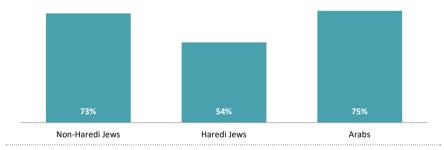
| Sector          | Average income before taxes and transfers | Average income after taxes and transfers | Relative poverty<br>rate before<br>transfers | Relative poverty<br>rate after taxes<br>and transfers | Rate of change in poverty rate among young children |
|-----------------|---|--|--|---|---|
| Non-Haredi Jews | NIS 5,707                                 | NIS 9,484                                | 13%  | 9%  | 27%   |
| Haredim         | NIS 5,313                                 | NIS 9,790                                | 72%  | 63%   | 12%   |
| Arabs           | NIS 6,382                                 | NIS 8,414                                | 57%  | 58%   | -2%   |

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

In practice, transfer payments succeeded in lifting about 31,000 households out of relative poverty, but at the same time, about 12,000 households across all sectors (65% of them Arabs), and among them about 16,000 children, dropped below the poverty line according to their income after transfers. This is because, mandatory taxes (income tax, NII payments, and national health insurance) that these households paid were higher than the social benefits they received. Examining the income sources of these 12,000 households that were above the poverty line yet dropped below it after transfer payments revealed that only 4% of them received benefits other than child allowances.

In contrast, among the 31,000 households who successfully moved out of poverty due to transfers, 93% received allowances or other government payments like maternity benefits, disability allowance, negative income tax, transfers for learning in a *yeshiva*, in addition to child allowances. To understand the relative role of transfers for households in different sectors, Figures 11 and 12 present sources of disposable income of households with young children who lived below the poverty line in each sector.

Figure 11. Share of income from labor out of disposable income in households below the poverty line with children from birth to age four, by sector, 2018



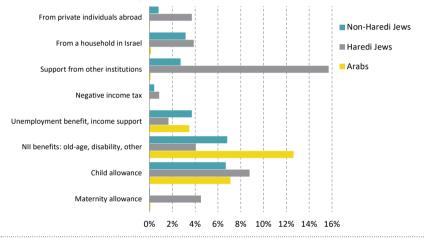
Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

As shown in Figure 11, the share of income from labor in Arab and non-Haredi Jewish households with young children below the poverty line was fairly similar, representing about three-quarters of household income. Among Haredi households below the poverty line, the share was much lower — only 54%.

In Figure 12, we see notable sectoral differences in the share of income from transfer payments. Haredi households below the poverty line received about 43% of their disposable income from transfers, as compared to 24% for non-Haredi Jews and Arab households. More specifically, in 2018, support from sources other than NII, mostly for yeshiva study, was an important income source for Haredi households living below the poverty line. The vast majority of this support for yeshiva study represents about 14% of these families' net income or about NIS 1,315 on average per month. This is in comparison to less than 1% of disposable income for non-Haredi Jewish households and the absence of this income source for Arab households. In addition, Haredi households received a larger share of their disposable income from

private sources (in Israel and abroad) — 8% versus 4% in non-Haredi Jewish households and less than 1% in Arab households. Maternity benefits are also a much higher share of disposable income for these Haredi families, at about 4% as compared to less than 0.1% for Arabs and non-Haredi Jews. In contrast, Arab families below the poverty line seem to receive a fairly high share of income from other allowances, mostly disability and old-age allowances — 13% compared to 7% for non-Haredi Jews and 4% for Haredim.

Figure 12. Income sources of households below the poverty line with children from birth to age four, by sector, 2018



Note: Share of disposable income.

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

It appears that the child allowance, intended to be universally enjoyed by families with children in Israel, represented a fairly substantial share of disposable household income across households below the poverty line in the three sectors (7–9% of disposable income). Of interest and concern, however, is the finding that for the three sectors, the share of negative income tax out of household income for those below the poverty line — a transfer specifically intended to encourage households to enter the labor market — was almost negligible. Income support and unemployment allowances, two other policy tools intended to help families experiencing economic hardship, also seem to have a relatively minimal contribution to disposable household income particularly for Haredi households.

### Implications of living below the poverty line for young children

We turn now to explore some implications of living below the poverty line that may be relevant to the development of young children. We focus on household density, local socioeconomic measures, home ownership, general expenses, and, more particularly, early childhood education expenses.

### Standard of living

Wilson's classic 1987 work, *The Truly Disadvantaged*, described the disadvantages and lack of opportunity that stem from living in poor neighborhoods. Since then, a growing body of empirical research has shown that a child's surroundings influence their well-being. Specifically, there are place-based inequalities that emerge in economic, social, cultural, and built environment attributes of a child's neighborhoods that can have a substantial effect on their development and future life course outcomes. Young children in poorer neighborhoods are more likely to be exposed to pollutants or environmental hazards, may have lower quality childcare, and fewer community resources than children in other neighborhoods (Minh et al., 2017).

In Israel, children below the poverty line tend to live in residential areas of lower socioeconomic clusters on average. The local socioeconomic cluster on a scale from 1 to 5 (1 lowest, 5 highest) was, on average, 1.98 among young children living below the poverty line in 2018, compared to 2.94 among other young children. Table 4 suggests that, among Arab children, there is a substantial distributional gap, as the median for this group declines from the second lowest cluster to the lowest.

Table 4. Socioeconomic cluster of residential area of children from birth to age four above and below the poverty line, by sector, 2018

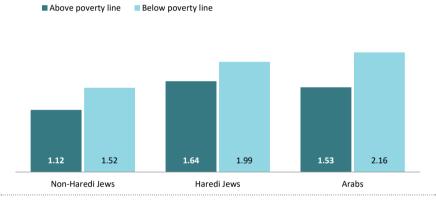
|                     | Relative poverty       | Non-Haredi Jews | Haredim | Arabs | Total |
|---------------------|------------------------|-----------------|---------|-------|-------|
| Average SES cluster | Above the poverty line | 3.21            | 2.26    | 1.68  | 2.94  |
|                     | Below the poverty line | 2.85            | 2.10    | 1.44  | 1.98  |
| Median SES cluster  | Above the poverty line | 3.00            | 2.00    | 2.00  | 3.00  |
|                     | Below the poverty line | 3.00            | 2.00    | 1.00  | 2.00  |

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

<sup>17</sup> The socioeconomic clusters of the place of residence in this study are determined by the CBS.

In terms of the more immediate environment, there is also a difference in physical space in the home between those living above and below the poverty line. Figure 13 shows the average ratio of people to rooms in a household for different sectors by relative poverty status. The figure confirms that children below the poverty line lived in more crowded households than their counterparts in each of the sectors. Demonstrating the importance of sector in living standards, however, we also see that children of non-Haredi Jews below the poverty line lived in similar conditions to those of the Haredi and Arab sectors who were above the poverty line.

Figure 13. Housing density for households above and below the poverty line with children from birth to age four, by sector, 2018



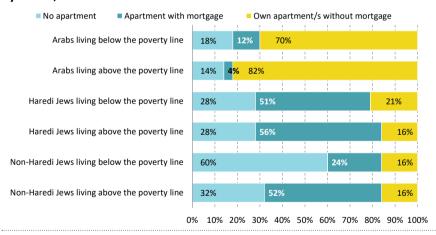
Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

### **Apartment ownership**

Research has shown that home ownership may have benefits for children, in terms of better home environments, academic achievements, and fewer behavioral problems, even when controlling for a range of other social and economic factors. This may be because people who own their home are more willing to invest in their living space and also live there for longer periods of time leading to greater stability, both of which positively affect children (Haurin et al., 2001). Apartment ownership, especially if there are no loans or mortgages to repay, can also reduce parental stress levels, which is a known mediator between poverty and child development outcomes (for instance Troller-Renfree et al., 2022).

Figure 14 shows the share of households owning at least one apartment (for residence or other purposes) with or without a mortgage in the survey year. The share of Arab and Haredi households that owned an apartment, even among those below the poverty line, stands out — 82% and 72%, respectively. For Haredim, this probably results from norms within the Haredi sector of purchasing an apartment for the young couple as part of the marriage agreement. For non-Haredi Jews, there is a substantial difference by poverty status: while 68% of households above the poverty line owned an apartment, only 40% of those below the poverty line owned one. Considering housing debt as well, however, this difference between non-Haredi Jews above and below the poverty line disappears — 16% of each group owned at least one apartment and had no housing debt. It is interesting that, among Haredi Jews, the share of ownership without debt was actually higher for households below the poverty line than the corresponding share of households above the poverty line.

Figure 14. Share of households with children from birth to age four living above and below the poverty line that own at least one apartment, by sector, 2018



Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

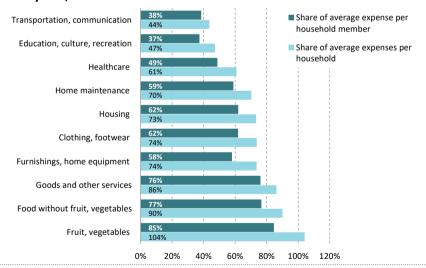
<sup>18</sup> In the Haredi population this is apparently the result of the custom of parent's purchasing an apartment for the young couple as part of the marriage agreement.

### **Expenditures**

Not surprisingly, there is also a difference between the self-reported spending patterns of households with young children above and below the poverty line. Figure 15 compares household expenditures for households below the poverty line to households above the poverty line, for both total household expenditures and standardized per household member.

It is clear that the households below the poverty line spent less in almost all categories, except for fruits and vegetables. For fruits and vegetables, the average expenditure per household living below the poverty line was 104% of the total expenditure of a household above the poverty line. As with all of the categories, expenditure per standardized person was lower here, too, for households below the poverty line. The lowest ratios were for *transportation and communication* and *education and culture*. Since the latter includes early childhood education and care (ECEC) expenses, and since education is an investment in human capital, we explore the differences in this category next.

Figure 15. Share of expenditure in each category out of average household expenditure for households with children from birth to age four below the poverty line, 2018



Note: The data are relative to the expenditures of a household with children from birth to age four above the poverty line.

Source: Yael Navon and Liora Bowers, Taub Center | Data: CBS, Household Expenditure Survey 2018

<sup>19</sup> Households in the survey sample complete an expense journal for two weeks, which forms the basis for expenses data.

### Expenditure on early childhood education and care

Although there were, on average, more young children in the households living below the poverty line, these households spent less on early childhood education and care (ECEC), as shown in Table 5. This holds across almost all ECEC spending types and within each sector.<sup>20</sup> The share of households with any expense in each category was also lower among those households below the poverty line. This may be due, in part, to the fact that many of these households living below the poverty line have a single-wage earner and thus their children have less need for ECEC than households above the poverty line.

The highest category of ECEC spending for those below the poverty line is for daycare (including a daycare center, home care, or private childcare outside of the child's home), at an average of NIS 890 per month among the 27% of households with such expenses. For those above the poverty line, the spending on private preschools was particularly high, at a monthly average of NIS 2,233 for the 23% of households with this expense. The table also shows that households above the poverty line spent almost four times as much on private preschools than those below the poverty line, suggesting that there may be residential segregation by socioeconomic class and/or quality differences in the types of preschools attended by children above and below the poverty line. The differences shown in average expenditure on education for families above and below the poverty line may be due to the higher levels of subsidy given to low-income families in official daycare centers for children from birth to age three. Differences in spending may also be affected by differential rates/prices depending on the socioeconomic ranking of the neighborhood or between different sectors.

<sup>20</sup> The breakdown by sector is not shown in the table. The exception in this area is expenditure on nannies in the Arab population. Arab households below the poverty line spend more on private childcare in their home than households above the poverty line.

Table 5. Share of average expenditure on early childhood education and care by households above and below the poverty line with children from birth to age four, 2018

|                        | Childcare in family<br>home                    |  | Infant care                           |  | Daycare, family<br>home care, childcare<br>outside of home |  | Private preschool                              |  |
|------------------------|--|--|---------------------------------------|--|--|--|--|--|
|                        | Share of<br>households<br>with this<br>expense | Average<br>monthly<br>expense<br>(NIS) | Share of households with this expense | Average<br>monthly<br>expense<br>(NIS) | Share of<br>households<br>with this<br>expense             | Average<br>monthly<br>expense<br>(NIS) | Share of<br>households<br>with this<br>expense | Average<br>monthly<br>expense<br>(NIS) |
| Above the poverty line | 9%   | 960                                    | 4%                                    | 733                                    | 35%  | 1,928                                  | 23%  | 2,233                                  |
| Below the poverty line | 3%   | 311                                    | 3%                                    | 259                                    | 27%  | 890                                    | 19%  | 581                                    |

### Discussion

This study aimed to better understand the phenomenon of poverty, as defined by the NII Poverty Report, among young children in Israel, given that poverty during this critical period has been shown to negatively affect a range of developmental areas (for instance, Bradley & Corwyn, 2002; Johnson et al., 2016; Lee, 2014; Shay & Shavit, 2022; Shavit et al., 2018). It is important to note that the definition of poverty here, as in the NII report, is relative poverty as opposed to absolute poverty. Thus, children who live below the poverty line may still live in households that have enough resources to meet their essential needs. Nevertheless, it is important to stress that while the definition of relative poverty is in relation to the entire population, subpopulations in Israel are characterized by important differences in their housing and consumption patterns. This means that subjective perceptions of poverty and its impact are likely to be different in the various sectors. Irrespective, young children living below the poverty line likely have fewer opportunities than their counterparts to receive cognitively enriching stimulation, which is beneficial for their development.

Overall, we found that poverty rates among households with young children are higher than those with older children or without children, and 30% of Israeli children from birth to age four lived under the poverty line in 2018. Arab and Haredi children are particularly likely to live in households under the poverty line compared to non-Haredi Jews.

Not surprisingly, the number of working household members is a very important predictor of childhood poverty. Our findings show that the share of children living below the poverty line goes from 87% in households with no working household members to 11% in those with two working household members. Still, even among children in two-wage earner homes, one out of ten lived below the poverty line. A possible explanation for this lies in the fact that, in at least half of such homes, the second wage earner worked only part-time. In addition, we found that the likelihood of living below the poverty line was greater when the wage earners had lower education levels and when both were self-employed. Therefore, it is not enough to encourage labor force participation to ensure that children do not grow up in poverty. Policy must also address the number of hours that families can work and encourage higher levels of education among the labor force. Alongside this, it is appropriate to evaluate the possibilities of assisting self-employed workers with low incomes.

The correlation of parental working status with relative poverty was found to be generally consistent across all sectors, with the notable exception that, while among Arabs and Haredi households being below the poverty line is unaffected by the gender of the sole wage earner, for non-Haredi Jews, the likelihood of being below the poverty line increases substantially if the sole wage earner is the mother. This might be related to the larger gender wage gaps among non-Haredi Jews (Debowy et al., 2023). This could also be due to some kind of self-selection mechanism based on cultural norms; while a mother not working could reflect a conscious decision to stay home with the young children, a father not working might be more likely to reflect illness, disability, or other challenges finding employment.

Another notable factor affecting the likelihood of young children living below the poverty line is the number of children in the household. This is a by-product of the income per capita calculation since children under the age of 15 are barred from employment by law in Israel, and so their number in the household affects the denominator but not the numerator. However, given that fertility levels are especially high among those sectors with the highest levels of relative poverty, it is an important effect to note and address.

<sup>21</sup> In the context of the discussion of the number of wage earners in a household it is important to note that there are times when the decision to have a single wage earner may improve the standard of living, given the high costs of ECEC services, which in some cases exceeds the potential net earnings of the secondary wage earner. In such a case, in terms of available resources, children in such a household are likely to be better off than in the case of two wage earners.

The multivariate estimates suggest that these two factors (the number of wage earners and the number of children in the household), together with another compositional characteristic that is correlated with both income and sector affiliation, parental education level, are not sufficient to explain the much higher incidence of young Arab children living under the poverty line. This may be partially due to other obstacles, including a language barrier, which Arabs confront in the labor market and affects their opportunities to work in higher-income jobs.

A large gap between sectors was also found in the effectiveness of transfer payments, which are a policy mechanism intended to narrow income inequalities and lift families out of poverty. Indeed, the data show that 93% of households with young children who rose out of relative poverty did so with the help of a variety of transfer allowances, while 96% of households that fell below the poverty line after taxes and transfers received only the child allowance. Nevertheless, as seen here, transfers helped only about a tenth of the children whose household income before taxes and transfers put them below the poverty line to move above the poverty line, and their effectiveness, as mentioned, is not the same across all sectors. Thus, in 2018, transfer payments helped 27% of non-Haredi Jewish young children to be above the poverty line, and 12% of Haredim, while in the Arab sector, the effect was the opposite. Among Arabs, 2% of young children fell below the poverty line after transfer payments. The reasons for this are in the difference between mandatory payments that families pay and the amounts of the transfers they receive. For about 12,000 low-income families with young children in the survey year, payments of income tax, national insurance premiums, and national health care insurance (mandatory payments) exceeded the amount they received in government and private transfers. The share of Arab families in this group was substantially greater than the share of Jews — 7% of Arab households with young children, versus 1%–2% of Jewish households. This gap is in part due to differences in the source of income for the households below the poverty line in the different sectors. Relatively low participation rates of Arab women in the labor market alongside high rates of self-employment of Arab men, lessen the potential transfers and benefits from the NII for things like maternity allowances, negative income tax, and unemployment benefits. In contrast, among Haredi households, part of the transfers are not related to participation in the labor market — more than a third of the income in Haredi households below the poverty line in 2018 was from transfer payments, and a share of 14% of their disposable income was from funding related to their yeshiva studies, which are not contingent on other sources of income. It would seem that transfer payments as they are at present in Israel are not effective enough in preventing poverty among young children, particularly among the Arab population.

The literature suggests a variety of mechanisms that are involved in the relationship between poverty and early childhood development. Among them, some are related to living conditions, parental stress, and the quality of early childhood education and care frameworks (Vaknin et al., 2019). This research found that across all sectors, young children living below the poverty line lived in more crowded homes and lower socioeconomic status residential areas relative to children in households living above the poverty line. Oftentimes, this means reduced access to community resources, poorer quality childcare options, and a less healthy built environment. In addition, families below the poverty line spent less on ECEC, not only in categories such as supervised, subsidized daycare for children from birth to age three that have meanstested subsidies but also on private daycare and preschool. Inasmuch as the costs of these services relate to their quality, this difference also impacts gaps between the developmental environment of young children above and below the poverty line.

An interesting finding is that non-Haredi young children living below the poverty line actually live in similarly (or less) crowded homes and in better socioeconomic status neighborhoods than Arab and Haredi children who are above the poverty line. In contrast, young children in Arab and Haredi households below the poverty line are much more likely to live in homes that their families own — 82% and 72% respectively, versus 40% among non-Haredi Jews. Thus, non-Haredi Jewish children below the poverty line may be more exposed to the stresses and instability of living in rented accommodations as compared to Arab and Haredi children. These are an example of sectoral differences in housing and consumption patterns that stress the importance of expanding our understanding of these differences between sectors and their impact.

### **Conclusions**

This research examined the characteristics and scope of relative poverty among children under the age of four in Israel and examined the factors influencing the likelihood of young children living below the poverty line. While the data in this study are from 2018, the overall poverty rates and poverty rates for children from birth to age 17 in later National Insurance Institute reports have not changed dramatically, despite a slight decline during the COVID-19 period. Thus, we have little reason to believe that there has been a substantial change over the past few years in the figures specific to young children. In the areas of taxes and transfer payments, the main changes during the period were temporary ones, due to the COVID-19 pandemic. The most salient permanent change was the reform for individuals with disabilities implemented in 2021. This is likely to slightly improve the situations of households where part of their income comes from disability allowance, though unlikely to make a drastic change in the picture presented here. The following are a series of policy direction alternatives that arise from the findings and which, in our opinion, are likely to contribute to a reduction in the rates of children from birth to age four living below the poverty line.

Identification of the target population: Policy makers should identify the populations with young children that have a higher likelihood of being below the poverty line and intervene where possible. For example, the current study findings indicate that special attention should be given to households with young children where both wage earners are self-employed, or where the head of the household is under age 30 (especially when the head of household is an older sibling). In such cases, welfare services or the NII should check if the household requires individualized support.

Labor market participation: It is important to continue to encourage the factors that are known to contribute to social mobility, including integration into the workforce, longer working hours among secondary wage earners in a household, and higher education. It is a matter of some concern that the negative income tax, a key policy tool for encouraging labor force participation, seems to provide an almost negligible share of household income in households below the poverty line. It would be worthwhile to examine whether this is an issue of a low share of families that are eligible for the negative income tax, low rates of take-up of the benefit, or the benefit amount being too low.

Income support and unemployment allowances: Findings show that the contribution of these two NII allowances to the disposable income in households below the poverty line with young children is relatively little, particularly in the Haredi and Arab sectors. Here again, it is important to understand if the challenge is indeed the eligibility criteria, benefit uptake rates, or the size of the benefit. It would also be beneficial to examine the structure and effectiveness of these programs in Israel relative to that of other developed countries.

Government transfers: A finding of concern from this study is that among Arab households with young children, poverty rates in 2018 increased slightly after transfers, due to the gap between taxes paid and transfers received. This phenomenon of moving below the poverty line after taxes and transfers has also been found in other sectors, though at lower rates. Since there has been little change in the areas of taxes and benefits since the years that this study examined, it seems appropriate to establish a mechanism to correct this, whether by expanding the variety of benefits that this group is entitled to or by reducing taxes that are paid by this group.

Early childhood education and care (ECEC): We found that household expenditure on ECEC frameworks is lower in households below the poverty line than in those above it. This is likely partially a reflection of government subsidies that are given to low-income households. Nevertheless, particularly low expenditure on frameworks — especially on private day-cares and preschools — often also reflects low-quality services or fewer hours in these frameworks by those living under the poverty line.

Studies show the importance of quality ECEC frameworks in the development of young children (for instance, Kulic et al., 2019), and thus the availability of high-quality frameworks for all population groups is critical to narrow developmental gaps between children from different backgrounds. From this perspective, the current government's five-year plan for early childhood education, presented to the public in April 2023, may be a step forward. According to the plan, the State will act to improve the measures of quality in early education frameworks by reducing the ratio of children to caregivers, improving the education and training levels of caregivers, and more. In addition, the program is supposed to increase subsidies substantially for children from birth to age three enrolled in supervised, subsidized daycare settings and provide tax credits or grants to working households with children

in this age group. The proposed policy is supposed to simultaneously encourage employment, reduce the financial burden on families with young children, and help promote the enrollment of children from lower socioeconomic groups in high-quality educational frameworks.

Nevertheless, to ensure the success of this program, appropriate preparatory steps must be taken. Currently, the majority of households with young children under the poverty line have one or no working household members, so they would either not qualify or receive less assistance under the proposed policy. Thus, it is essential to expand the incentives to join the labor force while ensuring access to ECEC for this population and streamlining the process of receiving the benefit.

Finally, it is important to emphasize again that, in this discussion of poverty, a relative measure of income inequality rather than an absolute definition based on the deprivation of material needs was used. In Israel, as in many other countries, it is customary to use the relative poverty line index. Nevertheless, for the development of both research and policy, it is important to examine the links between different poverty indices. Based on these findings regarding the standard of living, there appears to be a direct correlation between living below the poverty line and more crowded living arrangements, lower socioeconomic neighborhoods, and less spending on education. Altogether, these elements contribute to a more challenging external environment to support optimal development for young children, and their later life outcomes.

With the findings on young children living under the poverty line provided by this study, we hope that better-targeted policies and programs can be created and evaluated to help support a brighter future for Israeli's youngest. After all, we are dealing with the future generation of the State of Israel.

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