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What we know from Growing Up in Ireland (GUI) (2008-2024): Key Well-being Factors for Children and Young People

November 2025



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What we know from Growing Up in Ireland (GUI) 2008-2024: Key Well-being Factors for Children and Young People

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Executive summary

Purpose and Background

This report was commissioned by the Department of Children, Disability and Equality to systematically review and synthesise evidence from the Growing Up in Ireland (GUI) study. Its purpose is to identify the key factors which impede or support child well-being, the extent to which these are socially patterned, and the resulting policy opportunities for intervention. This work provides a comprehensive overview of the risk and protective factors shaping the development of children and young adults up to age 22, drawing on findings from both the '98 and '08 GUI Cohorts.

Scope of the Review

A total of 353 eligible studies were identified through a comprehensive search, from which 223 peer-reviewed journal articles and 23 GUI thematic reports were selected for in-depth analysis. In line with guidance notes for use of GUI data, the evidence was synthesised across four domains:

1. Physical Health and Development
2. Education and Cognitive Development
3. Socioemotional Development and Well-being
4. Civic and Economic Engagement

This review covers research published up to 5 June 2024.

Review Findings

A wide range of individual, family, peer, school, neighbourhood, and socio-political factors were associated with child and youth well-being outcomes in Ireland.

Looking at the four domains separately, the synthesised research demonstrated the following key findings:

- **Physical Health and Development:** Socioeconomic gradients were evident in outcomes such as health status, obesity and physical activity. Boys were consistently more physically active, while girls, children with chronic illness, disabilities, developmental delays, higher BMI and from more disadvantaged backgrounds engaged in lower levels of physical activity. Healthcare use across childhood and adolescence was shaped by socioeconomic status, health needs, and caregiver factors. Public health cover was shown to improve access to GP services.

- **Education and Cognitive Development:** Use of non-parental childcare was associated with both family characteristics and contextual factors. The socioeconomic gap in developmental and academic outcomes is visible as early as age 3 and widens through the school years. Parental expectations and the school environment (including Delivering Equality of Opportunity in Schools (DEIS) status) are critical supports. School attitudes and academic performance shifted over time, with mixed trends across literacy, numeracy, and engagement. Girls, those from less advantaged backgrounds, and children with special educational needs experienced a greater decline in academic self-confidence when transitioning to secondary education. Better academic outcomes and higher self-image at age 9 were protective factors.
- **Socioemotional Development and Well-being:** This was the most researched domain. Strong relationships with parents and peers, safe local facilities, and structured sports are key protective factors, while bullying and family adversity (e.g., lower SES, parental illness/psychopathology, stress) are significant risks. A consistent gender pattern was observed, with adolescent girls reporting higher levels of anxiety and emotional difficulties, while adolescent boys demonstrate higher levels of antisocial behaviour. Digital engagement and screen time increased markedly between cohorts, particularly by age 9, and was associated with lower physical activity levels and socioemotional well-being.
- **Civic and economic engagement (>17 years):** This domain was under-researched, nevertheless, results showed emerging patterns of political and social participation in adolescence and early adulthood, with differences by rural-urban setting. Sports-related volunteering is more common among rural youth, while political engagement is more common among urban youth. Higher education expectations and outcomes are positively shaped by early academic performance, academic self-concept, and parental expectations and education. Caregiving responsibilities in young adults are linked to lower progression to higher education.

Looking across domains, several key patterns and findings also emerged:

- **Socioeconomic disadvantage**—including low income, lower parental education, lone-parent households, and migrant background—was consistently linked to poorer outcomes across all domains.
- **Sex differences** were observed across all well-being domains, with girls reporting more internalising symptoms (e.g., anxiety, low self-concept) and boys more behavioural difficulties and higher levels of physical activity. Boys generally scored higher in maths at 9 and 13 years, whereas girls had higher literacy in later adolescence (at 15 years) and achieved higher overall Leaving Certificate scores.
- **Environmental and neighbourhood factors**, such as safety, access to green space, and community amenities, were associated with physical activity, socioemotional outcomes, and civic engagement.

- **Policy influences**, including access to medical cards, free GP care, and maternity leave, shaped health outcomes and service use. Economic crises, including the recession (2008–2013) and COVID-19 pandemic, were linked to elevated risks across domains—particularly for already vulnerable children.
- **Cohort comparisons** highlighted changes in children’s lives over time, particularly regarding digital media use, physical activity, and emotional well-being, with such cohort differences reflecting broader social and policy shifts in Ireland over the past two decades.

Implications and Policy Opportunities for Intervention

The findings highlight several clear policy opportunities for intervention. A primary implication is the need for targeted policies that mitigate the impact of socioeconomic disadvantage. Investment in social infrastructure—including safe neighbourhoods, accessible sports facilities, and high-quality, affordable childcare—is crucial. Furthermore, the evidence points to an urgent need to strengthen school-based mental health supports, particularly for adolescent girls, and to address the challenges emerging from the new digital landscape.

Future Research

This review identifies several areas for future investigation. Under-explored domains, including civic engagement, sleep, and coping strategies, warrant greater focus. To fully leverage the power of the GUI data, future research should prioritise longitudinal analyses that track how risk and protective factors interact over time to influence outcomes, as well as more direct cross-cohort comparisons to understand the impact of societal and policy changes.

1. Introduction

1.1 About this report

This report documents the research undertaken to systematically source, review, summarise, synthesise, interpret, and report on the body of evidence published between 2007 and June 2024 using *Growing Up in Ireland* (GUI) data. The aim is to identify key factors that support or hinder the well-being of children, adolescents, and young people in Ireland up to the age of 22.

Commissioned by the Department of Children, Disability and Equality in Ireland, this work contributes to a deeper understanding of the longitudinal relationships between these factors and their influence on well-being outcomes over time. This review also examines, where possible, the impact of public policy on child and youth well-being, and considers the implications of these findings for future policy development.

In doing so, it identifies both risks and protective factors, highlights gaps in the existing GUI literature, and offers evidence-informed recommendations for research and policy.

1.2 Background

1.2.1 The Growing Up in Ireland cohorts

GUI is Ireland's national longitudinal study focused on children and youth. Launched in 2006, the study tracks the development of three distinct cohorts across a range of domains. Data collection for the “Child” cohort (Cohort '98) began in 2007, when study children were 9 years old, while data collection for the “Infant” cohort (Cohort '08) started in 2008, when study children were 9 months old. In September 2024, data collection started for a new birth cohort (Cohort '24).

Since its inception, GUI has followed the Child and Infant cohorts at regular intervals (“waves”), allowing for in-depth analysis of their development over time. Cohort '08 has participated in data collection waves at ages 9 months, 3, 5, 7/8, 9, and 13 years, while Cohort '98 participated at ages 9, 13, 15, 17/18, 20, and 25 years.

In addition to scheduled waves, an unscheduled online COVID-19 survey was conducted in December 2020, capturing data on the 12-year-olds in Cohort '08 and the 22-year-olds in Cohort '98.

Most data collection for GUI involved in-person visits by interviewers to family homes. Wave 4 for Cohort '08 (age 7/8 years) primarily used postal questionnaires, while Wave 6 (age 13 years) primarily relied on telephone interviews. Wave 5 for Cohort '98 (age 25 years) was mainly web-based, with some face-to-face interviews.

The primary goal of GUI is to describe the lives of children and track their development as they grow into adulthood. As a longitudinal study, GUI follows the same individuals over time, allowing for the collection of both cross-sectional data at each wave and longitudinal data that reveals how participants' circumstances, experiences, and outcomes evolve. This design provides valuable insights into developmental trajectories and identifies both risk and protective factors that influence growth. Each wave of data collection enriches the overall dataset, providing insight into the developmental trajectories of cohort members and highlighting both risk and protective factors that influence their growth.

Data collected throughout the study spans three main domains: (1) physical health and development, (2) education and cognitive development, and (3) socio-emotional development and well-being. At age 17, a fourth domain—civic and economic engagement—is introduced.

In addition to these core domains, GUI collects critical sociodemographic information from parents and guardians, such as occupation, social class, household income, family structure, and parental educational attainment. This information helps examine whether children's well-being outcomes vary depending on the circumstances and structure of their households.

The data collection process also evolves as children grow. In infancy and early childhood, most of the information is provided by the parent/guardian. However, as the children mature, they increasingly contribute their own perspectives. By age 20 (in Cohort '98) only a small amount of information is collected from the guardian, with most data gathered from the young adults themselves.

In addition to individual- and family-level data, GUI also collects relevant information from both primary and post-primary schools. This includes data from school principals and class teachers, helping to provide a fuller picture of the children's educational experiences and development.

1.2.2 Bronfenbrenner's Bio-Ecological Model of Development

Since its inception, the Growing Up in Ireland study has been guided by Bronfenbrenner's bio-ecological model of development [1]. This framework views the individual as being nested within multiple layers of environmental systems that interact with both each other and the person. These systems include other people, institutions (such as schools), policies, and cultural norms. The model suggests that those closest to the individual, such as family and peers, tend to have the greatest influence on their development.

As depicted in Figure 1, the model includes several levels of influence. The innermost layer is the microsystem, which consists of the individual's immediate environment, such as family, school, and peer groups. The exosystem refers to broader social systems that indirectly affect the individual, such as the local community or the parents' workplace. The macrosystem encompasses larger cultural and societal factors, such as national education policies or societal norms around gender. The mesosystem involves the interactions between the various systems or actors within those systems, like conflicts between parents or their involvement with the school.

Bronfenbrenner also emphasises the role of time in shaping development, represented by the chronosystem. Time influences development in several ways. First, as the individual matures, their capacities and the expectations placed upon them evolve. Additionally, the repetition of interactions over time, such as consistent caregiving, plays a crucial role in development—secure attachments, for example, are formed when a child learns that their needs will consistently be met by a responsive caregiver. The chronosystem also includes the period effect, referring to the historical context in which a person grows up. For example, the COVID-19 pandemic had a significant impact on both Cohort '08 and Cohort '98, but the timing of this event was different for each cohort. Cohort '08 experienced it during the transition from primary to secondary school, while Cohort '98 faced it as they were transitioning from college to the workforce. These period effects illustrate how life events can uniquely influence development depending on when they occur in an individual's life course.

Bronfenbrenner's model underscores the idea that a child's development—and their sense of well-being, happiness, and satisfaction—cannot be separated from the broader social, cultural, and material environment in which they are embedded. An adequate assessment of a child's well-being, therefore, must account for both

proximal influences, such as family relationships, and distal factors, such as cultural norms and societal expectations, as well as the geopolitical and material conditions that frame their experiences.

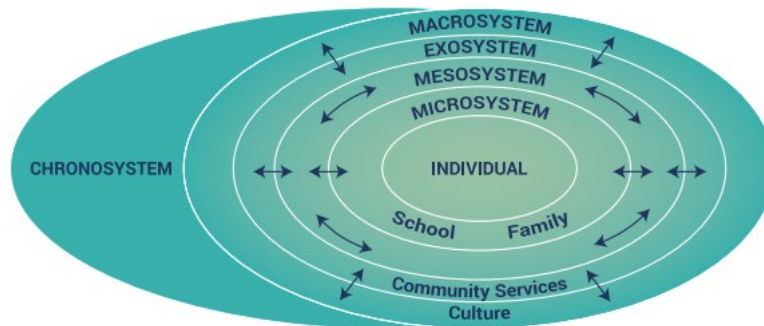


Figure 1. Visualisation of Bronfenbrenner's bio-ecological model (Figure derived from [2])

1.2.3 Well-being framework Ireland

Ireland's *Understanding Life in Ireland: The Well-being Framework*, launched in 2021 [3], adopts the ecological approach that Bronfenbrenner promoted. The approach consists of 11 dimensions and 35 measurable indicators that integrate the biopsychosocial with the broader social, cultural, and material factors that affect quality of life. Examples of dimensions include Subjective Well-being (e.g., % of school-aged children happy with life), Mental & Physical Health (e.g., rates of depression and unmet medical needs), and Knowledge, Skills & Innovation (e.g., PISA scores in reading and maths). The Connections, Community & Participation dimension tracks loneliness and access to social support, while Housing & the Built Environment includes energy ratings and proximity to essential services.

While the *Understanding Life in Ireland Well-being Framework 2025* generally portrays a positive picture of well-being nationwide, drawing on multiple data sources, there are certain signals within the data that raise concerns. Notably, one concerning finding from The Irish Health Behaviour in School-Aged Children (HBSC) Study 2022 [4] is related to school-aged children happiness with their lives. Concretely, between 2014 and 2022, the percentage of school-aged children (10-17 years) who reported feeling happy with their lives at present reduced from 89.7% in 2014 to 78.5% in 2022, according to this study [4]. Disparities were also evident, with girls, children from immigrant backgrounds, and those with disabilities reporting lower levels of happiness compared to the average child [4].

Such cross-sectional data reported in the national Well-being Information Hub¹ and in the HBSC Study 2022 [4], offer valuable insights into the well-being of children and adolescents in Ireland—a key snapshot of their lives at a specific point in time.

To gain a more comprehensive and developmental perspective on the key factors influencing child and adolescent well-being, as well as to understand the extent to which these factors are socially patterned and exhibit characteristics that signal policy opportunities for intervention, it is crucial to complement our existing knowledge with an assessment of the available longitudinal evidence. In this context, it is timely to review what we know from Growing Up in Ireland (GUI), the nationally representative longitudinal study of child and adolescent well-being over time.

1.2.4 Review aims

The primary aim of the review is:

- To systematically source, review, summarise, synthesise, interpret, and report on the research evidence published to date using GUI data to identify the key factors that support or impede the well-being of children, adolescents, and young people in Ireland up to the age of 22. Achievement of this aim will result in the identification of the risks and protective factors associated with well-being in children and young people in Ireland and will lead to an improvement in our understanding of the longitudinal relationships between these factors and how they interact to influence well-being outcomes over time.

The secondary aims of this review are:

- To assess the impact of policy on well-being outcomes, by linking findings reported in sourced studies to the policy context that pertained when the given study was conceptualised, written and published.
- To provide policy recommendations and identify opportunities for intervention that (i) mitigate risks and reduce barriers that inhibit well-being, (ii) safeguard protective factors, and (iii) maximise enablers of well-being for children, adolescents, and young people in Ireland.

¹ <https://www.cso.ie/en/releasesandpublications/hubs/p-wbhub/well-beinginformationhub/>

2. Methods

To address the aims of this report, we conducted a systematic review of all studies that have utilised data from both GUI cohorts, in accordance with the PRISMA guidelines [5]. The following sections provide a detailed overview of the methods employed throughout the review process.

2.1 Research Question and Eligibility Criteria

The main, broad, research question for this review was:

“What do we know from published studies that utilise GUI '98 Cohort and '08 Cohort data about the factors that impede or support child and adolescent well-being over time?”

We aimed to conduct a comprehensive review of published studies using data from both the GUI '98 and '08 Cohorts. Our goal was to include research spanning all ages and developmental stages covered by these GUI data—infants, children, adolescents, and young adults—and to consider all relevant outcomes related to well-being in a broad sense. This encompassed the following domains: (1) physical health and development, (2) education and cognitive development, and (3) socio-emotional development and well-being, (4) civic and economic engagement. Studies employing quantitative, qualitative, or mixed-methods approaches were eligible for inclusion.

2.2 Information Sources & Search Strategy

We conducted a comprehensive search across multiple library databases to ensure multidisciplinary coverage, reflecting the broad nature of well-being research and well-being determinants. This included peer-reviewed journal articles, as well as grey literature—such as reports from governmental and non-governmental agencies, conference abstracts and proceedings, and dissertations—to minimise issues associated with publication bias [5,6].

Twenty-six databases were searched (see Appendix 1) including subject-specific databases—covering business, economics, education, food science, health, sociology, sports, library and information science—and more general databases, such as Web of Science, Academic Search Complete, SCOPUS, Proquest Dissertations & Theses). The search term used across all databases was “Growing Up in Ireland”, allowing us to

identify all potentially eligible documents. The searches were conducted by a UCD Health Sciences College Liaison Librarian. Searches were run on the 5th June, 2024.

2.3 Study Screening & Selection

Study titles and abstracts retrieved from the database searches were downloaded to Endnote and subsequently imported into Covidence software, a platform widely used for managing systematic reviews. Endnote served as the repository for all retrieved studies, while Covidence was used to conduct study screening, selection, and data extraction.

Study screening and selection followed a three-stage process: data preparation, title and abstract screening, and full-text review. One member of the review team screened all studies, and a random sample of studies was reviewed by two members of the review team. Any uncertainty around the potential inclusion of studies was discussed with the review team until consensus was reached.

2.4 Data Extraction

General data extraction was carried out for all identified GUI-based studies (k = 353) to record their key characteristics, including title, authors, year of publication, study type, cohort(s) used, ages of the children involved, main aims, and study design.

2.4.1 Peer-reviewed journal articles

Given the large volume of studies identified as eligible (k= 353), detailed data extraction was limited to peer-reviewed journal articles (k=261), as these sources typically undergo independent evaluation and may offer a higher level of scientific rigour. Of these, only studies that examined child well-being and its potential determinants were selected for full assessment (k=223). Studies focused primarily on methodology, or on outcomes unrelated or only indirectly related to child well-being (e.g., parental or teacher well-being), were catalogued but excluded from detailed analysis. Appendix 7 provides an overview of peer-reviewed studies not fully analysed (k=38), including their outcome of interest and the reasons why they were not selected for detailed extraction.

A detailed data extraction sheet was developed to systematically map key facilitators and barriers to child well-being for each study (see Appendix 2). The sheet also captured study-level information about specific measures used, number of

participants, and the types of research approaches (i.e., quantitative, qualitative, mixed-methods) used. All eligible peer-reviewed studies (k=223) were reviewed and assessed using this standardised data extraction sheet.

Eligible peer-reviewed studies also underwent a quality assessment. Details about the quality assessment are presented in Section 2.6. Further limitations of focusing on peer-reviewed journal articles are presented in Section 4.4.

2.4.2 Selection of GUI thematic reports

A total of 45 reports were identified during the search process, including a number of official GUI reports. In addition to the full analysis of peer-reviewed journal articles, we also examined the content of 23 thematically focused reports, including official GUI reports, selected in consultation with the Department of Children, Disability and Equality. By joint agreement with the Department, data extraction from these selected thematic reports focused on high-level findings, using the same structured data extraction sheet applied to peer-reviewed journal articles. It should be noted that broader GUI 'key findings' reports were not included in this analysis.

2.4.3 Other studies

Studies that were not eligible for full data extraction were catalogued as part of this review. A complete list of all 353 identified GUI studies is provided in Appendix 6.

2.5 Data Synthesis

Evidence on child well-being outcomes extracted from the included studies (k=246) was organised into four overarching domains: (1) physical health and development; (2) education and cognitive development; (3) socioemotional development and well-being; and (4) civic and economic engagement. Each domain was further divided into multiple subdomains (see Table 1).

Table 1. Refined framework of GUI domains and subdomains used in this review

Physical health and development	Education and cognitive development	Socioemotional development and well-being	Civic and economic engagement (>17y)
Commuting*	Academic self-image	Bullying, perpetration	Aspirations
Dental health	Aspirations, school choice, post-school educational attainment	Coping strategies	Attitudes to work
Diet, eating behaviour	Attitudes to school, school engagement, absenteeism	Gambling, self-harm*	Concerns
Handedness*	Attitudes to school subjects	Hobbies, activities, interests	Employment
Health status	Childcare uptake*	Key relationships (e.g., with parents and peers)	Experience of discrimination
Long-term conditions, illness, and disability	Home learning environment*	Mental health/anxiety/depressive symptoms	Political engagement
Physical Activity, sedentary behaviour	Neurodevelopment, expressive language*	Screen time	Volunteering
Sleep	Relationships with teachers	Self-esteem, happiness, self-concept	
Smoking, alcohol, and drugs	Shadow education*	Stressful events*	
Use of health services, vaccination	Verbal reasoning and numeracy, academic performance	Antisocial behaviour/contact with the criminal justice system	
Weight, height, BMI, obesity, overweight	Perception of skills learned in school		
	Subject choice in school		
*Subdomains marked with an asterisk represent additional subdomains identified inductively during this review.			

Our initial subdomain categorisation for this review was informed by sample topics covered under GUI domains listed on page 6 of the Department's guidance note for policymakers, researchers, and NGOs using GUI data [7]. Eight additional subdomains emerged inductively during this review process (see asterisks in Table 1), reflecting the range of well-being outcomes observed in the peer-review literature. The refined subdomain framework used in this report (Table 1) therefore comprises the original GUI subdomains plus the eight inductively identified subdomains. This approach highlights the added methodological value of the review, which not only categorised eligible studies but also informed the refinement of the subdomain framework.

Studies were assigned to one or more domains and subdomains, depending on the number and diversity of child outcomes they assessed. Tables were then created to summarise the characteristics and findings of each study, listed per domain and

subdomain. In addition, summary tables were created which include only a concise summary of all study results belonging to a subdomain.

A “spotlight” table was developed to summarise the impact of policy and broader societal factors on child well-being outcomes, based on the perspectives of the original study authors. This table highlights all studies that examined the impact of policy and societal factors on child outcomes. A second spotlight table was created to capture environmental and neighbourhood factors, which represent potentially modifiable factors that could be targeted by future policies.

2.6 Quality assessment

All eligible peer-reviewed studies underwent a quality assessment. After reviewing available tools, the NHLBI “Quality Assessment Tool for Observational Cohort and Cross-Sectional Studies” [8] was selected because it was well matched to the needs of this review. Designed to evaluate the internal validity of observational cross-sectional and longitudinal studies, this tool aligned with the types of analyses commonly conducted using GUI data. The tool offers flexibility and transparency—essential for assessing a diverse body of research spanning multiple waves, cohorts, and analytical approaches. Importantly, it also requires reviewers to address key challenges associated with GUI data, such as reliance on self- or parent-reported information, retrospective reporting, and attrition, through relevant quality criteria (e.g., measurement of exposure and outcome, blinding, and loss to follow-up). The structured checklist format supports systematic application across a large number of studies, and endorsement by a respected institution (NIH) adds to the credibility and comparability of the assessment.

Using this 14-item checklist (Appendix 3), scores for the studies ranged from 3 to 12 out of 14, with a mean score of 8.3. Six studies [9–14] achieved the highest score of 12, while one study [15] received the lowest score of 3. A summary of scores for each study is provided in Appendix 9.

In many cases, studies lost points because the criteria were not applicable due to study design. For example, blinding of outcome assessors (Q12) and sample size justification or power calculations (Q5) were generally not applicable to the GUI studies, as it concerned primarily secondary data analyses. A handful of studies did report on sample size justification or power calculations. Similarly, exposure assessed more than once (Q10) and loss to follow-up $\leq 20\%$ (Q13) were unmet primarily due to

the use of cross-sectional designs (not applicable) or the inclusion of later follow-up data where attrition was higher. Exposure measured prior to outcome (Q6) was also frequently unfulfilled, especially in cross-sectional or retrospectively reported data.

Overall, studies tended to lose quality points due to methodological constraints inherent to secondary data analysis of large-scale cohorts like GUI. Common issues included reliance on self- or parent-reported data (which may be prone to recall or social desirability bias), unclear reporting of final sample sizes, limited control for confounding variables in some analyses. In some cases, it was also difficult to assess certain quality criteria due to unfamiliarity with certain methods/analyses, e.g., advanced economic models.

3. Results

3.1 Study Selection

A total of 886 documents (825 non-duplicates) were retrieved from the database searches and screened by title and abstract. Those meeting initial inclusion criteria were reviewed in full to determine eligibility, resulting in the inclusion of 338 studies that analysed GUI data. An additional 15 thematic GUI reports were manually sourced bringing the total to 353 eligible studies. These eligible studies were peer-reviewed journal articles (k=261), reports (k=45), theses (k=27), books or book chapters (k=10), as well as other documents types (e.g., preprints of academic papers, corrigendum; k=10). By joint agreement with the Department, a total of 246 studies were selected for analysis for this review. This concerned 223 peer-reviewed articles that specifically examined child well-being and its potential determinants, as well as 23 selected GUI thematic reports. Figure 2 illustrates the numbers of documents identified, screened, and included. A more detailed PRISMA flowchart is displayed in Appendix 4.

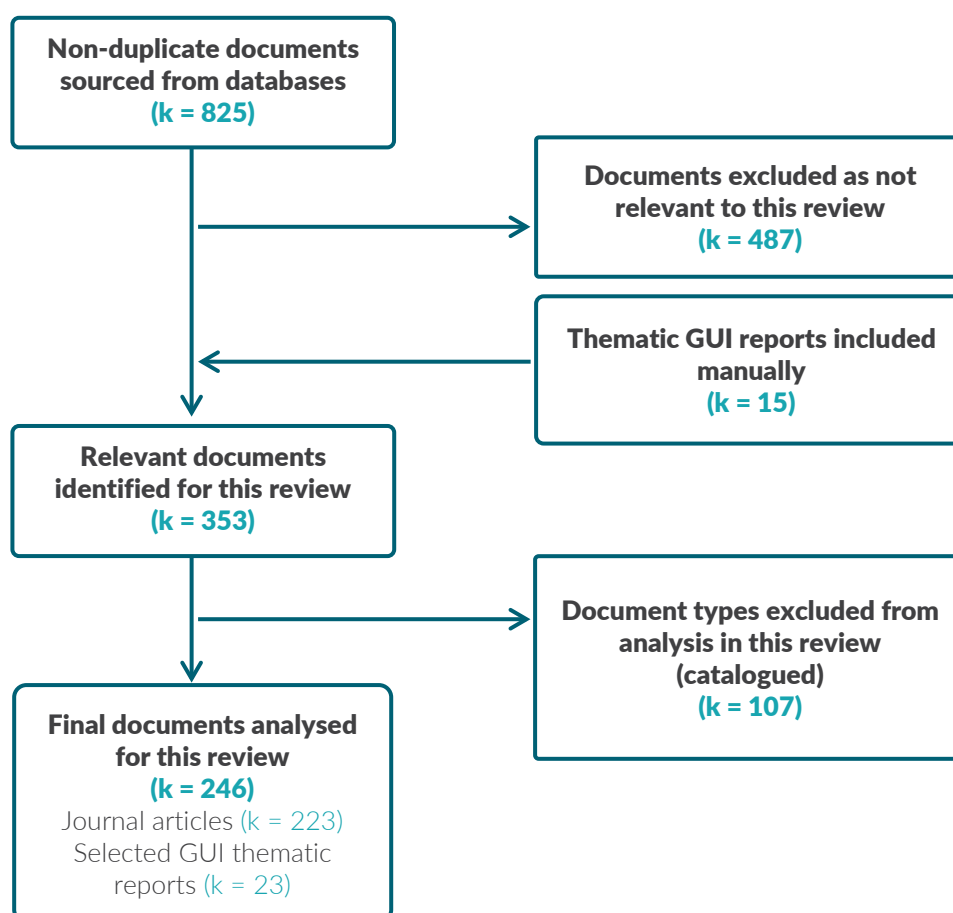


Figure 2. Review document selection flowchart

3.2 Study Characteristics

A profile of the 223 peer-reviewed journal articles and 23 selected GUI thematic reports is presented in Table 2. Most journal articles were published from 2017 onward, with approximately three-quarters published after that year. The vast majority employed quantitative methods (98%), with more than 60% using longitudinal designs and focusing on the '98 Child Cohort (60%). Socioemotional development and well-being was the most frequently examined domain (50%).

Most thematic reports were published between 2012 and 2024, and were primarily based on quantitative analyses. Over half applied a longitudinal design or analysed data at multiple waves (57%). Data from the '98 and '08 Cohorts were used equally often (39% each), while approximately one in five reports used data from both cohorts (22%). Socioemotional development was the most frequently examined domain (78%), followed by physical health and education/cognitive development (57% each), and civic and economic engagement (13%).

A profile of all 353 included studies is presented in Appendix 5.

Table 2. Profile of peer-reviewed journal articles (k=223) and selected GUI thematic reports (k=23) analysed for this review

Characteristic	Peer-reviewed journal articles		Thematic reports	
	# studies	% of total	# studies	% of total
Year of publication				
2010	1	0.45%	0	0.00%
2011	1	0.45%	1	4.35%
2012	17	7.62%	2	8.70%
2013	7	3.14%	2	8.70%
2014	17	7.62%	2	8.70%
2015	7	3.14%	1	4.35%
2016	9	4.04%	0	0.00%
2017	13	5.83%	2	8.70%
2018	17	7.62%	0	0.00%
2019	19	8.52%	1	4.35%
2020	22	9.87%	1	4.35%
2021	21	9.42%	4	17.39%
2022	27	12.11%	3	13.04%
2023	28	12.56%	2	8.70%
2024	17	7.62%	2	8.70%

Research method used				
Quantitative	219	98.21%	23	100.00%
Qualitative	3	1.35%	0	0.00%
Mixed-Methods	1	0.45%	0	0.00%
Design				
Longitudinal	134	60.09%	13	56.52%
Cross-sectional	89	39.91%	10	43.48%
GUI dataset(s) used				
'98 Child Cohort	134	60.09%	9	39.13%
'08 Infant Cohort	73	32.74%	9	39.13%
'98 Child Cohort AND '08 Infant Cohort	16	7.17%	5	21.74%
GUI domain covered (many studies cover >1 domain)*				
Physical health and development	79	35.43%	13	56.52%
Education and cognitive development	75	33.63%	13	56.52%
Socioemotional development and well-being	112	50.02%	18	78.26%
Civic and economic engagement (>17y)	4	1.79%	3	13.04%

*Of the **peer-reviewed studies**, 44 (19.73%) cover >1 domain: 179 studies cover 1 domain, 41 studies cover 2 domains, and 3 studies cover 3 domains; Of the **thematic reports**, 15 (65.22%) cover >1 domain: 8 reports cover 1 domain, 8 reports cover 2 domains, 5 reports cover 3 domains, and 2 reports cover all 4 domains.

3.3 Main Findings

Section 3.3 presents the main findings of the review, organised around the four overarching domains of child well-being: physical health and development; education and cognitive development; socioemotional development and well-being; and civic and economic engagement. The section is structured into several subsections. Subsection 3.3.1 summarises the domains and subdomains of well-being identified in peer-reviewed articles and selected GUI thematic reports, with findings presented for each subdomain. The subsequent subsections highlight cross-domain insights, including key vulnerability factors (Subsection 3.3.2), differences between the '98 Cohort and '08 Cohort (Subsection 3.3.3), the influence of societal and policy factors (Subsection 3.3.4), and the role of environmental and neighbourhood-related factors (Subsection 3.3.5).

3.3.1 Domains and subdomains of well-being covered in the articles and thematic reports

Table 3 summarises the coverage of child well-being domains and subdomains across the peer-reviewed studies and selected thematic reports included in this review.

Socioemotional development and well-being (k=112 articles; k=18 reports) was the most frequently assessed domain, followed by physical health and development (k=79 articles; k=13 reports), and education and cognitive development (k=75 articles; k=13 reports). Civic and economic engagement was assessed less frequently, with only a small number of articles (k=4) and reports (k=3) focusing on this domain.

In both the peer-reviewed studies and thematic reports, the most commonly examined subdomains reflect similar patterns. Within the socioemotional development and well-being domain, the most prominent subdomains were mental health, anxiety, and depressive symptoms (k=73 articles; k=12 reports), followed by self-esteem, happiness, and self-concept (k=24 articles; k=6 reports). In the physical health and development domain, frequently studied subdomains include weight, height, BMI, and obesity (k=40 articles; k=4 reports), as well as physical activity and sedentary behaviour (k=16 articles; k=5 reports).

In the education and cognitive development domain, verbal reasoning, numeracy, and academic performance (k=40 articles; k=6 reports) were the most commonly assessed subdomains. The thematic reports place relatively more emphasis on school-related subdomains, such as attitudes toward school, school engagement, and absenteeism (k=6 reports), as well as attitudes to school subjects (k=3 reports). They also give some attention to health behaviours, including smoking, alcohol, and drug use (k=3 reports).

The civic domain was largely absent from peer-reviewed articles (k=3 out of 223) but somewhat more widely covered in the reports (k=3 out of 23, covering 4 distinct subdomains).

A summary of findings by subdomain is provided in Table 4, while a detailed overview of study results and characteristics, organised by domain and subdomain, is available in Appendix 8.

Table 3. Overview of the GUI domains and subdomains covered in the analysed peer-reviewed studies (k=223) and thematic reports (k=23)

Physical health and development K=79 articles K=13 reports	Education and cognitive development K=75 articles K=13 reports	Socioemotional development and well-being K=112 articles K=18 reports	Civic and economic engagement (>17y) K=4 articles K=3 reports
Commuting K=1 article / K=0 reports	Academic self-image K=5 articles / K=1 report	Bullying, perpetration K=7 articles / K=0 reports	Aspirations K=4 articles / K=1 report
Dental health K=2 articles / K=0 reports	Aspirations, school choice, post-school educational attainment K=6 articles / K=1 report	Coping strategies K=2 articles / K=0 reports	Attitudes to work K=0 articles / K=0 reports
Diet, eating behaviour K=5 articles / K=3 reports	Attitudes to school, school engagement, absenteeism K=8 articles / K=6 reports	Gambling, self-harm K=2 articles / K=0 reports	Concerns K=0 articles / K=0 reports
Handedness K=1 article / K=0 reports	Attitudes to school subjects K=2 articles / K=3 reports	Hobbies, activities, interests K=6 articles / K=4 reports	Employment K=0 articles / K=1 report
Health status K=12 articles / K=4 reports	Childcare uptake K=2 articles / K=3 reports	Key relationships (e.g., with parents and peers) K=21 articles / K=10 reports	Experience of discrimination K=0 articles / K=0 reports
Long-term conditions, illness, and disability K=3 articles / K=2 reports	Home learning environment K=2 articles / K=0 reports	Mental health/ anxiety/ depressive symptoms K=74 articles / K=12 reports	Political engagement K=0 articles / K=1 report
Physical Activity, sedentary behaviour K=16 articles / K=5 reports	Neurodevelopment, expressive language K=17 articles / K=2 reports	Screen time K=12 articles / K=4 reports	Volunteering K=0 articles / K=1 report
Sleep K=2 articles / K=0 reports	Relationships with teachers K=1 article / K=0 reports	Self-esteem, happiness, self-concept K=24 articles / K=6 reports	
Smoking, alcohol, and drugs K=4 articles / K=3 reports	Shadow education K=1 article / K=0 reports	Stressful events K=4 articles / K=0 reports	

Use of health services, vaccination K=14 articles / K=1 report	Verbal reasoning and numeracy, academic performance K=40 articles / K=6 reports	Anti-social behaviour/contact with the criminal justice system K=1 article / K=2 reports	
Weight, height, BMI, obesity, overweight K=40 articles / K=4 reports	Perception of skills learned in school K=0 articles / K=0 reports		
	Subject choice in school K=0 articles / K=0 reports		
Notes: 44 of the peer-reviewed journal articles and 15 of the thematic reports selected for analysis cover child well-being outcomes that belong to multiple domains; many studies also cover multiple subdomains within one domain.			

For the selected GUI thematic reports, results were extracted solely from the high-level findings as detailed in the executive summaries and categorised into the various domains and subdomains. As a result, this approach may lead to an underrepresentation of certain (sub)domains.

Table 4. Summarised results of the peer-reviewed journal articles and thematic reports per subdomain

Physical health and development (K=79 articles, K=13 reports)	
Subdomain (K studies)	Facilitators / Barriers
Commuting K=1 article K=0 reports	<i>Summary of articles:</i> The uptake or maintenance of active school travel is facilitated by living in an urban area, and a decreased distance to school between ages 9 and 13. Increased distance to school is a barrier [16].
Dental health K=2 articles K=0 reports	<i>Summary of articles:</i> At 9 months, dental problems were more likely among infants with a difficult temperament and higher primary caregiver depression scores, and less likely with dull temperament or soother use [17]. At 3 years, risks included poor child health, hospital admissions, lower primary caregiver education, “Other White” ethnicity, child or maternal overweight, child illness/disability, and low income [17,18].
Diet, eating behaviour K=5 articles K=3 reports	<i>Summary of articles:</i> Poor dietary outcomes in childhood and adolescence were associated with higher sugar intake [15], chronic illness [19], lower maternal education [20], and parental unemployment [21]. Adolescents with overweight were more likely to restrict food intake for weight loss [22]. <i>Summary of reports:</i> Dietary quality in children varied by sex and social class, with lower socioeconomic households farther from food shops, especially supermarkets offering fresh produce [23]. Girls showed lower dietary quality with greater distance to food outlets [23]. The pandemic worsened social inequalities, with disadvantaged groups having a poorer diet [24]. Job loss during the pandemic increased junk food and alcohol consumption, widening social disparities [25].

Handedness K=1 article K=0 reports	Summary of articles: Longer breastfeeding duration (≥ 6 weeks) was linked to a slightly higher likelihood of right-handedness, while being male was associated with a lower likelihood of being right-handed [26].
Health status K=12 articles K=4 reports	Summary of articles: Infant and child health outcomes were worse in children exposed to socioeconomic disadvantage [27–30], low parental education [27,30], lack of folic acid intake in the first trimester of pregnancy [31], unintended pregnancy [32], chronic illness [19], ADHD [33], and childhood psychopathology [34], while exclusive breastfeeding [35] and higher birthweight [36] were mostly protective. Some of these associations varied by age, cohort, and gender [27–29,37]. Summary of reports: Centre-based childcare was associated with a higher risk of poor health, including more respiratory, ear, and gastrointestinal infections, compared to parental care [38]. Poor housing, influenced by socioeconomic factors, was linked to respiratory issues, lower health ratings, and accidents in children [39]. The pandemic worsened health inequalities [24]. Young people involved in more intensive caregiving self-report poorer health [40].
Long-term conditions, illness, and disability K=3 articles K= 2 reports	Summary of articles: Persistent poverty was associated with a higher risk of longstanding illness in children, though this risk was attenuated for those attending DEIS schools [41]. Physical disabilities were more prevalent among children in rural DEIS schools [42]. Chronic illness was less likely among infants of less-educated mothers, but among 9-year-olds, household income and maternal education were not associated with chronic illness [27]. Summary of reports: Exposure to economic vulnerability was linked to poorer health outcomes at age 9 and 17 [43]. The proportion of mothers reporting a long-standing illness or disability in their 9-year-old increased from 11% to 24% between Cohort '98 and Cohort '08, though changes in survey wording complicate interpretation [44].
Physical Activity, sedentary behaviour K=16 articles K=5 reports	Summary of articles: Physical activity in children and adolescents was lower among those with developmental delays [45], chronic illness [19,46,47], autism [48–50], vision problems [47], higher BMI [22,47,51,52], and from socioeconomically disadvantaged families [52–55]. Experiencing bullying [49], excessive screen time [51,56], lower maternal education [53,54], parental unemployment [21], and urban residence [47] also contributed to lower PA levels. Supportive PA parenting practices [54,55,57], peer factors [57,58], structured sports activities [51,53,54,58], active travel [51,54,57], and neighbourhood facilities and safety [47,51,54,57,58] were positively associated with PA. Gender disparities persisted, with boys consistently more active than girls across all studies [46,47,51,52,57,58]. Summary of reports: Physical activity levels in 9-year-olds were lower in families with higher parental stress [59], of lower social class, and in girls [23]. Over time (Cohort '08 vs Cohort '98), sports participation and exercise in 9-year-olds declined, with widening gaps by parental education, social class, and income, and a stable gender gap in sports participation [44]. In 13-year-olds, weekly involvement in organised sports had increased, and lower levels of exercise were less evident compared to a decade ago [60]. The pandemic worsened social inequalities in physical activity [24].
Sleep K=2 articles K=0 reports	Summary of articles: Most children had age-appropriate sleep routines, with early bedtimes and consistent wake times; nighttime wakings and daytime naps decreased with age, and perceived sleep problems became less frequent over time [61]. Sleep guidelines were met in a similar way by children with autism spectrum disorder and their typically developing peers [50].

Smoking, alcohol, and drugs K=4 articles K=3 reports	Summary of articles: Teenage substance use was common, with alcohol, smoking, and e-cigarettes being the most frequently reported [62]. Parental and peer smoking, particularly exposure to primary caregiver smoking during early adolescence, increased risk for teenage substance use [62]. Socioeconomic background showed mixed associations: higher wealth was linked to more experimentation but lower current smoking, while higher caregiver education protected against smoking [62]. Prior smoking problems and earlier psychopathology were also predictive of heavy or ongoing substance use in later adolescence and early adulthood [34,63]. Children exposed to cumulative disadvantage early in life were more likely to experience broader risks, including those linked to risk behaviours [30]. Summary of reports: At 13 years, early maturing girls were more likely to smoke and drink, while early maturing boys were more likely to drink [64]. Smoking, drinking, and drug use were associated with having older friends and being a bully perpetrator. For girls, lower maternal autonomy was linked to smoking, while for boys, low paternal responsiveness and conflict were linked to smoking and drinking [64]. Economic vulnerability in childhood was linked to increased smoking and drinking at age 17 [43]. During the pandemic, alcohol consumption declined, but junk food consumption increased, widening social disparities [25].
Use of health services, vaccination K=14 articles K=1 report	Summary of articles: Healthcare use across childhood and adolescence was shaped by socioeconomic status, health needs, and caregiver factors. In infancy and early childhood (0–5 years), public healthcare entitlements (e.g., medical/GP cards) increased GP visits [65,66], while co-payments reduced service use [29]. Vaccination uptake at 6 months was lower among children of self-employed or smoking mothers, and higher in households with private or public cover [67]. There were distinct sociodemographic differences between pregnant women using standard care, private consultant-led care, and midwifery-led care, and the occurrence of natural birth and caesarean section [68]. By middle childhood (around age 9), healthcare use was higher among children with chronic illness, among victims of bullying [69], and those from lone-parent or lower-educated households [33,70,71]. Parents of children with intellectual disabilities reported more unmet healthcare needs [72]. In adolescence (13–20 years), having ADHD [33], overweight or obesity [70], and prior psychopathology (especially among girls) [34] were linked to greater healthcare use. Public cover increased GP visits [73]. Across ages, gaining a full medical or GP visit card between 2 waves is associated with extra GP visits per annum [66], while being of immigrant-origin is associated with lower healthcare use [74]. Summary of reports: Young children with public health cover (medical/GP visit cards) or private insurance had more GP visits than those without cover. Gaining public cover between 9 months and 3 years increased GP visits, but losing cover had no significant impact. Higher-income households had more GP visits even without public cover. Poor maternal health was linked to higher GP use for children [75].
Weight, height, BMI, obesity, overweight K=40 articles	Summary of articles: Low birthweight is more common among girls, preterm infants [36], those whose mothers smoked [36,76,77], were employed, in poorer health, or had pregnancy complications [36,77], as well as in mothers who consumed alcohol, were very young or older, came from low-income households [77], gained excess weight during pregnancy [36], had non-singleton pregnancies, or underwent fertility treatments [78]. Childhood and adolescent weight outcomes are shaped by a wide range of biological, behavioural, and socioeconomic factors. Parental smoking during pregnancy and childhood, parental overweight, high birthweight, female sex, low

K=4 reports	physical activity, higher screen time, lower parental education, low income and adverse childhood experiences are repeatedly associated with higher child and adolescent BMI and obesity [9,22,27,41,46,76,79–92]. Differences by ethnicity, chronic illness, childcare type, delivery method (e.g., caesarean section), antibiotic exposure, parental employment status and neighbourhood features (e.g., urban/rural), and personality traits (consciousness) are also evident in some studies [13,19,21,46,82,93–96]. Summary of reports: At age 9, lower social class, low activity, and high screen time (only in boys) were risk factors for overweight/obesity [23]. Economic vulnerability in childhood was associated with higher rates of obesity at age 9 and 17 [43]. Smoking during pregnancy was the strongest predictor of low birthweight, and less breastfeeding and earlier introduction of solid foods were linked to rapid growth from birth to 9 months [97]. More intensive caregiving responsibilities in late adolescents was associated with higher obesity rates [40].
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Education and cognitive development (K=75 articles, K=13 reports)	
Subdomain (K studies)	Facilitators / Barriers
Academic self-image K=5 articles K=1 report	Summary of articles: Academic self-concept in childhood and early adolescence is positively shaped by parental education, parental closeness, the number of books in the home and a better teacher relationship, while negatively impacted by special educational needs (SEN), bullying, and poor teacher relationships [98–101]. When transitioning to secondary education, young people with poor parent, peer and teacher relationships, SEN, from a lone parent or migrant family, and females showed a greater decline in academic self-image, while young people with better academic outcomes and a higher academic self-image at age 9 years, better peer and parent relationships and higher parental involvement showed an improved self-concept [101]. Summary of reports: At age 13, students reported lower academic self-confidence after transitioning to the junior cycle, with girls, those from less advantaged backgrounds, and children with SEN experiencing a greater decline. Immigrant-origin youth faced more transition difficulties but maintained relatively stable self-confidence. Positive peer relationships, parental involvement, and positive teacher interactions helped support smoother transitions, while frequent reprimands were linked to a greater drop in academic self-confidence [102].
Aspirations, school choice, post-school educational attainment K=6 articles K=1 report	Summary of articles: Socio-cultural, demographic and religious factors are associated with primary school choices [102]. Higher education expectations and outcomes are positively shaped by early academic performance, academic self-concept, and parental expectations and education. Disadvantaged students—including those from lower-income, lone-parent, DEIS, or SEN backgrounds—and those with worse parent and teacher interactions are more likely to become early school leavers and to plan for further education and training (FET) or non-university routes and face more barriers to university access [102–107]. Differences in information sources and school engagement also contribute to disparities in expectations and subject choices [106]. Summary of reports: Young people involved in caregiving are less likely to progress to higher education, mainly due to lower grades, and tend to have limited choices of institutions, prioritising the ability to live at home [40].

Attitudes to school, school engagement, absenteeism K=8 articles K=6 reports	Summary of articles: Children from economically disadvantaged backgrounds (e.g., economically inactive, low income or lone families), those with SEN, chronic illness or mental health difficulties, and those with parent or peer difficulties are more likely to dislike school, experience difficult transitions or be absent from school. Protective factors include academic engagement, positive relationships with teachers and parents, structured extracurricular participation, and strong peer networks [100,101,108–113]. Boys are more likely to dislike school [108,109], while girls are more at risk for school transition difficulties [101,110,112]. Summary of reports: Most 9-year-olds, especially girls and children from disadvantaged families, reported liking school, with an increase over time (Cohort '08 vs '98) [44]. By age 13, most students, especially girls, were positive about school. Negative attitudes were more common among those from lower-educated families, lone-parent households, and those with special educational needs [114]. Positive attitudes toward school in 13-year-old girls declined from Cohort '98 to Cohort '08, likely due to increased emotional difficulties [60]. Early school experiences, such as disliking school or having low literacy, strongly predicted later disengagement, especially in subjects like Maths [114]. Exposure to economic vulnerability in childhood was linked to lower school engagement at age 9 and 17 [43]. The pandemic worsened social inequalities, with greater disengagement from school observed among disadvantaged groups [24]. Remote learning in higher education during the pandemic was challenging, particularly for women and final-year students, with poor conditions like inadequate study space and broadband access leading to more difficulties [25].
Attitudes to school subjects K=2 articles K=3 reports	Summary of articles: Disengagement with the Irish language was associated with lower exposure to Irish at home and in school settings, lower general school engagement, reduced literacy activity at home, special educational needs, receiving resource hours, high screen time, multi-class teaching, rural school attendance, and school patronage [115]. Negative attitudes towards mathematics were more likely among children who had experienced bullying, while this did not affect attitudes towards reading/literacy [100]. Summary of reports: Attitudes toward reading in 9-year-olds improved over time (Cohort '08 vs '98), with little change by gender or social class [44]. Most read for pleasure a few times a week, with daily reading more common among girls and those from more advantaged families; however, frequent reading declined over time, especially among children with less-educated parents [44]. Attitudes to Maths remained stable, but the gender gap widened in favor of boys, and parental education increased disparities [44]. Negative attitudes to school and subjects were linked to more reprimands and less positive feedback from teachers [114]. In 13-year-olds, interest in English, Maths, and especially Science improved in the past decade (Cohort '08 vs '98) [60].
Childcare uptake K=2 articles K=3 reports	Summary of articles: Use of non-parental childcare was associated with both family characteristics and contextual factors. Grandparent care was common among lower-income, younger, and less-educated families [116]. Migrant families were more likely to use formal care over informal care, though non-English-speaking households showed lower overall use of non-parental care [117]. Higher parental education, urban living, and maternal labour force participation predicted greater use of formal care, while informal care was more likely among single-parent households and those with more available help [117]. Summary of reports: At nine months, 39% of infants were in regular non-parental childcare, with use linked to maternal employment and family

	income, and higher-income, smaller families more likely to use care [38]. By age 3, non-parental childcare use increased to 50%, with centre-based care becoming the most common option [118]. Relative care, mostly provided by grandparents, was most common at nine months, while centre-based care was more common at 3 years [118]. Care quality varied by setting, with centre-based care offering more books and higher carer qualifications, but less one-on-one interaction [38]. Migrant-origin children were less likely to attend centre-based childcare at age 3, though this varied by maternal country of birth [119].
Home learning environment (HLE) K=2 articles K=0 reports	Summary of articles: Younger and lone parents reported more frequent HLE involvement at age 3 years [120], while shared reading and book availability were more common across different ages in childhood in higher-income, English-speaking households and children with stronger vocabulary skills [121]. Parental level of education was unrelated in one study [120], but positively associated in home learning activities in the other study [121].
Neurodevelopment, expressive language K=17 articles K=2 reports	Summary of articles: Early cognitive, expressive vocabulary and developmental outcomes in early childhood were positively associated with breastfeeding [122], rich home learning environments [123–127], parental emotional closeness or attachment [123,126,128]. Preterm birth and lower socioeconomic status (class, education, income) were consistently linked with poorer language and developmental outcomes [12,125,126,128–130]. Some negative associations were also reported with having a first language other than English [127], caesarean section [131], poor health, low birthweight and difficult infant temperament [132]. Summary of reports: Prematurity, low birthweight, and difficult temperament were linked to poorer developmental outcomes at 9 months of age, while greater parental sensitivity showed modest improvements [133]. Non-relative care at age 3 was linked to small vocabulary gains, but longer hours in care (30+ hours/week) were associated with slightly lower vocabulary scores [118]. Stronger predictors of cognitive outcomes in early childhood included birthweight, family income, maternal education, consistent parenting, home learning environment, and engagement with grandparents [118]. Centre-based care had small positive effects on vocabulary for children from non-English speaking homes, and starting school by age 5 was linked to higher cognitive scores [118].
Relationships with teachers K=1 article K=0 reports	Summary of articles: Children with behavioural difficulties were more likely to report disliking their teacher [111].
Shadow education (private tuition) K=1 article K=0 reports	Summary of articles: Females, students with special educational needs, final year students, students planning to attend higher education, students who consistently liked school (ages 9–13 years), and young people reporting higher parental control are more likely to use shadow education (commonly referred to as ‘grinds’ in Ireland), while those between the ages of 9 and 13 who participated in cultural and sporting activities sporadically or not at all, youth with parents with lower levels of education, those living in very low-income households, those from lower social class families, and those attending DEIS schools are less likely to use shadow education [134].
Verbal reasoning and numeracy, academic performance K=40 articles	Summary of articles: In early childhood (up to age 5), cognitive outcomes were shaped by socioeconomic factors, caregiving behaviours, and early childcare. Lower cognitive ability and IQ at age 5 were predicted by factors such as lower birthweight, lower gestational age, lower socioeconomic status (education, class, income) [135–137]. Early reading activities at age 3 and 5, alongside centre-based childcare at 9 months, improved cognitive skills and

K=6 reports	language outcomes [137,138], while excessive screen time at this stage was linked to lower nonverbal reasoning [139]. In middle childhood (ages 5–9), informal home learning environments (shared reading and books at home), positive parental and teacher relationships, and parents' educational expectations supported reading and cognitive development [98,121,140–143]. Speech and language problems at age 9 were linked to developmental impairments, bullying, and family stress [144]. Academic performance at this stage was positively associated with higher birthweight, breastfeeding, home and school IT access, participation in cultural activity, but negatively associated with migrant background, disadvantaged school contexts, learning/intellectual disabilities, emotional/behavioural problems, lower school engagement, and particularly lower socioeconomic status (class, education, income, lone-parent families) [30,36,71,108,140–143,145–152]. In early adolescence (around 13 years), worse academic outcomes were associated with lower socioeconomic status (class, education, income), disadvantaged school contexts [100,153,154], higher parent-child conflict, lower parental and adolescent educational expectations, learning/intellectual disabilities, emotional/behavioural problems [100,154–156], phone ownership at age 9 years [157], and lower academic achievement at age 9 years [100,154,158]. Increased engagement in hard exercise was associated with better outcomes [159]. By later adolescence (ages 15–18), exam performance was shaped by cognitive ability at 13, but earlier psychopathology, family SES, school type, and parental education also contributed [34,160–164]. Low to moderate levels of screen time are linked with higher math scores [165]. Across childhood and adolescence, socioeconomic gradients in achievement emerged as early as 3 years and widened over time [166]. Sex differences also emerged with generally higher scores in males at 9 and 13, especially in maths [108,153,159], but higher literacy and leaving certificate scores in females in later adolescence [100,164]. Summary of reports: Children from Eastern European backgrounds scoring lower in English vocabulary at age 9, though language proficiency improved significantly between ages 3 and 9 among migrant-origin children [119]. Higher parental stress was linked to poorer academic outcomes in children [59]. Engagement in cultural activities, sports, and social networking was associated with better reading and maths scores, while excessive TV/sports time and "busy lives" led to lower scores [167]. Young people with caring responsibilities had lower Leaving Certificate grades, especially when caring for multiple family members [40]. Economic vulnerability in childhood was linked to poorer cognitive and educational outcomes at age 9 and 17 years [43]. The pandemic worsened social inequalities in academic outcomes [24].
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Socioemotional development and well-being (K=112 articles, K=18 reports)	
Subdomain (K studies)	Facilitators / Barriers
Antisocial behaviours/contact with the criminal justice system K=1 articles K=2 reports	Summary of articles: The presence of outdoor recreation areas reduces conduct, hyperactivity, peers, and antisocial problems [168]. Summary of reports: At age 13 years, antisocial behaviour (ASB) was more common among boys, with those having more friends, older friends, and a

	history of bullying perpetration showing higher levels of ASB [64]. Boys, young people with special educational needs, from lower-education or financially strained families, or from lone-parent households showed more behavioural difficulties [169]. Frequent reprimands and disengagement from school were linked to worse behaviour outcomes, while positive parenting and teacher relationships served as protective factors [169]. Larger friend networks were associated with a higher risk of "acting out," while neighbourhood disadvantage had less impact than school environment [169].
Bullying, perpetration K=7 articles K=0 reports	Summary of articles: Children and adolescents with (perceived) overweight or obesity [22,170], more behavioural and emotional difficulties [111], poor peer and parent relationships, lower socioeconomic status (class, education, income), and neighbourhood disorder were more likely to report being bullied [30,171]. Children who described themselves as being skinny or overweight and boys with higher externalising difficulties were more likely to report having picked on another child [170], while children with higher verbal cognitive ability were less likely to do so [172].
Coping strategies K=2 articles K=0 reports	Summary of articles: Adolescents (aged 17/18 years) with higher self-concept, higher parental educational expectations, and supportive relationships with parents and other adults employed more positive coping styles, while those with emotional difficulties, experiencing parent conflict, and those from households with economic vulnerability were less likely to employ more positive coping styles [162,173]. Young men were less likely to seek support and less likely to employ avoidance coping styles than young women [162].
Gambling, self-harm K=2 articles K=0 reports	Summary of articles: Self-harm in late adolescence was linked to earlier peer problems, school difficulties, family conflict, and depression, with diagnosed depression at 17 showing the highest risk at age 20 [174]. Gambling behaviours increased notably among males between 17 and 20, particularly among those in team sports, employed, using substances, or living with parents [175].
Hobbies, activities, interests K=6 articles K=4 reports	Summary of articles: Immigrant-origin children, those in disadvantaged contexts, lower parental education, children with a chronic illness, and those with screens in their bedroom were less likely to participate in structured activities [53,176,177]. Children from disadvantaged households spend significantly less time reading, doing homework, and engaging in physical exercise and sport than their counterparts, and more time engaging in unstructured play, with widening gaps from 9 to 13 years [177]. Sports participation was higher among boys, better educated families, and families with supportive parental physical activity practices, but lower in lone parent families, children with special educational needs, those living in urban settings, and attending urban DEIS schools (esp. Urban Band 1) [55,56,176,177]. From a young age, boys and girls engaged in different types of leisure activities [56] and girls participated more in household work, particularly typically female tasks [178]. Summary of reports: At age 9, girls are more likely to engage in social networking and cultural activities, while boys tend to play sports or video games, with children from more advantaged families more involved in cultural activities [167]. Immigrant-origin children are more likely to have "busy lives" with a mix of activities, though less involved in cultural pursuits [167]. Time spent on general play by 9-year-olds remained stable from Cohort '98 to '08, with more play among girls and children from more educated or financially strained families [44]. Sports participation and physical activity declined over time, with children from advantaged families engaging more [44]. In 13-year-olds, weekly involvement in organised sports increased in the past decade,

	though sports participation remained highly gendered [60]. Cultural activity participation remained stable or increased, but involvement in organised groups like Scouts declined due to pandemic restrictions [60]. The pandemic also led to reduced face-to-face contact with friends and declines in sports and cultural participation in young adults, particularly among those whose education or job was disrupted [25].
Key relationships (e.g., with parents and peers) K=21 articles	Summary of articles: Language-minority and immigrant-origin children faced elevated relational challenges, including parent-child conflict, lower levels of attachment, and lower self-reported popularity [53,179]. Lower parent-child relationship quality was associated with parental incarceration, parental depression and stress, child psychopathology, and stressful life events/adversity [180–186]. Peer relations were negatively affected by childhood psychopathology, low self-concept, chronic illness, parental depression and stress, and stressful life events/adversity [19,34,183,184,186–188], while sport participation, larger class sizes and teaching experience enhanced social bonds [53,187]. At age 17/18, young people with higher emotional stability were less likely to meet someone from online, while those scoring higher on the trait of openness, with excessive internet use, being non-heterosexual, using dating apps, and being sexually active at 17 years were more likely to meet someone from online [189]. Some sex differences were evident in peer and parent relationships at different ages [63,186,188,189].
K=10 reports	Summary of reports: Higher depressive symptoms and marital dissatisfaction in parents of 9-year-olds were linked to more hostile and less warm parenting [190] and higher conflict with children [191]. Father-child relationships showed more conflict in urban areas and with fathers who had traditional gender role views or illness/disability [59]. 9-year-old boys and families under financial strain reported lower parent-child closeness and higher conflict, though this effect was weaker in the Cohort '08 [44]. Parents of the Cohort '08 reported lower adolescent-parent conflict, but more peer problems, and smaller friendship groups [60]. Late adolescents with caregiving responsibilities reported more positive family relationships but also more frequent conflict with mothers when caring for siblings [40]. Economic vulnerability was linked to poorer quality relationships at 9 and 17 years of age [43].
Mental health/ anxiety/ depressive symptoms K=74 articles	Summary of articles: Across early and middle childhood (ages 3–9), a range of risk factors—including parental stress, parent-child conflict, hostility and low attachment, parental disability/illness/psychopathology, prenatal exposure to smoking, lower socioeconomic status (class, education, income, lone-parent family, job loss), childcare attendance, DEIS school attendance, developmental/cognitive delays, and earlier psychopathology were consistently linked to increased behavioural and emotional difficulties [12,14,30,34,41,42,45,76,128,172,179,188,192–203]. Some associations were also observed between mental health outcomes in children and pregnancy/birth complications [156,204], (lack of) breastfeeding [205,206], and screen time [165,207]. Unsafe and disordered neighbourhood are associated with poorer child mental health at age 5 and age 9 years [201], while the presence of outdoor recreation areas can reduce children's mental difficulties, especially in children with lower SES [168]. Risk factors for psychopathology problems at age 13 years or persistent problems from childhood into adolescence were maleness, one-carer households, low parental education, poor physical health, low cognitive ability or special educational needs, caregiver depression at age 9 years, parent-child conflict, parental depression, childhood adversity and bullying

K=12 reports	victimisation, child overweight at age 9 years, and ADHD diagnosis at age 9 years [9,11,33,100,153,182,202,208–210]. A high self-concept at age 9 and increased self-concept from 9-13 years played a protective role against later psychological difficulties and lower odds of psychotic experiences [10,182]. Risk factors for psychopathology problems in late adolescence (17 / 20 years) or persistent problems in adolescence (13-20 years) were prenatal smoking [76], low physical activity at age 9 years or reduced activity from 9-13 years [185,211], worse parent and peer relationships, victimisation, higher online usage, lower self-concept in early adolescence [63,165,184,185,212–215], childhood adversity [183,214], parental depression [214,216,217], cognitive ability [63,163], previous psychopathology [34,63,214], and having caring responsibilities for parents [184]. Continued physical activity throughout childhood and adolescence is a protective factor [52]. The COVID-19 pandemic further exacerbated mental health difficulties among young adults, with a marked rise in depressive symptoms, especially among females, but without a clear socioeconomic gradient [218]. Differences in mental health outcomes by sex became more pronounced in later childhood and adolescence: boys showed higher overall difficulties in childhood [204,216,219–221] and higher levels of externalising symptoms in adolescence [213,215,221], while females showed consistently higher levels of internalising symptoms throughout adolescence and in early adulthood [63,208,213–215,218,221]. Summary of reports: Mothers' depressive symptoms, marital dissatisfaction, hostility and lower warmth were linked to higher internalising and/or externalising difficulties in 3-year-old children [190]. Hostility from fathers was also associated with higher internalising difficulties [190]. Poor housing conditions and exposure to economic vulnerability were associated with poorer socio-emotional outcomes in children and adolescents [39,43,222]. Children from lower-education or financially strained families or lone-parent households showed more behaviour difficulties [169]. Early family disruptions, such as changes in household structure, were linked to worse emotional and behavioural outcomes, particularly for girls [64]. Positive parent, peer and teacher relationships, as well as local facilities, safe places, and structured sports acted as protective factors against worse behaviours, while having a SEN, older friends, poor-quality peer relationships and neighbourhood disadvantage were risk factors [169]. In adults, parental illness, particularly maternal depression, was also associated with higher depression rates [40], while living in areas with stronger social infrastructure was a protective factor [223]. The pandemic and related measures led to a rise in depression in young adults [25] and exacerbated social inequalities in socio-emotional difficulties [24].
Screen time K=12 articles	Summary of articles: Screen use trajectories were stable from ages 3 to 5, fluctuated between 5 and 7, and stabilised again by age 9, with early internalising and externalising behaviours predicting increased screen use at later ages [207]. Boys had higher levels of game and device use from age 5 through 9 [56,58]. At age 9, higher screen time was linked to lower parental education, reduced physical activity, fewer outdoor resources, social challenges, and chronic illness [19,58]. Broader trends show increasing mobile phone ownership and social media use by age 9 in the '08 versus the '98 Cohort [224]. At age 13, higher physical activity was associated with lower TV watching [22], and digital engagement as negatively correlated with adolescent well-being [225]. At age 17, excessive internet use was higher among females, especially those spending time alone, and in youth experiencing more parent-child conflict

K=4 reports	and power-assertive parenting, but lower in youth with a higher level of psychological autonomy at age 13 [226]. No difference in screen time was found in young children (<5 years) with or without developmental delays [45], results were mixed for digital engagement of 9-year-old children with autism compared to typically-developing peers [48–50]. Summary of reports: 9-year-old girls are more likely to use ICT for social networking, while boys engage more with video games [167]. Children from more advantaged families engage more in social networking and ICT use, while those with learning disabilities tend to have less computer usage [167]. In the last decade, there has been a shift from television viewing to other digital devices, with a marked rise in mobile phone ownership among 9-year-olds, particularly among girls and disadvantaged children [44]. Among 13-year-olds, screen time also shifted further from traditional media (TV, video games) to other digital activities in the past decade, which was linked to lower participation in sports and cultural activities [60]. Informal screen time increased for around two-thirds of young adults during the pandemic [25].
Self-esteem, happiness, self-concept K=24 articles K=6 reports	Summary of articles: Close and supportive relationships with parents and teachers, positive maternal ratings in maths or reading and higher academic expectations, having many children's books at home, and higher social class are linked to better self-concept [98,99,154,171,227]. In contrast, worse parent and peer relationships, mobile phone ownership, family and life stressors, disadvantaged or migrant background, having multiple SEN, learning disabilities, (persistent) emotional-behavioural difficulties, or autism are associated with lower self-concept, happiness, well-being and life satisfaction [10,33,34,99,154,162,171,182,183,185,186,227–232]. Disparities by sex persist, with girls more likely to report lower well-being and higher anxiety [99,186,227,232], while boys score lower on behavioural adjustment [99]. Girls also had a lower self-concept when being taught in multi-grade classes [151]. Summary of reports: Children who had positive relationships with their fathers had higher happiness, less anxiety, and better behaviour according to their parents, while father-child conflict was linked to poorer self-image in boys [59]. Self-concept scores at age 9 were lower for some migrant-origin groups, such as Eastern Europeans, partly due to lower activity participation and fewer socioeconomic resources, although team sports participation was associated with higher self-concept [119]. Children who perceive themselves as underweight or overweight reported lower self-concept, particularly regarding physical appearance and popularity [23]. Academic self-confidence declined for most 13-year-olds after transitioning to the junior cycle, with girls, children from disadvantaged backgrounds, and SEN facing a greater drop [114]. Exposure to economic vulnerability was linked to lower life satisfaction and self-concept at ages 9 and 17 [43]. Volunteering was associated with higher life satisfaction and a stronger adult identity, while stronger social infrastructure was linked to better life outcomes, including higher life satisfaction and confidence [223].
Stressful events K=4 articles K=0 reports	Summary of articles: Migrant youth initially appear to face more cumulative stressors [185,233], though this may be largely driven by migration-related events (moving house and country) [233]. Girls and youth come from a lower socioeconomic background report more stressful life events [185,186].

Civic and economic engagement (>17y) (K=4 articles, K=3 reports)	
Subdomain (K studies)	Facilitators / Barriers
Aspirations K=4 articles K=1 report	Summary of articles: Higher education expectations and outcomes are positively shaped by early academic performance, academic self-concept, and parental expectations and education [103,104,107]. Disadvantaged students—including those from lower-income, DEIS, or SEN backgrounds—and those with worse parent and teacher interactions are more likely to plan for further education and training (FET) or non-university routes and face more barriers to university access [103,104]. Summary of reports: Caregiving is linked to lower progression to higher education, largely due to lower grades, and those who do attend are often limited in their choice of institution, prioritising the ability to live at home. By age 20, young people involved in caregiving are less likely to have moved out of the parental home, even after accounting for their lower rates of higher education participation [40].
Employment K=0 articles K=1 report	Summary of reports: During the pandemic, many young adults experienced employment disruption, with job losses more common and fewer working remotely compared to the parents of Cohort '08. Higher Leaving Certificate grades and professional roles at age 20 offered some protection against job loss, and receiving the Pandemic Unemployment Payment (PUP) helped alleviate financial strain [25].
Political engagement K=0 articles K=1 report	Summary of reports: Urban youth are more politically active than rural youth, engaging in both high- and low-intensity activities. Young women are more politically engaged but report lower political interest than men. Youth with graduate mothers show higher political engagement and interest, while those in rented accommodation are less engaged. Area-level disadvantage, such as low social structure or neighbourhood disorder, is linked to greater political activity, while migrant-origin youth have lower political engagement. Higher academic achievement, education participation, and cultural activities are associated with greater political engagement, while sports participation correlates with lower political activity [223].
Volunteering K=0 articles K=1 report	Summary of reports: Volunteering is more common among rural youth, particularly in sports-related activities, though rural-urban differences in non-sports volunteering are minimal. Youth with higher-educated mothers volunteer more, while those in rented accommodation volunteer less. Young women are less likely to volunteer in sports but engage more in other forms of volunteering [223]. Positive school experiences, taking Transition Year, and higher academic achievement are linked to higher volunteering rates. Local facilities and public transport access boost volunteering, with extracurricular and cultural activities in adolescence linked to greater non-sports volunteering later. Early involvement in sports predicts later sports volunteering, while youth with disabilities or from migrant backgrounds volunteer less, partly due to reduced access to extracurricular activities [223].

3.3.2 Vulnerability factors

Sociodemographic risk factors—including sex, social class, maternal education, income, and migration background—consistently shaped child well-being outcomes across all domains.

Sex differences were particularly evident in the types of activities boys and girls engaged in, internalising and externalising behaviours, and academic performance. For instance, boys were generally more physically active, especially in terms of sports participation [46,51,58]. They also spent more time playing video games, while girls were more likely to use technology for social networking [167]. Girls more frequently reported lower self-concept and subjective well-being, along with higher anxiety and internalising symptoms [99,186,227]. Girls also experienced greater difficulties during school transitions (e.g., [101,112,234]). Boys, in contrast, were more likely to engage in antisocial behaviours [64]. In terms of education and academic performance, girls generally outperformed boys in literacy—especially in later adolescence [100,164]—while boys tended to score higher in maths during childhood and early adolescence [153,159].

Disadvantaged children—those from low-income households, families with lower levels of educational attainment, lone-parent households, or DEIS schools—experienced poorer physical health, lower academic achievement, and greater socioemotional difficulties [43,169]. Children from migrant backgrounds, particularly those from Eastern Europe, had a lower academic self-concept, poorer language outcomes, and greater socioemotional difficulties—partly due to lower participation in structured activities and fewer socioeconomic resources [119]. Economic disadvantage was linked to poorer outcomes across all domains, with the COVID-19 pandemic exacerbating these disparities [24].

Having special educational needs was also consistently associated with poorer well-being outcomes in children, including lower academic self-image, more negative attitudes toward school and school subjects [114,115], elevated behavioural difficulties and other forms of psychopathology [169], and a less frequent sports participation [53].

Other vulnerability factors consistently associated with adverse outcomes across domains (health, academic, socio-emotional) included having a chronic illness [19,69,113,148,162,191,208], being a victim of bullying [64,69,100,111,170,208], prenatal exposure to smoking [76,77,80,97,188,195,198], and preterm birth [126,128,133,156,181].

3.3.3 Differences between children in the '98 and '08 Cohorts

When comparing results from the two GUI cohorts, several trends and shifts in well-being emerge—particularly in relation to socioemotional development, attitudes towards school and school subjects, and the children’s free time activities.

For example, 9-year-olds in the '08 Cohort reported more positive attitudes towards school than those in the '98 Cohort [44]. However, by age 13, attitudes had declined in the '08 Cohort—potentially linked to increased emotional difficulties, especially among girls [60]. Attitudes toward reading improved among 9-year-olds over time ('08 vs '98 Cohort), while interest in English, maths, and science increased among 13-year-olds over the past decade [60].

Time spent on general play remained stable across the cohorts for 9-year-olds, but physical activity and sports participation declined in the '08 Cohort, particularly among children from lower socioeconomic backgrounds [44]. By age 13, there was a slight recovery in sports participation among the '08 Cohort, though gender gaps persisted in both cohorts, with girls consistently less involved in sports [60].

Mobile phone ownership and social media use rose markedly among 9-year-olds in the '08 Cohort compared to the '98 Cohort [224]. Additionally, the proportion of mothers reporting a long-standing illness or disability in their child increased over time—though this may partly reflect changes in questionnaire item wording between cohorts [44].

In terms of family dynamics, parents of the '08 Cohort reported less conflict with their teenagers, but noted more peer problems and smaller friendship groups [60].

3.3.4 Societal and policy factors and child well-being outcomes

“Spotlight” Table 5 summarises findings from peer-reviewed journal articles and thematic reports that investigated the impact of various societal and policy factors on child well-being outcomes using GUI data. These range from policies in health and education to broader social events such as the recession and COVID-19 pandemic.

Several studies highlighted the role of public health insurance, showing that access to medical or GP visit cards is consistently associated with higher GP utilisation in both the '08 and '98 cohorts [29,65,66,73]. However, the introduction of drug co-payments reduced GP visits and hospital stays for infants, while older children

showed increased GP usage—even when controlling for health status and family background.

Similarly, research on prenatal care models [68] found that midwifery-led care was linked to a higher likelihood of natural births, whereas private consultant-led care was associated with more elective caesarean sections. Maternity leave policies were also observed as influencing child outcomes. McDonnell and Doyle [13] observe that full-time maternal employment and reliance on informal childcare were linked to an increased risk of childhood overweight—particularly among children of mothers with higher levels of educational attainment. Decisions about returning to work and childcare were largely influenced by educational attainment, income, and financial need, with cost being a major factor [38,118].

Educational subsidies, such as the Broadband for Schools Programme, had a positive impact on academic outcomes, particularly maths and reading [147].

The economic recession (2008–2013) was found to negatively affect children’s health, education, and socioemotional outcomes, with impacts varying based on parental job loss and financial strain [21,28,82,160,197]. More recently, the COVID-19 pandemic further exacerbated inequalities, with income loss linked to poorer emotional well-being in children, albeit with financial supports and access to remote learning resources helping to buffer some of these negative effects [25,218,227].

Together, these demonstrate that health and education policies, socioeconomic conditions, and societal disruption such as recessions and pandemics have significant implications for child well-being in Ireland.

Table 5. Spotlight on peer-reviewed studies and thematic reports investigating the impact of societal and policy factors

Authors	Well-being indicator	Cohort(s) (Age(s))	Result
Health policies:			
Peer-reviewed journal articles			
Layte & Nolan, 2015 [65]	GP visiting rates	08 (9 months); 98 (9 years)	- Even when controlling for child health, and parental and family characteristics, 9-month-old infants (low & high users) with no cover have fewer GP visits than corresponding infants with a full medical card. - Low-using 9-year-old children with no cover also have fewer GP visits per annum than corresponding children with a full medical card, but for high users, no difference was observed. - Household income is insignificant in both age groups.
Nolan & Layte, 2017 [66]	GP utilisation	08 (9 months, 3 years); 98 (9 years, 13 years)	- For both the Infant and Child Cohort, gaining a full medical or GP visit card between 2 waves is associated with extra GP visits per annum (+25% and +63% per annum, respectively). - Losing a full medical or GP visit card between two waves was associated with fewer GP visits per annum for the Child Cohort (-69%), but not for the Infant Cohort.
Mohan & Nolan, 2020 [29]	Healthcare utilisation; Health	08 (9 months, 3 & 5 years); 98 (9, 13 & 17/18 years)	- In the Infant Cohort, the introduction (and increase) in co-payments was associated with a decrease in GP visits and hospital nights, while it was associated with an increase in GP visiting in the Child Cohort. - Children from medical card families had poorer health and higher levels of health-care utilisation than those not covered by public insurance.
Kirby & Murphy, 2022 [73]	GP utilisation at 16/17 years	98 (16/17 years)	- When need, predisposing and enabling factors are controlled for, public GP cover increases adolescents' annual GP consultations in the overall population (+38%) and in those without chronic illnesses (+42%).
Thematic reports			
Nolan & Layte, 2017 [75]	GP utilisation	08 (9 months, 3 years)	- At both 9 months and 3 years of age, children with a full medical or GP visit card had significantly more GP visits than those with no cover (i.e., without a full medical card, GP visit card or private health insurance), even after adjusting for health needs and other characteristics. - Children with private insurance without GP cover also had more GP visits than those with no cover, despite both paying full out-of-pocket costs. - Gaining public cover (medical/GP card) between 9 months and 3 years was linked to a 25% increase in GP visits, but losing cover did not significantly reduce GP visits.

Authors	Well-being indicator	Cohort(s) (Age(s))	Result
			- Among children without public cover, those from higher-income households had more GP visits.
Prenatal care:			
Peer-reviewed journal articles			
Gillespie et al., 2019 [13]	Mode of birth	08 (9 months)	- 85.31% of the estimation sample had standard care, 12.58% private consultant-led care, and 2.07% midwifery-led care. - The probability of a natural birth is higher for mothers who had midwifery-led care compared to standard and private consultant-led care and lower for mothers who had private consultant-led care relative to standard and midwifery-led care. - In contrast, the probability of elective caesarean section is higher for mothers with private consultant-led care compared to those with standard care or midwifery-led care.
Maternity leave policies:			
Peer-reviewed journal articles			
McDonnell & Doyle, 2019 [13]	Child weight	08 (9 months, 3 & 5 years)	- The combination of part-time employment and informal or formal childcare reduces the probability of being overweight at age 3 years. - Full-time maternal employment at 9 months combined with either formal or informal childcare increases the likelihood of being overweight at 3 years, but only for children of highly educated mothers. Similar results are observed for part-time employment coupled with informal or parental care. The results for mothers with lower levels of education are either not significant or favourable. - While the majority of the effects dissipate by age 5 years, there is some evidence that full-time maternal employment coupled with informal care increases the risk of being overweight at both ages 3 and 5 years for children of higher-educated mothers.
Thematic reports			
McGinnity et al., 2013 [38]	Childcare use, infant health	08 (9 months)	- Few mothers in Ireland returned to work before six months postpartum. Early returners (before 6 months) were typically self-employed, young, or lone mothers. Return at 8–9 months was more common among highly educated, older, Irish mothers in couples. - Mothers not returned by nine months tended to be low-educated, very young or older, and lone mothers. Highly educated mothers were more likely to return after paid leave ended.

Authors	Well-being indicator	Cohort(s) (Age(s))	Result
			- Financial need was the main reason cited for returning to work, with career motivations more common among highly educated mothers. Most mothers took paid maternity leave; unpaid leave was more common among higher-income, higher-educated mothers. - Childcare use was strongly related to maternal employment and family income. - Cost strongly influenced childcare decisions, beyond just proximity of relatives. - Centre-based care was linked to a small but significant higher risk of poorer overall health and more infections (respiratory, ear, gastrointestinal), even after adjusting for child health and family income.
McGinnity et al., 2015 [118]	Childcare uptake	08 (9 months, 3 & 5 years)	- Non-parental childcare increased from 39% at 9 months to 50% at 3 years. Care shifted from mostly relative-based at 9 months to mostly centre-based at 3 years. - Centre-based care at 3 had a small positive effect on vocabulary at 5 for children from a non-English speaking background:
Free preschool year:			
Thematic reports			
McGinnity et al., 2015 [147]	Free Preschool Year	08 (9 months, 3 & 5 years)	- By age 5, 96% had participated in the Free Preschool Year (FPSY), compared to 27% in centre-based care at age 3. Over 20% of parents said they could not have afforded preschool without the FPSY. - School-starters by age 5 had higher vocabulary and reasoning scores.
Educational subsidies:			
Peer-reviewed journal articles			
Hyland et al., 2015 [147]	Educational performance	98 (9 years)	- Being in a classroom where the internet is used is associated with higher reading and especially higher maths test scores.
Recession impact:			
Peer-reviewed journal articles			
Jabakhanji et al., 2017 [82]	Overweight/obesity	08 (9 months, 3 years)	- There was evidence that children whose families reported a perceived very significant recession effect were more likely to have obesity at 3 years of age compared with children whose families had experienced a significant effect.

Authors	Well-being indicator	Cohort(s) (Age(s))	Result
Reinhard et al., 2018 [28]	Asthma, atopy symptoms, any health problems.	08 (9 months, 3 & 5 years)	- Reduced working hours and difficulty affording basics were linked to poorer child health. - A reduction in welfare benefits was associated with an increased risk of reporting asthma and atopy symptoms.
Briody, 2021 [21]	Weight, diet, physical activity	08 (9 months, 3 & 5 years)	- Either parent being unemployed or becoming unemployed over time is associated with an increase in the probability that a child is classified as having overweight or obesity. - Analyses with weight-for-age indicate similar results across several alternative growth charts and definitions of adiposity (the WHO standard, British Growth Reference, and Centers for Disease Control). - Parental unemployment reduced the likelihood of healthy food consumption in children. - The probability of a child engaging in physical activity with an implied cost is lower if either parent becomes unemployed.
Mari & Keizer, 2021 [197]	Verbal abilities, internalising and externalising problems	08 (9 months, 3 & 5 years)	- When adjusting for child, parent and household factors (e.g., parental income and negative parenting), paternal job loss is not associated with verbal abilities or internalising and externalising problems at age 3 and 5 years. - At age 5, maternal job loss is associated with higher externalising problems in children. - Parental job loss exacerbates problem behaviour at ages 3 and 5, via the channels of parental income and maternal negative parenting.
Layte et al., 2018 [235]	Psychological adjustment	98 (9 & 13 years)	- Family experience of recession was significantly associated with negative change in all of the components of the family stress model, particularly parental mental health. A model with a direct effect of recession on child psychological adjustment provided a better fit to the data.
Layte, 2022 [160]	Educational achievement	98 (9, 13 & 17/18 years)	- A family's experience of economic strain can reduce child attainment in state exams at age 15. - The variables associated with 'family stress model' explain more of the effect for economic strain than change in the variables associated with 'family investments model'.
Gibbons et al., 2023 [236]	Behavioural difficulties	08 (3, 5 & 9 years), 98 (9, 13 & 17/18 years)	Associations with internalising and externalising behaviours differed based on sex and age/cohort: - In Cohort '98, subjective financial strain is predictive of externalised behavioural difficulties for boys and girls, even after adjusting for material deprivation and income. In this cohort, material deprivation was also associated with greater externalised behavioural difficulties for boys. - In Cohort '08, an increase in material deprivation was associated with an increase in boys' internalised behavioural difficulties, even after adjusting for income and financial strain.

Authors	Well-being indicator	Cohort(s) (Age(s))	Result
Burke, 2020 [216]	Psychological health	98 (9, 13 & 17 years)	- Children living in a household where parents have expressed difficulty in making ends meet, children whose mother exhibits depression symptoms or chronic health issues, children with chronic health issues themselves, children who feel underweight or overweight (compared to feeling about right) have an increased likelihood of being in the Abnormal SDQ range (increased psychopathology). - Parental working hours of above 30 hours per week reduce the likelihood of being in the Abnormal SDQ range, but only in females.
Thematic reports			
Nixon et al., 2019 [190]	Economic strain, parenting	08 (9 months, 3 years)	- Sixty-five per cent of families indicated that household income had been reduced as a result of the recession. 40% of families experienced increased economic strain over time. Single parenthood and lower maternal education were linked to higher economic strain. - Economic strain was associated with slightly more warmth in mothers and higher warmth in fathers who couldn't afford luxuries.
Watson et al., 2014 [222]	Socio-emotional well-being	08 (9 months, 3 years); 98 (9 & 13 years)	- There was a substantial increase in economic vulnerability for families in both cohorts, rising from 15 per cent to 25 per cent for the '98 Cohort and from 19 per cent to 25 per cent for the '08 Cohort between Wave 1 and 2 when the recession started to set in. - Economic vulnerability is linked to higher socio-emotional difficulties. - Multiple disadvantages increase the risk for socio-emotional difficulties; multiple advantages can offset economic vulnerability.
Maître et al., 2021 [43]	Economic vulnerability, child outcomes in education, health, and well-being	08 (9 months, 3 & 5 years); 98 (9, 13 & 17/18 years)	- The Great Recession increased families' risk of falling into and remaining in poverty. - Relationship breakdown (separation or entry of a new partner) and parental job loss were key triggers for entering poverty. - Full-time employment helped families exit poverty; part-time work did not. - Children exposed to poverty had poorer outcomes in education, health, and well-being. Even short-term poverty had negative effects; cumulative exposure was worse. Negative patterns were consistent across both cohorts and ages.
COVID-19 and Job loss due to pandemic:			
Peer-reviewed journal articles			
Smyth et al., 2022 [227]	Emotional well-being	08 (9 & 12 years)	- In households where the income had fell a lot or a little, children had a significantly poorer well-being at 12 years. - Receiving PUP, having a quiet place to study, and a computer for remote learning were associated with higher well-

Authors	Well-being indicator	Cohort(s) (Age(s))	Result
			being scores, while having changed school over the pandemic, being worried about the virus and seeing that parents are worried were associated with lower well-being scores.
Madden, 2024 [218]	Mental health	08 (PCs of 12-year-olds); 98 (22/23 years)	- Mental health worsened for both young adults in the '98 Cohort and primary caregivers (PCs) in the '08 Cohort since the last pre-COVID survey. - Among the '98 cohort, the proportion exceeding the depression threshold nearly doubled. Females showed a significantly higher base rate of depression than males, with a majority meeting the threshold post-COVID. Males also experienced a decline in mental health, but to a lesser extent than females. - No clear socioeconomic gradient (maternal education, income) was observed in poor mental health among young adults, either before or after COVID. For mothers from the '08 Cohort, a gradient was observed during the pre-COVID-19 pandemic period with poorer mental health status for lower-income and less educated mothers. This gradient was less pronounced post-COVID, the levelling-off arising from a greater deterioration in mental health for higher-income and better-educated PCs.
Thematic reports			
Smyth & Nolan, 2022 [25]	Diet, activities, financial strain, depression	98 (20/22 years)	- During the pandemic, many young adults experienced employment disruption, with job losses more common and fewer working remotely compared to the parents of Cohort '08. - Higher Leaving Certificate grades and professional roles at age 20 offered some protection against job loss, and receiving the Pandemic Unemployment Payment (PUP) helped alleviate financial strain. - Job loss during the COVID-19 pandemic was linked with more alcohol and junk food consumption. These diet changes resulted in increased differences by social background compared to the pre-pandemic period, though reduced drinking slightly narrowed pre-pandemic differences. - Reduced involvement in sports and cultural activities was more common among those whose education or job was disrupted. - Pandemic-related disruptions—job loss, study difficulties, and reduced face-to-face social contact—contributed to an increase in depression among young adults.
Darmody et al., 2020 [24]	Health, education, and well-being	08; 98	- Inequalities in health, education, and well-being—especially for disadvantaged, minority, and SEN groups—have likely widened post-pandemic. - They face poorer health, diet, school engagement, academic performance, and more socio-emotional difficulties. - Women reported higher rates of depression, anxiety, and sadness during the pandemic.

3.3.5 Environmental and neighbourhood-related factors and child well-being outcomes

“Spotlight” Table 6 summarises findings from peer-reviewed journal articles and thematic reports that investigated associations between environmental and neighbourhood-related factors and child well-being outcomes. These studies highlight the influence of various factors—such as school type, neighbourhood characteristics, urban vs rural settings, food environment, and housing conditions—on both favourable and unfavourable child well-being outcomes in Ireland.

Children attending socioeconomically disadvantaged schools (DEIS Urban Band 1) were more likely to experience emotional and behavioural difficulties [192]. Neighbourhood problems were associated with poorer academic outcomes, while boys in rural areas—particularly those from low SES backgrounds—showed higher levels of academic achievement [155].

Living in a safe neighbourhood was positively associated with physical activity levels for both boys and girls. In contrast, disorderly neighbourhoods were especially detrimental to girls’ physical activity [54,57]. Access to after-school activities and nearby playgrounds also increased the likelihood of children engaging in physical activity [51,58]. Similarly, safe outdoor environments and green spaces were also linked to higher levels of engagement in cultural activities and social activities with friends [167].

Children living in unsafe or disorderly neighbourhoods exhibited more socioemotional difficulties and lower levels of pro-social behaviour [39,201]. Conversely, access to outdoor recreational areas and other forms of social infrastructure—such as the availability of local amenities and safe communal spaces—was associated with higher life satisfaction, stronger social trust, and fewer socioemotional difficulties [168,169,223].

Urban youth were more likely to engage both in high- and low-intensity political activities, with urban youth also showing more political engagement and social networking activity [167,223]. Conversely, rural youth, while less politically active, had higher rates of sports-related volunteering [223].

Food access also played a role in child well-being. Lower SES households living farther from food outlets offering fresh produce was associated with poorer dietary quality in girls [23]. Housing conditions were also linked to child well-being, with poor housing conditions—such as overcrowding and inadequate heating—linked to higher rates of respiratory problems, more frequent accidents requiring medical intervention, and elevated socio-emotional difficulties [39].

Table 6. Spotlight on studies investigating associations with environmental and neighbourhood related factors

Peer-reviewed journal articles			
Authors	Well-being indicator	Cohort(s) (Age(s))	Result
McNally et al., 2014 [116]	Grandparent childcare provision	08 (9 months)	- Families with lower incomes, primary caregivers younger than 30 years old, caregivers with lower secondary, Leaving Certificate, or non-degree education, caregivers with family nearby were more likely to use grandparent childcare.
Madden et al., 2014 [77]	Low birth weight	08 (9 months)	- The most important risk factors with respect to overall low birth weight were prenatal smoking and drinking, poorer maternal overall health, age (both very young and older), working, and lower household income. Income inequality appears to be less important for the case of preterm births, while father's education and local environmental conditions (1: rubbish and litter, homes and gardens in bad condition, vandalism, public drunkenness and drug-taking; 2: safety to walk after dark, safety for children to play outside, safe parks and playgrounds, intend to continue living in the area, are settled and part of the community) appear to be more relevant for intrauterine growth retardation.
Bowe et al., 2024 [135]	Cognitive ability	08 (9 months, 5 years)	- The ten most important features used in the best performing model for predicting low cognitive ability at age 5 were (in order of importance): primary caregiver alcohol intake (measured when infant was 9-months old), family social class, primary caregiver education, number of bedrooms in the home, household equivalised income, gestational age, community connectedness, English parental native language, birth weight category, maternal age
Rubio-Cabanez, 2024 [168]	Mental problems	08 (3, 5 & 9 years)	- The presence of outdoor recreation areas reduces children's mental difficulties. Looking at the SDQ subscales, outdoor recreation areas reduce conduct, hyperactivity, peers, and antisocial problems. The largest effects are found for hyperactivity and antisocial problems. - The positive effect of outdoor recreation areas on total mental problems decreases with increasing SES until it becomes insignificant for the children with the highest SES. Looking at the SDQ subscales, scores are only significantly different between children of varying SES for hyperactivity problems.
Putra et al., 2024 [201]	Mental health	08 (5 & 9 years)	- Neighbourhood safety, cohesion, interaction, and disorder were associated with child mental health at age 5 and age 9 years, and partially explained socioeconomic inequalities in child mental health. - Specific concerns over 'people being drunk or taking drugs in public' and 'this is a safe neighbourhood' had the strongest connections with child mental health. - Built environments may explain partially socioeconomic inequalities in mental health in urban children only.
Banks et al., 2012 [192]	Emotional behavioural difficulty	98 (9 years)	- Children attending the socioeconomically most disadvantaged schools (DEIS Urban Band 1 schools) are more likely to be identified with EBD by their teacher, all else being equal.

Keane et al., 2016 [20]	Dietary quality at 9 years	98 (9 years)	- After controlling for socioeconomic characteristics of the household, no link was found between distance to the nearest supermarket or convenience store and dietary quality.
Cadogan et al., 2014 [51]	Physical activity levels	98 (9 years)	- Children living in a neighbourhood with after school activities were more likely to be in the moderate PA group.
Sohun et al., 2021 [55]	Child physical activity	98 (9 years)	- Community resources and organisational factors mediated the presence of physical activity parenting practices.
Garcia et al., 2016 [58]	Physical activity, screen-time	98 (9 years)	- In boys, having playgrounds nearby was positively associated with MVPA, while in girls, higher availability of sports facilities was positively associated with higher MVPA. - In both boys and girls, higher screen time was associated with having less access to play space. In boys, it was also associated with less perceived environmental safety. In girls, a lack of playgrounds nearby was also associated with higher hours of screen time.
Kong, 2020 [155]	Academic achievement	98 (9 & 13 years)	- In the low-SES group, significant predictors of academic achievement at age 13 are geographical location: Being in the rural area significantly predicted academic achievement, educational aspiration, attentional and hyperactivity problems, and close relationship between the primary caregiver and the child. Being in a rural area appeared to benefit boys in far greater magnitude than girls. In contrast, an increase in neighbourhood problems posed a risk to girls' achievement. - In the high-SES group, significant predictors of academic achievement at age 13 are being in a rural area, neighbourhood risk, class climate, parental expectation, maternal education, educational aspiration, attentional and hyperactivity problems, and academic self-concept.
Murtagh et al., 2016 [16]	Uptake and maintenance of active school travel (AST) at 9 and 13 years	98 (9 & 13 years)	- Urban residence at 9 and reduced school distance between 9 and 13 predicted AST uptake/maintenance; increased distance reduced AST. - Weak associations found for child's sex, light exercise, lone parent household, school size, and parental safety perceptions.
Yu et al., 2017 [57]	Physical activity at age 13 years	98 (13 years)	- Having easy access to play spaces was associated with a higher likelihood of having higher levels of PA. - Adolescents were more physically active when parents perceived higher levels of safety, and this perception mediated some of the associations between adolescent, family and neighbourhood characteristics and PA levels.
McAvinue et al., 2022 [161]	Academic achievement	98 (9 & 17/18 years)	- The SES of each social context made an independent contribution to Reading/English and Maths performance in both the 9 and 17/18-year-old samples. Family context showed the strongest association with performance, followed by that of the school and, finally, the neighbourhood.

McEvoy et al., 2022 [54]	Physical activity	98 (9, 13 & 17/18 years)	- Living in a safe neighbourhood was significantly positively associated with levels of PA for both males and females. - Living in a disorderly neighbourhood was negatively associated with levels of PA for females.
Thematic reports			
Authors	Well-being indicator	Cohort(s)	Result
Laurence et al., 2023 [39]	Physical health; accidents/injuries; socioemotional difficulties	08 (9 months, 3, 5 & 9 years)	- One in ten children lived in housing deemed unsuitable, mostly due to limited space. - Socioeconomic factors (parental education, income, employment) was strongly linked to housing tenure and conditions. - Poor housing conditions (e.g., damp, inadequate heating) were linked to more respiratory issues (e.g., wheezing), lower parent-rated health, and more accidents/injuries requiring medical treatment at age nine. - Childhood accidents that required medical intervention were also more common in disorderly neighbourhoods. - Poor housing conditions—especially overcrowding and inadequate heating—are linked to more socio-emotional difficulties in children. - Children living in more disorderly neighbourhoods experience more difficulties and exhibit less pro-social behaviour. Even when housing conditions are held constant, living in social housing has an additional negative effect. - Moving house has mixed effects: for low-income families, it is linked to more socio-emotional difficulties; for high-income families, moves generally have a positive impact.
McCoy et al., 2012 [167]	ICT and video games; activities	98 (9 years)	- Urban children are more often “social networkers” (high and diverse use of ICT, use it for social networking; spend a lot of time with friends, and also spend time reading and taking part in cultural activities) or have “busy lives” (diversity of activities, spending some time on ICT, reading, cultural activities, sports and video games), while rural children show different patterns. - Neighbourhood factors are associated with children's recreational activities; those in the cultural activities group are more likely to live in orderly areas with green spaces. Social networkers, who spend a good deal of time with their friends, are more likely to live in an area where it is safe to play outside, and there are green spaces and safe parks to play in. - Children in gaelscoileanna are more culturally engaged; school internet access is linked to greater ICT and social networking use outside school.
Layte & McCrory, 2011 [23]	Dietary quality	98 (9 years)	- Children from lower socioeconomic households generally live farther from food shops, especially larger supermarkets offering fresh produce. - Greater distance to food outlets is associated with lower dietary quality, but this effect is observed only for girls, even after controlling for parental income, education, and social class.

Smyth & Darmody, 2021 [169]	Externalising behaviour, internalising behaviour, school-based misbehaviour, antisocial behaviour	98 (9, 13 & 17/18 years)	- The school attended was linked to misbehaviour, truancy, and emotional difficulties, even after accounting for student background. - DEIS school students had more behaviour issues—but also higher prosocial behaviour—than peers in other schools. - Externalising behaviour was more prevalent among young people in the most disadvantaged quarter of electoral divisions (EDs) but other forms of behaviour did not differ by the socioeconomic composition of the area. - Young people in larger urban areas and small towns tended to have poorer behaviour outcomes. - Those living in areas characterised by mothers as disorderly (with more antisocial behaviour or public drinking/drug-taking) had greater internalising and externalising difficulties and less prosocial behaviour, while perceived local gang activity was associated with higher internalising and antisocial behaviour. - The presence of local facilities and a safe place to hang around helped protect against internalising and externalising behaviours. - Being involved in structured sports was associated with lower internalising behaviour and truancy.
Laurence & Smyth, 2023 [223]	Depressive symptoms	98 (9, 13, 17/18 & 20 years)	- Urban youth are more likely than rural youth to engage in both high-intensity (21% vs. 13%) and low-intensity (62% vs. 53%) political activities, even after adjusting for other factors. - Volunteering is more common among rural youth than urban youth at both 17 (31% vs. 27%) and 20 years (36% vs. 31%), mainly due to higher rural rates of sports-related volunteering (13% vs. 9%). - No major urban–rural differences were found in political interest, voter registration, or non-sports volunteering. - Political activity is not associated with life satisfaction but higher activity is linked to more depressive symptoms, but only for those in areas with weaker social infrastructure and for individualised forms of engagement (e.g., signing a petition). - Youth in rented accommodation are less politically engaged and volunteer less. - In contrast to individual-level SES, area-level disadvantage (e.g., low social structure, neighbourhood disorder) is linked to greater political activity. - Living in areas with stronger social infrastructure (e.g., more local amenities, social networks) is associated with better life outcomes: greater life satisfaction, lower depression, higher social trust, more confidence in institutions, and stronger adult identity. - Volunteering appears to buffer the negative effects of weak social infrastructure on well-being, identity, and trust.

4. Discussion

This review synthesises evidence on the factors associated with the well-being of children, adolescents, and young adults in Ireland, drawing on 223 peer-reviewed articles and 23 selected thematic reports using GUI data from the '98 and '08 Cohorts. Most of these studies were published after 2017 and primarily focused on socioemotional development and well-being, followed by physical health and education/cognitive development.

Across domains, socioeconomic factors—including parental education, household income, and family composition—emerged as consistent and influential determinants of child well-being domains. Sex differences were also consistently observed: boys were generally more physically active, while girls reported higher levels of anxiety and emotional difficulties.

External contextual factors such as health policies, economic recession, and the COVID-19 pandemic further shaped child outcomes, underscoring the role of public policy and policy responses to societal issues in mitigating inequalities. For example, access to medical or GP cards was linked to increased GP utilisation, while job loss and household financial strain during the recession and pandemic was associated with poorer outcomes across all domains for many children and young adults.

Taken together, a wide range of individual, family, peer, school, neighbourhood, and socio-political factors were found to be associated with child and youth well-being outcomes in Ireland. In line with Bronfenbrenner's socio-ecological model, these findings underscore the idea that a child's development and well-being cannot be separated from the broader social, cultural, and material environment in which they are embedded. The findings of this review deepen our understanding of the risks and protective factors shaping child well-being in Ireland, and offer valuable insights into the societal, structural and political factors that can shape these outcomes.

4.1 GUI '08 vs GUI '98

Several trends and differences in child well-being outcomes were observed between the '98 and '08 Cohort, particularly regarding socioemotional development, attitudes towards school and school subjects, and patterns of engagement in free time activities. Some differences can be interpreted through Bronfenbrenner's

bioecological model—specifically, the chronosystem [1]—which emphasises the role of time and historical context in shaping development.

Ireland underwent significant social and economic changes between the late 1990s and late 2000s. The '08 Cohort grew up in the aftermath of the Celtic Tiger economic boom and the onset of the financial crisis, later followed by the COVID-19 pandemic. These events profoundly affected Irish families and likely influenced the well-being of the two cohorts in different ways, depending on their age and developmental stage at the time of data collection.

For example, economic vulnerability increased substantially between Wave 1 and Wave 2 for families in both cohorts as the recession took hold—rising from 15% to 25% for the '98 Cohort and from 19% to 25% for the '08 Cohort [222]. For both cohorts, economic vulnerability was linked to greater socio-emotional difficulties, especially when households were exposed to multiple sources of disadvantage [222].

The impact of socioeconomic stressors on children's behavioural outcomes also appeared to differ across cohorts and by child sex. In Cohort '98, for example, subjective financial strain predicted externalising behavioural difficulties in both boys and girls, with material deprivation more strongly associated with externalising behaviours in boys [236]. In contrast, in Cohort '08, increases in material deprivation was associated with higher internalising difficulties in boys—even after controlling for income and financial strain [236].

During this period, against the backdrop of Ireland's ratification of the UN Convention on the Rights of the Child [237] in 1992, several national policy developments aimed at improving children's lives emerged. These policies focused on well-being protection and welfare, and child development, with the overarching principle being the best interests of the child.

The launch of the first *National Children's Strategy* in 2000 [238] marked a significant shift in recognising children as active citizens, leading to improved data collection, interdepartmental cooperation, and investment in services. This was followed by the Ombudsman for Children Act 2002 [239], which established the Ombudsman for Children's Office in 2004 to promote children's rights and provide a dedicated mechanism for addressing child-related concerns.

In 2005, the DEIS programme introduced targeted supports for disadvantaged schools, including smaller class sizes, school meals, literacy and numeracy initiatives,

and expanded Home School Community Liaison supports [240]. The Early Childhood Care and Education scheme, introduced in 2010 [241], aimed to provide universal access to pre-school education, with potential benefits for early learning and socioemotional development in the Cohort '08. This was followed by the National Childcare Scheme in 2019, which provided the first statutory entitlement to financial support for childcare for children up to the age of 15 years [242].

Furthermore, the establishment of *Better Outcomes, Brighter Futures* in 2014 [243] marked Ireland's first national policy framework for children and young people, running until 2020 and committing government departments to a whole-of-government approach to well-being, learning, and development. In parallel, the Government launched *First 5: A Whole-of-Government Strategy for Babies, Young Children and their Families, 2019–2028* [244], providing the first dedicated policy framework for early childhood. More recently, the *Young Ireland: National Policy Framework for Children and Young People, 2023–2028* [245] adopted a whole-of-government, rights-based approach, outlining targeted 'Spotlight' initiatives to tackle pressing issues such as child poverty, mental health, and disability services.

Complementing these child- and youth-focused frameworks, Ireland has advanced broader social inclusion strategies that emphasise the centrality of reducing child poverty within the national child well-being agenda. Successive *National Action Plans for Social Inclusion* (first introduced in 2007 [246] and updated in 2015 [247]) outline whole-of-government measures to tackle poverty and social exclusion, with a particular emphasis on vulnerable groups, including children and families. These initiatives culminated in the *Roadmap for Social Inclusion 2020–2025*, which strengthened the focus by committing to reduce consistent poverty to 2 per cent or less by 2025 [248]. Acknowledging the persistent challenge of child poverty, the Government has since adopted a revised national target to reduce consistent child poverty to 3 per cent or less by 2030 [249]. This target is intended to guide cross-government action, prioritise investment, and ensure resources are directed to the children and families most in need.

This review revealed notable differences between the '98 and '08 cohorts in socioemotional development, attitudes towards school and school subjects, and free time activities. One of the most striking shifts was the transition from TV to mobile devices and social media by age 9—mobile phone ownership, for example, increased from 61% in Cohort '98 to 78% in Cohort '08 [44,224]. Among children in Cohort '08,

there are indications that increased technology use—particularly mobile phone and social media use—may have displaced traditional forms of social interaction, including participation in sport, cultural activities, and face-to-face peer relationships. This displacement effect appears especially pronounced among children from lower socioeconomic backgrounds. In contrast, levels of technology use were more limited for the '98 Cohort, who experienced childhood during a less digitally saturated period.

These behavioural shifts in technology use are also reflected in children's well-being outcomes. In Cohort '08, excessive screen use was negatively associated with socio-emotional well-being, particularly among 9-year-olds, with such media engagement linked to lower subjective well-being scores [224]. In Cohort '08, higher levels of screen use were linked to behavioural difficulties in preschool boys [250]. High screen time at age 5 was also associated with lower nonverbal reasoning scores [139]. For Cohort '98, early mobile phone ownership at age 9 was linked to lower academic scores by age 13 [157], while sports and computer game participation were associated with higher reading and math scores [167]. High screen time, mobile phone ownership, and having a TV in the bedroom at age 9 were also linked to higher BMI, obesity, and lower physical activity [23,58,84].

In adolescence (ages 13–17), high levels of digital engagement were associated with poorer mental health in both cohorts—elevated emotional symptoms for girls and more behavioural issues for boys [212]. Excessive video gaming and multiscreen use were also associated with worse mental health outcomes for both sexes [213].

These examples of cohort differences in Ireland highlight the critical role of historical context and societal changes in shaping the lives of children and adolescents. The societal pressures and disruptions experienced by children and youth at different developmental ages underscore the importance of understanding the role of socio-historical influences on development. These periodic effects carry important implications for policy—particularly in addressing the rising challenges related to mental health, school engagement, and physical activity among Irish youth, particularly in the aftermath of economic instability and the COVID-19 pandemic.

4.2 Influencing factors and suggestions for policy

Several peer-reviewed journal articles and reports using GUI data have explored how societal and policy factors influence on child well-being outcomes, revealing both key

insights and potential evidence gaps. Several health policies—such as GP visit cover and access to medical cards—were associated with increased GP utilisation, illustrating the positive role of public health cover in improving healthcare access and outcomes for children [29,65,66].

Drug co-payments were also associated with healthcare use, with reduced GP visits among infants but increased utilisation among older children [29]. This discrepancy, according to the study authors, may be partly explained by differences in the timing of data collection, as families in the '08 Infant Cohort families were recruited and initially visited during Ireland's 2008 economic recession [29]. Overall, these findings highlight the need for further research on how policy impacts may differ across age groups and population subgroups.

The 2008-2013 economic recession had far-reaching effects on child well-being. Children exposed to poverty during this period experienced poorer outcomes in health, education, and socio-emotional development [21,28]. The recession highlighted the vulnerability of children in low-income households and the importance of policies that provide time economic support to families during financial crises.

Maternal return to work after childbirth and childcare choices were significantly influenced by educational attainment, family background, income, and financial need—with cost of childcare emerging as a particularly important determinant. These findings suggest that such decisions may be shaped by external factors, including constraints, rather than by parental preference. To support families and promote child well-being, the findings suggest that policy should prioritise making high-quality childcare more affordable and accessible—including targeted measures for lower-income households and children from non-English speaking backgrounds, for whom this can positively influence child language outcomes.

More recently, the COVID-19 pandemic introduced new challenges that further intensified inequalities in child well-being. Job loss and household financial strain were linked to negative impacts on children's emotional well-being. Although support measures such as the Pandemic Unemployment Payment (PUP) and access to remote learning served as protective factors, the pandemic still led to rising mental health concerns—especially among young adult women in the '98 Cohort [218,227].

Looking ahead, future policies should aim to draw on these learnings and buffer against economic shocks and strengthen mental health support for vulnerable groups, particularly those affected by disruptions in education and employment.

In addition to studies that directly addressed the impact of specific policies, results from cross-sectional and longitudinal studies highlight several modifiable factors with important policy implications for improving child and adolescent well-being in Ireland.

Basic needs such as nutrition and housing remain fundamental to child well-being. Improving access to healthy food and addressing poor housing conditions—in both urban and rural areas—can support better dietary habits and overall physical health, particularly among children in low-income households [23,39]. Strengthening family and community support systems could also reduce the negative impacts of economic vulnerability and improve child well-being [43,223].

Neighbourhood safety and infrastructure emerged as critical for promoting physical activity and supporting mental health. Prioritising the development of safer neighbourhoods—particularly in urban areas should be a key policy focus [54,201]. Enhancing social infrastructure and local amenities, such as sports facilities and after-school programs, can foster youth engagement in both physical activity and broader community life, particularly in rural and disadvantaged areas [51,57].

Civic and community engagement also warrants attention. To address rural–urban disparities, targeted initiatives to support political participation, volunteering, and youth-led community initiatives in rural settings could promote a stronger sense of agency and community belonging among young people [223].

Educational and extracurricular engagement is another key area for investment. Expanding access to structured extracurricular activities, including sports and cultural programmes, may help reduce the incidence of socioemotional problems and improve academic outcomes—especially for children from disadvantaged backgrounds [167,232]. In the wake of the pandemic, policies that enhance remote learning conditions, ensure equitable access to educational resources—including digital equity—are particularly important for low-income and migrant families [25].

Finally, supporting mental health and relationships is essential. Promoting strong peer- and adult-child relationships, increasing access to youth mental health services, and providing tailored resources for young people with caregiving responsibilities could further enhance emotional well-being and educational attainment [40,59].

In summary, by targeting these modifiable environmental and community-level factors, policy efforts can help create to foster safer, healthier, and more supportive communities that promote the well-being of children and adolescents across Ireland.

4.3 Future research

This review also identifies several gaps and opportunities for future research. While some domains and subdomains were well-represented in the peer-reviewed literature and selected GUI thematic reports, others received less attention.

The civic and economic engagement domain was notably underexplored, likely due to its age-specific relevance (16+ years). As Cohort '08 has only recently reached this age, further studies using this group may be forthcoming or still under consideration in the peer-review process.

Several subdomains warrant greater focus in future research. These include factors influencing dental health, sleep, relationships with teachers, school subject choices, and coping strategies. Although less frequently studied, these subdomains have important implications for child well-being, as they intersect with physical health, academic performance, and mental well-being.

Naturally, certain factors were more prominently investigated in specific cohorts due to the age at which data was collected. For instance, early life factors—such as birth information and breastfeeding—were more extensively captured in Cohort '08. As this group moves through adolescence into early adulthood, longitudinal analyses could provide valuable insights into the long-term effects of these early exposures.

One of the core strengths of the GUI study is its longitudinal design. Future research should increasingly focus on longitudinal analyses spanning more than one or two waves, in order to better capture the complexity of children's developmental pathways. Another major strength is the inclusion of multiple cohorts: Cohort '98, Cohort '08, and, most recently, Cohort '24, a birth cohort that began data collection in September 2024. While only a few studies to date have directly compared well-being outcomes between the cohorts at similar ages, upcoming data releases will allow for richer cohort cross-cohort comparisons. These comparisons will be particularly valuable in understanding the impact of societal changes—such as technological shifts, economic fluctuations, and policy reforms—on child and adolescent outcomes over time.

In parallel, there is a need for continued evaluation of policy interventions, with attention to their long-term effects on child development. Future studies could examine how different health and maternity care policies impact health and socio-emotional outcomes, particularly among disadvantaged children. The impact of economic policies—particularly during times of crisis like recessions and pandemics—also warrant further exploration, to better understand the mechanisms through which economic strain affects child well-being and how families can be protected from its adverse consequences.

4.4 Strengths and limitations

This review has several strengths and limitations that should be considered when interpreting its findings. Limitations include:

- First, the selection process for full data extraction. Due to the high number of sourced documents from our search, the review focused only on peer-reviewed journal articles and a selection of thematically focused GUI reports. While this approach ensured a rigorous focus on peer-reviewed evidence, it may underrepresent certain study types, populations, or domains of child well-being that, although relevant, were not considered scientifically novel or timely at the time of publication. Consequently, the findings may not fully reflect the breadth of research conducted using GUI data or the full range of domains covered by different study types.
- Second, although a large number of sources were systematically summarised in this report, the review primarily described reported “associations” and did not consistently distinguish between longitudinal and cross-sectional analyses. Making a clearer distinction between the quality of evidence provided by cross-sectional versus longitudinal studies would have offered a deeper understanding of the facilitators and barriers to child well-being over time, particularly the strength of directional causal relationships underlying observed associations. While this was beyond the scope of the current review, it represents an important avenue for future research.
- Finally, due to the large volume of evidence requiring synthesis, null findings were largely omitted from the results. As a result, this may in some cases lead to an incomplete understanding of factors that are associated with, as well as those unrelated to, child well-being outcomes. Discerning the quality of evidence from null findings is a highly technical methodological issue, still a matter of considerable debate among statisticians [251,252], and was therefore beyond the scope of this review. Further research on whether null findings identified in this review reflect a clear lack of association between a factor and child well-being or simply inconclusive evidence requiring further investigation would be an important and practically informative contribution, but was likewise beyond the scope of this report.

Despite these limitations, the review has several notable strengths.

- First, it draws from a broad evidence base, including a wide range of document types sourced from 26 databases, offering a comprehensive overview of how GUI data has been used to examine child and adolescent well-being in Ireland.
- Second, the review captures a rich diversity of results, spanning multiple domains and subdomains of well-being. It illustrates how both GUI cohorts have contributed to understanding the many factors that influence children's well-being, through both cross-sectional and longitudinal studies.
- Third, in addition to synthesising findings in a concise and structured way in the main results section, the more detailed results tables (Appendix 8) provide a valuable reference for further analysis. These tables allow users to explore the extent of existing investigations into associations between specific variables, as well as to identify under-researched areas to support future research design.
- Finally, the policy recommendations derived from the evidence offer practical insights to guide future interventions aimed at improving child and adolescent well-being in Ireland.

5. Conclusion

This review sourced and synthesised evidence on the factors influencing the well-being of children, adolescents, and young adults in Ireland. Findings highlight how a wide range of individual, family, peer, school, neighbourhood, and socio-political factors shape well-being outcomes across multiple domains and subdomains. They underscore the critical role of public policy and policy interventions in addressing disparities—particularly in times of economic strain—and in supporting vulnerable groups.

In addition to offering a comprehensive overview of existing research, the review identifies important gaps in the literature and sets out key directions for future studies. By mapping both the evidence base and areas for further investigation, this work provides a foundation for evidence-informed policymaking aimed at improving child and youth well-being in Ireland.

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