


**Please cite the Published Version**

Goswami, Haridhan  (2021) Children's subjective well-being in Bangladesh: influence of socio-demographic and economic factors. *Population Review*, 60 (1). pp. 119-140. ISSN 0032-471X

**Publisher:** Sociological Demography Press

**Version:** Published Version

**Downloaded from:** <https://e-space.mmu.ac.uk/630689/>

**Additional Information:** This article is reproduced here with permission from *Population Review*.

**Enquiries:**

If you have questions about this document, contact [openresearch@mmu.ac.uk](mailto:openresearch@mmu.ac.uk). Please include the URL of the record in e-space. If you believe that your, or a third party's rights have been compromised through this document please see our Take Down policy (available from <https://www.mmu.ac.uk/library/using-the-library/policies-and-guidelines>)



PROJECT MUSE®

---

Children's Subjective Well-being in Bangladesh: Influence  
of Socio-demographic and Economic Factors

Haridhan Goswami

Population Review, Volume 60, Number 1, 2021, (Article)

Published by Sociological Demography Press



➔ For additional information about this article

<https://muse.jhu.edu/article/792010>

# Population Review

Volume 60, Number 1, 2021

Type: Article, pp. 119-140

## Children's Subjective Well-being in Bangladesh: Influence of Socio-demographic and Economic Factors

**Author:** Haridhan Goswami

**Affiliation:** Department of Sociology, Manchester Metropolitan University, United Kingdom

**Corresponding author/address:** Haridhan Goswami, Department of Sociology, Manchester Metropolitan University, United Kingdom; email: [H.Goswami@mmu.ac.uk](mailto:H.Goswami@mmu.ac.uk)

### Abstract

Overall, research on children's subjective well-being has received considerable attention from researchers and policymakers in past decades. However, we know very little about children's subjective well-being in Bangladesh, which has around 64 million children. This article attempts to fill part of this gap. It aims to identify the key socio-demographic and economic factors that are associated with children's subjective well-being, using data from the Children's Worlds 3<sup>rd</sup> Wave survey, which was conducted for the first time in Bangladesh in 2018. Over 3,000 children took part in the survey from three geographical regions in the country. Eight key socio-demographic factors were examined, and four – gender, family structure, rural-urban locality and geographic region – were found to be significantly linked with different levels of children's subjective well-being in Bangladesh. Three economic factors – material deprivation, family finance worries, and affordability to buy enough food – were significantly associated with subjective well-being assessments in Bangladesh. Out of these seven significant factors, rural-urban locality had the highest effect on subjective well-being among children followed jointly by material deprivation, affordability to buy enough food, and geographical regions. These findings are discussed in the context of previous empirical studies and theories on subjective well-being with special emphasis on their theoretical, methodological and policy significance, not only for Bangladesh but also for cross-cultural research context.

### Keywords

Children, subjective well-being, policies, Bangladesh, material deprivation, gender, rural-urban disparity

## 1. Introduction

Promoting children's well-being is vital in for children to have a good childhood and is the basis for their future well-being as adults (Rees, et al., 2012). Research on children's subjective well-being has received considerable attention from policymakers in past decades. This policy drive – coupled with the injunction from the New Sociology of Childhood (Prout and James, 1997) to consult with children as active agents – has resulted in an increasing number of studies on children's and young people's well-being at national and international levels (for a full review, see Goswami, et al., 2016). Previous studies have identified a number of socio-demographic factors, such as age, gender, ethnic background, material conditions, family structure, disabilities, and experience of being bullied to be associated significantly with children's subjective well-being (for a full review, see Rees et al. 2010a; Huebner 1991a; Bradshaw et al. 2011; Bradshaw et al. 2010).

While these studies have made a significant contribution to our understanding on subjective well-being by providing insights into the factors that explain variations in children's subjective well-being, we know very little about the subjective well-being of children in Bangladesh, which has around 64 million children. Pioneering studies on children's subjective well-being were conducted in neighbouring India by Young Lives (2020), and in Sri Lanka and Nepal by Children's Worlds (2020). These studies are very useful to understand the state of childhood in these three South Asian countries. There are also some high-quality studies in Bangladesh conducted by UNICEF, using indicator-based measures such as literacy rate, death rate, immunisation, school enrolment, etc. Although these indicator-based studies provide valuable insights into the life of children in Bangladesh, we know little about how children in Bangladesh are doing in different aspects of their lives when assessed by data provided by children themselves. The present article fills this gap by using Children's Worlds survey data gathered in 2018. The aim of the article is to identify the socio-demographic and economic factors that are associated with differences in children's subjective well-being in Bangladesh. Key research questions are:

- (a) Which socio-demographic factors are significantly correlated with children's subjective well-being in Bangladesh?
- (b) What economic factors are significantly associated with children's subjective well-being in Bangladesh?
- (c) Which of these factors have the highest effect on children's subjective well-being in Bangladesh?

The article contributes to the existing body of knowledge by providing evidence on reliability of the multi-item subjective well-being scale, which is tested for the first time among Bengali speaking children in Bangladesh (for evidence on scale reliability, see 'subjective well-being scale' under 'methodology' in section 4). Moreover, the findings on key socio-demographic and economic factors are useful for policymakers to formulate evidence-based policies to improve children's subjective well-being in Bangladesh by paying targeted attention to children with those socio-demographic and economic characteristics.

The rest of the article is structured in the following way. Section 2 defines the concept of children's subjective well-being. Section 3 gives a brief overview of the study by highlighting the state of childhood in Bangladesh. It also includes a review of some key studies on children's well-being in Bangladesh. Section 4 discusses the methodology used in this research. Section 5 presents the results of the study. Section 6 discusses the key findings in the context of previous empirical studies and

theories on subjective well-being. Section 7 concludes with a brief discussion on policy implications of the research, acknowledging some limitations and putting forward some suggestions for future studies.

## **2. Definition of children's subjective well-being**

The concept of 'well-being' has been used in many different contexts. It is, therefore, essential to explain how the concept is used in the present research. In academic literature, it is used as an overarching concept to refer to the quality of life of people in society (Rees et al. 2010b). In spite of substantial academic and policy interest in well-being over the decades, there is no universally accepted definition of the concept. In defining it, a distinction is usually made between the hedonic and eudaimonic approaches (Ryan and Deci 2001). The hedonic approach views well-being in terms of subjective happiness and the experience of pleasure versus displeasure, broadly constructed to include all judgements about the good/bad elements of life. The eudaimonic approach maintains that not all desires — not all outcomes that a person might value — would yield well-being when achieved (Ryan and Deci 2001). It focuses on meaning and self-realisation and defines well-being in terms of the degree to which a person is fully functioning. Ryff and Keyes (1995) spoke of psychological well-being (PWB) and presented a multidimensional approach to the measurement of PWB that consists of six distinct dimensions: autonomy, personal growth, self-acceptance, life purpose, mastery, and positive relatedness.

Although there is much debate among the followers of these two approaches, evidence from a number of investigators (e.g., Biswas-Diener et al. 2009; Proctor et al. 2014) has indicated that well-being is probably best conceived as a multidimensional phenomenon that includes both hedonic and eudaimonic elements.

For the purpose of this article, well-being is defined by focusing on the hedonic perspective. In this article, children's subjective well-being refers to "children's evaluations of their lives — the degree to which their thoughtful appraisals and affective reactions indicate that their lives are desirable and proceeding well" (Diener et al. 2015: 234) (see section 4 for more information on how the subjective well-being scale is developed to measure the concept of well-being in the present article).

## **3. Background of the study**

This section is divided into two parts. The first part describes contextual situation of children's lives in Bangladesh using some macro level data. This part will help readers especially those who are not familiar to Bangladesh society to understand the results of this research by linking them back to the macro-level situation. The second part includes a brief review of key studies on children's well-being in Bangladesh.

### *Children's life in Bangladesh: An overview*

Bangladesh, a small country in South Asia, with an area of 147,570 square kilometres, became independent in 1971. It has an estimated population of around 161 million, making it one of the most densely populated (1,077 people per square km) countries in the world. Having almost 28% of its population under age 15 years and another 20% aged 15-24, it can be characterized as a youth populated country as nearly half of the country's population is below age 25.

The majority of the people are Muslims (around 89.3%), and the rest are Hindus (9.6%), Buddhists (0.6%) and Christians (0.3%), while other minorities constitute a small portion (0.2%). Although

Bengali are the main ethnic group (98%), there are almost 2% ethnic minority people who speak non-Bengali and have their own customs and traditions. Almost 34% of the people live in urban areas, and the literacy rate (15 years and above who can read and write) in the country is 61%.

In 2011, the Government of Bangladesh introduced the National Children Policy, which promises to ensure child rights, alleviate child poverty, eliminate all forms of child abuse and discrimination, and promote participation of children, taking their views on 'overall protection' into consideration to promote the best interest of the children. According to the Constitution of the country, every child has the basic right to free primary education. Bangladeshi law prohibits marriage before age 18 for girls and age 21 for boys. However, marriage of girls at earlier age is very widespread.

Child labour in Bangladesh is common, with 4.7 million (12.6%) of children aged 5 to 14 in the work force. In 2006, Bangladesh passed the Labour Law, setting the minimum legal age for employment at 14. Nevertheless, the enforcement of this law appears to be challenging because 93% of child labourers are employed in the informal sector – in small factories and workshops, on the street, in home-based businesses and domestic employment.

A four-tier education system exists in Bangladesh. Formal education has three main streams: Bengali-medium general education, English-medium education and religion-based education. Bangladesh has made tremendous improvements in increasing the accessibility to education as the net enrolment rate is 97.9% and 67.8% for primary and secondary level respectively.

Bangladesh signed and ratified the United Nations Convention on the Rights of the Child in 1990. Although the Children Act 1974 and the National Child Policy 2011 were introduced in Bangladesh to ensure overall protection of children and their rights, around 70 % of births are not registered. Corporal punishment of children appears to be rooted in Bangladesh culture as it is still used to bring discipline in classrooms and other aspects of children's lives. Although children's involvement in economic activities has been reducing, a large number of children from agricultural and lower social class backgrounds are directly engaged in income earning activities.

#### *Review of key studies on children's well-being in Bangladesh*

This section briefly presents some important findings on children's well-being from some key studies conducted in Bangladesh. This will help to identify gaps in our current knowledge on children's subjective well-being in Bangladesh.

Begum and Sen (2009) examined the interconnections between women's empowerment and maternal health outcomes that can influence current child well-being and future escape chances from chronic poverty. Measuring child well-being by health indicators, such as underweight, wasted and stunted, this study revealed that a women's agency – mother's education, domestic decision-making role, and media exposure, and maternal nutritional status – plays a vital role in children's health.

Measuring health and the education domain of well-being using nutritional status of children and the deviation of each child's completed years of schooling from the average completed years of schooling of other children of the same age, Malapit et al., (2015), it was revealed that gender gaps in empowerment are only weakly linked to children's nutrition. Overall, the household head's (father's) education was significantly associated with better nutrition and education outcomes for children, but younger girls (ages 6-10) and older boys and girls (ages 11-17) were more likely to receive more education when mothers were more educated. Results on parental education suggested that fathers'

empowerment might be reflecting a “wealth” effect that is invested in children’s nutrition and education when they are young, while mothers’ empowerment becomes more important in girls’ education in general and keeping older children, regardless of sex, in school.

Using data from UNICEF’s Multiple Indicator of Cluster Surveys, Emerson et al., (2016) found that children aged 3-4 in Bangladesh with developmental delay were more systematically disadvantaged in health and education – both measured by objective indicators such as diarrhoea, fever, obesity, attendance at early education.

Child Well-Being Survey (2016), commissioned by UNICEF, examined the level of child well-being in urban areas of Bangladesh in terms of nutrition, health, education, protection and access to water and sanitation. It identified a significant difference on those well-being domains at regional level in Bangladesh.

Childhood disparity in Bangladesh is evident in key aspects of children’s life and influenced by a number of factors, including gender, location, region, wealth, ethnicity and religion. According to the Global Childhood Report by Save the Children (2018), Bangladesh scored 701 out of a possible 1,000 points, representing a 21-point improvement, which was the biggest increase for any country in South Asia. This improvement was primarily due to one factor: more Bangladeshi children now remain in school. However, it is still ranked a disappointing 130th out of 175 countries. The ranking was based on an index which was constituted from seven indicators: under-5 mortality rate, school dropout rate, child labour, violence against children, child malnutrition, child marriage, and adolescent pregnancy. According to the report, more than a third of children under 5 years of age still suffer from stunting, 44% of teenagers are married before they turn 20, and nearly 3.5% of children do not survive to their fifth birthday. According to UNESCO data, Bangladesh’s dropout rate for school children has gone down by 36% over the past five years. Despite the progress in primary education, many children are still outside the formal school system.

These studies provide valuable insights into the state of childhood in Bangladesh. They are specifically useful to assess the situation of children’s health and education, which are regarded as two important domains of well-being for children. However, if we pay closer attention to these studies from a children’s rights perspective, we notice that these objective, indicator-based research projects did not give much room for children to evaluate and/or assess these aspects by themselves.

The present article focuses on Bangladeshi children’s own assessments about their overall well-being. The key aim here is to identify the socio-demographic and economic factors that are associated with children’s subjective well-being in Bangladesh.

#### **4. Methodology**

The present paper is based on the results from the Children’s Worlds 3<sup>rd</sup> Wave of survey, which was conducted in Bangladesh in 2018. This international collaborative research aimed to collect robust data on children’s lives and daily activities, their time use, and in particular, their own perceptions and evaluations of their well-being. The purpose was to improve children’s well-being by creating awareness among children, their parents, their communities, opinion leaders, decision-makers, professionals and the general public. For comparative purpose, it used a common questionnaire in gathering data from children from 35 countries in Europe, Asia, Africa, South America and North America (for detailed survey methodology and objectives of this project, visit **Children’s Worlds** at

<http://www.isciweb.org/>). This is the first international survey on children’s subjective well-being in Bangladesh that gives children the opportunity to raise their voices on issues affecting their lives, which will help formulate evidence-based policies to improve the well-being of children in Bangladesh. A small-scale pilot was first conducted among 300 children in 2016 to test suitability of the questionnaire content, uncover translation issues, and to solve practical aspects linked to data collection from schools. Findings from the pilot survey helped us to improve questionnaire length, its content, translation and operational aspects of data collection in the main survey.

*Study area and sampling*

The survey was conducted in schools in three cities in Bangladesh: Barishal, Rajshahi, and Moulvibazar. Barishal is situated on the banks of the Kirtankhola river, 115 km south of Dhaka (the capital city) and 106 km from the Bay of Bengal. Being one metre above sea level, this region is severely affected by floods and cyclones. Barishal is a major trade centre which is famous for rice, jute and fish. Rajshahi is located in the mid-western area of Bangladesh. The region is notable for producing mango and silk. Moulvibazar is located in the north-eastern part of the country. This region has a number of topographical features – small hills, wetlands and a high flood plain – making it different from the rest of Bangladesh.

These three cities were selected purposively because of easy access to local schools where the researchers were based. However, once the cities were identified, selection of schools was made randomly from a sampling frame which contained all mainstream primary and secondary schools within the city corporation boundary in Rajshahi and Barishal and Sadar Thana boundary in Moulvibazar. Schools were selected randomly from the list of all schools in each city. In total, 56 schools (out of which 36 primary and 20 secondary) were selected for the survey. Table 1 shows the breakdown of schools by their types in three locations.

**Table 1. Distribution of primary and secondary schools included in the sample by region**

Region	Primary schools		Secondary schools	
	Total school	Sample school	Total school	Sample school
<b>Barishal (City Corporation area)</b>	79	10	35	8
<b>Rajshahi (City Corporation area)</b>	189	15	25	5
<b>Moulvibazar (Sadar Thana)</b>	59	11	57	7
<b>Total</b>	<b>327</b>	<b>36</b>	<b>117</b>	<b>20</b>

*Sample size and response rate*

From these schools, children studying in class three, five (both in primary school) and seven (in secondary school) were included in the sample. The average age when the children start these study levels are respectively 8 years, 10 years and 12 years.

Usually, all children of targeted age groups/classes (e.g., class III, V or VII) were included. However, if a school was large (usually secondary schools) with multiple sections/groups in same class, then one section was randomly selected from that study level. If the selected school was ‘single sex’, then the next school was selected from the opposite sex to maintain gender balance in the sample. Almost equal number of children was included in the sample from each age category. The total number of children who completed the survey was 3,090. On average, response rate varied from 90% to 95% in each city. Table 2 shows the distribution of children by age/class, school type, and regions.



**Table 2. Distribution of sample by age, school type, and region**

Region	Primary school		Secondary school	Total
	8 years old (Class 3)	10 years old (Class 5)	12 years old (Class 7)	
<b>Barishal (City Corporation area)</b>	350	352	361	1063
<b>Rajshahi (City Corporation area)</b>	341	330	351	1022
<b>Moulvibazar (Sadar Thana)</b>	340	332	333	1005
<b>Total</b>	1031	1014	1045	<b>3090</b>

*Data collection instrument*

The English version of the questionnaire (prepared by Children's Worlds) was translated into Bengali by using back translation method. The Bengali questionnaire was first piloted and modified based on the pilot test results. Three separate versions of the questionnaire were prepared for three age groups of children: ages 8, 10 and 12 years. The children received a printed copy of the questionnaire and completed it in their class. Because of their cognitive ability, 8 year-old children answered a shorter questionnaire, which also had fewer response options for some questions compared to older groups. On average, 8 year-old children needed 50 minutes, 10 year-olds 45 minutes, and 12 year-olds 40 minutes to complete the survey. The questionnaire was read out to the children in class three (year 8). Only data from class five and seven (10 and 12 year-old children) were used, and almost an equal number of children from these two age groups took part in the survey (Table 4).

*Ethics*

In developing and undertaking the survey, close attention was paid to ethical issues, including consent, anonymity, risk of harm to children and researchers. To start the project in Bangladesh, the research team received ethical approval from an ethics committee at Manchester Metropolitan University. Consent was obtained verbally from both children and parents/teachers/caregivers prior to data collection.

*Data analysis*

For evaluating the reliability of the multi-item scale measuring children's well-being in Bangladesh, exploratory factor analysis and Cronbach's Alpha were calculated. For univariate analysis, percentages, mean and standard deviation were used. For multivariate analysis, multiple linear regression was used. All statistical analyses were carried out in Statistical Package for the Social Sciences (SPSS) version 25.

*Measures*

## 1. Dependent variable

## 1.a. Subjective well-being scale

Over the past few decades, a number of measures have been developed for measuring subjective well-being. Three of which gained popularity are the single-item measure of satisfaction with life as a whole (Cummins and Lau 2005), the single-item Cantril's ladder (Cantril 1965), and the multiple-item life

satisfaction scale (Huebner 1991b). Compared to the single item measure, the multiple-item measure of subjective well-being is reported to be more stable (Stock et al. 1982 in Diener 1984; Goswami 2009). The Children’s Worlds international study, the project from which the data for the present analysis is drawn, applies a slightly modified scale of Huebner (1991a). The scale was tested for its statistical robustness by using data from previous waves of Children’s Worlds international study (Casas and Rees, 2015; Casas, 2017). The items were further modified in Wave 3 following discussions with children in low-income countries outside Europe with the aim of improving cross-cultural comparability. The final version of Children’s Worlds Subjective Well-Being Scale (CW-SWBS) contains six items. Children were asked to say how much they agree with each item on a scale from 0 (do not agree with the sentence at all) to 10 (agree with it completely). Table 3 contains the list of items used in the scale. The scale measures children’s overall well-being rather than their satisfaction in a particular domain or aspect of life. A principal component analysis with orthogonal (varimax) rotation extracts one factor (eigenvalue 3.84) explaining 63.99 per cent of the total variance. Therefore, these items are proved to measure a single construct of ‘Subjective Well-Being’. Internal consistency analysis of these six items obtains Cronbach’s Alpha of 0.88, which indicates very high reliability of the scale (Table 3). Score in each item is added together to create an index of subjective well-being which ranges from zero to 60. For ease of interpretation, it is then rescaled so that scores range from zero to 100 – a higher score indicating a higher level of subjective well-being.

**Table 3: Results of the principal component analysis for the six-item CW-SWBS**

Subjective well-being scale items	Principal component loadings
My life is going well	0.84
I have a good life	0.83
I like my life	0.80
I am happy with my life	0.80
I enjoy my life	0.78
The things that happen in my life are excellent	0.75
<b>Eigenvalues</b>	<b>3.84</b>
<b>% of total variance explained</b>	<b>63.99</b>
<b>Cronbach’s Alpha</b>	<b>0.88</b>

## 2. Independent variables

### 2.a. Socio-demographic factors

Age: In the survey, children were asked to report their age. School year group (class in the context of Bangladesh) was used as a measure of age. Older group (average 12 years of age studying in class seven) is compared against the younger group (average 10 years of age studying in class five), which is kept as a reference category with code 0.

Gender: Children were asked to classify themselves either as boys or girls in the survey. Girls were kept as the focal category of interest and boys were dummy coded to 0 for advanced statistical analysis.

Rural-urban residence: In the survey, children were asked to name the area where they live. Although the survey was conducted in schools in three cities, the open-ended text data on area of living were useful to identify two distinct groups of children: rural children and urban children. Although the majority were living in urban areas, a considerable number of rural children (mainly secondary school children in class seven) in the survey were found to travel to schools in cities from their villages. Rural children were the main focus of interest and were compared against urban children who were dummy coded to 0 for statistical analysis purposes.

Primary care provider: In order to identify who provides main care to children, the survey asked children to describe who they live with from the list of five groups of people who act as the main caregiver for children in the context of Bangladesh: parents, government run orphanage, NGO run orphanage, relatives, non-relatives. For the purpose of the article, two types of caregiver providers were developed from children's responses to this question: parents providing care, and non-parents providing care. Children living with a non-parents-caregiver were dummy coded to 0 for statistical analyses purposes.

Family structure: In order to measure family structure, children were asked to report the list of all adults who they live with (excluding people from outside who provide help with household chores). From their responses, four types of family structures were developed: both birth parents, mother only, extended (a type of family in Bangladesh in which children live with their birth parents along with their grandparents in the same household), and others (living with father only, siblings only, grandparents only, or other relatives and/or non-relatives). Both birth parents were used as a reference type against which all other types of family were compared with.

Religious majority: Religious affiliation has been an important tool for categorization of people in society. Goswami (2004) has used it to analyse intergroup relations between Muslims and Hindus based on power relations which have changed in the history of Indian sub-continent. In order to measure whether children are from a religious minority or majority group, they were asked to report the religious group in which they affiliate themselves with from a list of five categories: Muslim, Hindu, Christian, Buddhist, and others. Children who identified themselves as Muslims were classified as 'religious majority' and the rest were defined as 'religious minority'.

Ethnic background: Bangladesh is regarded to be homogeneous (World Population Review, 2020) as 98% of the Bangladesh population are ethnic Bengali – 2% are ethnic minorities, including Biharis, Chakma, Tanchangya, Kuki, and Marma. In the present study, children were asked to self-define their ethnic identities by choosing the ethnic group identity that they felt affiliated with from a list of eight categories: Bengali, Rakhain, Monipuri, Santaol, Garo, Khasiya, Chakma, and other. Two ethnic groups were derived from children's responses: Bengali (coded 1) and non-Bengali (coded zero).

Region:

It is important to note that children from three regions in Bangladesh – Barishal (southern part of the country), Moulvibazar (north-eastern part of the country), Rajshahi (north-western part of the country) – took part in the survey. In order to control for regional variation in children's responses to subjective well-being, region was included in the analysis. Barishal was used as a reference region against which the other two areas were compared.

## 2.b. Economic factors

Four economic factors were tested against children's assessment of their subjective well-being. Multiple items were used to develop two economic indices: household asset index, and material deprivation index. Casas et al., (2013) argue that multi-item indices or scales are psychometrically more reliable than a single item measure. Single item was used to measure the remaining two economic factors: worry about family finance, and affordability to eat daily. These four measures are discussed in detail below:

Household asset index: The survey asked children whether or not their family has the following items at home: a computer (including laptops and tablets), a television, a fridge/freezer, a radio, a telephone (landline or mobile), a family car/van/motorbike for transport. The number of times they said 'Yes' to the items was counted to prepare an index ranging from 0 to 6, with a higher score indicating greater amount of household assets.

Material deprivation index: According to OECD (2007), material deprivation refers to the inability of individuals or households to afford those consumption goods and activities that are typical in a society at a given point in time, irrespective of people's preferences with respect to these items. In this research, we used a child centric index to measure material deprivation (Main and Pople, 2011). In supporting child centric measure of material deprivation, Main and Bradshaw (2012) argued that measuring deprivation at household level does not capture deprivation at child level. In the survey, we provided a list of eight items (clothes in good condition, enough money for school trips and activities, access to the internet at home, equipment/things needed for sports and hobbies, pocket money, two pairs of shoes in good condition, a mobile phone, equipment/things needed for school) and asked children whether or not they had those items. Counting the number of 'No' response to those items, an index was prepared. The index ranges from 0 to 8, with a higher score indicating greater level of material deprivation.

Worry about family finance: Children's worry about family finance was found to have links with their well-being (Rees, Pople & Goswami, 2011). The survey asked children how often they worry about the amount of money their family has: never, sometimes, often, or always. Responses to this single item were coded from 0 (never) to 3 (always), with a higher score indicating greater degree of worry for children about their family finance.

Affordability to eat enough daily: In order to measure the experience of living in poverty, children were asked to report how often they have enough food to eat each day: never (coded 0), sometimes (coded 1), often (coded 2) and always (coded 3). This single item scale ranges from 0 to 3, with a higher score indicating greater affordability to have enough food.

## 5. Results

### *Socio-demographic and economic characteristics of the children: descriptive statistics*

Girls (55%) slightly outnumbered the boys (45%) (Table 4), and 22 children did not respond to the question on gender. Almost one-quarter of the children in the survey came from a rural area. However, the percentage of rural children who took part in the survey does not represent the number of rural children in the region or country. Family was reported to be the main care provider (98%) for the children in the sample. In terms of family structure, the majority of the children (60%) reported that they lived with both parents. Almost one-quarter (26%) reported to live with extended family, and almost 10% percent reported to live only with their mother. Only 3.3% reported to live with 'other' type

of family (children living only with their father, siblings, and grandparents or other relatives or non-relatives who look after them in a family setting). Only 14% of the children were from a religious

**Table 4: Distribution of socio-demographic, economic factors, and subjective well-being scale**

<i>Variables (N)</i>	<i>Percentages/Mean (sd.)</i>
<b>Age group (2059)</b>	
10-years old	49.2%
12-years old	50.8%
<b>Gender (2037)</b>	
Male	44.9%
Female	55.1%
<b>Place of living (2059)</b>	
Rural	25.5
Urban	74.5
<b>Care provider (2055)</b>	
Parents	98.0
Non-parents	2.0
<b>Family structure (2058)</b>	
Both birth parents	60.8
Extended family	26.9
Mother only	9.0
Other type	3.3
<b>Religious minority (2057)</b>	
Yes	14.4
No	85.6
<b>Ethnic minority (2037)</b>	
Yes	2.0
No	98.0
<b>Region (2059)</b>	
Barishal	34.6
Moulvibazar	33.1
Rajshahi	32.3
Household asset index, range 0-6 (1752)	3.0 (1.4)
Material deprivation index, range 0-8 (1883)	2.3 (1.6)
Worry family finance scale, range 0-3 (1873)	1.2 (0.9)
Affordability to eat scale, range 0-3 (2024)	2.6 (0.7)
Subjective well-being scale, range 0-100 (1938)	86.4 (17.1)

**Note:** ‘Under ‘family structure’ variable, ‘other type’ includes those children who are looked after by a non-biological family. In Bangladesh, some parents send their children to live with these families for education purpose and/or to escape economic hardship of their own family. In this article, ‘other type’ also includes a few children who reported to live only with their father, grandparents, siblings, and other relatives.

minority, and 2% from ethnic minority backgrounds. Roughly, an equal number (almost 33%) of children took part from three regions (Barishal, Rajshahi, and Moulvibazar) in Bangladesh where the

survey was conducted. Although the percentage of rural children who took part in the survey does not represent the number of rural children in the region or the country, other demographic profiles of children in the study are representative of children in the region.

The average score of 3.0 in household asset index in Table 4 indicates that out of the possible six asset items, on average each family had three items. The average score of 2.3 (which is lower than the mid-point of 4) in material deprivation index suggests that children did not report to have that low level of deprivation. The average score of 1.2 in ‘worry scale’ (lower than the mid-point of 2.5) indicates relatively lower level of worry about family finance among the children. Children reported their family to have a moderate affordability (average score of 2.6 which is slightly above the mid-point of 2.5 in the scale) to eat enough food each day. Finally, average value of 86.4 (well above the mid-point of 50) on well-being scale suggested that by and large the children were happy with their overall life.

**Table 5: Correlation matrix between economic factors and children’s subjective well-being scale**

	1	2	3	4	5
Household asset index (1)	1				
Material deprivation index (2)	-0.44**	1			
Worry family finance scale (3)	-0.13**	0.22**	1		
Affordability to eat scale (4)	0.17**	-0.27**	-0.16**	1	
Subjective well-being scale (5)	0.09**	-0.21**	-0.12**	0.18**	1

Table 5 shows the bivariate association between economic factors and children’s subjective well-being. All economic factors included in the analysis were found to be associated statistically significantly with subjective well-being. Higher level of subjective well-being is reported by children who scored higher on both household asset index and affordability to eat enough food scale. In this regard, higher worry about family finance and material deprivation were both linked significantly with lower subjective well-being of children.

*Influence of socio-demographic and economic factors on children’s subjective well-being:*

*Multivariate results*

In order to test the influence of socio-demographic and economic factors on children’s subjective well-being, multiple linear regression was carried out. Before running the regression model, diagnostic testing was performed. When multicollinearity was assessed by tolerance values (Table 6), it was observed that the tolerance values for all independent variables were far above the cut-off point of 0.10 (Cohen et al. 2003). This suggested that the data did not suffer from high multicollinearity.

As part of seeking answers to the key research questions in this article, two models were tested under multiple linear regression analysis. Model 1 included only the socio-demographic factors and the control variable (region) to explain variations in children’s well-being. Model 2 included both socio-demographic and economic factors and the control variable (region). Results in these two models were then compared to find out the additional variation explained by economic factors in model 2. Table 6 reports the results of the multiple linear regression analysis.

**Table 6: Multiple linear regression analysis on subjective well-being scale by socio-demographic and economic factors**

	Model 1			Model 2		
	Beta	p-value	Collinearity Statistics (Tolerance)	Beta	p-value	Collinearity Statistics (Tolerance)
<b>(a) Socio-demographic factors</b>						
<b>Year Group (Year 10 Ref.)</b>						
Year 12	-0.06	0.027	0.98	-0.04	0.146	0.97
<b>Gender (Male Ref.)</b>						
Female	0.07	0.009	0.93	0.08	0.005	0.92
<b>Living in rural area (No Ref.)</b>						
Yes (in rural area)	-0.22	0.000	0.28	-0.15	0.002	0.27
<b>Family main carer (No Ref.)</b>						
Yes (Family carer)	0.01	0.754	0.94	0.01	0.957	0.94
<b>Family type (Both birth parents Ref.)</b>						
Living only with mother	-0.06	0.038	0.94	-0.04	0.158	0.93
Extended family	-0.01	0.843	0.87	-0.01	0.841	0.86
Other type	-0.10	0.000	0.93	-0.09	0.000	0.93
<b>Religious majority (No Ref.)</b>						
Yes (majority)	0.03	0.254	0.92	0.02	0.497	0.90
<b>Ethnic majority (No Ref.)</b>						
Yes (majority)	0.01	0.954	0.99	-0.01	0.864	0.98
<b>Control variable: Region (Barishal Ref.)</b>						
Moulvibazar	0.11	0.029	0.26	0.06	0.222	0.25
Rajshahi	-0.08	0.008	0.72	-0.13	0.000	0.68
<b>(b) Economic factors</b>						
Household asset index				0.05	0.117	0.73
Material deprivation index				-0.13	0.000	0.73
Worry family finance scale				-0.07	0.010	0.92
Affordability to eat scale				0.13	0.000	0.89
<b>Adjusted R<sup>2</sup> = 0.032; F = 5.13; P = .000; N = 1393</b>			<b>Adjusted R<sup>2</sup> = 0.090; F = 10.15; P = .000; N = 1393</b>			

It is observed from model 1 (Table 6) that children's age, gender, rural-urban location, family structure, and region are all statistically significantly associated with children's subjective well-being. Being in an older age group, living in a rural area (as opposed to urban), living with lone mother, other type (as opposed to both birth parents), and living in Rajshahi (as opposed to Barishal) were found to be associated significantly with lower subjective well-being. These factors jointly explained around 3% of the total variation in subjective well-being.

Among four economic factors in model 2 (Table 6), three were found to be associated significantly with children's subjective well-being. Higher material deprivation and worry about family finance were associated with lower well-being among children. In this regard, higher affordability of family to buy enough food each day was found to be associated with greater level of subjective well-being. Results in model 2 further reveal that these economic factors changed the influence of some socio-demographic

factors on well-being. In model 2, effect of age, living with lone mother, and living in Moulvibazar were not statistically significant anymore. However, the influence of some other socio-demographic factors, such as gender and rurality, were still significant. The economic factors in model 2 might explain some of the variation that were originally accounted for by age, living with lone mother and Moulvibazar region in model 1. The adjusted R-square value of 0.090 in model 2 suggests that an additional 6% of the variation in subjective well-being is explained by three economic factors: material deprivation, worry about family finance, and family's affordability to buy enough food to eat each day.

When the relative effect of each factor is assessed by standardised regression coefficient values in model 2, rurality appeared to have the highest influence on children's subjective well-being in Bangladesh. With same coefficient value of 0.13, Rajshahi region, material deprivation, and affordability index had the second highest effect. The third and fourth highest effect were observed, respectively, from family structure (standardised beta = -0.09) and gender (standardised beta = 0.08).

## 6. Discussion

This article aimed to identify socio-demographic and economic factors, which are linked to children's subjective well-being in Bangladesh. For this purpose, a multiple linear regression model was developed containing the factors of age, gender, rural-urban living, main carer, family type, religious and ethnic minority status, household asset, material deprivation, worry about family finance, and affordability to buy enough food to eat daily. Region was also included in the analysis for controlling differences resulting from children living in three different areas.

### *Socio-demographic factors affecting children's subjective well-being in Bangladesh*

Although age was initially found to be a significant factor of well-being in model 1, contrary to a number of previous studies (Currie et al. 2012; Casas 2011; Rees, et al., 2010b; 2012, Rees et al. 2020), children's age was not a significant predictor of subjective well-being when the influence of economic factors such as household asset, material deprivation, worry about family finance, and affordability to buy enough food to eat daily are controlled. In some previous studies, older children reported to be less satisfied with the degree of freedom and autonomy (Rees, et al.2010b; 2012) which are linked to having lower level of life satisfaction (Ryff 1989; Deci and Ryan 2000). Although it was not fully clear why that might be the case in Bangladesh, one possible reason might be that the two age bands (10 and 12 years of age) used in this paper in Bangladesh were too narrow. Comparing children using wider age bands might be suitable for detecting age difference.

Previous studies (Rees et al. 2010a; Rees et al. 2012; Bradshaw et al. 2011) have also observed small but statistically significant associations between the structure of family in which the young people live and their level of well-being. There has been a substantial amount of research on links between family structure and outcomes for children, much of it focusing on the short- and long-term impacts of parental divorce and separation. The broad picture that has emerged from this research is that, consistent with our findings above, there is a small but significant difference in 'outcomes' for children who experience parental divorce or separation compared to those children who grow up with both birth parents (The Children's Society 2009; Mooney et al. 2009). On this point, the quality of relationships within various family structures might be an important factor as the children and young people living with stepparents and lone parent families reported to be less satisfied in their family relationships compared to those living in a family with both birth parents (Bradshaw et al. 2011).



In the present study, girls reported to have significantly higher level of well-being than boys. This finding is in contradiction to theories of subjective well-being and the well-established fact of gender inequalities. Need-fulfilment theory (Tay & Diener, 2011) suggests that subjective well-being is dependent on one's fulfilment of physical and psychological needs, which societal systems and conditions can hinder or promote according to livability theory (Veenhoven & Ehrhardt, 1995). Cassondra et al., (2018) argue that if these theories are correct one would expect women, on average, to report lower subjective well-being than men because of the state of gender inequality globally. In this regard, the social-role theory proposed by Eagly & Wood (1999) might be useful, especially in the context of Bangladesh society where gender-based division is very acute in everyday life. Gendered division of labour leads to gender-role beliefs which might influence the members from marginal group to be more acceptable to subjective well-being disparity. However, caution is needed here in applying these theories because these are based on adults' experiences. Moreover, Children's Worlds Report 2020 (Rees et al. 2020) found different patterns on this across the countries. Future studies must ask children for their opinion on this issue to gain further insights into gender disparity on subjective well-being in different cultural contexts.

Although the rural children in Bangladesh reported to have significantly lower well-being than urban fellows, the influence of rural-urban differential on subjective well-being appears to be very inconclusive in literature. Cummings et al, (2003) Knight and Gunatilaka (2010) found that rural residents have higher level of subjective well-being. However, other researchers such as Murray et al., (2004) and Millward and Spinney (2013) reported that urban residents have higher level of subjective well-being than their rural counterparts. Differential level of economic development in rural and urban areas is argued to be responsible for different degrees of happiness among residents in the two localities (Easterlin et al., 2011). In the context of Bangladesh, the rural-urban divide, in terms of access to services and facilities – road infrastructure, electric power availability, healthcare, transportation, mobile phone signal strength – are limited to children living in rural areas, and these items might be potential reasons for rural children to report a lower level of well-being in Bangladesh.

The present study shows that level of reported well-being children varies significantly by geographic region. More specifically, those living in the north-western part (Rajshahi) of the country were reported to have significantly lower well-being compared to their peers living in the southern part (Barishal). This kind of geographical divide has also been observed in other studies, such as McDoom et al., (2019) in the Philippines. The regional disparity in child well-being is often explained by focusing on differences of opportunity (McDoom et al., 2019). In this regard, access to basic services available to children at the regional level might be an explaining factor. Further research focusing on regional facilities for children need to be explored for better understanding of these differences.

#### *Economic factors affecting children's subjective well-being in Bangladesh*

This study identifies material deprivation as one of the major factors of children and young people's subjective well-being. Previous studies (e.g., Main and Bradshaw 2012) also found that the material deprivation plays a crucial role in explaining variation in children and young people's well-being. Some qualitative research (e.g., Ridge 2002) also suggests that economic factors – mainly poverty – have a major influence on children's well-being. Other studies (e.g., Bradshaw 2011; Rees et al. 2011) link family poverty to children's lower levels of well-being and educational participation and attainment, higher risks of social exclusion, worse housing and neighbourhood conditions, and poor physical and mental health. Harju and Thorod (2011) reported how lacking an ordinary consumption of goods and not having the 'right' clothes result in frustration, feelings of exclusion, and fears of being bullied. This material deprivation and anxiety/strain account for deteriorating well-being (Fryer 1995).

The present research provides evidence that there is a statistically significant association between worry children have for their family finance and their subjective well-being. More specifically, those who reported to have higher amount of worry were found to have lower level of subjective well-being. Although research on influence of money worries on well-being is limited among children, there has been a growing interest among researchers who believe that family financial hardship affects subjective well-being of both adults and children. Ayre (2016) has found that poverty and other financial difficulties are associated with greater risks of mental ill-health in children and young people. Recent research among Finish children by Lindberg et. al, (2020) also found an association between subjective well-being and worries about money and family financial situation.

In order to capture the effect of a multidimensional aspect of poverty that impacts children differently than adults living in the same household (Main and Bradshaw, 2012), children were asked about their experience of food poverty. The present study indicates that children reporting their families to have higher abilities to buy enough food to eat each day were found to have higher level of well-being. This link is important as food poverty has negative health and economic outcomes, as well as social and psychological impacts (NHS Health Scotland, 2018).

## **7. Conclusions**

Considering children as active agents for formulating evidence-based policies, this research adopted a child-centric approach and gathered data on subjective well-being and a number of socio-demographic and economic characteristics of children. Out of eight socio-demographic factors, four (gender, family structure, rural-urban locality, and geographic region) were found to be significantly associated with children's subjective well-being in Bangladesh. On the other hand, out of four economic factors, three (material deprivation, family finance worries, and affordability to buy enough food) were significantly associated with children's subjective well-being. Moreover, out of these seven significant factors, rural-urban locality appeared to have the highest effect on children's subjective well-being, followed jointly by material deprivation, affordability to buy enough food, and geographical region. These findings contribute to our knowledge on children's subjective well-being from both a methodological and policy development viewpoint.

### *Methodological significance*

As described in the beginning of this paper, research on children's well-being – especially research asking children directly to evaluate their own life – is very new in Bangladesh. This international survey on children's subjective well-being undertaken in collaboration with Children's Worlds is the first large-scale comparative survey among children in Bangladesh. High reliability of the subjective well-being scale (indicated by Cronbach's Alpha value of 0.88, which is much higher than the acceptable threshold value of 0.70) among children in Bangladesh provides external validity of the scale in the context of research in a developing country. As this scale has been proven to be scientifically robust, its methodological contribution is crucial for child well-being scales in cross-cultural research and future monitoring/evaluation of children's subjective well-being in Bangladesh.

### *Policy significance*

Although further analysis is required before developing any concrete policies on children's subjective well-being from this research, the findings of this study can still be useful. In this regard, factors such as gender, rural-urban location, family structure, material deprivation, financial worries, and food vulnerability can play crucial roles in shaping child well-being policy debates in Bangladesh. Lower

subjective well-being was associated with boys, those living in rural areas, those not living with birth parents. Those who reported higher material deprivation, greater worry about family finance, and higher vulnerability in food security also had lower subjective well-being. Any future policy initiative in improving children's well-being in Bangladesh must give priority to those children who fall under those categories.

#### *Limitations and direction for future studies*

This study has some limitations that need to be acknowledged. First, it does not provide evidence on causal links between socio-demographic and economic factors and subjective well-being. A longitudinal study needs to be undertaken in the future to address this issue. Although it takes time to conduct a longitudinal study, changes in different aspects of children's lives, such as changes in family structure over time and their impact on children's subjective well-being, can be robustly analysed by adopting this type of research design. Until we have longitudinal data, the causal linkage between socio-demographic and economic factors and children's subjective well-being cannot be established firmly.

Second, this study focuses only on general or overall subjective well-being. Along with overall well-being, researchers (Rees et al. 2010a; Huebner 1991a, Cummins and Lau 2005) emphasise the importance of studying various domains of well-being – family, friends, school, satisfaction with the local area – for a better understanding of child well-being. Therefore, future studies need to look at how each domain of well-being is associated with overall subjective well-being and how children's satisfaction on these domains is influenced by the socio-demographic and economic factors.

Third, children were sampled only from mainstream schools. In Bangladesh, different types of schools exist, including faith-based and English medium schools. Therefore, this study could not capture what effects school type might have on subjective well-being. Future studies need to consider this aspect and include children from different types of school.

Fourth, in this research, children were the main unit of analysis and data were collected mainly from them. Although child level data are useful to examine variations in children's subjective well-being, they do not tell us about the effect of contextual variables, such as school level characteristics and facilities available at geographical regions, that are found to be important for child well-being research.

Fifth, since this study was conducted among children in mainstream schools, the sample did not cover some other groups of children, such as children with disabilities, learning difficulties, street children and those who drop out and/or never attended school. Future studies need to consider those groups as well for a more comprehensive picture on factors associated with children's subjective well-being in Bangladesh.

Sixth, the study could not examine the effect of some possible interaction effects between some socio-demographic and economic factors. For example, the effect of material deprivation or financial worries on children's well-being might vary significantly depending on family type or rural-urban location. These complex aspects need to be looked at more closely in the next phase as these could provide further insights into variations in child well-being and policy intervention.

Seventh, since the study was conducted among children studying in mainstream schools in three cities, which were not selected randomly, the findings cannot be generalised to other cities and the wider population of children in Bangladesh. The study is not representative of all children.

Eighth, since data are hierarchically structured (children are located in schools which are again located in cities), there is potential for a certain degree of correlation between children studying in schools. This might affect the statistical significance of certain factors. To overcome this, multilevel modelling needs to be considered in the next phase of this work. Since regression analysis in this paper did not consider the clustering of students by school, standard errors were not presented by school. This is an important point which also needs to be considered when the influence of these factors is assessed by running multilevel modelling in the next phase.

Finally, the regression model containing both socio-demographic and economic factors was able to explain around 9% of variation, which is very typical when compared to other studies in Europe that used similar types of predictors in modelling (for more information, see, Rees et al. 2010, Rees et al. 2012, Bradshaw et al., 2011, and Bradshaw et al. 2010). However, there is potential for improving the explanatory power of the model by including some other factors such as children's experience of being bullied, disabilities, participation in sports/extra curricula activities etc. along with rural-urban and regional disparity. These aspects must be considered in the next phase of this work.

**Acknowledgements:** I would like to thank all children for their contribution to this research and the teachers for providing access to schools. I am thankful to Dr M. Ibrahim Khalil and Professor Dr Bijoy Krishna Banik for their support in conducting fieldwork in Bangladesh. I also thank the anonymous reviewers for helpful comments and suggestions. I am grateful to Dr Dagmar Kutsar (Special Collection Editor) and Dr Heili Pals (Co-Editor, *Population Review*) for their important feedback in different stages of revision. Any errors that remain are my own. An early version of this article was presented in the 7th ISCI conference '*Children of the Worlds: The Touch of Change. Research, Policy, and Practices,*' held on 27-29 August 2019 in Tartu, Estonia. Jacobs Foundation and Manchester Metropolitan University jointly funded this research. Finally, I express my gratitude to the Core Research Group of Children's Worlds for their support and encouragement to conduct this survey in Bangladesh.

## References

- Ayre, D. (2016). *Poor Mental Health - The links between child poverty and mental health problems*. London: The Children's Society.
- Begum, S., and Sen, B. (2009). "Maternal Health, Child Well-Being and Chronic Poverty: Does Women's Agency Matter?" *The Bangladesh Development Studies* 32 (4): 69-93.
- Biswas-Diener, R., Kashdan, T. B., & King, L. A. (2009). "Two traditions of happiness research, not two distinct types of happiness." *The Journal of Positive Psychology*, 4(3): 208–211.
- Bradshaw, J., Keung, A., Rees, G., & Goswami, H. (2011). "Children's subjective well-being: International comparative perspectives." *Children and Youth Services Review* 33(4): 548–556.
- Bradshaw, J., Rees, G., Keung, A., & Goswami, H. (2010). "The subjective well-being of children," (pp. 181–204) in *Child well-being: Understanding children's lives*, edited by C. McAuley & W. Rose. London: Jessica Kingsley.
- Cantril, H. (1965). *The pattern of human concern*. New Jersey: Rutgers University Press.
- Casas, F. (2011). "The well-being of young people and their parents amid tough times: Views from Spain." *The American Journal of Orthopsychiatry* 81: 461–467
- Casas, F., Bello, A., González, M., and Alique, M. (2013). "Children's Subjective Well-Being Measured Using a Composite Index: What Impacts Spanish First-Year Secondary Education Students' Subjective Well-Being?" *Child Indicators Research* 6: 433–460
- Casas, F., & Rees, G. (2015). "Measures of Children's Subjective Well-Being: Analysis of the Potential for Cross-National Comparisons." *Child Indicators Research* 8(1): 49–69.
- Casas, F. (2017). "Analysing the Comparability of 3 Multi-Item Subjective Well-Being Psychometric Scales Among 15 Countries Using Samples of 10 and 12-Year-Olds." *Child Indicators Research* 10(2): 297-330.
- Cassandra Batz-Barbarich, C., Tay, L., Kuykendall, L., and Cheung, H. K. (2018). "A Meta-Analysis of Gender Differences in Subjective Well-Being: Estimating Effect Sizes and Associations With Gender Inequality." *Psychological Science* 29(9): 1491– 1503
- Child Well-Being Survey. (2016). *Divisional Reports*. Bangladesh Bureau of Statistics and UNICEF Bangladesh 2016, Dhaka, Bangladesh.
- Children's Worlds (2020). *International Survey of Children's Well-being*. <http://www.isciweb.org/>
- Cohen, J., Cohen, P., West, S. G., & Aiken, L. S. (2003). *Applied multiple regression/correlation analysis for behavioral sciences*. Mahwah: Lawrence Erlbaum.
- Cummins R. A., Eckersley, R., Pallantj, Van Vuht J., Misajon, R. (2003). "Developing a National Index of Subjective Well-being: The Australian Unity Wellbeing Index." *Social Indicators Research* 64: 159–190.
- Cummins, R., & Lau, A. (2005). *Personal wellbeing index–school children* (3rd ed.). Melbourne: School of Psychology, Deakin University.

Currie, C., Zanotti, C., Morgan, A., Currie, D., de Looze, M., Roberts, C., Samdal, O., Smith, O. R. F., & Barnekow, V. (2012). *Social determinants of health and well-being among young people*. Health behaviour in school-aged children (HBSC) study: International report from the 2009/2010 survey (health policy for children and adolescents, No. 6). Copenhagen: WHO Regional Office for Europe.

Deci, E. L., & Ryan, R. M. (2000). "The 'what' and 'why' of goal pursuits: Human needs and the selfdetermination of behavior." *Psychological Inquiry* 11: 227–268.

Diener E, Oishi S & Lucas, R (2015). "National accounts of subjective well-being." *American Psychologist* 70: 234–242.

Emerson, E., Savage, A., and Llewellyn, G. (2016). *The Wellbeing of Children with Developmental Delay in Bangladesh, Bhutan, Laos, Nepal, Pakistan and Vietnam. An Analysis of Data from UNICEF's Multiple Indicator Cluster Surveys*. University of Sydney: Centre for Disability Research and Policy.

Eagly, A. H., & Wood, W. (1999). "The origins of sex differences in human behavior: Evolved dispositions versus social roles." *American Psychologist* 54: 408–423.

Easterlin, R. A., Angelescu, L., and Zweigj, S. (2011). "The Impact of Modern Economic Growth on Urban–Rural Differences in Subjective Well-Being." *World Development* 39(12): 2187–2198

Fryer, D. M. (1995). "Benefit agency? Labour market disadvantage, deprivation and mental health." *The Psychologist* 265–272

Goswami, H. (2004). "Everyday Forms of Discrimination Experienced by the Minority: An Exploratory Study in a Village in Bangladesh." *Journal of International Development and Cooperation* 10 (2): 121–150.

Goswami, H. (2009). *Test-retest reliability of well-being measures: Evidence from the national survey of young people's well-being 2008*. London: The Children's Society.

Goswami, H., Fox, C., and Pollock, G. (2016). "The current evidence base and future needs in improving children's well-being across Europe: is there a case for a comparative longitudinal survey?" *Child Indicators Research* 9(2): 371 – 388.

Harju, A., & Thorod, A. B. (2011). "Child poverty in a Scandinavian welfare context—from children's point of view." *Child Indicators Research* 4: 283–299.

Huebner, E. S. (1991a). "Initial development of the students' life satisfaction scale." *School Psychology International* 12: 231–240.

Huebner, E. S. (1991b). "Correlates of life satisfaction in children." *School Psychology Quarterly* 6: 103–111.

Knight, J. Gunatilaka, R. (2010). "The Rural-Urban Divide in China: Income but not Happiness?" *Journal of Development Studies* 46 (3): 506–534.

- Lindberg, M., Nygård, M., Nyqvist, F., and Hakovirta, M. (2020). "Financial Stress and Subjective Wellbeing among Children -Evidence from Finland." *Child Indicators Research*  
<https://doi.org/10.1007/s12187-020-09779-9>
- Main, G., & Bradshaw, J. (2012). "A child material deprivation index." *Child Indicators Research* 5(3): 503–521.
- Main, L., and Pople, L., (2011). *Missing out: A child centred analysis of material deprivation and subjective well-being Contents*. London: The Children's Society.
- Malapit, H.J., Sraboni, E., Quisumbing, A. R., and Ahmed, A. U. (2015). *Gender empowerment gaps in agriculture and children's well-being in Bangladesh*. Discussion Paper 01470. Washington: International Food Policy Institute.
- McDoom, M. S., Reyes, C., Mina, C., and Asis, R. (2019). Inequality between whom? Patterns, trends, and implications of horizontal inequality in the Philippines. *Social Indicators Research*. 145(3), pp 923–942|
- Millward, H., Spinney, J. (2013). "Urban-Rural Variation in Satisfaction with Life: Demo-graphic, Health, and Geographic Predictors in Halifax, Canada." *Applied Research in Quality of Life* 8: 279–297.
- Mooney, A., Oliver, C., & Smith, M. (2009). *Impact of family breakdown on children's well-being*. London: DCSF.
- Murray, G., Judd, F., Jackson, H., Fra-Ser, C., Komiti, A., Hodgins, G., Pat-Tison, P., Humphreys, J., and Robins, G. (2004). "Rurality and Mental Health: The Role of Accessibility." *Australian and New Zealand Journal of Psychiatry* 38: 629–634.
- NHS Health Scotland (2018). *Health Inequalities: Briefing 12 Food Poverty*. Scotland: NHS Health Scotland.
- OECD (2007). *Society at a Glance: OECD Social Indicators*, 2006 edition, OECD, Paris.
- Proctor, C., Tweed, R., & Morris, D. (2014). "The naturally emerging structure of well-being among young adults: "Big two" or other framework?" *Journal of Happiness Studies* 16(1): 257–275.
- Prout, A., & James, A. (1997). *Constructing and reconstructing childhood: Contemporary issues in the sociological study of childhood*. London: UK Falmer Press.
- Rees, G., Bradshaw, J., Goswami, H., & Keung, A. (2010a). *Understanding children's well-being: A national survey of young people's well-being*. London: The Children's Society
- Rees, G., Goswami, H., & Bradshaw, J. (2010b). *Developing an index of children's subjective well-being in England*. London: The Children's Society.
- Rees, G., Goswami, H., Pople, L., Bradshaw, J., Keung, A., & Main, G. (2012). *The good childhood report 2012: A review of our children's well-being*. London: The Children's Society.
- Rees G, Pople L & Goswami H (2011) *Links between Family Economic Factors and Children's Subjective Well-being: Initial findings from Wave 2 and Wave 3 quarterly surveys*. London: The Children's Society.

Rees, G., Savahl, S., Lee, B. J., & Casas, F. (eds.), (2020). *Children's views on their lives and well-being in 35 countries: A report on the Children's Worlds project, 2016-19*. Jerusalem, Israel: Children's Worlds Project (ISCWeB). [[Children's Worlds Report, 2015 \(iscweb.org\)](#), assessed April 23, 2021]

Ridge, T. (2002). *Childhood poverty and social exclusion*. Bristol: Policy Press.

Ryan, R. M., & Deci, E. L. (2001). "On happiness and human potentials: A review of research on hedonic and Eudaimonic well-being." *Annual Review of Psychology* 52: 141–166.

Ryff, C.D., & Keyes, C.L.M. (1995). "The Structure of Psychological Well-Being Revisited." *Journal of Personality and Social Psychology* 69 (4):719–27.

Ryff, C. (1989). "Happiness is everything, or is it? Explorations on the meaning of psychological well-being." *Journal of Personality and Social Psychology* 57: 1069–1081.

Save the Children (2018). *Global Childhood Report*. Connecticut: Save the Children USA.

Stock, W., Okun, M., Stock, S., Haring, M., & Witter, R. A. (1982). *Reporting reliability: A case study of life satisfaction research*. Paper presented at the 90th annual convention of the American Psychological Association, Washington, DC.

Tay, L., & Diener, E. (2011). "Needs and subjective well-being around the world." *Journal of Personality and Social Psychology* 101: 354–365.

The Children's Society. (2009). *Family: A summary of selected research evidence* (Paper prepared for The Good Childhood Inquiry). London: The Children's Society.

Veenhoven, R., & Ehrhardt, J. (1995). "The cross-national pattern of happiness: Test of predictions implied in three theories of happiness." *Social Indicators Research* 34: 33–68.

World Population Review (2020). *Bangladesh Population 2020*. [<http://worldpopulationreview.com/countries/bangladesh-population/>, assessed January 31, 2020].

Young Lives (2020). A longitudinal study into children and youth in the world. [<https://www.younglives.org.uk/>, assessed January 31, 2020]