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Physical and Psychological Implications of Risky Child Labor: A Study in Sylhet City, Bangladesh

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Abstract

In Bangladesh, children are accustomed to working in industrial and manufacturing plants, small scale factories, metal works, construction, as well as in many informal sector activities. Based on a survey conducted in Sylhet city, this study found that child workers are suffering from different physical and psychological problems and that more than half of them receive their medical assistance from local health care providers who have no recognized qualifications. The study maintains that working from an early age impedes the children's physical growth and intellectual and psychological development, which then also has negative effects on their long-term health and earning potential.

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I. Introduction

Children are engaged in diverse forms of economic activities in the developing countries. In Bangladesh, of the 22.8 million work places that have been surveyed in 1995-96, 21.2 percent reported to have had employed children between the ages of 5-14 years (Khair, 2005). The corresponding percentage of employed children within all children of that age range was 19.1 percent (with 16.8 percent and 22.5 percent, respectively for the urban and rural areas). The number of working children in the same year was estimated at around 6.6 million.

The issue of working children has been addressed by the government through various plans, policies and laws. However, there are still many risky work places which imply a psychological, physical, and economic misuse and abuse of children in Bangladesh. The propensity of the hazards in the informal sector is by no means less than that in the formal sector where the physical and psychological well-being of children had been routinely compromised.

In Bangladesh, where more than 30 percent of the people live in extreme poverty, many families are unable to fulfill the basic needs which compel them to engage their children in risky jobs at an early age. Children as well as their parents have no interest in education as they think that education is not a real life necessity. Furthermore, poor schooling is often attributed to child labor in Bangladesh, especially as there is a severe deficiency in proper schooling facilities, particularly in rural areas (Khair, 2005).

This study has been undertaken mainly to examine the physical and mental health implications of risky child labor in Sylhet city. The study builds on previous work reviewed above and provides new information for Bangladesh. The primary objective of the study is to examine to what extent risky child labor causes physical and mental discomfort. On the basis of this inquiry and analysis the study attempts to (i) generate an overall idea about the extent and different forms of risky child labor in Bangladesh and (ii) identify the key issues of physical and mental immaturity.

The study is based on primary data, obtained by personal interview, whereby the purposive random sampling technique was employed for selecting child laborers in risky jobs from the large child labor market areas of Sylhet city (Ambarkhana, Akhalia, Mirjajanggal, Taltola, Kajolshah, Shibgang, Kinbridge, and the Kadamtoli railway station). Building on the existing child labor literature, we look at the type of child workers, their age, payments, education, health problems, and the actions taken by the child laborers to tackle their health problems.

This paper is structured as follows. The next section provides a literature review. The results of the survey are provided in the third section, followed by a discussion in the fourth section, before the last section provides some conclusions and recommendations.

II. Literature Review

As stated in Emerson and Knabb (2007), there has recently been renewed interest in this topic among economists, which has led to a series of theoretical studies with the aim of better understanding the causes and consequences of child labor and to help guide appropriate policy responses. There are now close to 100 publications that address child labor issues in Bangladesh. About 30 of them are multi-country data surveys of international or national agencies, like the various surveys of the International Labor Organization and the annual surveys of the United States Department of Labor's findings on the worst forms of child labor.¹

At least six publications focus on South Asia, addressing (i) the linkage between child labor and trade (Sharma, 2007), (ii) child labor and child abuse (Bhattacharya, 2007), (iii) domestic and international initiatives to reduce child labor (Castle, Chaudhri and Nyland, 2002), and (iv) the linkages between child labor and educational issues (Kabeer, 2001; Kabeer, Nambissan and Subrahmanian, 2002; and Ray, 2001). The most relevant for our study is that of Kabeer (2001), who explores the geographical, economic and social dimensions of the twin problems of child labor and poor educational outcomes in India and Bangladesh. She comes to the conclusion that poverty is not necessarily an insurmountable barrier to accessing educational services and that there is a need to draw out the lessons from the efforts of the few educational planners who have (i) understood the patterns of disadvantage caused by caste, gender, ethnicity and livelihood insecurity and (ii) started delivering educational services geared to the needs of the marginalized.

Of the about 60 publications that focus exclusively on child labor in Bangladesh, about 20 have been published before 2000 and about 40 have been published since 2000. Among the 40 more recent publications, seven address legal issues (Ali, 2004; Habib, 2008; Hasan, 2008; Murshed, 2001; Ruwanpura and Roncolato, 2006; Siddiqua, 2004; and Siddiqui, 2001), coming to the conclusion that the main problem is not related to the shortcomings of labor laws in Bangladesh but their enforcement.

Eight studies focus on child labor and educational issues (Amin, Quayes and Rives, 2006a, Ehsan, 2001, Khanam, 2008; Khanam and Ross, 2005; Nath and Hadi, 2000; Ravallion and Wodon, 2000; Shafiq, 2007a; and Shafiq, 2007b). The overall conclusion that can be drawn from these studies is that child labor is a deterrent to schooling as well as that the poor education system encourages children to work.

The remaining recent child labor studies address a variety of socio-economic issues, trends and policy options. The following paragraphs provide an overview of the most important studies that have been published since 2006 in alphabetical order.

Ali (2006) examines the nature and extent of child labor, and contemplates the factors influencing participation in child labor, based on a comparison between the National Child Labour Survey 1995-96 and 2002-03. He observes that there have been significant changes in some important aspects of child population (e.g., gender differentials,

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¹ Available at: http://www.dol.gov/ilab/media/reports/iclp/main.htm

occupational choice, rural urban differentials, schooling options, etc.) in the country and their participation in the workforce. He also observes that higher proportion of child labor comes from land poor and the poorest households and concludes that household's education and occupational choice also matter for child labor.

Amin, Quayes and Rives (2006b) show that for market work, fathers and children may be substitutes or complements in supplying labor, whereas mothers and children are complements for all groups of children. They also find almost no connections between parents' market work and daughters' household work status.

Emerson and Knabb (2007) show that the lack of access to capital markets gives rise to a Pareto-inferior outcome that is characterized by the presence of child labor and a low level of human capital. Based on a child labor model in a dynamic, general equilibrium setting, they show that a pay-as-you-go social security program can move the economy out of this inferior equilibrium by allowing families to redirect household income. They also show that the effectiveness of the intergenerational transfer program relies critically on its ability to change the behavior of households through their expectations.

Kalam (2007) has looked at a variety of child labor issues based on a survey in the Dhaka City Corporation, which provides findings on important differentials of the child labor, like, for example, the causes of child labor. He concludes that child labor cannot be completely eliminated unless Bangladesh's economy is developed sufficiently to create job opportunities for the vast majority of its adult work force and that poverty alleviation is a pre-condition to elimination or at least minimization of child labor. Given the chronic economic issue of child labor in Bangladesh, it cannot be stopped simply by a piece of legislation. Instead, it can be eliminated only by adoption of suitable long term economic measures that eliminate the need for child labor.

Khanam (2006) found that the trend and incidence of child labor has been increasing in Bangladesh even though child labor is on a declining trend in other South Asian countries, which she explains with the irrelevance or inadequacy of existing child labor laws in Bangladesh. This study suggests that a combination of policies would be appropriate for reducing child labor, which include employment generation schemes that lead to economic prosperity for the household, compulsory schooling for children, school enrolment subsidy, improving school infrastructure, the quality of education, flexibility in school schedules and adult literacy campaigns that increase community or social awareness, especially of the adult female.

Mamun, Mondal, Islam and Kabir (2008) aim at investigating the factors that influence the health complications of the child laborers by collecting primary data from some selected areas of Rangpur district, Bangladesh. Their logistic regression analysis shows that working hour per day, place of work and age at the time of entrance to work appeared to be the most significant factors in determining the likelihood of facing health complications. They find that (i) an increase in working hours increased the likelihood of health complications, (ii) children working in more hazardous sectors face more health problems than those working in comparatively less hazardous sectors, and (iii) children

that enter into work at an early age face more health complications than those entering work at an older age.

Based on fieldwork that was carried out during July-September 2004, Sumon (2007) provides an in-depth picture of child labor in the automobile sector. He found that a significant number of children work in the automobile sector and that almost all children came from the poorest families in rural areas. He also found that children worked for very low salaries and were sometimes only given food in return for their labor. They were furthermore exposed to all types of child exploitation and various hazards. Based on the analysis of secondary sources, the study also suggests that (i) there has been an alarming increase in hazardous child labor in recent years, (ii) coercive measures to stop child labor would result in forcing the poorest families to engage their children in underground activities such as prostitution, terrorism, robbery and hijacking; and (iii) that integrated policy actions can quickly improve the working environment of child laborers.

Tariquzzaman and Hossain (2009) come to the conclusion that poor boys have been left behind by public policy efforts to expand school access in Bangladesh – the same policies which have succeeded in attracting girls to school. They draw on original research to explore the failure to tackle the exclusion of poor boys from school, arguing that paid work has become more attractive in a context in which education is of poor quality and there are no social sanctions against child labor. They also states that poor boys may not necessarily inherit deeper poverty as long as there is steady economic growth, but that they are likely to inherit a position at the lower end of the social scale in the absence of state or social sanctions against child labor.

Tariquzzaman and Kaiser (2008) aimed at analyzing how and what factors have contributed in changing the patterns and perspectives of child labor over the last 15 years. Based on an in-depth research of 120 child laborers and 40 employers of child labor in a Dhaka slum and a rural community in the poor northern district of Nilphamari they articulate the employers' perspectives on child labor, with particular emphasis on understanding what factors have caused them to change their own practices over time. In this regard, they address four main issues: (i) why employers depend on child labor; (ii) how the types and forms of children's employment are believed to have changed over the last 15 years; (iii) factors that employers believe have contributed to these changes; and (iv) how employers are adapting to the changing situation with respect to the employment of children. Based on their findings,² they come to the conclusion that the increased

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² They found that certain tasks were deemed to be reserved for children since adults were unwilling to execute those tasks. These tasks effectively 'institutionalize' children's work, usually within informal settings. The physical structure of the children was found to be vital. In many cases the adults withdrew themselves from many tasks performed by children on grounds of status, particularly if they were seen as dirty tasks. Employers were also found less willing to pay full-time adult employee wages for tasks, which are intermittent, unskilled or low priority. They also found that three factors critical influence how and whether employers recruit children: (i) the increase in work opportunities; (ii) the related matter of change in family earnings; and (iii) education policy. Improvements in the communication and transportation systems have improved the opportunity for child work both in the rural and urban areas. However, many employers are now facing problems in recruiting children because of the development of family business and also the massive expansion of primary and more recently secondary education.

employment opportunity for children, the choices of sectors including better-paid and more attractive new sectors, as well as the flexibility and security of home-based work have led employers to adjust their behavior in various ways (including increased remuneration and other benefits) in an attempt to retain children workers.

There are also a few studies that are not specifically on Bangladesh but are relevant for this paper as they address physical and psychological implications of child labor. One of the first of such studies has been Grant (1993). He showed that risky child labor creates resistance to the psychosocial and physical development of the working children because working in workshops, constructions or transport sector creates a burden on the children's physical and mental health which impedes their future lives. Guendelman and Samuels (2002) showed that disabled or working children in the poor families are not getting effective medical care which puts them in a dangerous position. Guendelman, Wyn and Tsai (2002) examined the effects of health insurance on access and utilization of health care among children of working poor families. Based on a survey undertaken in California, they found that thirty-two percent of children of working poor families were uninsured and were (i) far more likely than insured children to face access barriers and (ii) less likely to see a physician.

III. Results

Eighty respondents were received from ten different places in the Sylhet metropolitan area, with the types of work among the 80 respondents as shown in Table 1. Given that we focused on children with full time jobs in risky environments, there were based on the children's replies no girls (which typically have different jobs in Bangladesh) and no children below age ten claiming to fit into the selection criteria. However, this should not be interpreted as that there are no girls and younger boys working in risky jobs.

Table 1: Types of Work Performed by the Child Laborers in the Sample

Type of labors	Sample size (in number)	Percentage
Rickshaw puller	17	21.25
Van puller	11	13.75
Rickshaw pusher	13	16.25
Construction labor	15	18.75
Welding labor	24	30.0
Total	80	100

Tables 2 to 4 show the percentage distribution of respondents according to their age, wage and education levels. As Table 2 shows, the majority of respondents (38.75 percent) belonged to the age group from 12 to 14 years, while the smallest age group (12.50 percent) constituted the 10 to 12 years old. The 14-16 years old represented 21.25 percent, while the 16-18 years old represented 27.5 percent.

Table 2: Distribution of Child Laborers based on Age

Age (years)	Number of laborers	Percentage
10-12	10	12.5
12-14	31	38.75
14-16	17	21.25
16-18	22	27.5
Total	80	100

Table 3 shows that the majority (59 percent) of the surveyed child laborers got daily payments within the range of taka 40-60 (which was about US\$0.60-0.95 at the time the survey was undertaken). Only 7.5 percent of the respondents received a daily remuneration of taka 80-100, 10 percent received wages between 60-80 taka, while close to one quarter received wages between 20-40 taka.

Table 3: Distribution of Child Laborers based on Wages

Daily income (taka)	Number of laborers	Percentage
20-40	19	23.75
40-60	47	58.75
60-80	8	10.0
80-100	6	7.50
Total	80	100

With regards to educational qualification reached at the time of joining employment, Table 4 shows that most of the child laborers (70 percent) claimed of having completed their primary schooling, though only 5 percent claimed of having passed the secondary level of education. Among the remaining 25 percent, about two-thirds were totally illiterate and about one third could only sign their name.

Table 4: Distribution of Child Laborers based on Education

Educational status	Number of	Percentage
	laborers	
Illiterate	13	16.25
Can sign at best	7	8.75
Primary level	56	70.0
Secondary level	4	5.0
Total	80	100

Table 5 represents the association between children's age with the type of labor engaged in. The majority of the two youngest age groups (those between the ages of 10-12 and between the ages of 12-14) were engaged in the welding sector, which might be considered to be logical as the welding sector needs to least physical strength. However, 17 percent of the 10-12 year old child laborers were working in the construction sector,

which is completely unsuitable for their physical development. Furthermore, another 17 percent of the 10-12 year old and 27 percent of the 12-14 year old were engaged in rickshaw pulling, which again is not suitable for these ages. Among the 14-16 year old child laborers, one quarter were working in the welding sector and another quarter were working as rickshaw pushers. The other half of the 14-16 year old were engaged as rickshaw pullers (18.75 percent), in the construction sector (18.75 percent) and as van pullers (12.5 percent). The majority (35 percent) of the 16-18 year old were working in the construction sector, followed by 25 percent working in the welding sector. One fifth of the 16-18 year old children were rickshaw pulling, and the remaining one fifth of the 16-18 year old were working as van pullers and rickshaw pushers. In conclusion, while there is some relationship between type of work and physical development, there are far too many children engaged in physical labor that is completely inappropriate for their age.

Table 5: Distribution of Child Laborers based on Age and Type of Labor

Type of		Total (by				
Labor	10-12 years	12-14 years	14-16 years	16-18 years	type of labor)	
Rickshaw	3	7	3	4		
puller	16.7 percent of	26.9 percent of	18.8 percent of	20.0 percent of	17	
F	10-12 year old	12-14 year old	14-16 year old	16-18 year old		
	2	5	2	2		
Van puller	11.1 percent of	19.2 percent of	12.5 percent of	10.0 percent of	11	
	10-12 year old	12-14 year old	14-16 year old	16-18 year old		
Rickshaw	4	3	4	2		
pushing	20.0 percent of	15.0 percent of	20.0 percent of	10.0 percent of	13	
Pg	10-12 year old	12-14 year old	14-16 year old	16-18 year old		
Construction	3	2	3	7		
laborer	15.0 percent of	10.0 percent of	15.0 percent of	35.0 percent of	15	
	10-12 year old	12-14 year old	14-16 year old	16-18 year old		
Welding laborer	6	9	4	5		
	30.0 percent of	45.0 percent of	20.0 percent of	25.0 percent of	24	
	10-12 year old	12-14 year old	14-16 year old	16-18 year old		
Total	18	26	16	20		
(percent in age group)	(100 percent of 10-12 year old)	(100 percent of 12-14 year old)	(100 percent of 14-16 year old)	(100 percent of 16-18 year old)	80	

Table 6 shows the distribution of child laborers based on age and working hours. The survey found that the majority (28 percent) of the 10-12 year old children were bound to

work daily between 10-12 hours, that 11 percent worked 12-14 hours, and a staggering 22 percent worked 14-16 hours. Nearly half (43 percent) of the 12-14 year old child laborers work for 10-12 hours, and nearly one quarter (23 percent) worked for 12-14 hours. The working hours are the longest for the 12-14 year old children, among which 37.5 percent work for 12-14 hours and another 25 percent work for 14-16 hours daily. The working hours of the oldest age group (16-18 years) is similar to that of the youngest age group of the survey, with the majority (30 percent) of them working 10-12 hours, followed by 25 percent working 14-16 hours daily. Looking at the last column of Table 6, we can see that only 10 percent of all surveyed child laborers work for 6-8 hours. Indeed, more than 70 percent of the 80 children covered in the survey worked for 10-16 hours a day. This obviously has considerable negative implications on these children's physical and psychological development.

Table 6: Distribution of Child Laborers based on Age and Working Hours

Working		Total (percent				
Hours (daily) 10-12 years		12-14 years 14-16 years		16-18 years	by working hours)	
	3	2	1	2	8 (10	
6-8	16.7 percent of 10-12 year old	11.1 percent of 12-14 year old	5.6 percent of 14-16 year old	11.1 percent of 16-18 year old	percent)	
	4	4	2	4	14 (17.5	
8-10	22.2 percent of	22.2 percent of	11.1 percent of	22.2 percent of	percent)	
	10-12 year old	12-14 year old	14-16 year old	16-18 year old		
	5	11	3	6	25 (31.25 percent)	
10-12	27.8 percent of	61.1 percent of	16.7 percent of	33.3 percent of		
	10-12 year old	12-14 year old	14-16 year old	16-18 year old	r · · · · ·	
	2	6	6	3	15 (21 25	
12-14	11.1 percent of	33.3 percent of	33.3 percent of	16.7 percent of	17 (21.25	
	10-12 year old	12-14 year old	14-16 year old	16-18 year old	percent)	
	4	3	4	5	16 (20	
14-16	22.2 percent of	16.7 percent of	22.2 percent of	27.8 percent of	percent)	
	10-12 year old	12-14 year old	14-16 year old	16-18 year old	percent	
Total	18	26	16	20		
(percent in age group)	(100 percent of 10-12 year old)	(100 percent of 12-14 year old)	(100 percent of 14-16 year old)	(100 percent of 16-18 year old)	80	

Table 7 shows the distribution of child laborers based on their health problems, which were classified into physical pain, breathing problems, skin diseases, eye sight problems and psychological immaturity. Among the 80 children covered in the survey, 90 percent

suffer from physical pain; 72.5 percent have breathing problems, and slightly more than 71 percent have eye sight problems. Nearly half (48.5 percent) have skin diseases, while 40 percent have been considered to be psychologically immature. Clearly, most of the surveyed child laborers suffered from multiple health problems. Looking at the last row and last column of Table 7 shows that on average, every child laborer suffered from 3.1 health problems. The highest number of health problems per child laborer (3.6) has been experienced by construction workers, followed by welding laborers (with 3.5 health problems per welding laborer). Rickshaw pullers were the least prone to health problems, though even they experienced an average of 2.2 health problem per rickshaw puller.

Table 7: Distribution of Child Laborers based on Health Problems

	Type of Laborer					
Type of Pain or Problem	Rickshaw pullers	Van pullers	Rickshaw pushers	Construction workers	Welding laborers	Total (problem-wise)
	(total of 17)	(total of 11)	(total of 13)	(total of 15)	(total of 24)	
DI . I .	12	11	12	13	24	72
Physical pain	70.6 percent of	100.0 percent of	92.3 percent of	86.7 percent of	100.0 percent of	90 percent among
	rickshaw pullers	van pullers	rickshaw pushers	construction workers	welding laborers	all 80 child laborers
Breathing	6	10	12	12	18	58
problem	35.3 percent of	90.9 percent of	92.3 percent of	80.0 percent of	75.0 percent of	73 percent among
	rickshaw pullers	van pullers	rickshaw pushers	construction workers	welding laborers	all 80 child laborers
gi. ii	3	2	5	8	21	39
Skin disease	17.6 percent of	18.2 percent of	38.5 percent of	53.3 percent of	87.5 percent of	49 percent among
	rickshaw pullers	van pullers	rickshaw pushers	construction workers	welding laborers	all 80 child laborers
Eye sight	11	8	9	12	8	48
problem	64.7 percent of	72.7 percent of	69.2 percent of	80.0 percent of	33.3 percent of	60 percent among
	rickshaw pullers	van pullers	rickshaw pushers	construction workers	welding laborers	all 80 child laborers
Psychological	5	3	2	9	13	32
problems	29.4 percent of	27.3 percent of	15.4 percent of	60.0 percent of	54.2 percent of	40 percent among
_	rickshaw pullers	van pullers	rickshaw pushers	construction workers	welding laborers	all 80 child laborers
Total number of health problems	37	34	40	54	84	249
Average health problems per child laborer	2.2	3.1	3.1	3.6	3.5	3.1

Table 7 also shows which type of health problem is related to which type of work. For example, 87.5 percent of the welding laborers have skin diseases, while 80 percent of the construction workers have eye sight problems. These high ratios among the welding and construction workers clearly reflect the specific environmental risks these children are exposed to in their work. Similarly, more than 90 percent of the van pullers and rickshaw pushers have breathing problems.

Finally, Table 8 provides the results for what kind of medical treatment the children have chosen, disaggregated by the type of labor they have performed. Largely due to financial constraints, the majority (54 percent) of the child laborers (53 percent of the rickshaw pullers, 64 percent of the van pullers, 46 percent of the rickshaw pushers, 58 percent of the construction laborers and 54 percent of the welding laborers) are seeking medical assistance from local self educated doctors who are not academically recognized. Nearly one quarter (24 percent) of the child laborers are visiting local health centers, while 14 percent seek help from kobiraj (which are traditional healers, typically using herbal treatments) and the remaining 9 percent undergo some kind of homeopathic treatment.

Table 8: Distribution of Child Laborers based on Types of Work and Medical Treatment Chosen

Type of	Type of Laborer					
Medical Treatment Chosen	Rickshaw pullers (total of 17)	Van pullers	Rickshaw pushers (total of 13)	Construction workers (total of 15)	Welding laborers (total of 24)	Total
Rural medical	3	2	3	6	5	19
center	17.6 percent of rickshaw pullers	18.2 percent of van pullers	23.1 percent of rickshaw pushers	40.0 percent of construction workers	20.8 percent of welding laborers	24 percent among all 80 child laborers
Local doctors	9	7	6	7	14	43
without qualifications	52.9 percent of rickshaw pullers	63.6 percent of van pullers	46.2 percent of rickshaw pushers	46.7 percent of construction workers	58.3 percent of welding laborers	54 percent among all 80 child laborers
	3	1	4	1	2	11
Kobiraj	17.6 percent of rickshaw pullers	9.1 percent of van pullers	30.8 percent of rickshaw pushers	6.7 percent of construction workers	8.3 percent of welding laborers	14 percent among all 80 child laborers
Homeopathic	2	1	0	1	3	7
treatment	11.8 percent of rickshaw pullers	9.1 percent of van pullers	0.0 percent of rickshaw pushers	6.7 percent of construction workers	12.5 percent of welding laborers	9 percent among all 80 child laborers
Total	17	11	13	15	24	80

IV. Discussion

The study provides a comprehensive overview of the situation of child labor in Sylhet city and writes a pen-picture of the whole country as well. Based on the previous results, the discussion here focuses on the physical and psychological health effects of child labor, though we also provide some observations on economic effects.

IV.1. Physical Health

There is overwhelming evidence that childhood labor comes with serious physical health problems which negatively affect the children's physical development, especially as the major part of the child laborers come from impoverished families and tare nutritionally unfit to face the rigors of a hard working life. Consistent with the results by Khair (2005), we come to the conclusion that the physical damage largely depends on the job type and the number of hours worked. For example, our survey showed that more than 60 percent

of the 14-16 year old child laborers work for an average of 14 hours daily, which obviously causes a variety of short-term and long-term health problems. Children are mostly vulnerable on account of physical immaturity and the exposure to unsafe workplaces. Moreover, unhealthy working conditions in the welding and construction sectors cause, respectively, skin diseases and eye sight problems. Nearly all child laborers (90 percent) are affected by physical pain during working hours or afterwards. What makes the situation worse is that most of the child laborers get no professionally recognized treatment of their health problems.

IV.2. Psychological Health

Children who are in risky job fields have no opportunity to build their natural psychosocial health. Long working hours breed their feeling of frustration and inadequacy. Their involvement in risky work resists eventually in building their emotional cognitive skills and they become withdrawn, introvert and uncommunicative. A significant portion of the children working at construction and welding sector are suffering from psychological immaturity and overall 40 percent child laborers are affected by abnormal psychological growth. They are also deprived of the special care that would be required for their psychological effects.

IV.3. Economic Effects

Child laborers are typically paid less than adults in all varieties of jobs even though they perform the same work and have to work beyond normal working hours. According to Khair (2005), children receive pathetic amounts that are hardly commensurate to the labor they put in. Indeed, based on our survey, the average income of the child laborers is around 50 taka, and only 17.5 percent get paid more than 60 taka for more than 10 hours or work a day. In most cases, the children's income is not spent for their own development. Instead, they are bound to work for feeding family members. The tragedy is that the child laborers lose their future working potentiality and may then become dependent on their own children.

In the construction or welding sectors, many employers are feeling comfortable to work with the children, which then replace male and female adults. Furthermore, formal contracts do typically not exist with children, which then allows employers to make arbitrary decisions regarding working hours, payment of wages, and the termination of services. Based on our survey, 20 percent of the child workers were either completely illiterate or could at best only sign their name. Given that only five percent completed their secondary education, most child laborers will be stuck with a low level of education, which then has an immense impact on their future welfare and their future inability to generate a decent income.

V. Conclusion and Recommendations

In Sylhet city, children work at menial, unskilled and non-productive jobs like rickshaw pulling, welding industries, and the lifting of heavy loads. They are generally not given any medical services, many times not even in cases of workplace accidents. It is common for all children to fall ill frequently with skin diseases, heat strokes, physical pain, and eye-sight-related problems. Children, with the compulsion of taking up work at early age

do not get the proper developmental environment. Many working children, especially girls, are also subjected to sexual abuse and harassment. Risky child labor also creates an obstacle for their future growth.

While it is difficult to pinpoint the issue of risky child labor to the children's physical and mental deteriorations, it is worth mentioning that most child laborers are illiterate and unskilled due to early joining the employment sector. Concern for risky child labor is gaining global recognition, leading many times to calls for the elimination of all child labor. It is imperative to explore a multitude of approaches in order to eventually reach the coveted goal of eliminating child labor and preventive measures for their health. In fact, there is evidence that many child workers actually like their work and take a lot of pride in what they do (Ehsan, 2001), though many of them do not realize the negative long-term effects their early work has.

Basu and Tzannatos (2003) concluded that while government intervention for controlling child labor is both desirable and possible, we have to craft policy recognizing the powerful market forces that give rise to child labor in the first place and be aware of the many pitfalls and risks that occur in this area. They distinguish between collaborative policies (like rewarding children who go to school instead of working) and coercive measures (like legal actions) and conclude that while coercive measures have their role, they need to be used much more carefully than collaborative policies as they can deprive children from work which was essential for their survival. Furthermore, if for example a law is effective only in some sectors, it can drive child labor to sectors that are more harmful for children.

In other words, it is counterproductive to view child labor purely as an ethical problem and ignore the economic and social fallouts of abolishing child labor as nearly all of the children engaged in child labor depend on it (see Amin, Quayes, and Rives, 2004). The child labor problem needs to be conceived as a broader problem of poverty and survival techniques. Without this more comprehensive view, intervention attempts are likely to become self-defeating and may actually make the situation worse. For reducing child labor successfully, it must be accompanied by alternative modes of income for those dependent on child labor.

Until such alternative modes of income are available, it is necessary to balance the perceived need of child labor with the children's vulnerability related to their physical and mental immaturity. Yet, the government and other relevant organizations need to take more initiatives to build a sense of responsibility and independence in the premature mind of the children and prepare them for a productive and healthy adult life. In this regard, the concerned authorities need to take a variety of integrative measures.

Within the employment-education sphere, the most important integrative measures would be to (i) take measures to improve basic education in order to reduce child labor, (ii) take the particular contexts of poor families into account by creating a non-formal education system parallel to primary education, (iii) create awareness among parents about the consequences of risky child labor, (iv) provide allowances for the poor families and (v) accelerate the food for education program at a large scale.

Within the employment-health sphere, the most important integrative measures would be to (i) improve the health services for children in areas where it is known that child workers are living and working, (ii) improve the health services of rural health centers, and (iii) create mobile medical teams that visit and treat child workers at their work places.

References

- Ali, Salma (2004) Report on Laws and Legal Procedures Concerning the Commercial Sexual Exploitation of Children in Bangladesh (Bangkok, Thailand: International Labour Office (ILO) -- International Programme on the Elimination of Child Labour (IPEC), October).
- Ali, Zulfiqar (2006) "Do Child Labourers Come from the Poorest? Evidence from NCLS and 64-Village Census Plus" Dhaka, Bangladesh: Bangladesh Institute of Development Studies (BIDS), *Programme for Research on Chronic Poverty in Bangladesh (PRCPB) Working Paper* No. 11 (February).
- Amin, Shahina; M. Shakil Quayes; and Janet M. Rives (2004) "Poverty and Other Determinants of Child Labor in Bangladesh", *Southern Economic Journal*, Vol. 70, No. 4 (April), pp. 876-892.
- Amin, Shahina; Shakil Quayes; and Janet M. Rives (2006a) "Market Work and Household Work as Deterrents to Schooling in Bangladesh", *World Development*, Vol. 34, No. 7 (July), pp. 1271-1286.
- Amin, Shahina; Shakil Quayes; and Janet M. Rives (2006b) "Are Children and Parents Substitutes or Complements in the Family Labor Supply Decision in Bangladesh?", *The Journal of Developing Areas*, Vol. 40, No. 1 (Fall), pp. 15-37.
- Basu, Kaushik (1999) "International Labor Standards and Child Labor" *Challenge*, Vol. 42, No. 5 (September October), pp. 80-93; available at: http://findarticles.com/p/articles/mi_m1093/is_5_42/ai_56057299/.
- Basu, Kaushik and Zafiris Tzannatos (2003) "The Global Child Labor Problem: What Do We Know and What Can We Do?" *World Bank Economic Review*, Vol. 17, pp. 147-173.
- Bhattacharya, M. S. (2007) Saga of Agony and Shame: Child Labour and Child Abuse in India and SAARC Countries (New Delhi, India: Decent Books).
- Cain, Mead (1978) "The Household Life Cycle and Economic Mobility in Rural Bangladesh", *Population and Development Review*, Vol. 4, No. 3 (September), pp. 421-438.
- Castle, R.; Chaudhri, D. P.; and C. Nyland (2002) "Child Labour in South Asia: Domestic and International Initiatives Including ILO and WTO", *Indian Journal of Labour Economics*, Vol. 45, No. 3 (July-September), pp. 497-516.

- Ehsan, Khaled (2001) "Children and Education", in: Shishu Adhikar Sangjog (ed.) *Child Rights: Reality and Challenges* (Dhaka, Bangladesh: British Council).
- Emerson, Patrick M. and Shawn D. Knabb (2007) "Fiscal Policy, Expectation Traps, and Child Labor", *Economic Inquiry*, Vol. 45, No. 3, pp. 453-469; available at: http://findarticles.com/p/articles/mi_hb5814/is_3_45/ai_n29387933/.
- Grant, James P. (1993) *All for Children* (New Delhi, India: United Nations Children's Emergency Fund (UNICEF)).
- Habib, Murshida Ferdous Binte (2008) "Child Rights and Child Labour in Bangladesh", Paper presented at the 29th International Congress of Psychology, Berlin, Germany (July 20-25).
- Hasan, Jesmul (2007) "An Overview of Child Labour Laws, Prevention Strategies and Assessment of Their Effectiveness in Bangladesh", in: Gamini Herath and Kishor Sharma (eds.) *Child Labour in South Asia* (Burlington, VT, USA: Ashgate).
- Kabeer, Naila (2001) "Deprivation, Discrimination and Delivery: Competing Explanations for Child Labour and Educational Failure in South Asia", Brighton, UK: University of Sussex, Institute of Development Studies (IDS), *IDS Working Papers*, No. 135 (May); available at: http://www.ntd.co.uk/idsbookshop/details.asp?id=612.
- Kabeer, Naila; Geetha B. Nambissan; and Ramya Subrahmanian (2002) *Child Labour and the Right to Education in South Asia: Needs versus Rights?* (Thousand Oaks, CA, USA: Sage Publications).
- Kalam, Iftekhar M. Shafiqul (2007) "Glimpse on Child Labor: A Study on Child Labor Situation in Dhaka City Corporation Area", *BRAC University Journal*, Vol. 4, No. 1, pp. 19-29.
- Khair, Sumaiya (2005) Child Labour in Bangladesh: A Forward Looking Policy Study (Geneva, Switzerland: International Labor Office, April).
- Khanam, Rasheda (2006) "Child Labour in Bangladesh: Trends, Patterns and Policy Options" *Asian Profile*, Vol. 34, No. 6, pp. 593-608; available at: http://mpra.ub.uni-muenchen.de/8008/1/MPRA_paper_8008.pdf.
- Khanam, Rasheda (2008) "Child Labour and School Attendance: Evidence from Bangladesh", *International Journal of Social Economics*, Vol. 35, No. 1-2, pp. 77-98.
- Khanam, Rasheda and Russell Ross (2005) "Child Work and Other Determinants of School Attendance and School Attainment in Bangladesh", Munich, Germany: *Munich Personal RePEc Archive (MPRA)*, Paper No. 9397; available at: http://mpra.ub.uni-muenchen.de/9397/1/MPRA_paper_9397.pdf.
- Mamun, Rashed; Nazrul Islam Mondal; Rafiqul Islam; and M. Kabir (2008) "Impact of Some Key Factors on Health Complication of the Child Laborers during Work: A Study on Rangpur, Bangladesh", *Pakistan Journal of Social Sciences*, Vol. 5, No. 3, pp. 262-267.

- Murshed, Madiha (2001) "Unraveling Child Labor and Labor Legislation", *Journal of International Affairs*, Vol. 55, No. 1 (Fall), pp. 169-189.
- Nath, Samir R. and Abdullahel Hadi (2000) "Role of Education in Reducing Child Labour: Evidence from Rural Bangladesh", *Journal of Biosocial Science*, Vol. 32, No. 3, pp. 301-313.
- Ray, Ranjan (2001) "Child Labour and Child Schooling in South Asia: A Cross Country Study of their Determinants", Canberra, Australia: Australian National University, Australia South Asia Research Centre (ASARC), *ASARC Working Papers*, No. 2001-09.
- Ravallion, Martin and Quentin Wodon (2000) "Does Child Labour Displace Schooling? Evidence on Behavioural Responses to an Enrollment Subsidy", *The Economic Journal*, Vol. 110, No. 462 (March), pp. 158-175.
- Ruwanpura, K. N. and L. Roncolato (2006) "Child Rights: An Enabling or Disabling Right? The Nexus between Child Labor and Poverty in Bangladesh", *Journal of Developing Societies*, Vol. 22, No. 4, pp. 359-378.
- Salmon, Claire (2005) "Child Labor in Bangladesh -- Are Children the Last Economic Resource of the Household?", *Journal of Developing Societies*, Vol. 21, No. 1-2, pp. 33-54.
- Shafiq, M. Najeeb (2007a) "Household Rates of Return to Education in Rural Bangladesh: Accounting for Direct Costs, Child Labour, and Option Value", *Education Economics*, Vol. 15, No. 3, pp. 343-358.
- Shafiq, M. Najeeb (2007b) "Household Schooling and Child Labor Decisions in Rural Bangladesh", *Journal of Asian Economics*, Vol. 18, No. 6 (December), pp. 946-966.
- Sharma, Kishor (2007) "Trade, Growth and Child Labour Practices in South Asia", in Gamini Herath and Kishor Sharma (eds.) *Child Labour in South Asia* (Aldershot, Hampshire, UK and Burlington, VT, USA: Ashgate), Chapter 5.
- Siddiqua, Rehena (2004) "Laws Relating to Child Labour in Bangladesh and Their Shortcomings", *Labour (Journal of the Bangladesh Institute of Labour Studies)*, Vol. 7, No. 1 (January–March).
- Siddiqui, Kamal (2001) Better Days, Better Lives: Towards a Strategy for Implementing the Convention on the Rights of the Child in Bangladesh (Dhaka, Bangladesh: University Press Ltd.).
- Sumon, A. I. (2007) "Informal Economy in Dhaka City-Automobile Workshop and Hazardous Child Labor", *Pakistan Journal of Social Sciences*, Vol. 4, No. 6, pp. 711-720; available at: http://medwelljournals.com/fulltext/pjss/2007/711-720.pdf.
- Tariquzzaman, Sheikh and Naomi Hossain (2009) "The Boys Left Behind: Where Public Policy has Failed to Prevent Child Labour in Bangladesh", *IDS Bulletin*, Vol. 40, No. 1, pp. 31-37.
- Tariquzzaman, Sk. and Elma Kaiser (2008) "Employers' Perceptions of Changing Child Labour Practices in Bangladesh", Dhaka, Bangladesh: *BRAC Monograph Series*

[Bangladesh Rural Advancement Committee], No. 35 (January); available at: http://www.bracresearch.org/monographs/Monograph_35%20.pdf.