Original Paper

Determination of Risk Behaviour and Health Problems among Rural Adolescents

Uddin ANMM[1], Jewel MH[2]

Abstract

Introduction: Adolescents are a large and growing segment of the global as well as the own population of a country. To invest in their health and development is actually investing in the greater wellbeing of the country as they constitute the nation's core resource for renewal and growth.

Objective: To identify the risk behaviour, magnitude, sociodemographic, cultural and economic condition along with common health problems, knowledge about health, hygiene and treatment seeking behaviour among rural adolescents.

Materials and Methods: This descriptive type of cross sectional study was conducted in Baliati village, Saturia upazilla of Manikganj district and Mohashashi village, Dhamrai upazilla of Dhaka district for a period of three months starting from November 2015 to January 2016. Targeted population was 10 to 19 years of both sexes residing in the study place. The sample size was of 510 adolescents. Non-probability purposive type of sampling was followed for this study. Data was collected on a structured interview schedule containing close ended questions keeping in view the selected variables of the study.

Results: In the study, among 510 respondents 35.3% in the 10-12 years age group and majority respondents were males (66.20%). 12.74% were involved in life threatening activities. In most cases they cross busy traffic (20.9%) and quarrel mostly with any issue (23.2%). Only 1.17% adolescents were addicted. Among addicted respondents 66% took Cannabis/ Marijuana. Cause of taking drugs among addicted respondents was by imitating others (83%). Skin disease was observed in 18.6 % respondents. 95.9% adolescents take treatment when they become ill and most of them (53.5%) go to doctors for allopathic treatment.

Conclusion: The magnitude of risk behaviours and health problems is a signal to the society, non-government, government and other international organizations that needs timely and appropriate intervention programs.

Key-words: Risk behaviour, health problems, adolescents.

Introduction

Adolescence is an important period when transition from childhood to adulthood takes place and the behaviours and life styles are shaped. They are a large and growing segment of the global as well as our own population. UNICEF assessment and analysis of the situation of adolescent in Bangladesh says that, now we have 52 million adolescents[1]. Unfortunately this distinct group in the society always grows up without proper attention, especially girls, most of whom move straight from childhood to marriage and pregnancy[2]. Even the male adolescents are found to be at risk. Data regarding this reveals that, male college/university students visited female sex workers and that a part of them never used a condom. So the adolescent boys are extremely prone to develop STDs. Besides dropout rate in secondary school is much higher than in primary schools[2]. Moreover, a section of them are victimized to smoking, drinking, drug abuse and trafficking, exploitation, acid throwing, eve teasing, suicide, premarital sex, rape or violence. So always there is a gap between their rights, health, gender equality, self-development, protection and most importantly they can't exchange their knowledge and ideas to the outside world[3]. Therefore, they are always remaining in the darkness. Most of them are involved in various income generating works but significant number of them do not even get the appropriate wage for their work and are prone to disease and malnutrition[4]. Over 41% of the working children (5 to15 years) work over 8 hours a day for earning

1. **Lt Col Abu Noman Mohammed Mosleh Uddin**, MBBS, MPH, MPhil, Associate Professor of Community Medicine, Armed Forces Medical College (AFMC), Dhaka 2. **Mehedi Hasan Jewel**, BSc (Hons), MS (Entomology), Entomologist, Armed Forces Medical College (AFMC), Dhaka.

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for family outside home[2]. Male and female reproductive health problems in terms of puberty are also a vital topic of discussion[5]. In 1996 the Institution of Child and mother Health (ICMH), in Dhaka also carried out a nutrition survey on adolescents (10 to 17 years) in four villages of Rupganj thana, Bangladesh. This study observed that 67 percent of these adolescents were thin (defined as BMI<5th centile of WHO recommended reference), 48 percent were stunted and 75 percent had hemoglobin<10.5 g/dl6. Though the findings cannot be generalized for the whole country yet the health condition of the adolescents of Bangladesh can be obtained from such survey. So this is an important issue to be concerned. Finding out the proper ways such as close connection to the parents, perfect regulation, religious factors (ideology) and psychological autonomy can protect from risk factors. Adult members of the family must be convinced about the importance of the cultural context in which the adolescents are brought up. At the same time the government, NGOs and the community based doctors should keep playing their roles to fulfill the challenges in this sector[7]. The development and prosperity of a nation largely depend upon children. To lead the nation towards this prosperity, comprehensive child development program is needed on a priority basis[8]. The health problems in adolescent group need special attention because during this period they are not free to discuss their problems with near ones in our socio cultural background. Furthermore, adolescents are encouraged to engage themselves in many anti-social works influenced by the media. Most of the cases these facts remain unnoticed and the affected stay unaware of them that ultimately increase the health risk and the health problems. That is why conducting study on this issue is required to find out the ways and means to improve the situations.

Materials and Methods

This descriptive type of cross sectional study was done in Baliati village, Saturia upazilla of Manikganj district and Mohashashi village, Dhamrai upazilla of Dhaka district and conducted from November 2015 to January 2016. Targeted study population was 10 to 19 years of both sexes residing in the study place. The sample size was 510 adolescents between 10 to 19 years of all sexes of above mentioned villages. Non-probability purposive type of sampling was followed for this study. Data was collected on a structured interview schedule containing close ended questions keeping in view the selected variables of the study. The data was checked,

verified and edited daily. After checking and rechecking data was analyzed by using Microsoft office package program. The frequency range and consistency was checked. Data was coded and recoded to create new variables. Accuracy of the data was ensured by defining range, limits and valid values of all variables. Data were presented in the forms of tables after analysis.

Results

Table-I shows the socio-demographic character of respondents. Among 510 respondents 35.3% in the 10-12 years age group and 32.9% were found in 13-15 years age group. (Mean=14.16 years, SD=3.25 years.) In the study majority respondents were males (66.20%). Regarding educational status of the total 358 respondents, 38.6% got secondary education. 74.9% fathers of respondents were employed whereas only 19.2% mothers were employed. As expected 81% respondents were students. Father and mother both were alive in 74.5% respondents.

Table-I: Socio demographic character of respondents (n=510)

Characteristics		Number	%
Age in Year	Age 10-12	180	35.3
	Age 13-15	168	32.9
	Age 16-19	162	31.8
Sex	Male	337	66.2
	Female	173	33.8
Education	Illiterate	41	8.0
	Primary	189	37.1
	Secondary	197	38.6
	Informal (Vocational)	83	16.3
Work status (Father)	Unemployed	128	25.1
	Employed	382	74.9
Work status of respondents	Unemployed	40	8
	Employed	56	11
	Student	414	81
Parent's Status	Father and mother alive	380	74.5
	Single parent	103	20.2
	Father and mother died	26	5.1

Table-II shows majority cases (38.8%), number of family members were 5-6. Monthly income was >15000 Tk in 32.4% families. 44.5 % respondents had <50 Tk daily income. Daily expenditure was <50 Tk in 42.7% of respondents. Most of them (62%) live with their parents.

Table-II: Distribution of family income and living status of respondents (n=510)

	Income	N	%
Family monthly income	<5000	106	20.8
	5001-10000	118	23.1
	10001-15000	121	23.7
	>15000	165	32.4
Daily income of respondents in taka	<50	227	44.5
	51-100	212	41.6
	>100	71	13.9
Living status of respondents	with parents	317	62.0
	with relatives	192	37.6
	others	1	0.4

Table-III shows distribution of life threatening activities and related factors of respondents. Among 510 respondents, 12.74% were involved in those activities. Regarding types of life threatening activities, in most cases they are crossing busy traffic (20.9%). They quarrel mostly with any issue (23.2%).

Table-III: Distribution of life threatening activities and related factors of respondents (n=510)

Characteristics	N	%
Respondents	65	12.74
Life threatening activities(multiple response)		
Running behind cars or vehicles	55	19.6
Riding in the roofs of trains/buses	57	20.2
Getting down from moving vehicles	50	17.8
Jump from heights	40	14.3
Crossing busy traffic	59	20.9
Self-injury	15	5.3
Others	5	1.9
Causes of fighting/quarrelling amongst the respondents(multiple response)		
Someone rebuked with bad words/hits first	45	16.3
After quarrelling with any issue	64	23.2
Monitory problems with friends	62	22.5
During games and sports	41	14.9
For family affairs	22	7.9
After someone taken or steal something	34	12.3
Others	8	2.9

Table-IV shows distribution of drug addiction and related factors of the respondents. Only 1.17% adolescents were addicted. Among addicted respondents 66% took Cannabis/Marijuana and the cause of taking drugs among addicted respondents was by imitating others (83%).

Table-IV: Distribution of drug addiction and related factors of the respondents

Characteristics	N	%
Yes	6	1.17
No	504	98.83
Distribution of types of drugs among addicted respondents		
Cannabis/Marijuana	4	66.0
Alcohol	2	34.0
Distribution of cause of taking drugs among addicted respondents		
Feels good	1	17
Imitating others	5	83

Table-V shows distribution of common health problem among respondents and hygiene status among respondents. Skin disease was observed in 18.6 % respondents. Majority of the respondents maintain their cleanliness of dress (79.2%), nail hygiene (68.1%), oral hygiene (81.2%) and proper hair cutting (80.2%).

Table-V: Distribution of common health problem among respondents and hygiene status among respondents (n=510)

Variables	Frequency	%
Skin disease (as observed)		
Present	95	18.6
Absent	415	81.4
Cleanliness of Dress		
Clean	404	79.2
Not Clean	106	20.8
Nail Hygiene		
Clean	347	68.1
Not Clean	163	31.9
Oral Hygiene		
Regular mouth wash	414	81.2
Occasional mouth wash	96	18.8
Hair Cutting		
Proper	409	80.2
Non-Proper	101	19.8

Table-VI shows preference to take treatment among respondents. In this study 95.9% adolescents take treatment when they become ill and most of them (53.5%) go to doctors for allopathic treatment.

Table-VI: Distribution of preference to take treatment among respondents (n=510)

Characteristics	N	%
Yes	489	95.9
No	21	4.1
Distribution of types of treatment received by respondents		
Doctors for allopathic treatment	273	53.5
Homeopathy	58	11.4
Kabiraji	12	2.4
Medicine shop/Pharmacy	155	30.4
Other treatment	12	2.3
Distribution of place of receiving doctor's treatment by respondents		
Govt. Hospital	148	29
NGO clinic	39	7.7
Private clinic	140	27.5
Free of cost treatment	179	35.1
Others	4	0.7

Discussion

This study was done to determine the magnitude of risk behaviours and to see the relationship of socio-demographic, cultural and economic factors alongside the common health problems of rural adolescents about health, hygiene and treatment seeking behaviour. In the present study regarding level of education, it was found that 16.3% had informal education, 37.1% had primary level of education, 38.6% had secondary level of education and 8% were found illiterate. The study showed lower percentage of informal education. A UNICEF study in 2002 reveals that boy's educational enrolment rates are lower at secondary than at primary level. It decreases with

each rise in educational level from 54% at primary to 41% at secondary and 25% at higher secondary level. Around three quarters of boys complete the primary stage and one-half the secondary stage. Boys drop out of school mainly because of the pressure of work, although school related costs and a lack of interest on the part of the boy or his parents are also factors. Adolescent boys acquire technical and vocational skills by informal, formal and non-formal means[2]. The study shows similar findings that there is decline of enrolment by level to level of education. This study reveals that migration due to poverty had increased than the past. Lack of job opportunity, educational and health care facilities in the rural areas is the major cause of migration which may be a reflection of socio-economic deterioration of Bangladesh. In a study by Rita A in 2000 it was found that cause of migration due to search for job was 22.3% poverty 25%, river erosion 1.7%, transfer by the employer 15.3%, education 22.5% and other causes were 2.7%[9].

Majority of the respondents had both father and mother alive 74.5% and 20.2% of them had single parent i.e. either father or mother died or separated. According to Bangladesh Bureau of Statistics (BBS) survey around half of them live with parents, 19% with mothers, 16% with other person, 7% alone, 7%with either step father or step mother[6].

In this study, it was found that most of the rural dwellers find employment in the informal sectors. The present study reveals the poor socio-economic condition of the families residing in the villages. As a result they suffer from financial constrain. In this study, out of 510 respondents, 12.74% were involved in those activities. Regarding types of life threatening activities, in most cases they cross busy traffic (20.9%). They quarrel mostly with any issue (23.2%). Significant association was found with age group, educational status and income of respondents. In a study by Mohammad Noor in 2003, found that most of the slum dwellers find employment in the informal sector: as day laborers, rickshaw pullers, petty traders and street vendors. Around 92% do not enough to meet their basic requirements[10]. In the study conducted by Sarkar Abdul Hakim in 2001, it was observed that 35% of the respondents had history of life threatening activity. This risk behaviour was found more among the males than their female counterpart. There is 8.14 (95%, CI=1.84-36.14) times increased risk among the male than the female[7]. World Health Organization (WHO) study 'Tobacco and Youth in the South East Asian region 2002' reveals that 55.6% addicted to cigarettes, 3.1% bidi, 3.1 % paan and 3.1% gul[8].

In national estimates from the 'Youth Risk Behaviour survey in the US' indicate that, in 1997, 37% of students in grades 9-12 had been in a fight within the preceding 12 months. Over the same period, approximately 4% reported seeking medical attention for an injury sustained from a fight and 7 % reported being threatened or injured with a weapon in school[11,12]. One of the most important risk behaviour among rural children is substance abuse which offers an escape from the harsh daily realities of family breakup, hunger and homelessness. In this study only 1.17% respondents were involved in different types of substance abuse. Highest number was addicted to Canabis (66%). Adolescents abuse drugs to keep awake for work, to get sleep, anaesthetize physical or emotional pain or to replace the need for food. Thereby increase health risk[13].

Studies reveal that the rural children of Bangladesh use those substances which are easily available and cheap. The present study reveals that the adolescents mostly suffer from skin disease (18.6%). According to 'BBS, Health and Demographic Survey 1999 'the common diseases from which adolescents suffer most are fever, common cold, malaria, dysentery, asthma and influenza. Illnesses which affect a higher proportion of girls than boys include asthma (twice as many girls), rheumatic fever, ordinary fever, dysentery and influenza. Accidents are a significant cause of injury and event mortality in adolescence, especially for boys. In Bangladesh, the accident rate is two and a half times higher for adolescent boys than girls (0.5 compared to 0.2%)[6]. This information reveals the poor health and hygiene condition of the villages. It also indicates most of the illnesses and diseases of the rural adolescents are due to poor nutrition, lack of awareness and communicable diseases.

Conclusion
Risk behaviour and health problems are related to incomplete education, several socio-economic barriers and unhygienic health status which are more or less affecting the process of their normal physical growth and intellectual development. It was found that a number of socio-demographic and economic factors correlate with their risk behaviour, knowledge about health, hygiene and treatment seeking behaviour. The incompatibility between macroeconomic and social policies and a significant break down in social and family cohesion and cultural values are leading causal factors of adolescent risk behaviour. We have to be more attentive about the overall health situation of the adolescents as they are the future planner and leader who can bring the changes in a country.

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