

Statistical Analysis of the Factors Affecting School Dropout in Egypt, 2005-2006

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E-mail: amanygad@yahoo.com**Abstract**

The study examines the major factors of school dropout in Egypt and assess the impact of child, household/ family variables on the likelihood of children aged (6-17 years) who have started school but dropped out before completing basic education (preparatory stage) specific focus on urban-rural residence using Egypt Household Education Survey (EHES), 2005-2006. To assess the impact of the child's personality and household/family on school dropout, this study applies four logistic regression models (due to the binary nature of the dependent variable school dropout). The findings of the study include that parent's educations, household wealth index, age of child are the most significant factors of children's dropout at the national level as well as in both urban and rural areas. The following recommendations were made. The state must adopt a national project to prevent school dropouts to improve Egypt's education system. Effort are needed to put an effective policy and programs of adult education, that help parents to get rid of illiteracy, by government and the NGO's at the national level especially in rural areas. Encourage public participation in education funding to help children and their families by ease the cost of education especially in poor rural areas.

Key Words: Education, School Dropout, Residence, Logistic Regression.

التحليل الإحصائي للعوامل المؤثرة في التسرب من المدارس في مصر، 2006-2005**ملخص**

تهدف هذه الدراسة إلى دراسة العوامل الرئيسية المؤثرة في التسرب من المدارس في مصر و تحديد أثر كلا من الخصائص (المتغيرات) الخاصة بكل من الطفل و الأسرة/ العائلة على احتمالية تسرب الأطفال والذين تتراوح أعمارهم بين (6-17 سنة) والذين التحقوا بالمدرسة ولكنهم لم ينهوا مرحلة التعليم الأساسي (المرحلة الإعدادية)، وقد انقسم التحليل إلى ثلاثة مستويات: المستوى الوطني وعلى مستوى كل من الحضر والريف على التوالي ، وذلك باستخدام بيانات مسح الأسر المعيشية الخاص بالتعليم 2005-2006. وقد طبقت هذه الدراسة أربعة نماذج للانحدار اللوجستي. وتوصلت هذه الدراسة إلى أن أهم العوامل المؤثرة هي كالتالي: تعليم الوالدين، المستوى المعيشي للأسرة، وعمر الطفل عند التسرب، وذلك على المستوى الوطني وكذلك في كل من المناطق الحضرية والريفية. وأستنادا على نتائج الدراسة أمكن استخلاص التوصيات التالية : ضرورة تبني الدولة مشروع وطني لمنع التسرب من المدارس وذلك بتحسين نظام التعليم والارتقاء بجودته، وضع سياسة فعالة لتعليم الكبار والتي يمكن من خلالها مساعدة الآباء والأمهات للتخلص من الأمية وذلك من خلال تكاتف الحكومة و المنظمات غير الحكومية على المستوى الوطني بصفة عامة والمناطق الريفية بصفة خاصة و تشجيع المشاركة المجتمعية في تمويل التعليم من أجل مساعدة الأطفال وأسره من خلال تخفيف تكلفة التعليم وخاصة في المناطق الريفية الفقيرة.

كلمات دالة: التعليم، التسرب من المدارس، محل الإقامة، الانحدار اللوجستي.

1. Introduction

Education is a fundamental human right and a basic requirement of human development of the society. It is also very important for the development of any country and wide-ranging benefits to both individuals and societies. Education is a key factor in empowering people and developing the economic, social, and personal well being of all citizens in a society, as well as competes within global world markets.

"The Education for All" initiative is a global commitment to provide quality basic education for all children, youth and adults. This initiative was launched at the "World Conference on Education for All" in 1990. It affirmed a commitment to achieving education for all, especially, the universal primary education by 2015.

Education is the responsibility of the state and government who should make every possible effort to provide it on an ever interesting and increasing scale in accordance with the national resources. The community should also realize its role in the development of education (Rahman & Salah Uldin, 2009).

School dropout is a very complex phenomenon which should be put down to complex factors, and which leads to failure in social integration. The risk of school dropout is much higher in families with a low standard of living, which have to deal with poverty and marginalization (Elkogali & Suliman, 2001; Cardoso & Verner, 2006; Chirtes, 2010).

Various studies have identified a number of factors belonging to the child personality that constrain children's dropout like, repeated more school grades, the poor academic performance, and child disinterested in school. These factors are significant reasons and barriers to children's education (Sulimam & Elhogali, 2002; Christes, 2010; Sabates, et al., 2010).

Studies that link between the children dropout and parental education, revealed the importance of parental education in influencing the chances of student dropout (Pal, 2004; Mike, et al., 2008; Sabates, et al., 2010; Manandhar & Sthapit, 2011).

According to Cardoso and Verner (2006), the early parenthood has a strong impact driving teenagers out of school. Extreme poverty is another factor lowering school attendance, but working does not necessarily have a detrimental effect on school attendance.

Hanushek, et al., (2007), in their study, tried to answer these questions: "Do students care about school quality?, and then what about the determinants of dropout behavior in developing countries?. This study investigated the underlying causes of dropping out of school using a rich longitudinal database on primary school-age children in Egypt. The central finding is that school quality and grade completion by students are shown to be directly linked, leading to very different perspectives on educational policy in developing countries.

Effective policies to improve school progression and reduce the numbers of children dropping out of school are critical if universal basic education is to be achieved. Although children are starting primary school in greater numbers than ever before, the rate of which children drop out from school remains high in many low income countries where over half of the children who start primary school do not complete the full cycle of education (Sabates, et al., 2011).

Education access and quality were also a national concern, and the education system was seen as a crisis, especially, for girls in Upper Egypt. In 1992, the Egyptian Ministry of Education

(MOE) and the United Nations Children's Fund (UNICEF) have signed an agreement to launch the community school initiative in Upper Egypt as a "joint venture for quality innovative education through genuine community participation" to establish local community schools and one-class schools to narrow the gap found in girls education especially in rural areas. During the latter half of the 1990s MOE and UNICEF launched an experimental community schools project to provide basic access education for girls of the poor communities especially in the deprived rural areas in three governorates in Upper Egypt (Assiut, Sohag and Qena) (Zaalouk, 2004).

The strategy of educational reform in Egypt is a dual strategy prospective that stresses education as one of the basic human rights that exerts benefit to the citizen and the country. Therefore, the government is responsible for offering free education at all levels and since Egypt's extension of the free compulsory law in 1981, the basic education is made compulsory for all Egyptian children between the ages of 6 and 15 years (9 academic years). Despite the continued efforts from the State at the basic education, enrollments rates are still far from universal.

Using the data from the Egypt Household Education Survey 2005-2006, we try to identify the factors pushing children out of school at the basic education level in Egypt. The plan of this paper is as follows: The next section contains the research problem, section 3 contains the research hypothesis, section 4 contains the objective of this study, section 5 contains data source, section 6 contains the methodology, section 7 contains the analysis of the results and discussion and section 8 contains the conclusion and recommendations.

2. Research Problem

Failure to complete a basic cycle of education represents a significant waste on the limited resources that countries have for the provision of basic education in addition to its consequences on present and future literacy rate. Egypt is facing on major challenge to eradicate school dropout as well as illiteracy at the same time. Therefore, it is useful to understand the reasons and barriers that caused these children leave school at the national level and in urban and rural areas separately, to improve Egypt's education system.

3. Research Hypothesis

The null hypothesis based on objective is:

H0: There is no significant difference in dropout of school among children in urban and rural areas.

4. The Objectives of the Study

The objectives of this study are:

- 1) To examine the major drop-out, push-out factors, and
- 2) To access the impact of child, household/ family variables on the likelihood of children aged (6-17 years) who have started school but dropped out before completing the basic education (preparatory stage) specific focus on urban-rural residence.

5. Data Source

The data used in this paper come from the 2005-2006 Egypt Household Education Survey (EHES) and it is the first national-level household education survey of its kind to be conducted in Egypt. The EHES is a nationally representative sample survey covering 6833 households, 7550 parents and guardians and 15914 eligible children aged 4-17 years. This survey provides information about household decisions about children's schooling.

The 2005-2006 EHES sample is based on the sampling frame for the 2005 EDHS¹. The 2005-2006 EHES was designed to provide estimates of education indicators for the country as a whole and for six major subdivisions (Urban Governorates, Urban Lower Egypt, Rural Lower Egypt, Urban Upper Egypt, Rural Upper Egypt and the Frontier Governorates). The 2005-2006 EHES involved two questionnaires: the Household Questionnaire and Parent/ Guardian Questionnaire. The Household Questionnaire included a list of individuals who lived in the household at the time of the 2005 Egypt DHS. The Parent/Guardian Questionnaire collected different kinds of information about each eligible child age 4-17, depending on the child's school status. Data were collected on the following topics, according to a child's schooling status, schooling background and participation during 2005-2006 school year, reasons for not attending school, reasons for dropping out of school,... etc. (El-Zanaty & Gorin, 2007).

6. Methodology

To examine the factors of dropout in the aspect of child and household / family, this study used a dummy D_{ij} which takes one if child i of household j dropped out of school and zero otherwise.

The logistic model is adopted because of the dichotomous nature of the dependent variable. In a general form, the logistic regression model with a set of child and household/family variables is state as:

$$\text{Pr ob } (D_{ij} = 1) = F (Ch_{ij}, Ho_{ij})$$

Where

D_{ij} = Dropout of a child (1 if a child dropped out; 0 otherwise).

Ch_{ij} : is a set of characteristics of child i in household j .

Ho_{ij} : is a set of household/family characteristics of child i in household j .

This study fits four models. To assess the impact of the child's personality on school dropout, we run two models [Model (1) and Mode (2)] at the national level. In Model (1), we omit the child's personality variables and regress the school dropout on a set of household/family variables; household level of wealth, residence, parent's education, total number of children's in the household, etc.... In Model (2), we omit the household/family variables and regress the set of child's personality variables related to age of child and grade failure/ repletion. Model (3) and Model (4) contain the mixed set of households/ family and child's variables for urban and rural areas separately.

6.1 Descriptive of Predictors (variables)

The dependent variable is a binary variable. The school dropout is coded 1 if the child dropout and 0 otherwise.

The independent variables include **two factor groups**: First group: factors that belong to the child's personality: Age of child that is used as categorical variable (use age (17 years) as reference in Model (2) and use it as a two categories in Model (3) and Model (4), first category (6-11) (primary stage) and second category (12-17) (which is the reference). Child abilities include (child academic performance, which is measured by whether the child has ever repeated or failed a grade (it take code 1, 0 otherwise).

¹ Egypt Demographic and Health Survey.

Second group: factors relates to household/family characteristics: household size (number of children in the household), household level of wealth index ² is used in quintiles with the highest (richest) quintile kept as reference category. Urban-Rural residence is coded as 1 if the family live in urban area and 0 if lives in rural area. Parent's education is coded as 1 if father/ mother ever attended school and 0 if not.

7. The Results and Discussion

This study investigates the main factors affecting children's dropout in Egypt using data collected by the EHES 2005-2006. Although the proportion of children aged (6-17) who dropout from school is relatively low in Egypt, just 6.2% among the whole sample in this study (66.7% in rural areas vs. 33.3% in urban areas). It is useful to understand the reasons and barriers that caused these children leave school at the national level and in urban and rural areas separately, to improve Egypt's education system.

7.1 The Main Reasons for School Dropout

Table (1) shows the main reasons for school dropout by household level of wealth at the national level. As shown, children are not interested in school is perceived as the first reason for dropping out followed by child failed/ repeated a grade and no enough money to pay education cost.

In regards to differences by household wealth level, 4 out of 8 reasons, turned out to be statistically significant ($P \leq 0.05$). These are: 1) child failed/repeated a grade, 2) no enough money to pay education costs, 3) school is too far and 4) child ill/disable.

Table (1): The Percentage Distribution of Children Dropout Aged (6-17) at the National Level by Reasons of Leaving School and Household Level of Wealth, EHES, 2005-2006

Reasons	National Level						Total	P-Value
	Household Level of Wealth Quintile							
	Poorest 20%	Second 20%	Middle 20%	Fourth 20%	Richest 20%			
Cost Related								
No Enough Money	58.5	37.5	18.8	25.5	18.8	38.8	0.000	
Child Labor	7.7	5.1	9.4	2.1	18.8	7.1	0.186	
Child Related								
Child Failed/Repeated a Grade	50	61.2	70.8	47.9	56.2	56.9	0.048	
Child not Interested	74.6	68.4	63.1	72.3	68.8	70.2	0.574	
Child Ill/Disable	1.7	0	3.1	8.3	12.5	3.1	0.014	
Child had Enough Education	11	15	6.2	14.6	0	11	0.242	
School Related								
Poor Quality	20.3	20	17.2	31.9	0	20.3	0.079	
School Too Far	6.8	1.2	0	12.5	12.5	5.2	0.009	
Number	332	198	147	103	34			

Source: Calculated by the Researcher.

(2) Household level of wealth index is a measure related to inequalities in household income. It was constructed using household asset data and principle components analysis. Asset information was collected in the 2005 Egypt DHS Household Questionnaire and covers information on household ownership of a number of consumer items ranging from a radio to a computer, as well as dwelling characteristics such as source of drinking water, type of sanitation facilities, and type of material used in flooring. Each household was then assigned a score for each asset, and the scores were summed for each household; individuals were ranked according to the total score of the household in which they resided. The sample was then divided into quintiles from one (lowest) to five (highest) (EHWS, 2005-2006, Report)

Table (2) shows the main reasons for school dropout by urban-rural residence and household level of wealth. As shown, child not interested in school, child failed/repeated a grade, no enough money to pay education costs followed by poor quality of school are the most reasons for dropout in both urban and rural areas.

Table (2): The Percentage Distribution of Children Dropout Aged (6-17) by Reasons, Urban-Rural Residence and Household Level of Wealth, EHES, 2005-2006

Reasons	Urban							Rural						
	Household Level of Wealth Quintile ^(*)													
	Q ₁	Q ₂	Q ₃	Q ₄	Q ₅	Total	P-Value	Q ₁	Q ₂	Q ₃	Q ₄	Q ₅	Total	P-Value
	20%	20%	20%	20%	20%			20%	20%	20%	20%	20%		
Cost Related														
No Enough Money	92.9	40	8	28.6	20	33	0.000	53.8	35.6	25.6	16.7	0	41.2	0.003
Child Labor	0	9.5	0	0	21.4	4.6	0.009	8.7	3.4	15.4	7.7	0	8.3	0.325
Child Related														
Child Failed/Repeated a Grade	30.8	81	68	44.1	60	57.4	0.016	52.4	54.2	74.7	58.3	0	56.7	0.074
Child not Interested	84.6	55	72	67.6	73.3	69.2	0.464	73.1	72.9	56.4	84.8	0	70	0.038
Child Ill/Disable	0	0	0	5.9	0	1.9	0.358	1.9	0	5.1	7.7	0	3.2	0.000
Child had Enough Education	0	10	0	14.7	0	6.5	0.099	12.5	15.3	10.3	15.4	0	12.9	0.922
School Related														
Poor Quality	15.4	15	20	44.1	0	23.6	0.008	21	21.7	15.4	0	0	18.7	0.351
School Too Far	28.6	4.8	0	11.8	13.3	10	0.056	3.8	0	0	15.4	0	2.8	0.027
Number	47	55	59	77	33	271		285	144	88	26	0	543	

Source: Calculated by the Researcher.

(*) Q₁ : poorest (lowest) quintile, Q₂ : second quintile, Q₃ : middle quintile, Q₄ : fourth quintile and Q₅ : richest (higher) quintile.

Concerning wealth disparities in the previous reasons for why children dropout in urban areas, the cost of school, the child need to labor, child failed/repeated a grade and school poor quality are the only significant reasons. Whereas the only significant reasons for children's dropout in rural areas, the cost of school, children are not interested in school, child ill/disabled and school is too far.

7.2 The Main Factors that Determine School Dropout

To examine the major dropout factors, this study estimates four logistic regression models; Model (1) and Model (2) for all children drop out at the national level, Model (1) includes the household/family variables while Model (2) includes the child's personality variables. Model (3) and Model (4) for children drop out in urban and rural areas separately.

To test the statistical significance of association between the dependent variable and independent variables and to determine the degree and direction of its association, the correlation technique, which is considered the first step in the application of the regression models, was used.

Table (3): Correlation Coefficients of Dropout with the Independent Variables, EHES, 2005-2006

Independent Variables	Correlation Coefficient		
	National Level	Urban Areas	Rural Areas
Residence (Urban/Rural)	-0.022*	-	-
Household Level of Wealth Quintile	-0.127**	-0.192**	-0.110**
Age of Child	0.260**	0.232**	0.238**
Sex of Child	-0.015	-0.019	-0.011
Father Education	-0.162**	-0.186**	-0.147**
Mother Education	-0.143**	-0.180**	-0.123**
Number of Children	0.025**	0.071**	-0.003
Failed/Repeated a Grade	0.126*	0.151	0.115
Complete Enough Schooling	0.122*	-0.085	-0.140*
Not interest	0.029	0.133	-0.106

Source: Computed by the Researcher.

* Correlation is significant at the 0.05 level (2-tailed).

** Correlation is significant at the 0.01 level (2-tailed).

Results in table (3) show that there was negative correlation between the drop out with household level of wealth (-0.127). As the household level of wealth increased the dropout rate was decreased, and the correlation coefficient in urban (-0.192) was higher than in rural (-0.110). There was significant difference at 0.01 level between drop out and household wealth level. There was no significant difference between the drop out and sex of child (national level, urban and rural areas). Father's education and mother's education were also negatively correlated with drop out. There were significant differences at 0.01. This result showed that father education was more influenced than mother in their children's education, and the correlation coefficient of parent's education in urban areas was higher than in rural areas. There was positive correlation between the drop out with number of children in household and child age. There were significant differences at 0.01.

Table (4) shows the logistic regression analysis results for Model (1) and Model (2).

For Model (1): The father education, mother education, household level of wealth, urban-rural residence and number of children per parent were significant at 5% level. Parents play an important role in how children cope with school. At the national level, children whose mothers are educated are less likely to drop out by 45% than those whose mothers are uneducated, this due to the fact that educated mothers are more effective in helping their children in a daily academic work by spending enough time with them. While for father education, children whose fathers are educated are less likely to drop out by about 54% than those whose fathers are uneducated, this phenomenon could be due to that: educated father are also interested to their children's education. Overall, the results show that father education is more influence than mother education in reducing the school dropout.

Children are living in larger households are more likely to dropout by 22% than children are living in smaller households at the national level. The risk of dropping out of children is significantly reduced as the child moves from the poorest quintile to any other quintiles at the national level. Table (4) shows that a child in the poorest (lowest), second, middle and fourth quintiles faces a risk by about 7.7, 5, 4.4 and 3 times respectively higher than a child in the richest (highest) quintile.

Table (4): The Significant Independent Variables Included in the Logistic Regression Model (1) and Model (2) at the National Level, EHES, 2005-2006

Child and Household/Family Variables	National Level							
	Model (1)				Model (2)			
	B	S. E.	P-Value	Exp (B)	B	S. E.	P- Value	Exp (B)
Household/Family Variables								
Residence (Rural)	-0.723	0.136	0.000	0.485				
Household Level of Wealth Quintile (HLW)								
Poorest 20%	2.036	0.320	0.000	7.663				
Second 20%	1.587	0.319	0.000	4.889				
Middle 20%	1.470	0.310	0.000	4.351				
Fourth 20%	1.193	0.307	0.000	3.297				
Father Education	-0.784	0.123	0.000	0.457				
Mother Education	-0.593	0.139	0.000	0.553				
Number of Children	0.200	0.048	0.000	1.222				
Child 's Variables								
Age of Child								
Age (13)					2.619	1.306	0.045	13.726
Age (14)					1.688	0.697	0.015	5.407
Failed/repeated Grade					0.719	0.343	0.038	2.052
Constant	-3.699	0.326	0.000	0.025	0.925	0.327	0.004	2.585
Correct Classification	94.4%				84.2%			

Source: Computed by the Researcher.

References Category of: residence (urban), household level of wealth quintile (the highest (richest)), father education (not educated), mother education (not educated), age of child (17 years) and child failed/repeated a grade (no).

The logistic regression analysis and fit Model (1) is shown by the following equation:

Logit (Y) = - 3.699 - 0.784 father education - 0.593 mother education + 2.036 HLW (poorest (lowest) quintile) + 1.587 HLW (second quintile) + 1.470 HLW (middle quintile) + 1.193 HLW (fourth quintile) + 0.200 number of children - 0.723 (residence (rural)).

For Model (2): The age of child and child failed/repeated a grade, at the national level were significant at 5% level. The odds ratios estimate for the age of child show that the likelihood of dropout are significant at age (13,14 years) and the children aged 13,14 years are more likely to dropout than those aged (17 years) by about 13.7 and 5 times respectively.

A child experience of grade failure/repetition significantly increases odds of dropping out by about two times.

The logistic regression analysis and fit Model (2) is shown by the following equation:

Logit (Y) = 0.950 + 2.619 age of child (13) + 1.688 age of child (14) + 0.719 child failed/repeated a grade.

For Model (3) and Model (4): The father education, mother education, household level of wealth, age of child are significant at 5% level, while number of children per parent is only significant in Model (3).

The parent's education plays an important role in how children perceive with school in both urban and rural areas as well as at the national level in Model (1). Table (5) shows that father education is more influenced than mother education in reducing the school dropout in both urban and rural areas. Children whose fathers are educated are less likely to drop out by about 60% and 46% than those whose fathers are uneducated in urban and rural areas respectively. While for mother education, children whose mothers are educated are less likely to drop out by about 40% and 44% than those whose mothers are uneducated in urban and rural areas respectively.

The odds ratios estimate for the age of child show that the likelihood of dropout is significant at age group (6-11 years) (primary stage) and the children in this age group are less likely to drop out by about 67%, 94% in urban and rural areas respectively than those aged (12-17) (preparatory stage).

Children in urban areas whose are living in larger households are more likely to drop out by about 50% than those in smaller households. Table (5) reveals that the wealth has a great effect in urban areas and a child in the poorest (lowest), second, middle and fourth quintiles faces a risk to drop out by about 5.8, 4.6, 4 and 3 times respectively greater than a child in the richest quintile. While for rural areas, the child in the poorest and second quintiles faces a risk to drop out by about 2.6 times greater than a child in the richest (highest) quintile.

Table (5): The Significant Independent Variables Included in the Logistic Regression Model (3) and Model (4) in Urban and Rural Areas, EHES, 2005-2006

Independent Variables	Urban				Rural			
	Model (3)				Model (4)			
	B	S. E.	P-Value	Exp (B)	B	S. E.	P-Value	Exp (B)
Household Level of Wealth Quintile (HLW)			0.000				0.002	
Poorest 20%	1.762	0.417	0.000	5.825	0.949	0.311	0.002	2.583
Second 20%	1.522	0.398	0.000	4.582				
Middle 20%	1.376	0.350	0.000	3.922	0.470	0.349	0.177	1.601
Fourth 20%	1.163	0.329	0.000	3.199	-	-	-	-
Father Education	-0.937	0.218	0.000	0.392	-0.621	0.156	0.000	0.538
Mother Education	-0.517	0.224	0.021	0.596	-0.588	0.184	0.001	0.555
Number of Children	0.403	0.087	0.000	1.497				
Age of Child			0.000				0.000	
Age (6-11)	-3.399	0.425	0.000	0.330	-2.800	0.243	0.000	0.061
Constant	-3.331	0.420	0.000	0.036	-2.164	0.320	0.000	0.115
Correct Classification	95.2%				93.0%			

Source: Computed by the Researcher.

References category of: Household level of wealth quintile (the highest (richest)), father education (not educated), mother education (not educated) and child aged (12-17).

The logistic regression analysis and fit Model (3) is shown by the following equation:

$$\text{Logit (Y)} = - 3.331 - 0.937 \text{ father education} - 0.517 \text{ mother education} + 1.762 \text{ HLW (poorest (lowest) quintile)} + 1.522 \text{ (second quintile)} + 1.376 \text{ (middle quintile)} + 1.163 \text{ (fourth quintile)} + 0.403 \text{ number of children} - 3.399 \text{ child aged (6-11)}.$$

The logistic regression analysis and fit Model (4) is shown by the following equation:

$$\text{Logit (Y)} = - 2.164 - 0.621 \text{ father education} - 0.588 \text{ mother education} + 0.949 \text{ (poorest (lowest) and second quintiles)} - 2.800 \text{ child aged (6-11)}.$$

The study reveals that the main reasons for school dropout at the national level as well as in both urban and rural areas are: children not interested in school followed by child failed/ repeated a grade, no enough money to pay education cost and poor quality of school, and this finding is supported by the result of Sulimam & Elhogali (2002). Parent's educations, household wealth index, age of child are the most significant factors of children's dropout at the national level as well as in both urban and rural areas. This finding is supported by the result of Mike, et al., (2008). While child failed/ repeated a grade is significant only at the national level and numbers of children in household is significant only in urban areas, and this finding is also supported by the result of Sulimam & Elhogali (2002).

8. Conclusion and Recommendations

8.1 Conclusion

The study examines the major factors of school dropout in Egypt and access the impact of child, household/ family variables on the likelihood of children aged (6-17 years) who have started school but dropped out before completing basic education (preparatory stage) specific focus on urban-rural residence using Egypt Household Education Survey (EHES), 2005-2006. Although the proportion of children aged (6-17) who dropout from school is relatively low in Egypt, just 6.2% among the whole sample in this study (66.7% in rural areas vs. 33.3% in urban areas). It is useful to understand the reasons and barriers that caused these children leave school at the national level and in urban and rural areas separately, to improve Egypt's education system. We concluded that the main reasons for school dropout at the national level as well as in both urban and rural areas are: children not interested in school followed by child failed/ repeated a grade, no enough money to pay education cost and poor quality of school.

To assess the impact of the child's personality and household/family on school dropout, this study apply four logistic regression models (due to the binary nature of the dependant variable (school dropout), two models at the national level while the others two models, one of them for urban areas and the other for rural areas. Parent's educations, household wealth index, age of child are the most significant factors of children's dropout at the national level as well as in both urban and rural areas. While child failed/ repeated a grade is significant only at the national level and numbers of children in household is significant only in urban areas.

8.2 Recommendations

Based on the main findings derived from this study, the following are important recommendations would help alleviate school dropout:

- 1) The state must adopt a national project to prevent school dropouts to improve Egypt's education system.
- 2) Effort are needed to put an effective policy and programs of adult education, that help parents to get rid of illiteracy, by government and the NGO's at the national level especially in rural areas.
- 3) Encourage public participation in education funding to help children by ease the cost of education especially in poor rural areas.
- 4) Improve quality of education and activate the role of school groups tutoring (it refers to tutoring endorsed by the Ministry of Education and provided in the schools) to reduce repetition and dropout, particularly in rural areas.

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