





Original Research / Orijinal Araştırma

# Public Opinion Towards Adolescent Pregnancies and Expectations from Healthcare Professionals

# Toplumun Ergen Gebeliklerine Bakışı ve Sağlık Profesyonellerinden Beklentileri

Funda Salgür<sup>1</sup>, Altuğ Kut<sup>2</sup>, Özgür Çaycı<sup>3</sup>, Yasemin Çetinel<sup>4</sup>, Fisun Sözen<sup>5</sup>

#### **Abstract**

Objectives: Complications arising from pregnancies during adolescence bring along very important health problems in terms of both women's health and babies' health. Therefore, society's perspective on adolescent pregnancies and expectations from healthcare professionals will guide the measures to be taken to protect maternal health under the age of 18. This study aims to identify the determinants of society's point of view regarding adolescent pregnancies and to determine expectations from healthcare workers. Methods: This descriptive cross-sectional study enrolled randomly selected 980 subjects who volunteered to join the study, and answered a questionnaire composed of 39 questions. The questionnaire was consulted by multi-disciplinary to confirm the accuracy of the questions. Results: The mean age was 41.0 (range: 19-64, Male-Female ratio 1:1.15) and 71.6% were married. The majority (80.3%) argued that girls under the age of 19 should not have children, and this is significantly affected by income level and education. It has been observed that the view that reducing adolescent pregnancies will positively affect maternal and neonatal mortality rates is related to the education and income level of the participants. (p=0.001 and p=0.024). 66.1% of the respondents stated that adolescent pregnancies could be reduced by providing adequate information from primary healthcare institutions rather than other sources. In addition, primary healthcare institutions were shown as the primary center in the follow-up of these pregnancies by .66.1% of the participants. Conclusion: It is important to inform society about this issue in the prevention of adolescent pregnancies, which have significant risks for maternal and infant health. Society believes that the solutions of this problem can be provided by primary health care services.

Keywords: adolescent, pregnancy, primary health care.

#### Özet

Amaç: Ergenlik dönemindeki gebeliklerden kaynaklanan komplikasyonlar hem kadın sağlığı hem de bebek sağlığı açısından çok önemli sağlık sorunlarını beraberinde getirmektedir. Bu nedenle toplumun adölesan gebeliklere bakış açısı ve sağlık profesyonellerinden beklentileri 18 yaş altı anne sağlığını korumak için alınması gereken önlemlere rehberlik edecektir. Bu çalışma, toplumun adölesan gebeliklere bakış açısının belirleyicilerini ve sağlık çalışanlarından beklentileri belirlemeyi amaçlamaktadır. Gereç ve Yöntem: Bu tanımlayıcı kesitsel çalışmaya, araştırmaya katılmaya gönüllü olan ve rastgele seçilmiş 980 denek dahil edildi ve 39 sorudan oluşan bir anket yanıtlandı. Hazırlanan soruların multidisipliner kontrolü sağlandı. Bulgular: Ortalama yaş 41.0 (aralık: 19-64, E: K-oran1:1.15) idi ve %71.6'sı evliydi. Çoğunluk (%80,3) 19 yaşından küçük kızların çocuk doğurmaması gerektiğini, bunun da gelir düzeyi ve eğitimden önemli ölçüde etkilendiğini savunmuştur. Adolesan gebeliklerin azaltılmasının anne ve yenidoğan ölüm oranlarını olumlu etkileyeceği görüşünün katılımcıların eğitim ve gelir düzeyi ile ilişkili olduğu gözlenmiştir. (p=0,001ve p=0,024). Ankete katılanların %66,1'i diğer kaynaklardan ziyade birinci basamak sağlık kuruluşları tarafından yeterli bilgi verilmesiyle adolesan gebeliklerin azaltılabileceğini belirtti. Ayrıca katılımcıların %.66,1'i tarafından bu gebeliklerin takibinde birinci basamak sağlık kuruluşları birincil merkez olarak gösterilmiştir. Sonuç: Anne ve bebek sağlığı yönünden önemli riskleri olan adolesan gebeliklerin önlenmesinde toplumun bu konuda bilgilendirilmesi önem taşımaktadır. Toplum, bu sorunun çözümünün birinci basamak sağlık hizmetleriyle sağlanabileceğine inanmaktadır.

Geliş tarihi / Received: 11.04.2022 Kabul tarihi / Accepted: 06.01.2023

Address for Correspondence / Yazışma Adresi: Funda Salgür, Başkent Üniversitesi Tıp Fakültesi / Türkiye drfundasalgur@gmail.com

Salgur F, Kut A, Cayci O, Cetinel Y, Sozen F. Public Opinion Towards Adolescent Pregnancies and Expectations from Healthcare Professionals. TJFMPC, 2023;17(1): 100-108

DOI:10.21763/tjfmpc.1100360

<sup>&</sup>lt;sup>1</sup>Başkent Üniversitesi Tıp Fakültesi / Türkiye

<sup>&</sup>lt;sup>2</sup>Başkent Üniversitesi Tıp Fakültesi / Türkiye

<sup>&</sup>lt;sup>3</sup>Emirefendi Aile Sağlığı Merkezi, Bafra, Samsun / Türkiye

<sup>&</sup>lt;sup>5</sup>Başkent Üniversitesi Tıp Fakültesi / Türkiye

## Introduction

The period of adolescence, which is not homogenous in human life in terms of physical and psychological aspects is defined by the United Nations as the period between 10-19 years of age. During this period, hormonal activity changes, secondary sex characteristics develop; reproductive ability is gained. Accordingly, adolescence can also include important events such as marriage and child-bearing. Several countries decided to enact legal arrangements in matters of social status changes such as child-bearing and marriage in adolescent ages.

The Turkish Civil Code also includes various regulations in this respect. According to those regulations, adulthood, which is defined as "maturity", begins from 18 years of age onward. On the other hand, these regulations mention that "the marriage of a person" also suffice to declare him or her as a mature person regardless of age. Although different countries have several regulations defined by law in matters of marriage and maturity, evolving values of the societies of these countries are also contributing to defining these periods of life.

After the 90s, researchers in international literature have begun to refer to a term called "Emerging Adulthood", which is defined in 1994 by Jeffrey Jensen Arnett as a distinct period of life between adolescence and adulthood, ages from 18 to 25 years. Especially urban life circumstances, identified by prolonged training durations, and cultural structures which emphasize the individual are clearly influential in the concept of this newly defined period. Urban residents are more likely to consider marriage and child-rearing as soon as they feel prepared in areas such as completing educational training or finding work. However, in rural life and urban migration areas, individuals who are still unable to break their bonds with traditional lifestyle usually marry and have children at a considerably earlier age. According to the latest Turkey Population and Health Survey (TNSA) data in our country, 3.5% of girls between the ages of 15-19 have started to give birth, and this rate is inversely proportional to education level and economic level.

Being married and having children, which holds an important place in Turkish society, has been promoted as a population policy in certain periods of Turkish History (especially in the years following the independence war). <sup>9</sup> Nowadays, pronatalist approaches are encouraging people to have more children in our country, which is going through a demographic transition process. <sup>10</sup> This fact also seems to encourage society to marry at earlier ages, and frequently during adolescence.

Given that pregnancies under the age of 18 are risky pregnancies, it is extremely important for the community to know the risks associated with marriages made during adolescence. We aimed to find out what factors influence society's perception of adolescent pregnancies and what healthcare workers expect.

# **Materials and Methods**

This descriptive cross-sectional study was carried out in the outpatient clinics of Başkent University in Ankara's Ümitköy district. Between December 2014 and March 2015, we randomly selected 980 patients and their relatives who applied for an appointment at the outpatient clinic (internal medicine, family medicine, pediatrics, gynecology, and obstetrics). All subjects volunteered for the study and signed informed consent forms. The study was approved by the localethics committee (KA14/319). Inclusion criteria include the following: not having a mental illness, being between the ages of 19 and 64, not having any other relatives in the study group, and not having an end-stage chronic disease. Only one of the wives was given a questionnaire.

## **Ouestionnaire Information**

As far as we are aware, there is no structured questionnaire about adolescent pregnancies, so we created one by soliciting input from pediatricians, psychiatrists, obstetricians, and gynecologists. A questionnaire of 39 questions was used to ask the subjects about their opinions on marriage and marriage, marriage age, sexuality, having children, marriage and having children in adolescence, medical follow-up of pregnancies in adolescence, and prevention of adolescent pregnancies. Of the 39 questions: 15 items were targeting demographic information; one item questioned their thoughts on "legally valid marriages"; three items questioned the "appropriate age of marriage"; two items questioned their opinion regarding "professional marriage counseling"; one item questioned their views about "premarital sexual intercourse"; one item questioned their "age when bearing the first child". Seven items examined their attitudes and knowledge about childbearing and pregnancy during adolescence, and nine items addressed whether or not to prevent adolescent pregnancies and the best ways to do so.

# **Statistical Analysis**

The data obtained from the study were recorded in the SPSS 21.0 program (Statistical Package for Social Sciences v.21.0. SPSS Inc. Chicago. IL). Descriptive statistical data were evaluated as mean  $\pm$  standard deviation, minimum-maximum for continuous variables, and frequency and % distribution for intermittent data.

When the data set provided parametric test prerequisites for continuous variables, independent two-group t-test (Student's t-test) was used to compare mean  $\pm$  standard deviation of two groups, and variance analysis ANOVA

and Tukey HSD test of multiple comparison methods were performed when necessary. When the parametric test prerequisites did not fulfill the statistical evaluation and when the assumptions after data transformation were not met, the Mann Whitney-U test, the Kruskal Wallis test, and when necessary the Dunn test of multiple comparison methods was used for data analysis of continuous variables. Categorical variables were assessed by Fisher's Exact test (Chi-square test). The level of statistical significance in the study was accepted as p < 0.05 with 95% confidence interval.

#### Results

As for the study population, 980 subjects, 53.6% (n=525) female and 46.4% (n=455) male participated in the study. Male to female ratio was 1:1.15. The mean age of the participants was  $41.0\pm14.7$ ; (Female:  $39.29\pm14.6$  and Male:  $42.9\pm14.5$ ; Range: 19-64).

Women were significantly younger than men (p=0.002) and had a significantly higher level of education (p=0.002). Income analyses reveal that while 21.4% (n=210) of the volunteers were in the high (refers to appx >6000% per month), 51.7% (n=507) were in the moderate (refers to appx. 2000-5999% per month), and 26.8% (n=263) were in the low-income group (refers to appx <2000% per month). Income level ranges are adjusted in accordance with the requirements of the year in which the study was conducted. However, there was no significant difference between the views of two sexes in terms of household income (p=0.757). Of the volunteers 68.6% (n=672) were university and college graduates, while the rest of the group consisted of undergraduates.

In terms of occupation distribution, 11.0% (n=108), 22.4% (n=220), 14.3% (n=140), 50.8% (n=966), and 1.5% (n=15) were unemployed, retired, students, employed, and others, respectively. 71.6% (n=705) of the volunteers were married or were not married due to divorce or spousal death after marriage. We asked the participants what type of marriage they preferred. A statistically significant majority of participants (p=0.000) believed that there should be both a religious and civil marriage ceremony (Table-1). Table-1 shows the results of an investigation into other variables such as education level, age groups, monthly income, gender, and marital status in relation to their effect on opinion about type of marriage. Although the majority of all age groups prefer to perform both civil and religious ceremonies at the same time, we found that the proportion of individuals who have this opinion grows with age (Table-1). This was a statistically significant situation (p<0.05).

		monthly income, gender, and marital status.  Opinion towards type of marriage							
		Only Civil Marriage	Only Religious Ceremony	Civil Marriage and Religious Ceremony	Living together without any Ceremony	No İdea	P**		
		n (%)	n (%)	n (%)	n (%)	n (%)			
on on	Primary	9 (8.9)	2 (2.0)	85 (84.2)	0 (0.0)	5 (5.0)			
Level of Education	Secondary	44 (21.3)	0 (0.0)	154 (74.4)	8 (3.9)	1 (0.5)	0.000		
Ed	College and University	229 (31.1)	4 (0.6)	337 (50.1)	89 (13.2)	13 (1.9)			
	19-28	47 (18.4)	2 (0.8)	165 (64.7)	36 (14.1)	5 (2.0)			
sdr	29-38	42 (18.9)	2 (0.9)	155 (69.8)	18 (8.1)	5 (2.3)	0.000		
Age Groups	39-48	55 (33.1)	1 (0.6)	92 (55.4)	15 (9.0)	3 (1.8)			
	49-58	57 (36.8)	0 (0.0)	77 (49.7)	17 (11.0)	4 (2.6)			
	≥ 59	81 (44.5)	1 (0.5)	87 (47.8)	11 (6.0)	2 (1.1)			
<u> </u>	<2000	46 (17.5)	3 (1.1)	192 (73.0)	16 (6.1)	6 (2.3)			
Income (E)	2000-5999	155 (30.6)	2 (0.4)	291 (57.4)	52 (10.3)	7 (1.4)	0.000		
Inc	≥ 6000	81 (38.6)	1 (0.5)	93 (44.3)	29 (13.8)	6 (2.9)			
ler	Male	134 (29.5)	3 (0.7)	258 (56.7)	53 (11.6)	7 (1.5)	0.200		
Gender	Female	148 (28.2)	3 (0.6)	318 (60.6)	44 (8.4)	12 (2.3)	0.390		
	Single	62 (22.5)	2 (0.7)	159 (57.8)	44 (16.0)	8 (2.9)			
SII	Married	205 (31.9)	3 (0.5)	388 (60.4)	38 (5.9)	8 (1.2)			
Marital Status	Divorced	9 (20.9)	0 (0.0)	20 (46.5)	12 (27.9)	2 (4.7)	0.000		
arital	Widowed	5 (38.5)	0 (0.0)	7 (53.8)	1 (7.7)	0 (0.0)	0.000		
Σ	Lives Separately	1 (25.1)	0 (0.0)	2 (50.0)	0 (.0 0)	1 (25.0)			
	Lives Together	0 (0.0)	1 (33.3)	0 (0.0)	2 (66.7)	0 (0.0)			

When the ideal age of marriage for women was asked, the most preferred answer among the high school, university and college graduates was between 25-29 years [55.6% (n=115); 75.3% (n=506) respectively], while the most preferred answer among the primary school graduates was between 20-24 years (66.3%). We also found that the income level of the participants effects the opinion towards the age of marriage for women. We observed that the recommended 20-24 age range for females is suggested more frequently as the income level of the respondents decreases (p=0.000). The participants recommended significantly older marriage ages for male. It is also noticeable, that respondents with more advanced income levels suggested older marriage ages (Table-2). A vast majority of respondents (80.3%) suggest that women prior to 19 years of age shouldn't bear children. (Table-2) As the respondents' income levels and education increase, the view that they find marriages before the age of 19 objectionable increases significantly (Table-2). Higher education levels, higher income levels also are significantly related to the opinion that prohibiting or decreasing the rate of adolescent pregnancies will lead to decreases in maternal and neonatal mortality rates. (Table-2)

We asked the study population about what the most effective way will be to prevent adolescent pregnancies. Possible answer options were prevention by education, by legislations, we don't have to prevent adolescent pregnancies at all, and I have no idea. We seek for relation with education, age of respondents, monthly

income, and gender. The results indicated that all parameters were significantly related with the opinion that education would prevent adolescent pregnancies. Also, higher education levels and higher monthly income levels of respondents were significantly related with the ideal that education will solve this problem. Ages of the respondents and gender were seemingly similar among the chosen answers. However, 12.9% of the study group still thought there is either no need to prevent adolescent pregnancies or had any idea about the issue (Table-2).

		Bearing a child before the age of 19				pregna	ncies redu	g of adolesce ce maternal a tality rates?		Views toward best method to prevent ac pregnancies			event adoles	olescent
		No objection	Objection	No Idea	p*	Yes         No         No Idea           n (%)         n (%)         n (%)	No	No Idea	D*	Education	Law	No need	No idea	_ p*
		n (%)	n (%)	n (%)	1		1	n (%)	n (%)	n (%)	n (%)	1		
_	PS	15 (14.9)	74 (73.3)	12 (11.9)		69 (68.3)	9 (8.9)	23 (22.8)		62 (61.4)	13 (12.9)	5 (5.0)	21 (20.8)	
Education	HS	21 (10.1)	155 (74.9)	31 (15.0)	0.010	167 (80.7)	10 (4.8)	30 (14.5)	0.001	141 (68.1)	25 (12.1)	13 (6.3)	28 (13.5)	0.0
duc	U+C	45 (6.7)	558 (83.0)	69 (10.3)	0.010	571 (85.0)	23 (3.4)	78 (11.6)	0.001	524 (78.0)	89 (13.2)	27 (4.0)	32 (4.8)	
Ξ.	Total	81 (8.3)	787 (80.3)	112 (11.4)		807 (82.3)	42 (4.3)	131 (13.4)	]	727 (74.2)	127 (12.9)	45 (4.6)	81 (8.3)	
	19-28	19 (7.5)	197 (77.3)	39 (15.3)	0.116	208 (81.6)	6 (2.4)	41 (16.1)	0.128	178 (69.8)	42 (16.5)	14 (5.5)	21 (8.2)	0.0
Age Groups	29-38	19 (8.6)	178 (80.2)	25 (11.3)		179 (80.6)	12 (5.4)	31 (14.0)		171 (77.0)	29 (13.1)	9 (4.1)	13 (5.9)	
	39-48	16 (9.6)	126 (75.9)	24 (14.5)		130 (78.3)	11 (6.6)	25 (15.1)		119 (71.7)	14 (8.4)	15 (9.0)	18 (10.8)	
3	49-58	12 (7.7)	134 (86.5)	9 (5.8)		129 (83.2)	8 (5.2)	18 (11.6)		122 (78.7)	20 (12.9)	6 (3.9)	7 (4.5)	
Ē.	≥ 59	15 (8.2)	152 (83.5)	15 (8.2)		161 (88.5)	5 (2.7)	16 (8.8)		137 (75.3)	22 (12.1)	1 (0.5)	22 (12.1)	
	Total	81 (8.3)	787 (80.3)	112 (11.4)		807 (82.3)	42 (4.3)	131 (13.4)		727 (74.2)	127 (12.9)	45 (4.6)	81 (8.3)	
	<2000	35 (13.3)	178 (67.7)	50 (19.0)		200 (76.0)	17 (6.5)	46 (17.5)		159 (60.5)	40 (15.2)	17 (6.5)	47 (17.9)	0.0
Income (b)	2000- 5999	37 (7.3)	422 (83.2)	48 (9.5)	0.000	426 (84.0)	17 (3.4)	64 (12.6)	0.024	392 (77.3)	64 (12.6)	24 (4.7)	27 (5.3)	
ncor	≥ 6000	9 (4.3)	187 (89.0)	14 (6.7)		181 (86.2)	8 (3.8)	21 (10.0)		176 (83.8)	23 (11.0)	4 (1.9)	7 (3.3)	
=	Total	81 (8.3)	787 (80.3)	112 (11.4)		807 (82.3)	42 (4.3)	131 (13.4)		727 (74.2)	127 (12.9)	45 (4.6)	81 (8.3)	
	Female	33 (6.3)	444 (84.6)	48 9.1 ()		444 (84.6)	20 (3.8)	61 (11.6)		383 (73.0)	84 (16.0)	23 (4.4)	35 (6.7)	
	Male	48 (10.5)	343 (75.4)	64 (14.1)	0.001	363 (79.8)	22 (4.8)	70 (15.4)	0.145	344 (75.6)	43 (9.5)	22 (4.8)	46 (10.1)	
5	Total	81 (8.3)	787 (80.3)	112 (11.4)	1	807 (82.3)	42 (4.3)	131 (13.4)	1	727 (74.2)	127 (12.9)	45 (4.6)	81 (8.3)	1

Of the respondents 66.1% (n=648) stated that adolescent pregnancies could be prevented or decreased by providing sufficient information about the risks of adolescent marriages and pregnancies by means of family physicians and nurses at primary-healthcare-centers rather than other sources of information (Table-3).

		Who should provide education about adolescent pregnancies?									
		FMC**	Hospital	Municipality or NGOs'**	Counselling Centers	No need to	No idea	Others	P*		
		n (%)	n (%)	n (%)	n (%)	n (%)	n (%)	n (%)			
9	Primary School	70 (69.3)	16 (15.8)	0 (0.0)	5 (5.0)	0 (0.0)	10 (9.9)	0 (0.0)			
l of tion	High School	148 (71.5)	20 (9.7)	2 (1.0)	15 (7.2)	1 (0.5)	21 (10.1)	0 (0.0)			
Level of Education	University + College	430 (64.0)	91 (13.5)	15 (2.2)	91 (13.5)	1 (0.1)	42 (6.3)	2 (0.3)	0.02		
500000	Total	648 (66.1)	127 (13.0)	17 (1.7)	111 (11.3)	2 (0.2)	73 (7.5)	2 (0.2)			
	19-28	174 (68.2)	26 (10.2)	10 (3.9)	34 (13.3)	0 (0.0)	11 (4.3)	0 (0.0)	0.014		
SC	29-38	148 (66.7)	29 (13.1)	3 (1.4)	25 (11.3)	1 (0.5)	16 (7.2)	0 (0.0)			
Age Groups	39-48	112 (67.5)	19 (11.4)	2 (1.2)	18 (10.8)	1 (0.6)	12 (7.2)	2 (1.2)			
e G	49-58	94 (60.6)	31 (20.0)	2 (1.3)	15 (9.7)	0 (0.0)	13 (8.4)	0 (0.0)			
Ą.	≥ 59	120 (65.9)	22 (12.1)	0 (0.0)	19 (10.4)	0 (0.0)	21 (11.5)	0 (0.0)			
	Total	648 (66.1)	127 (13.0)	17 (1.7)	111 (11.3)	2 (0.2)	73 (7.5)	2 (0.2)			
<u> </u>	<2000	171 (65.0)	31 (11.8)	9 (3.4)	24 (9.1)	1 (0.4)	27 (10.3)	0 (0.0)	-		
thly ie (E)	2000-5999	345 (68.0)	58 (11.4)	6 (1.2)	63 (12.4)	1 (0.2)	33 (6.5)	1 (0.2)			
Monthly Income (f	≥ 6000	132 (62.9)	38 (18.1)	2 (1.0)	24 (11.4)	0 (0.0)	13 (6.2)	1 (0.5)	0.07		
_ =	Total	648 (66.1)	127 (13.0)	17 (1.7)	111 (11.3)	2 (0.2)	73 (7.5)	2 (0.2)	$\neg$		
1	Female	357 (68.0)	75 (14.3)	7 (1.3)	53 (10.1)	1 (0.2)	32 (6.1)	0 (0.0)	0.13		
Gender	Male	291 (64.0 )	52 (11.4)	10 (2.2)	58 (12.7)	1 (0.2)	41 (9.0)	2 (0.4)			
	Total	648 (66.1)	127 (13.0)	17 (1.7)	111 (11.3)	2 (0.2)	73 (7.5)	2 (0.2)			

When questioning the opinions towards the follow-up of adolescent pregnancies, 85.7% thought that close follow-up of these patients should be performed by Perinatology &Obstetric departments departments to reduce maternal and perinatal complications (Table-4).

Table	4: Opinions to	wards the Follow-	up of Adolescent Pre	gnancies	***					
		Should there be pregnancies?	a special follow-up	for adolescent	Reason for a	special follow-u	p			
		Yes	No	No idea	A	В	C	D	No idea	
		n (%)	n (%)	n (%)	n (%)	n (%)	n (%)	n (%)	n (%)	
200	PS	75 (74.3)	7 (6.9)	19 (18.8)	36 (35.6)	33 (32.7)	10 (9.9)	3 (3.0)	19 (18.8)	
of tion	HS	169 (81.6)	5 (2.4)	33 (15.9)	78 (37.7)	72 (34.8)	23 (11.1)	3 (1.4)	31 (15.0)	
Level of Education	U+C	596 (88.7)	10 (1.5)	66 (9.8)	283 (42.1)	292 (43.5)	24 (3.6)	4 (0.6)	69 (10.3)	
Le	Total	840 (85.7)	22 (2.2)	118 (12.0)	397 (40.5)	397 (40.5)	57 (5.9)	10 (1.0)	119 (12.1)	
	P*	0.000		0.000						
	19-28	225 (88.2)	3 (1.2)	27 (10.6)	106 (41.6)	113 (44.3)	8 (31.1)	1 (0.4)	27 (10.6)	
s	29-38	185 (83.3)	5 (2.3)	32 (14.4)	85 (38.3)	93 (41.9)	10 (4.5)	3 (1.4)	31 (14.0)	
dno	39-48	130 (78.3)	11 (6.6)	25 (15.1)	69 (41.6)	59 (35.5)	11 (6.6)	3 (1.8)	24 (14.5)	
Age Groups	49-58	136 (87.7)	2 (1.3)	17 (11.0)	56 (36.1)	66 (42.6)	13 (8.4)	1 (0.6 )	19 (12.3)	
\ge	≥ 59	164 (90.1)	1 (0.5)	17 (9.3)	81 (44.5)	66 (36.3)	15 (8.2)	2 (1.1)	18 (9.9)	
4	Total	840 (85.7)	22 (2.2)	118 (12.0)	397 (40.5)	397 (40.5)	57 (5.9)	10 (1.0)	119 (12.1)	
	P*	0.002		0.354						
	<2000	203 (77.2)	14 (5.3)	46 (17.5)	106 (40.3)	83 (31.6)	25 (9.5)	4 (1.5)	45 (17.1)	
Ę Đị	2000-5999	448 (88.4)	6 (1.2)	53 (10.5)	211 (41.6)	213 (42.0)	25 (4.9)	5 (1.0)	53 (10.5)	
Monthly Income (E)	≥ 6000	189 (90.0)	2 (1.0)	19 (9.0)	80 (38.1)	101 (48.1)	7 (3.3)	1 (0.5)	21 (10.0)	
M o	Total	840 (85.7)	22 (2.2)	118 (12.0)	397 (40.5)	397 (40.5)	57 (5.9)	10 (1.0)	119 (12.1)	
	P*	0.000			0.001					
L	Female	465 (88.6)	1.0 (19)	50 (9.5)	226 (43.0)	228 (43.4)	23 (4.4)	3 (0.6)	45 (8.6)	
Gender	Male	375 (82.4)	12 (2.6)	68 (14.9)	171 (37.6)	169 (37.1)	34 (7.5)	7 (1.5)	74 (16.3)	
l e	Total	840 (85.7)	22 (2.2)	118 (12.0)	397 (40.5)	397 (40.5)	57 (5.9)	10 (1.0)	119 (12.1)	
	P*	0.022			0.000					

Regression analysis was used to evaluate the factors that determine the perspective of the society on adolescent pregnancies. We found that gender (being female, p=0.034) and educational status (high-school and university graduation, p=0.000) were the factors that define the perspective of the society (Table-5).

Factors		B (SE)	Exp (B)	CI (%95)	P 0.691 <b>0.034</b>
Age		-0.004 (0.009)	0.996	0.978-1.015	
Gender		0.284 (0.134)	1.328	1.021-1.728	
	Married	-0.895 (0.501)	0.409	0.153-1.091	0.074
Marital Status	Single	-0.506 (0.368)	0.603	0.293-1.241	0.170
	2000-5999 t	0.236 (0.2172)	1.266	0.903-1.773	0.171
Monthly income	> 6000 t	-0.026 (0.214)	0.974	0.641-1.480	0.902
	High School	0.872 (0.267)	2.391	1.418-4.031	0.001
<b>Educational Status</b>	University	0.926 (0.266)	2.526	1.501-4.250	0.000
Marriage duration	·	0.008 (0.010)	1.008	0.989-1.027	0.422
Number of Marriage		0.604 (0.432)	1.829	0.785-4.262	0.162
Number of Children		0.092 (0.096)	1.097	0.909-1.324	0.336
Having Adolescent Pre Family	egnancies in the Last 10 Years in the	-0.098 (0.179)	0.907	0.638-1.288	0.584

## **Discussion**

The adolescent period varies from person to person due to factors such as the geography where the person lives, the social structure, the education they receive, and the family structure in general. In addition, depending on

N=980.R2 = 0.044 (Nagelkerke) Model: X2 (9) = 32.947, p> 0.005

A: Early pregnancies carry a high risk of low birth weight, preterm birth, preeclampsia and postpartum problems. So be more care ful with the follow-up.

B: Since most of the early pregnancies are underage, their physical and psychological development will be inadequate and their follow-up should be done more frequently.

C: Pregnant women should be monitored more closely since early pregnancies have a higher risk of maternal death.

P: Pregnant at early ages do not differ significantly from other pregnant. Therefore, no application is required.

\*\* Chi-Square Test

PS, Primary School; HS, High School; U+C, University and/or College

the socioeconomic and sociocultural level, the community's expectations from adolescents and young people show distinct differences. The Ministry of Family and Social Policies conducted in 2006 and 2011 a survey called "Family Structure Survey in Turkey" (Türkiye'de Aile Yapısı Araştırması; TAYA) where the researcher questioned the types of weddings of already married couples. <sup>16</sup> In 2006 they investigated the first, second, third, fourth, and the last marriages of the couples, while in 2011 they questioned the first and the last marriage. According to their findings 10% of marriages were civil marriages, while 3% were performed according to religious ceremonies only and 86% were performed according to both civil and religious ceremonies. In 2011, those who preferred civil and religious ceremonies only were 3% in both groups, while those who preferred both ceremonies together were 94%. This study indicates that the request for religious ceremonies tend to increase in the Turkish society.

Our study also resulted in a high percentage of respondents who think that both ceremonies should be held together, though not as much as the TAYA study. It is also remarkable that the number of people who want both ceremonies together increases slightly as the age gets smaller (19-28 age 64.7%. 29-38 age 69.8 %.). Accordingly, the values and beliefs of the Turkish society seem to change religiously.

According to The Turkish Statistical Institute, while the number of married boys between 16-17 years of age in 2015 in Turkey was 1483, the number of girls married at the same age range was 31.337. Again, according to Turkish Statistical Institute 2015, the number of adolescent mothers giving birth was 19.104, which consisted of 1.43% of total births in Turkey. <sup>17</sup> This rate has decreased slightly over the years and adolescent deliveries in 2018 became 0.95% of total births. <sup>17</sup> In the light of The Turkish Statistical Institute between 2015 and 2018, an increase in both household income and education level stands out. <sup>16</sup>

In the literature, there is a study conducted in Malaysia in 2008 by Omer et al., they found that adolescent pregnancies were inversely proportional to income level and education level. Identically, we observed that the income and education levels of the respondents were effective in the formation of their perspective on having a child before the age of 19 in our study. Also, the rate of approval for adolescent pregnancies increases as income and education levels decrease and the ideal marriage age increases as the socioeconomic level increases due to the increase in income level. This shows that the decline in adolescent pregnancies over the years with the increase in income and education level in our Turkey also coincides with our findings.

There are studies in the literature that claim pregnancies in adolescence cause peri and postnatal problems. Melekoğlu et al. revealed in 2013 that adolescent pregnancies cause increased rates of preterm deliveries, preeclampsia, anemia, congenital abnormalities compared to pregnancies above the age of 19. <sup>11</sup> Keskinoglu et al. also claimed in a study comprising of 945 adolescent pregnant in 2007 that, preterm deliveries are significantly increasing during the adolescent years. <sup>15</sup>

In our study, where we examined the perspective of the community about adolescent pregnancies, we found that a significant majority of respondents thought that adolescent pregnancies are objectionable. Volunteers in our study think that preventing these pregnancies will decrease maternal and infant mortality and follow-up of pregnant adolescents should be more frequent and careful.

A study conducted by Pirdal et al. in 2016 investigated pregnancy follow-up and the level of knowledge of pregnant women. They found that there was no significant difference between the knowledge levels of pregnant women who obtained information from their primary care physician and those who obtained information from their physicians working at the secondary and tertiary level healthcare services. <sup>19</sup>

Our participants believed that adolescent pregnancies should be closely monitored. They stated that Family Physicians, who are the most accessible healthcare professionals, should carry out this follow-up, as well as provide the public with medical information about adolescent pregnancies. Our study has also some limitations. The fact that the sample in which we conducted the study is in a region of Ankara with a high socio-cultural and socioeconomic level has restricted the overall view of the country.

## Conclusion

Adolescent pregnancies are a social health problem that can negatively affect all periods of life, both psychologically and physiologically. Considering that any problem that may occur in adolescence period may have important consequences in a person's life, which Ericson defines as the period of identity confusion against gaining identity, a pregnancy occurring at this age will affect the whole life of the young person. This situation can go so far, that having children at this age can negatively affect the social status, responsibilities, education, and health of the adolescent.

Taking measures to raise the socioeconomic level and the level of education, especially in the population at risk, may be beneficial in reducing the dimensions of this issue. Family Physicians, to whom society applies initially in terms of health, have a great responsibility in this regard. Primary healthcare professionals should raise public awareness about the complications of adolescent pregnancies and other problems encountered both during

their 15-49 age follow-ups and their general dialogue with the population of responsibility. Again, it would be beneficial to monitor pregnant adolescents identified in Family-Health-Centers more closely.

All authors declare that: no support, financial or otherwise, has been received from any organization that may have an interest in the submitted work; and there are no other relationships or activities that could appear to have influenced the submitted work.

This study was supported by Baskent University Research Fund.

#### **References:**

- 1. McIntyre P. Pregnant adolescents delivering on global promises of hope., WHO Library Cataloguing-in-Publication, Geneva, 2006;4-7.
- 2. Hatipoglu N. Pubertal period and its problems. Turkish Journal of Family Practice. 2012;16:1-13.
- 3. Sungurtekin Ozkan M. The Assumed Role of the Jurisdiction in the Preventation of the Juvenile Marriages. Journal of Yasar University. 2013;8:2177-2189.
- 4. Turkish civil code. Law N. 4721, dated 7/12/2002. Article 11.
- 5. Dogan A, Cebioglu S. Emerging Adulthood: A Period between Adolescence and Adulthood. Turkish Psychological Articles. 2011;14(28):11-21.
- 6. Atak H, Cok F. A new period in human life: Emerging adulthood. Journal of Childhood and Adolescence Mental Health. 2010;17(1):39-50.
- 7. Hacettepe University Institute of Population Studies (2014) "2013 Demographic and Health Surveys" Hacettepe University Institute of Population Studies. Turkish Ministry of Development and TUBITAK. Ankara. Turkey. 2014;60 table:4.1
- 8. Hacettepe University Institute of Population Studies (2019) "2018 Demographic and Health Surveys" Hacettepe University Institute of Population Studies. TC Presidential strategy and budget department and TUBITAK. Ankara. Turkey. 2018;68 table:5.12
- 9. Kaya V, Yalcinkaya O. Can population be a source of economic growth?: A historical look at "at least three-child policy" Ataturk University Journal of Economics and Administrative Sciences. 2014;28(1):165-198.
- 10. Gurses I, Kilavuz MA. The Importance of Intergenerational Religious Education and Communication in Terms of Psychological Developmental Stages Theory of Erikson. Uludag University The Review of The Faculty of Theology.2011;20(2):153-166.
- 11. Melekoglu R, Evruke C, Kafadar T, et al. Perinatal Outcomes Of Adolescent Pregnancy. JTurk Soc Obstet Gynecol. 2013;10(4):213-9.
- 12. Bespinar FU. Research on family structure in Türkiye, findings, and recommendations. Eds. Turgut M, Feyzioglu S. Ministry of family, labor and social services, general directorate of family and community services. Research and Social Policy Series 07. Cizge Tanıtım ve Kırtasiye Ltd. Şti, İstanbul, 2014;168.
- 13. Koyun A, Taşkın L, Terzioğlu F. Women Health and Psychological Functioning in Different Periods of Life: Evaluation of Nursing Approach. Current Approaches in Psychiatry. 2011;3(1):67-99.
- 14. Mason E. WHO guidelines on preventing early pregnancy and poor reproductive health outcomes among adolescents in developing countries. 2011;1-9. https://apps.who.int/iris/bitstream/handle/10665/44691/9789241502214\_eng.pdf;jsessionid=F72BCC203CD64A4229 7A9B3591A5D2A2?sequence=1. access date: 05 October 2020.
- 15. Keskinoglu P, Bilgic N, Picakciefe M, et al. Perinatal outcomes and risk factors of Turkish adolescent mothers. J Pediatr Adolesc Gynecol. 2007; 20(1):19-24.
- 16. Bespinar FU. Research on family structure in Türkiye, findings, and recommendations. Eds. Turgut M, Feyzioglu S. Ministry of family, labor and social services, general directorate of family and community services. Research and Social Policy Series 07. İstanbul, Çizge Tanıtım ve Kırtasiye Ltd. Şti. 2014, p:143.
- 17. Turkish Statistical Institute, Central Dissemination System. TURKSTAT Population and demographic information. 2020; https://biruni.tuik.gov.tr/medas/?locale=en, access date: 05 October 2020.
- 18. Omar K, Hasim S, Muhammad N.A, Jaffar A, Hashim S.M, Siraj H.H. Adolescent pregnancy outcomes and risk factors in Malaysia. International Journal of Gynecology & Obstetrics. 2010; 111(3): 220-223.
- 19. Pirdal H, Yalçın B.M, Ünal M. Knowledge levels of pregnants on their pregnancy and the related factors. Turkish Journal of Family Pratices.2016; 20 (1): 7-15.