# Personality Attributes of Israeli Unmarried Pregnant Adolescents

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Keywords: pregnant adolescents, ego-strength, sex-role identity

Abstract: The aim of this study was to expand the understanding regarding psychological characteristics of pregnant adolescents. Twenty unmarried pregnant adolescents, ranging in age from 15–19, were compared with two matched groups of non-pregnant adolescents: One group included subjects who were sexually active, but used contraceptives, the other group reported no involvement in sexual activity. Based on Erikson's theory of ego development, it was hypothesized that pregnant adolescents will demonstrate less ego-strength and have more problems in sex-role identity than non-pregnant ones. Most of the findings confirmed the hypothesis regarding ego-strength. Findings regarding sex-role identity were in the predicted direction, but less conclusive. The discussion addressed the issue of whether these characteristics are the cause or the result of the pregnancy.

Zusammenfassung: Persönlichkeitsstruktur von ledigen schwangeren Jugendlichen in Israel. Das Ziel dieser Untersuchung war es, unser Verständnis über die psychologischen Merkmale schwangerer Jugendlicher zu vertiefen. 20 unverheiratete schwangere Jugendliche im Alter zwischen 15 und 19 Jahren wurden mit zwei Kontrollgruppen nichtschwangerer Jugendlicher verglichen: dabei waren die Mitglieder der einen Gruppe sexuell aktiv (mit Kontrazeptiva), und die andere Gruppe hatte keine sexuellen Beziehungen. Auf der Grundlage von Eriksons Theorie der Ich-Entwicklung wurde angenommen, daß schwangere Jugendliche eine geringere Ich-Stärke haben und mehr Probleme in der Geschlechtsrollenidentität als nichtschwangere Jugendliche. Die meisten der Ergebnisse bestätigten die Hypothese in bezug auf die Ich-Stärke. Die Ergebnisse in bezug auf die Geschlechtsrollenidentität gingen in die vorhergesagte Richtung, waren aber weniger signifikant. Die Diskussion behandelte die Frage, ob diese Eigenarten die Ursache oder die Folge der Schwangerschaft sind.

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Considerable research has been undertaken in an attempt to characterize sociocultural, and demographic background of unmarried adolescent mothers (Hayes, 1987; Farber, 1994; Jacobs, 1994; Leynes, 1980, Lightman & Shlesinger, 1982; Selman & Glendinning, 1996; Sobol & Daly, 1992; Trent & Harlan, 1994). Re-

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searchers also investigated psychological aspects of adolescent mothers' parenting (East & Felice, 1996), causes which determine teenage mothers' decision to raise the child or place it for adoption (Deykin, Campbell & Patti, 1984; Donnelly & Davis-Berman, 1994; Dworkin, Harding, Schreiber, 1993; Pannor, Baran, & Sorosky, 1978; Resnick, 1987), and the consequences of this decision for the mother and child (Burnell & Norfleet, 1979; Furstenberg, Levin & Brooks-Gunn, 1990; Winkler & van Keppel, 1984). However, as stated by Brooks-Gunn and Furstenberg (1989), psychological characteristics of these mothers were less investigated. This study presents an attempt to learn about psychological attributes of unmarried pregnant adolescents. It is hoped that the expansion of research in this direction will provide new insights as to why some adolescents are in greater risk for early pregnancy or childbearing. A deeper understanding of the psychological aspects involved in early pregnancy or childbearing may also help in identifying factors which mediate the emotional reactions to this situation and decisions made about pregnancy or motherhood. Finally, it may be suggested that such understanding will improve the efficacy of preventative interventions which aim at reducing the occurrence of teen parenthood and its adverse consequences for the mother and the child.

A look at the available literature indicates that most of the studies which compared personality attributes of pregnant teens and teen mothers with those of nonpregnant or nonparenting adolescents, describe the first two groups as suffering from psychological weaknesses. Teens who become pregnant or mothers tend to lack adequate ego and superego (Babikian & Goldman, 1971), have low self-esteem (Mindick & Oskamp, 1982), tend to romanticize life and pregnancy (Medora, Goldstein, von der Helen, 1994; Rosenthal, Muram, Tolley, McAlpine, 1993), are externally controlled, have low social competence and frequently act out (Meyerovitz & Maley, 1973; Connally, 1975; Passino, Whitman, Borkovski, 1993). They are more impulsive, have difficulties making long-term plans and solving problems (Passino, Whitman, Borkovski, 1993), tend to have more irrational beliefs (Westphal & Wagner, 1993) and are more depressed (McCue, Horowitz, Klerman, Sung Kuo & Jekel, 1991). On the other hand there are studies which report no relationship between self-esteem and early pregnancy (Medora, Goldstein, von der Helen, 1994; Meyerowitz & Maley, 1973: Robbins, Kaplan, Martin, 1985) or even that under specific circumstances such as father absence, or perceived family stress, adolescents who have low self-esteem are less at risk for pregnancy than are their more confident peers (Robbins, Kaplan, Martin, 1985).

Despite the inconsistency regarding self-esteem, it seems that pregnant teens and teen mothers display considerable emotional difficulties, which make them more vulnerable in coping with the personal and interpersonal pressures of adolescence, as well as with their particular problems. If this vulnerability existed before they became pregnant it may be claimed that pregnancy is either a result of these difficulties or was motivated by them. Possible motivations could be looking for ways to resolve the difficulties by receiving external support, or by trying to enhance feelings of competence through sexual activity and motherhood (McCue, Horowitz, Klerman, Sung Kuo & Jekel, 1991; Selman & Glendinning, 1996). On the other hand it should be noted that the findings which indicate emotional weakness, are based on studies in which subjects were evaluated, in a situation

which may be defined as a crisis. This raises the question whether evaluations made during unplanned and unwelcomed pregnancy or motherhood, often at a time when decisions to keep or relinquish the child are considered, or shortly after childbearing reflect the personal characteristics of the subjects or rather the way in which they react to a crisis. The question whether any characteristics are the outcome of the particular situation or consequences of previous psychological determinants will remain unresolved until prospective and longitudinal data will be available.

The present research does not offer a step forward in applying a prospective or longitudinal methodology. However, we tried to enlighten the antecedents – consequences problem by focusing on variables which represent more stable cognitive configurations, namely, trait type characteristics rather then reactive – state type characteristics. In choosing the variables representing "psychological attributes" we were also aware of Brooks-Gunn & Furstenberg (1989) and Sobol & Daly, (1992), suggestions that in investigating adolescents' sexual behavior attention should be directed particularly at characteristics which are theoretically related to developmental processes during adolescence. Based on the state-trait differentiation and Erikson's developmental theory (1963, 1968), the interest was directed at ego development as represented in ego-strength (ES), and at aspects of sex-role identity (SRI). These personality attributes may be differentiated from reactive responses like, depression, anxiety or distress.

Another attempt for characterizing the group of interest more specifically was undertaken by comparing it with two other groups of adolescents which displayed preventative behaviors regarding pregnancy. The group of pregnant adolescents was compared with two matched groups of non-pregnant adolescents. One group consisted of adolescents who reported being sexually active, but used contraceptives, and a second group who reported no involvement in sexual experiences. This comparison is more specific than the often reported comparison between pregnant or childbearing teens and nonpregnant, nonparenting groups. Assuming that traits are evaluated, information obtained from a more controlled comparison may be considered as providing clearer information regarding the characteristics which differentiate between adolescents who became pregnant and others who did not.

A short review of Erikson's theoretical propositions regarding developmental experiences in adolescence demonstrates the relevance of his thinking to the phenomenon of teens' pregnancy and childbearing. According to Erikson, adolescents are confronted with a variety of tensions some of which originate from biological pressures, others from parental or peer expectations. Meeting these challenges adequately depends on experiences from previous developmental stages and on the ability to integrate past and present experiences into a meaningful personal identity. This integration is represented by a "sense of ego identity", implying that one is able to maintain a "sense of inner sameness and continuity", that others perceive this sameness and continuity, and that this process is accompanied by a development of an appropriate sex-role which is essential for the development of self identity (Erikson, 1963, 1968).

"Identity", "ego sense" or "ego-strength" are abstract constructs. When applying these constructs to research, more operational formulations which include functions that reflect them are needed. Barron's (1953), suggestion which corre-

sponds to Erikson's ideas (1963; 1968), and is accompanied with a measure of ES, appeared to be very appropriate for this study. It specifies and evaluates the following aspects of ES: Self control (ability to tolerate frustration and control impulses), self investment (ability to plan, and engage meaningfully in goal directed behavior), mental well-being (ability to deal with affects), conformity (sense of belonging to a general value system), and physical health (a sense of being able to rely on the body).

Sex-role identity was not included in the above configuration. However, since it is an important aspect of general ego sense and strength, and since the focus in this study was on ego identity of females, we employed a measure which taps upon feminine identity as represented in views regarding motherhood, perceptions of relationships with personal mothers, and views about femininity. Perceived mother—daughter relationship, is of special interest because recent research findings indicate that it influences the choice of adolescents to mother (Jacobs, 1994), their psychological and social adjustment (Crockenberg, 1987; Davis & Rhodes, 1994), and their expectations from their infants (Contreras Rhodes & Mangelsdorf, 1995).

Relating these ideas to adolescents' sexual behavior it is plausible to suggest that adolescents with a stronger ego and sense of sexual identity display more responsible behaviors, can anticipate future consequences and thus avoid risks by either using contraceptives or by postponing sexual activity. They also need less reassurance of their adequacy by proving that they are being loved, able to love, and care for a human being who depends on them. More specifically, the hypotheses that were tested in this study are: 1. Pregnant adolescents will demonstrate lower ego-strength than non-pregnant adolescents. 2. Pregnant adolescents will report more difficulties with sex-role identity than non-pregnant adolescents.

## Method

Subjects

Sixty adolescents, ranging in age from 15–19 participated in the study. Twenty, were in the third trimester of pregnancy. All of them stated that they did not use contraceptives and that the pregnancy was unplanned. Fourteen, decided to place the child for adoption and were in a maternity residence, 6 were still deliberating whether to keep the child or place it for adoption. Since there were no significant differences between the two groups on any of the background or dependent variables, we refer to them as one group of pregnant adolescents (PA). The fact that parenters and placers do not differ significantly was previously repotted also by Kalmuss, Namerow & Bauer, (1992), and McLaughlin & Manninen (1988).

On the basis of questionnaires completed by a comparable sample of 130 adolescents, the PA group was matched with two other groups of twenty subjects each. The following variables were considered for matching: Age, number of years of education, country of mother's and father's origin, parents' socioeconomic level, and community (city, rural). Thirty six respondents stated that they had engaged in sexual activity more than a few times, but in order to avoid pregnancy used contraceptives. Based on matching on the above mentioned variables 20 of these respondents were chosen to compose the first control group. This group will be

referred to as the sexually active group (SA). Eighty one respondents stated that they did not engage in sexual activity, namely were not active sexually. Twenty of these respondents were chosen to compose the second control group. Subjects in the second control group will be referred to as not active sexually, (NAS). Thirteen from the responders did not provide information about sexual activity and were not considered for any of the control groups.

#### Instruments

Ego-strength was evaluated by Barron's (1953), Ego-Strength (ES) scale which is based on items from the MMPI. The 50 items scale was translated and adapted to Hebrew by Koren, (1987). The adaptation was based on principle component analysis with varimax rotations. The results indicated a multi-dimensional structure involving 5 factors. These factors accounted for 58.2% of the variance. Only items loading .30 on a factor were retained. This procedure produced the final version of the scale, it includes 47 items which constitute five factors of 9–10 items each. The factors represent Barron's (1953) original themes: self control, self investment, mental well-being, conformity and physical health.

SRI was evaluated by three sub-scales from a four sub-scales questionnaire which assesses women's attitudes to different aspects of the feminine role. The sub-scales depict attitudes towards motherhood, daughter-mothers relationship, and femininity. The questionnaire was developed by Kipper, Zigler-Shani, Serr & Insler (1977), and originally used in a study on psychogenic infertility. The fourth sub-scale of the original questionnaire relates to attitudes towards the spouse was not relevant to this study. The questionnaire has an objective version which represents normative attitudes or conformity with general norms, (Objective Social Perception Inventory) and a subjective version which represents personal experiences and attitudes (Subjective Social Perception Inventory). The objective version includes items such as "women are close to their mothers", and the subjective version includes items like, "I find it difficult to consult my mother with personal problems". Each version includes 18 items which are rated as true or false. The subscales include six objective and six subjective items (three positive and three negative). A detailed description regarding the construction of the instrument is provided by Kipper, Zigler-Shani, Serr & Insler (1977). It involved items' selection and allocation based on ratings of five judges, split-half reliability tests, validity tests based on correlations with a criterion measure (Lakin Projective Test, Lakin, 1957) and significant mean differences between psychogenically infertile and mechanically infertile women. Both in the original study and in this study the main interest was in the subjective form of the instrument.

# Personal Information

In order to form the control groups a short questionnaire was devised. The main questions related to personal and family background and to information about sexual activity, it's frequency, and use of contraceptives. These questions however, were embedded among other questions relating attitudes towards smoking, having a boy-friend, and ideas about adolescence.

### **Procedures**

The pregnant adolescents were recruited through a maternity residence. At the time of conducting the study fourteen boarded in the residence, and six were in contact with it. All agreed to participate. In order to assure anonymity, only basic information was released about the subjects and their families. The question-naires were administered by the staff of the maternity residence. The researchers did not meet the subjects, they obtained completed anonymous material. Subjects for the control groups were recruited from 130 adolescents who completed the personal information questionnaire, mainly in schools, in the same communities from which the pregnant adolescents originated. They were asked to complete also the ES and SRI questionnaires, but only the questionnaires of subjects who were assigned to the control groups were used. The variables for matching were specified in the subjects section.

#### Results

Results regarding group comparisons on ES are presented in Table 1. The analysis includes a total score which indicates general ES, and scores on the different subscales. Presented are means, standard deviations, results of one way ANOVAs, which when significant, were followed by posthoc Sheffe Test for between groups comparisons.

Table 1. Ego Strength: Comparison in the three investigated groups

Variable/	Total score		Self control		Self investment		Mental well-being		Conformity		Physical health	
Group												
	M	SD	М	SD	M	SD	М	SD	М	SD	М	SD
PA	2.59	0.37	2.51	0.43	2.57	0.56	2.31	0.54	2.56	0.45	2.93	0.41
SA	2.90	0.38	2.85	0.58	3.08	0.57	2.81	0.53	2.83	0.36	2.44	0.32
NAS	2.94	0.27	2.90	0.32	3.25	0.33	2.74	0.46	2.77	0.31	3.07	0.37
F =	6.36**		3.71*		9.95***		5.69***		2.79		0.90	
Group Comparisons	PA <sa, nas<="" td=""><td colspan="2">PA<sa, nas<="" td=""><td colspan="2">PA<sa, nas<="" td=""><td colspan="2">PA<sa, nsa<="" td=""><td colspan="2">-</td><td colspan="2">-</td></sa,></td></sa,></td></sa,></td></sa,>		PA <sa, nas<="" td=""><td colspan="2">PA<sa, nas<="" td=""><td colspan="2">PA<sa, nsa<="" td=""><td colspan="2">-</td><td colspan="2">-</td></sa,></td></sa,></td></sa,>		PA <sa, nas<="" td=""><td colspan="2">PA<sa, nsa<="" td=""><td colspan="2">-</td><td colspan="2">-</td></sa,></td></sa,>		PA <sa, nsa<="" td=""><td colspan="2">-</td><td colspan="2">-</td></sa,>		-		-	

Note: PA = pregnant adolescents; SA = sexually active; NAS = not active sexually

All df = 2/57; \* p<.05; \*\* p<.01; \*\*\* p<.001

Results indicate that the PA group differed significantly from the two other groups on the total score F(2,57) = 6.36, p = .003, and on three sub-scales: Self control, F(2,57) = 3.71, p = .03, self investment, F(2,57) = 9.95, p = .000, and mental well-being, F(2,57) = 5.69, p = .000. The difference on the conformity sub-scale approached significance, F(2,57) = 2.79, p = .07. On all these measures PA obtained lower scores than the two other groups. The differences among scores of the physical health sub-scale, did not reach significance.

Table 2 presents data obtained from the SRI measure in the three compared groups. Since none of the comparisons of the objective version of the scale reached significance, only the total scores of the groups on this part of the questionnaire are presented. Sub-scales scores are presented only for the subjective part of the

Variable/ Group	Object total so		Subjective total score		Attitude to motherhood		Daughter-mother relationship		View of femininity	
	М	SD	М	SD	М	SD	М	SD	М	SD
PA	1.81	0.14	1.54	0.14	1.57	0.23	1.58	0.23	1.51	0.26
SA	1.78	0.16	1.36	0.19	1.24	0.19	1.37	0.31	1.48	0.24
NAS	1.77	0.15	1.40	0.15	1.33	0.22	1.41	0.25	1.48	0.19
F =	0.77		6.39**		13.09***		3.63*		0.11	
Group Comparisons	-		PA>SA, NAS		PA>SA, NAS		PA>SA		-	

Table 2. Sex-Role Identity: Comparison in the three investigated groups

Note: PA = pregnant adolescents; SA = sexually active; NAS = not active sexually All df = 2/57; \* p<.05; \*\* p<.01; \*\*\* p<.001

scale. The same statistical procedures which were applied for the comparison of ES were used in the comparisons on the SRI data.

As may be observed, the results of the objective version of the scale did not reach significance. This means that the investigated groups did not differ significantly on perceiving the prevailing attitudes in their environment towards topics related to femininity. On the subjective level, when referring to personal experiences, the PA group differed significantly, from the other groups, mainly from the SA group. Pregnant adolescents reported significantly more problems regarding motherhood than the two other groups, F(2,57) = 13.09, p = .000, and more problems in relationships with their own mothers than adolescents in the SA group, F(2,57) = 3.63, p = .03, Their total subjective score was also significantly higher than the score of the other groups, F(2,57) = 6.39, p = .003.

It is interesting to note that none of the comparisons on ES or SRI, yielded a significant difference between the two control groups.

#### Discussion

Looking at the results obtained from the ES measure it is evident that PA differ from the two other groups. Almost in all the comparisons, the differences are in the predicted direction. PA reported significantly lower scores in the total measure of ES, and in three of its sub-scales. These findings indicate that in comparison with the two control groups, the PA group was significantly deficient in the ability to exercise self control, to invest themselves, and in mental well-being. Namely, they reported difficulties to control emotions, to be goal oriented, they felt less adequate mentally and less understood by others. The two control groups did not differ from each other on any of these measures indicating that the meaningful differentiation is between pregnant adolescents and those who protect themselves in their sexual behavior by using contraceptives or by refraining from sexual experiences.

The sub-scales which did not produce significant differences between any of the compared groups, were measures of conformity and physical health, although when conformity is considered the PA group manifested a close to significance lower level of conformity than the other groups. This finding may indicate some impairment in social judgment and in the ability to identify with the environment. However, since this finding only approached significance, and was not confirmed by the results from the objective part of the SRI questionnaire this assumption does not gain support.

The findings from the SRI questionnaire, are less conclusive than those obtained with the ES measure, but they lead to similar conclusions and partly support the second hypothesis. First it appears that in the objective version of the questionnaire which represents familiarity with norms and expectations no difference emerged among the groups. The similarity of the groups is manifested in the total score, and in all the specific scores. Combining the findings from the ES and the objective SRI measures it is plausible to suggest that the problems of teens who become pregnant are neither problems of socialization or of physical health, but rather problems in aspects related to the self, and subjective experiences.

Indeed, the groups differed significantly on the subjective level of the SRI measure. The differences in the total subjective SRI scores indicate that the PA group reported significantly more problems in this domain than the two control groups. The examination of the data obtained from the different sub-scales demonstrates that the most obvious difference among the groups, are in attitudes towards motherhood. The PA group, expressed more doubts regarding being ready for motherhood, more resentment at having to give up things when becoming a mother, and anger at the fact that the baby restricts the mother's freedom. The proximity of having to deal with actual motherhood, may explain this response pattern. On the other hand, it may be viewed as a defense which justifies relinquishing the child.

The problematic relationship with the mother, reported by the PA group, confirms previous findings (Davis & Rohdes, 1994) and supports the idea that their sexual involvement may be motivated by search for autonomy and for emotional closeness outside their family of origin (McCue Horowitz, Klerman, Sung Kuo & Jekel, 1991). In contrast to these results, it is interesting to note that SA subjects, those who reported using contraceptives, reported best relationships with their mothers. The difference reached significance only when compared with the PA group, but this is enough to suggest that adolescents who describe relationships with mothers favorably possibly can communicate with their mothers regarding their sexual involvement and benefit from maternal guidance in this respect. On the other hand, adolescents who report less favorable relationships with their mothers either became pregnant or reported refraining from sexual experiences. The fact that open interaction in families may enhance the use of contraceptives was also reported by Casper (1990).

Feminine identity is an important component of the general identity, yet the groups did not differ in this respect. The lack of difference among the groups in views about femininity, may be attributed to the fact that agreement with the items in the scale that was used in this study represents very extreme views. Examples are "I have reasons to complain about being a women", "I feel that in our days to be a woman is too heavy burden", "I am not sure I fulfill my role as a woman in an appropriate way". Apparently very few adolescents, in the compared groups, could agree with these statements. Despite the fact that we did not obtain significant results in attitudes towards femininity, it seems appropriate to continue to investigate this issue by employing more appropriate measures of this variable.

The problems in ES and SRI identified in the PA group, may represent an inadequacy that either led to the complication of an early pregnancy or is an outcome of it, and will continue to cause problems for future adjustment. As previously stated, the design of this study does not permit a clear conclusion whether these characteristics represent antecedents or consequences. However, irrespective of these considerations, in line with Erikson's theorizing that an adequate resolution of any developmental task helps to progress to the next stage in an adaptive fashion, our findings suggest that the demands in adolescence and the need to cope with premature motherhood will interfere with the developmental progress to adulthood and with the ability of coping with future developmental tasks or situational crises.

The practical implications of these findings may be considered with regard to the prevention of early motherhood and even more importantly in case of a decision to parent, for helping the adolescent to enhance her parenthood and the child's well being. In relating to the prevention of teenage pregnancy researchers discuss the importance of providing educational and employment opportunities, sex and family planning education, contraceptive devices, and availability of free legal abortion (Selman & Glendinning, 1996). The present findings reflect the importance of the psychological sphere and point out that in populations at risk for early pregnancy, another preventative route is to establish opportunities for teenage females to enhance personal growth, and an adequate personal and sexual sense of self, including a redefinition of their relationship with their mothers.

When the decision to parent is reached, and this occurs in 90% of the cases (Unger & Wandersman, 1988), the findings of this study may help in preparing teen mothers for their role. Recent findings indicate that compared to children born to older mothers children of teen mothers are born at lower birth weight, experience poorer health, have lasting deficits in IQ, are more likely to fail in school, to run away from home and to encounter problems with the juvenile justice system. Teen mothers tend to have unrealistic expectations about their babies development and have more punitive child-rearing attitudes. As a result often, the children are exposed to harsh parenting and abuse. In turn, children react to this style of parenthood with anger and noncompliance. This elicits more maternal anger and the cycle becomes self perpetuating, creating additional distance between mother and child and eventually, more teen-age pregnancies (Crockenberg, 1987; Furstenberg, Brooks-Gunn, & Morgan, 1987; Mauldon, 1998; Maynard, 1996; Taylor, Roberts, Jacobson, 1997; Unger & Wandersman, 1988). Considering these findings from a preventive view, it is inevitable to see the urgent importance in extending psychological guidance and help to teen mothers. As already noted, the psychological issues which were investigated in this study like aspects of ego development, specifically self control, self investment and mental well-being, as well as aspects of sex role identity, mainly attitude to motherhood and working through relationship with own mother seem very relevant for improving the quality of parenthood. It is also hoped that the attendance to these themes may improve the adolescent mother's ability to acquire education and support from her family or from a male partner, which are key issues in determining her adjustment (Crockenberg, 1987; Taylor, Roberts, Jacobson, 1997).

Finally, though very difficult, time consuming and expensive, given the adverse consequences of premature parenthood for parents, children, and society (Furstenberg, Brooks-Gunn, Chase-Lansdale, 1989; Haskett, Johnson & Miller, 1994; Selman & Glendinning, 1996), it is important to apply rigorous research designs to study all the aspects of the problem and its prevention.

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