

ATTACHMENT PATTERNS FROM THE PERSPECTIVE OF EARLY MALADAPTIVE SCHEMAS³

ABSTRACT

The goal of the research is to test the significance of differences between attachment patterns in terms of frequency of early maladaptive schemas, particularly aimed at better understanding of insecure attachment patterns.

The study was conducted on the sample of students of the Faculty of Philosophy in Nis (N=290). Attachment was assessed by the RQ questionnaire (Relationship Questionnaire, Bartholomew & Horowitz, 1991.). Early maladaptive schemas were operationalized and measured by a short form of the Young Schema Questionnaire (Young, Klosko & Weishaar, 2003.).

The results show that the groups of respondents, formed according to the attachment patterns, differ significantly in relation to the expression of early maladaptive schemas. Early maladaptive forms are significantly more present in groups of insecurely attached respondents. The finding that the highest total score on the Young Schema Questionnaire is achieved by respondents with disorganized attachment patterns is particularly important.

¹ Tatjana Stefanović Stanojević, psychologist, e-mail: sstanja@gmail.com

² Jasmina Nedeljković, psychologist, e-mail: jasmina.nedeljkovic@gmail.com

³ This paper is prepared as a part of the project Indicators and Models of Harmonization of Professional and Family Roles, No. 179002.

Scientific paper
Received: siječanj, 2012.
Accepted: ožujak, 2012.
UDK 159.922.7

Tatjana Stefanović
Stanojević¹

Psychology Department,
Faculty of Philosophy, Niš

Jasmina
Nedeljković²

Faculty for Law and Business
Studies

Department for Business
Psychology
Novi Sad

Key words:

attachment patterns, early
maladaptive schemas.

INTRODUCTION OR THEORETICAL GROUNDS FOR OBSERVING ATTACHMENT PATTERNS FROM THE PERSPECTIVE OF MALADAPTIVE SCHEMAS

The attachment theory is one of the current and frequently used psychological theories (Bowlby, 1968.). According to this theory, inner working models (of self and others) are formed during the childhood through interactions between a child and a caregiver; these models persist while growing up and significantly participate in organizing experience and behaviour of adults (Holmes, 2004.). In addition to the widely applicable theoretical framework another reason for the popularity of the construct is the possibility of reliable detection of individual differences in terms of the attachment quality. Based on behaviour of children in an experimental situation (Ainsworth et al., 1978.) psychologists distinguish four patterns of early attachment. Furthermore, only one pattern characterizes security with a figure of attachment and the primary reaction strategy (the secure attachment pattern), while three patterns characterize different qualities of insecure attachment and the secondary reaction strategy (avoidant, ambivalent, and disoriented).

The question is what happens to the adopted reaction strategies after childhood and if there is an equally reliable way to identify them in adulthood. It should also be mentioned that the patterns in adulthood are somewhat differently named: the secure pattern, the dismissing pattern, the preoccupied and the disorganized. Recognizing strategies that dominate in the insecure patterns would contribute to a more comprehensive understanding and treatment of numerous psychopathological changes, which has been an insufficiently developed aspect of the attachment theory so far (Main, 1999.).

The cognitive psychology concept of the existence of dysfunctional schemes, or false beliefs about self and relations with others by J. Young could contribute to a better understanding of functioning of self and others (Young, Klosko & Weishaar, 2003.). Young defines schemas as the deepest level of cognition - as a broad and pervasive theme or pattern. He calls them early and maladaptive because they occur early in development and they take part in creating and maintaining proneness to different disorders. These are unconditional beliefs of a person about oneself in relation to the surrounding, which is dysfunctional in a significant and repetitive way. Namely, schemas can be recognized by the same overreaction to the same type of situation; they are activated by similar events - relevant for a particular schema. They are mainly results of bad experiences with parents, siblings, and peers. They are self-maintaining and resistant to changes. They subsist by means of cognitive distortions: people avoid behaviors that could test or override a particular schema.

Based on observations over many years (of mainly clinical population), Young describes eighteen maladaptive schemas, organized in seven (Schmidt et al., 1995.; Nikoloski Končar et al. 2006.), or five domains (Young, 2003.). Numerous factual researches resulted in further

revisions of the number of schemas. We shall present the version with fifteen schemas grouped into five domains (Young & Brown, 1990.; Young, Klosko & Weishaar, 2003.).

The domain of disconnection and rejection is related to the belief of a person that it is impossible to find predictable and stable satisfaction of the need for security, safety, and contact with others. This domain contains: a belief that no one will ever respond to our emotional needs (emotional deprivation); a belief that a relationship with a significant other will suddenly fall apart (abandonment, instability); a belief that others think only about themselves and that they would not stop at anything to satisfy their own needs (mistrust, abuse); a belief that one is different and does not belong to any group (social isolation/alienation); a belief that one is less worthy and inferior to others (defectiveness/shame).

The domain of impaired autonomy and performance includes schemas relating to the feeling that one cannot be separated from others and to function independently from others. It is related to unestablished identity and insufficiently defined goals in life. Impaired autonomy and performance include: a belief that one is unsuccessful in areas of achievement (failure); a belief that one is helpless and incapable to handle daily problems (dependence/incompetence); a belief that a sudden catastrophe will strike (vulnerability to harm or illness); a belief that involvement with others can be realized at the expense of individuality and normal social development (enmeshment/symbiosis).

The domain of impaired limits includes the way a person relates to long-term goals and specifically to others. The relation toward goals is shown as intolerance to frustrations in the process of fulfilling goals (insufficient self-control, self-discipline). The relation toward others is characterized by giving less rights and competence to others (entitlement, grandiosity).

The domain of other-directedness is a belief that one has to be submissive in contacts with others, and that one should give precedence to the needs of others. It is a belief that it is necessary to give control over one's own life to others in order to avoid their anger (subjugation); and a belief that it is necessary to satisfy other people's needs at one's own expense (self-sacrifice).

The domain of overvigilance and inhibition contains a belief that one is incapable to control one's own emotions and impulses (emotional inhibition), as well as a belief that one has to succeed in everything both in professional and in private life (unrelenting standards, hypercriticism).

If we understand the schemas as filters which, by filtering information, contribute to a certain (false) experience of the reality, we can expect that the attachment patterns will be different in frequency of certain maladaptive schemas in accordance with the inner working models of self and others that are applicable for that particular pattern.

ASSUMPTIONS ON FREQUENCY OF CERTAIN DOMAINS OF IMPAIRMENT IN ATTACHMENT PATTERNS

Persons characterized by secure attachment patterns have the positive inner working model of the self and the positive working model of others. The theory (Thompson, 1999) suggests that these are persons to whom it was possible in childhood to maintain primary strategy reactions because they were given consistent and adequate responses to their signals by their significant others (mostly mothers). Based on such experience they developed both a positive self-image and a positive image of others. Since there was no need to develop secondary reaction strategies we can assume that the frequency of the early maladaptive schemas will be the lowest.

The preoccupied pattern is characterized by the negative inner working model of self and the positive inner working model of others. Selective availability of significant others (mostly mothers) contributed to forming a negative image of the self and to developing strategies of drawing attention and affection of the positively valued and significant others. In accordance with this, it can be expected that persons who fall into this pattern have developed beliefs from the domain of impaired autonomy and other-directedness.

The dismissing pattern is characterized by the negative inner working model of others and the positive inner working model of self. Distrust in consistently unavailable significant others, which is acquired in early childhood, results in a strategy of relying only on oneself. This is a possible reason for nourishing beliefs from the domain of disconnection and rejection, as well as from the domain of overvigilance.

The disorganized pattern is characterized by both the negative inner working model of self and the negative working model of others. According to the theory, people with this type of attachment were faced with situations which caused fear during their childhood, but it was not possible for them to find a coping strategy. The researchers (Lyons-Ruth & Jacobvitz, 1999.) believe that the children who fall into this pattern perceive significant others either as scared or scary. In either situation they are led to a paradox: they desire to be close to others, but at the same time that very contact with others makes them scared. Consequently, one can expect impaired autonomy, communication, and limits, i.e. the beliefs from all the domains.

OVERVIEW OF AVAILABLE EMPIRICAL EVIDENCE

The overview of the available empirical evidence confirms dysfunctionality of the schemas: a high frequency of early maladaptive schemas is a predictor of bad interpersonal relations and worse adaptation (Freeman et al., 2002.); a high frequency of the schemas of enmeshment/symbiosis and unrelenting standards is a predictor of emotional exhaustion (Rittenmeyer, 1997.). Significant correlations between the early maladaptive schemas and

personality disorders have also been found (Schmidt et al., 1995.), as well as between early maladaptive schemas and eating disorders (Meyer & Gillings, 2004.). Schmidt and colleagues (Schmidt et al., 1995.) have researched whether there are connections between the maladaptive schemas and distress, anxiety, depression, self-confidence, and vulnerability to depression. According to this research the schemas of dependence/incompetence and defectiveness are significant predictors of depression, while the schemas of vulnerability and emotional inhibition are significant predictors of anxiety. In a Serbian research of the maladaptive schemas (Nikoloski Končar, Zotović & Hautekèete 2006.) the authors have tried to establish whether there are differences between children who lived in bombarded cities and children who were not directly imposed to the bombardment in terms of prevalence of the early maladaptive schemas. The research has shown that the examined schemas are more frequent in children from the bombarded cities.

Research of the maladaptive schemas and attachment patterns is rare and mostly done on clinical samples (Baker & Beech, 2004.; Mason, Platts & Tyson, 2005.). Results of this research confirm significant differences between the patterns in terms of the frequency of the maladaptive schemas: the disorganized pattern is identified as the pattern with the highest level of frequency of all schemas, after which the preoccupied attachment pattern follows. We single out several domestic researches from those that have been conducted on nonclinical samples (no foreign research on nonclinical sample is available). The results of the research performed on students of the universities of Banja Luka and Zagreb (Hadžić Krnetić, Mirović & Štefanec, 2011.) show significant differences in frequency of most maladaptive schemas. According to the finding in this research, the maladaptive schemas are most frequent in people with the preoccupied attachment pattern. However, in words of the author: "The disorganized pattern is not different in any schema from the preoccupied pattern, which can be explained by a small number of the respondents with the disorganized pattern in our sample, N=9" (Štefanec, 2010.: 58). The research conducted on students of the University of Novi Sad (Mihić, Zotović & Petrović, 2008.) also confirms that the attachment patterns are significantly different in terms of frequency of the early maladaptive schemas, and that the highest score of the early dysfunctional schemas is reached by respondents with the preoccupied attachment pattern, but the authors of this research also stress that the number of the respondents with the disorganized pattern (N=1) did not allow this attachment style to be included in most analyses.

Since both the theory (Main & Hesse, 1990.) and the research on clinical population indicate that the disorganized pattern is the most vulnerable one (Mason Platts & Tyson, 2005.), it would be important to plan research on nonclinical population, which would include a sufficient number of respondents who fall into the disorganized pattern and to examine the frequency of the maladaptive schemas in respondents with the disorganized attachment. This was one of the motives to plan the research on a sufficiently large and non-clinical sample. Since the RQ (Relationship Questionnaire, Bartholomew & Horowitz, 1991.)

has been used in a recent study of attachment patterns, that has also been conducted on the sample of students, (Stefanović Stanojević & Tošić, 2011.), and since the results have shown that the disorganized pattern is the second most common in the obtained distribution of patterns (17.6%), we have decided to conduct a pilot research within this research in order to check whether there are differences in relation to the used assessment instrument. The pilot research has been conducted using three instruments: RQ, Bartholomew & Horovitz, 1991.; CRQ, Bartholomew & Shaver, 1998.; ECR, Brennan et al., 1995., modification of Kamenov & Jelić, 2003.; it has confirmed that the assessment using the RQ gives a higher frequency of the disorganized pattern. A possible explanation for this finding lies in the manner in which the disorganized pattern is presented in the RQ: the description of the state and the dilemmas of a disorganized person in the RQ is less unacceptable for respondents than items referring to the disorganized pattern in the other two mentioned tests.

The overview of empirical research shows a lack of research (on a non-clinical sample) in which the frequency of maladaptive schemas is assessed in reference to all the four patterns of the research, as well as a lack of research in which the goal is an examination of a possible correlation between the domains of impairment and the attachment patterns.

The research is designed based on these mentioned problems.

METHOD

PROBLEM

The basis of the research is an attempt to examine two problems:

- the frequency of maladaptive schemas in attachment patterns on a non-clinical sample;
- the frequency of domains of impairment in certain attachment patterns.

Basic hypotheses that we set are:

- the existence of significant differences in the intensity of maladaptive schemas in students with different attachment patterns is expected. More precisely, it is expected that the lowest frequency of maladaptive schemas is found in the secure patterns, and the highest in the disorganized attachment pattern;
- the existence of significant differences is expected in relation to the frequency of domains of maladaptive schemas between students who belong to different attachment patterns. More precisely, it is expected that persons with the secure pattern will not have significantly present maladaptive schemas in any domain, persons with the preoccupied pattern will have most maladaptive schemas from the domain of impaired autonomy and other-directedness, persons with the dismissing pattern will have most maladaptive schemas from the domain of disconnection and rejection and the domain of overvigilance, and finally, persons with the disorganized

pattern will have significantly present maladaptive schemas in all the domains of impairment.

Determining a specific relation of frequency of maladaptive schemas within particular attachment patterns would contribute to a better understanding of behavior and expectations of people, which are formed by certain patterns through dominant (false) beliefs. A specific contribution of this research is an attempt to gather enough respondents with the disorganized pattern who do not fall into a clinical sample and hereby to make analysis of this subgroup possible. This would help understanding the people with different psychopathological changes, contribute to more precise and thorough diagnostics, but it would also mark those beliefs to which attention should be given during the therapeutic work.

VARIABLES AND INSTRUMENTS

The attachment is assessed by the RQ (Relationship Questionnaire, Bartholomew & Horowitz, 1991.), designed to assess the global orientation toward the intimate relations. The instrument has four descriptions, one for each attachment pattern. Respondents choose the one which describe them best, by ranking each of the descriptions on a scale from 1 (not at all like me) to 7 (very much like me). This provides continuous scores for the inner working models:

- the score for the working model of the self is obtained by adding points for the two patterns of attachment with the positive model of the self (secure and dismissing) and then by subtracting the sum of the points for the negative model of the self (preoccupied and disorganized).
- the score for the working model of others is gained by adding points for the patterns with the positive model of others (secure and preoccupied) and subtracting from that sum the sum of points for the attachment patterns that are characterized by the negative model of others (disorganized and dismissing).

The combination of these two scores gives the attachment pattern:

- the secure attachment style – a positive score for both models. The secure attachment pattern characterizes people who have self-confidence and who trust others, and based on that they build open and reliable relations with people.
- the dismissing attachment style – a positive score for the model of the self, and a negative for the model of others. The dismissing attachment type is characterized by relying on the self and distrust in others. Hence, the relations with people are superficial and infrequent, and investment is placed on their own carrier, material status, etc.
- the preoccupied attachment style - a positive score for the model of others, and a negative for the model of the self. Persons with this type of attachment are characterized by the tendency to rely on others, due to the lack of confidence and trust

in themselves. Hence, there is a tendency to excessively attach to others, up to a symbiotic partnership.

- the disorganized attachment style – a negative score for both models. Because of mistrust in others, but also in themselves, persons with this attachment pattern are, on the one hand, incapable to build authentic relations with others and, on the other hand, incapable to rely on their own potentials. Hence, their relationships are unstable, chaotic, manipulative, etc.

Instrument reliability has been confirmed also on the sample of this research (Cronbach's $\alpha = 0.674$).

Early dysfunctional schemas are operationalized and measured by the short form of Young Schema Questionnaire (Young, Klosko & Weishaar, 2003.). The questionnaire has 75 items on 1-6 scale, and it is designed for the assessment of the fifteen cognitive schemas grouped into the five domains (Table 1).

Table 1

Classification of maladaptive schemas and domains of impairment

Domain	Schemas
Domain of disconnection and rejection ¹	Emotional deprivation (ED); Abandonment / Instability (AB); Mistrust/Abuse (MA); Social isolation (Si), Defectiveness/shame (DS).
Domain of impaired autonomy and performance	Failure (FA); Dependence/incompetence (DI); Vulnerability to harm or illness (VH); Enmeshment(EM);
Domain of impaired limits	Entitlement (ET); Insufficient self-control (IS)
Domain of other-directedness	Subjugation (SB); Self- sacrifice (SS)
Domain of overvigilance and inhibition	Emotional inhibition (EI), Unrelenting standards (US)

Instrument reliability has been confirmed also on the sample of this research (Cronbach's $\alpha = 0.944$ of the whole scale).

SAMPLE

The research sample included students of psychology from the Faculty of Philosophy in Niš (N=290). There were more female than male students, which reflects the actual situation on the chosen department (253 young women and 36 young men). The age of respondents was 19-36 (the average age 20.26).

PROCEDURE

The data were collected during the lectures in the first semester of the school year 2010/11. The average time for filling in the questionnaires was 20 minutes. Before the questionnaires were handed out, the students had been informed about the research, and about the protection of anonymity of the respondents. All students signed the agreement on participation in the research.

RESULTS

Descriptive indicators for characteristics of attachment of the respondents (Table 2):

Table 2
Distribution of attachment patterns

Pattern	Frequency	Percent
Secure attachment	151	52.1%
Dismissing attachment	60	20.7%
Preoccupied attachment	43	14.8%
Disorganized attachment	36	12.4%
Total	290	100%

The distribution of the attachment patterns shows the expected domination of the secure pattern (52.1%). Especially noteworthy is the significant number of respondents with the disorganized pattern (36 or 12.4%), which is partly a reflection of the used instrument and it allows this subgroup to be included in the analysis.

Descriptive indicators of the early maladaptive schemas (Table 3)

Table 3
Arithmetic means of the early maladaptive schemas

Maladaptive scheme	Min	Max	Mean	Std. deviation
Emotional deprivation	5	30	7.99	4.522
Abandonment / instability	5	30	12.01	5.353
Mistrust/ abuse	5	29	12.92	5.079
Social isolation	5	29	9.96	4.941
Defectiveness	5	26	6.89	3.148
Failure	5	23	7.30	3.192
Dependence/incompetence	5	26	7.70	3.108

Nastavak tablice 3.

Maladaptive scheme	Min	Max	Mean	Std. deviation
Vulnerability to harm	5	30	8.98	4.236
Enmeshment	5	29	8.96	3.992
Subjugation	5	30	8.38	3.700
Self-sacrifice	5	30	14.49	5.069
Emotional inhibition	5	28	9.96	5.206
Unrelenting standards	5	29	14.22	4.847
Entitlement	5	29	12.25	4.848
Insufficient self-control	5	28	12.05	4.718
TOTAL SCORE	85	295	154.05	39.363

The schemas of self-sacrifice and unrelenting standards are the most frequent in the whole sample, followed by mistrust, entitlement, insufficient self-control, and abandonment.

In order to compare the answers of the respondents which belong to different attachment patterns on the Young Schema Questionnaire, the variance analysis has been performed.

The obtained average scores for the particular scales and the whole questionnaire are shown in Table 4:

Table 4

Results of the variance analysis

		Secure	Dismissing	Preocc.	Disorgan.	F	p
Total	MM	140.51	154.89	170.70	183.40	17.649	0.000
	SD	30.796	39.503	39.157	44.299		
Emotional deprivation	M	7.15	9.05	8.07	9.69	4.740	0.003
	SD	3.359	5.423	5.002	5.736		
Abandonment	M	11.01	11.15	14.74	14.36	9.007	0.000
	SD	4.659	5.148	6.203	5.683		
Mistrust	M	11.25	13.77	13.79	17.47	19.114	0.000
	SD	3.968	5.280	4.911	5.833		
Social isolation	M	8.28	11.18	10.86	13.89	17.689	0.000
	SD	3.285	5.376	5.281	6.449		
Defectiveness	M	6.09	6.85	7.28	9.83	16.208	0.000
	SD	2.224	2.550	2.702	5.385		
Failure	M	6.79	6.77	9.07	8.25	7.840	0.000
	SD	2.712	2.540	4.595	3.166		

Nastavak tablice 4.

		Secure	Dismissing	Preocc.	Disorgan.	F	p
Dependence	M	6.99	7.47	9.28	9.22	10.130	0.000
	SD	2.230	2.831	4.113	4.127		
Vulnerability to harm	M	8.07	8.93	9.37	12.11	9.960	0.000
	SD	3.508	4.194	3.958	5.585		
Enmeshment	M	8.44	8.75	9.93	10.31	3.200	0.024
	SD	3.409	4.531	4.125	4.744		
Subjugation	M	7.31	8.03	10.49	10.78	16.305	0.000
	SD	2.496	3.577	4.002	5.388		
Self-sacrifice	M	14.45	13.70	15.65	14.58	1.248	0.293
	SD	4.935	5.159	5.009	5.484		
Emotional inhibition	M	8.19	11.17	10.58	14.58	19.773	0.000
	SD	3.817	5.036	5.337	6.780		
Unrelen. standards	M	13.52	14.63	14.90	15.67	2.567	0.055
	SD	4.714	4.840	4.460	5.550		
Entitlement	M	11.64	13.17	12.33	13.19	1.985	0.116
	SD	4.146	6.090	4.040	5.859		
Insufficient self-control	M	11.66	12.44	13.26	11.69	1.494	0.216
	SD	4.556	5.299	4.562	4.509		

The results suggest that the attachment patterns are statistically significantly different in terms of the occurrence of eleven out of the fifteen schemas.

The graph (Graph 1) confirms that the highest scores are reached by respondents with the disorganized pattern, and the lowest by the respondents with the secure attachment pattern.

The post hoc analysis (LSC Test) shows that the respondents with the disorganized attachment pattern are different in five maladaptive schemas in relation to the rest of the attachment patterns. These schemas are: mistrust, i.e. the belief that others think only about themselves and that they would stop at nothing to obtain what they want, social isolation, emotional inhibition, defectiveness and vulnerability to harm or illness. Furthermore, based on the LSD test, the secure and the preoccupied pattern are different in four schemas: abandonment, failure, dependence, subjugation; the dismissing and the preoccupied in two: emotional deprivation and abandonment; the dismissing and disorganized also in two: emotional deprivation and subjugation; and the preoccupied and disorganized in one: enmeshment.

Differences in the frequency of cognitive schemas between the groups of respondents that are formed according to attachment patterns have also been assessed by a discriminant analysis (Table 5).

Graph 1

Scores of the respondents on the maladaptive schemas in relation to the attachment patterns

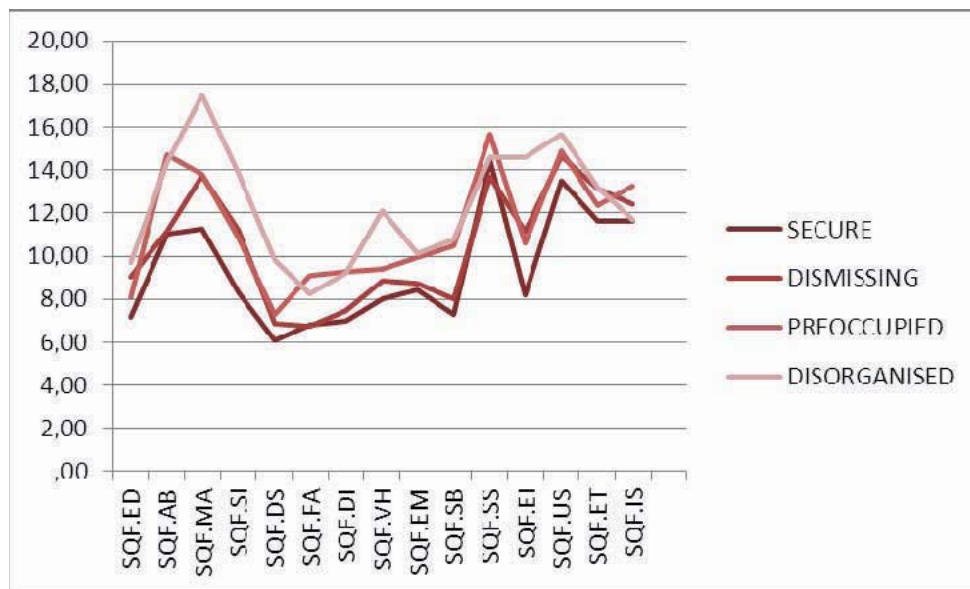


Table 5

Descriptive indicator for discrete discriminant functions

Function	Eigenvalue	R	Wilks-Lambda	Chi	df	p
1	0.473	0.567	0.546	166.065	5	0.000
2	0.187	0.397	0.804	59.762	8	0.000
3	0.047	0.213	0.955	12.704	13	0.471

Three functions have been singled out:

Table 6

Centroids of the groups for the 1st discriminant function

Pattern	1 function
Secure	-0.504
Dismissing	0.262
Preoccupied	0.062
Disorganized	1.590

The first function significantly distinguishes the disorganized group from the rest (Table 6), and those differences are best seen between the group of respondents with the secure attachment pattern and the group of respondents with the disorganized attachment pattern.

Table 7
Structure matrix for the 1st function

Scheme	1 function
Emotional inhibition	0.677*
Mistrust	0.646*
Social isolation	0.608*
Defectiveness	0.587*
Vulnerability to harm	0.457*
Unrelenting standards	0.234*
Failure	0.213
Subjugation	0.483
Dependence	0.302
Abandonment	0.352
Enmeshment	0.219
Self-sacrifice	0.003
Insufficient self-control	0.021
Emotional deprivation	0.315
Entitlement	0.171

NOTE: * $p < 0.05$

A structure matrix (Table 7) points to the schemas that define this function: emotional inhibition, mistrust, social isolation, defectiveness, vulnerability, and unrelenting standards. These schemas are the most characteristic for the disorganized pattern. Three schemas fall into the domain of disconnection and rejection (mistrust, social isolation, defectiveness), two in the domain of overvigilance (emotional inhibition and unrelenting standards), and one in the domain of impaired autonomy (vulnerability).

Based on the appearance of the matrix for the first discriminant function we can conclude that there is a correlation between the domains of disconnection and rejection, overvigilance and impaired autonomy and the disorganized pattern. Although this correlation is not strong (the canonical correlation is 0.57) it demonstrates a profile of a dominantly disorganized pattern.

The second isolated discriminant function most successfully distinguishes the group of respondents with the preoccupied attachment pattern in relation to other groups classified according to the attachment patterns (Table 8):

Table 8

Centroids of the groups for the 2nd discriminant function

Pattern	2 function
Secure	-0.077
Dismissing	-0.483
Preoccupied	0.953
Disorganised	-0.015

Table 9

Structure matrix for the 2nd function

Scheme	2 function
Emotional inhibition	0.031
Mistrust	0.135
Social isolation	0.101
Defectiveness	0.131
Vulnerability to harm	0.131
Unrelenting standards	0.105
Failure	0.597 ⁺
Subjugation	0.591 ⁺
Dependence	0.573 ⁺
Abandonment	0.506 ⁺
Enmeshment	0.311 ⁺
Self-sacrifice	0.289 ⁺
Insufficient self-control	0.180
Emotional deprivation	-0.067
Entitlement	-0.043

NOTE: * $p < 0.05$

The structure matrix of the second isolated function (Table 9) shows that the second isolated function is mostly populated by the following schemas: failure, subjugation, abandonment, dependence/incompetence, enmeshment/symbiosis, and self-sacrifice. These schemas are characteristic for the preoccupied attachment pattern, and they are from the domains of impaired autonomy (failure, dependence, enmeshment/symbiosis), other-directedness (subjugation, self-sacrifice), and disconnection and rejection (abandonment).

The correlation between the domains of impaired autonomy, other-directedness, and disconnection and the preoccupied pattern is also not very strong (the canonical correlation coefficient is 0.39). However, since the correlation is statistically significant we can assume

that the schemas of the mentioned domains can profile respondents with a dominantly preoccupied pattern.

The third isolated discriminant function is not statistically significant (sig. 471), however it is shown because it contains information on maladaptive schemas which partly distinguish the group of the respondents with the dismissing attachment pattern from the rest of the groups.

Table 10
Centroids of the groups for the 3rd discriminant function

Pattern	3 function
Secure	-0.126
Dismissing	0.342
Preoccupied	0.200
Disorganised	-0.264

The centroid of the groups for the third discriminant function (Table 10) points to the level of difference between the dismissing and the other patterns, from which we can see that the group of the respondents with the dismissing pattern is significantly different from the groups with the disorganized and the secure pattern (the difference in relation to the preoccupied pattern is the smaller one):

Table 11
Structure matrix for the 3rd function

Scheme	3 function
Emotional inhibition	0.332
Mistrust	0.177
Social isolation	0.387
Defectiveness	-0.259
Vulnerability to harm	-0.242
Unrelenting standards	0.209
Failure	0.038
Subjugation	0.166
Dependence	-0.059
Abandonment	0.133
Emmeshment	-0.154
Self-sacrifice	-0.118
Insufficient self-control	0.418*
Emotional deprivation	0.417*
Entitlement	0.323*

NOTE: * p<0.05

The structure matrix of the isolated function (Table 11) shows that this discriminant function is mostly saturated by the following schemas: insufficient self-control, emotional deprivation, and entitlement, which are from the domains of impaired limits (insufficient self-control and entitlement) and disconnection and rejection (emotional deprivation).

DISCUSSION

DISCUSSION ON DISTRIBUTION OF ATTACHMENT AND FREQUENCY OF MALADAPTIVE SCHEMAS IN RELATION TO PREVIOUS RESEARCH FINDINGS

Beside the domination of the secure pattern, the attention should also be paid to the finding that 47.9% of the respondents fall into some of the insecure patterns. The obtained distribution is similar to distributions previously obtained with the same instrument (Mihic, Zotovic i Petrovic 2008.; Stefanović Stanojević & Tošić, 2011.), and it is different from those obtained on the clinical sample, as expected (the occurrence of insecure patterns is 81%, Mason, Platts & Tyson, 2005.).

The frequency of the maladaptive schemas is not different from other available domestic distribution obtained on nonclinical samples (Mirović, 2010.; Nikoloski Končar, Zotović i Hautekèee, 2006.). The most frequent schemas are unrelenting standards and self-sacrifice, and they are followed by insufficient self-control, abandonment, and mistrust. Since the sample is the student population, the beliefs that one has to sacrifice one's needs to meet high standards in behavior and performance can be understood as a part of students' cognitive map, which implies that duties are the priority, as well as an effort to achieve better success. The highest frequency of the unrelenting standards schema has already been obtained in the first domestic research of the maladaptive schemas (Nikoloski Končar, Zotović i Hautekèee, 2006.) on the sample of children, and it has been explained by the adverse economic situation in Serbia, hence the need of parents to demand more from their children so that the achieved success would provide them with a better life. Furthermore, the same research has shown a high frequency of self-sacrifice, which has been explained by the dominant patriarchal morality which can lead to putting children's needs in the second place. The similar results that have been obtained on a sample of older students contribute to the fact that it is possible to explain the results by the socio-economic context.

Discussion on the obtained differences between the attachment patterns in relation to the frequency of the maladaptive schemas

In relation to the previous research these results have confirmed that the groups of respondents formed according to attachment patterns are significantly different in terms of the frequency of the maladaptive schemas. The results have also confirmed the earlier finding (Mason, Platts & Tyson, 2005) that the maladaptive schemas are more significantly

frequent in groups of respondents with insecure attachment patterns, and especially those with the disorganized pattern.

However, our expectation that the disorganized pattern on a nonclinical sample would also be the pattern with most frequently found maladaptive schemas has also been proven.

The highest score on the Young Schema Questionnaire is reached by the respondents with the disorganized attachment pattern. Persons with this attachment style believe that they are inferior in many aspects of life, that they do not deserve to belong to any social group, and that other people do not wish them well, so they would hurt them if they are not careful. Furthermore, persons with the disorganized pattern are frightened by catastrophic events (disease, natural catastrophe, criminal, misfortune), but they tend to maximally inhibit their fears and other emotions, which can result in inadequate reactions typical for the disorganized pattern: motionless in front of danger, bizarre reactions, a lack of mimic expressions in stories about life's losses (Main & Hesse, 1990.). They are also characterized by the schema of unrelenting standards, i.e. the belief that one should meet very high inner standards in behavior and performance.

In brief, people with the disorganized pattern have a double problem: neither do they feel good in their own skin, nor do they believe someone will help them. One of the mechanisms to overcome this unfavorable life situation is maybe implied by the finding about the nourished high inner standards of behavior and performance. This may be the way they try to compensate their belief about social isolation and their own inferiority. This is the finding that might help in psychotherapeutic work with the respondents with the disorganized attachment pattern.

According to the level of the total score on the Young Schema Questionnaire the pattern that follows the disorganized one is the preoccupied attachment pattern. It is characterized by the negative model of the self and the positive model of significant others. Therefore, people with this attachment style are characterized by the belief that they are unsuccessful in many areas of achievement, and that they do not have capabilities to cope with daily problems. They are also characterized by the belief that the control over their life has to be given to others in order not to cause their anger, the belief that close relations with others are possible at the expense of their own individuality and the belief that satisfying other people's needs has to be more important than satisfying their own.

People with the dismissing attachment pattern come in the third place according to the total score on the Young Schema Questionnaire. Since the dismissing pattern also falls into the group of insecure attachment patterns (Holmes, 2004.), the question is what the cause for the lower frequency of total maladaptive schemas is. One of the possible explanations is the fact that the patterns with the more frequent maladaptive schemas (disorganized and preoccupied) are characterized by the negative model of the self, while the dismissing pattern is characterized by the positive model of the self. Could it be that the positive self-image

is some kind of protection from the maladaptive schemas? This question deserves testing. Namely, although this interpretation corresponds with the theoretical postulates and the expectations derived from them, based on the centroids of the groups for the third function (the dismissing and the preoccupied are closer than the remaining patterns) it is possible to assume the existence of maladaptive schemas which make difference between those with the dismissing and the preoccupied attachment in relation to those who are securely and fearfully attached. Since the statistical significance has not been obtained, the mentioned expectations demand further research.

The lowest score on the Young Schema Questionnaire is reached by respondents with the secure attachment, which is in correspondence with the preset expectations. The only schema where people with the secure attachment reach a higher score than respondents with the dismissing pattern is the belief about the need to satisfy needs of others at the expense of their own needs (self-sacrifice). Although not statistically significant, this difference could be explained from the perspective of the basic difference between the secure and the dismissing pattern - the image of others. Since people with the dismissing pattern have the negative image of others it is understandable that the belief about satisfying needs of others at the expense of their own is less present than in respondents with the positive image of others (the secure pattern). However, it is also possible to observe this finding as a consequence of gender differences, i.e. a result of the fact that significantly more young women participated in the sample. There is research that indicates that the schema of self-sacrifice is more frequent in young women (Mirović, 2010.).

DISCUSSION ON THE OBTAINED FINDING ON THE DIFFERENCES BETWEEN PATTERNS REGARDING THE FREQUENCY OF DOMAINS OF IMPAIRMENT

The expectation that there will be differences between attachment patterns regarding most frequent domains of impairment has been confirmed. Above all, the expectation that persons with the disorganized pattern will show more domains that are contradictory to each other, and that persons with the preoccupied pattern will show higher frequency of domains of impairment of autonomy and other-directedness has been confirmed. It has also been confirmed that the securely attached respondents show none of the domains of impairment. The expectations relegating to the dismissing pattern and the domains of disconnection and rejection, as well as the domain of overvigilance have not been confirmed with a level of statistical significance, but they will also be briefly discussed.

It has been confirmed that there is a connection between the disorganized pattern and the following domains: disconnection and rejection, overvigilance, and impaired autonomy.

Regarding the “experience of fear without a coping strategy” which has been carried since childhood (Cicchetti & Beeghly, 1987.; Main & Hesse, 1990.), the respondents of this subgroup are even in their adulthood constantly conflicted between the desire to secure themselves through attaching to others and the fear that others would abuse their trust. Hence, the confirmation of the expectation that the schemas from the domain of relation with others (disconnection and rejection) will be impaired is not surprising. The paradoxicality of the developed model is also confirmed by the presence of essentially different domains: the domain of impaired autonomy and the domain of overvigilance. Therefore, the belief in a coming catastrophe is followed by the belief in a necessity to hide emotions and impulses and a necessity of the existence of high inner standards.

The correlation between the preoccupied pattern and the domains of impairment of autonomy, other-directedness and disconnection has also been confirmed.

Since persons with the preoccupied attachment pattern have the negative working model of the self and the positive model of others, it has been expected that the domain of impairment of autonomy and the domain of other-directedness will be the most frequent. This expectation has been confirmed. Based on the given models, the assumption on the dominant strategy of persons with the preoccupied pattern: a struggle for sympathy of others as a crucial condition for improving the self-image (through the idea that if loved by others – we are worthy) has been confirmed.

The statistically significant correlation between the dismissing pattern and the maladaptive schemas from the domains of disconnection and rejection and overvigilance has not been confirmed.

In people with the dismissing pattern the frequency of the domain of impairment of autonomy and the domain of disconnection and rejection has been affirmed, which confirms the set hypothesis.

In any case, in light of the fact that the image of others is negative, we can understand the presence of the belief from the domain of disconnection and rejection, which is only partially confirmed by the discriminant analysis. To be precise, only one belief from this domain is more frequent in people with the dismissing pattern: the belief that no one will respond to their needs. On the other hand, the distinctiveness of two beliefs from the domain of impairment of limits potentially suggests a more dominant strategy of people with the dismissing attachment pattern: the belief about their superiority and the lack of self-criticism, with the approach to goals that is characterized by the intolerance to frustrations.

In accordance with the theoretical expectations, no domains which are in correlation with the secure attachment pattern have been established.

The finding on non-existence of the domain of impairment is not a consequence of exclusively positive experience in childhood, but also of the privilege of growing up among people who reacted to their needs in a consistent and adequate way, which contributed to forming the positive image of the self and others. Being taught that showing their authentic

needs and emotions will meet an adequate reaction, the securely attached respondents use the primary strategies even in their adulthood. This also means that there is no need for the secondary strategies, i.e. for developing false beliefs about the self and others (maladaptive schemas), which is confirmed by the results of this research.

CONCLUSIONS

- Groups of respondents formed according to the attachment patterns are significantly different in frequency of maladaptive schemas. The early maladaptive schemas are more significantly frequent in groups with insecure attached respondents, and above all in groups with the disorganized and the preoccupied pattern.
- Groups of respondents formed according the attachment patterns are also different in the frequency of the domains of impairment. The expectation that a larger number of domains will be present in the disorganized pattern, as well as that these domains are more difficult to harmonize has been confirmed. Furthermore, in correspondence with the preset expectations, the domains of impaired autonomy and other-directedness have been seen in the preoccupied pattern. In people with the secure pattern, the expectation has been confirmed regarding the lowest frequency of all the domains of impairment. The expectation regarding the correlation between the domains of disconnection and rejection and overvigilance and the dismissing pattern has not been confirmed.

LIMITS OF THE RESEARCH AND SUGGESTIONS FOR FURTHER RESEARCH

The correlation between the attachment patterns and the early maladaptive schemas would be most reliably observed in a longitudinal study, which may be a goal of some future studies and which is certainly a limitation of this one. A possible limitation of the research with such a concept is the fact that the participants have been asked to fill in the questionnaires in half an hour's time, so the correlation of the examined variables could partly be a reflection of a current emotional state of the respondents. Furthermore, one of the more significant limitations of this research is the fact that the sample was mainly comprised of young women; a more complete image of the frequency of the maladaptive schemas in relation to the attachment patterns would be obtained through research with both genders equally represented.

We hope that this research, despite its limitations, raises some theoretical and practical questions. Especially, the obtained data contribute to the theoretical corpus of knowledge of the relation between the patterns and the maladaptive schemas, and they could also contribute to preventive work on mental-hygiene of the young.

REFERENCES

1. Ainsworth, M., Blehar, M., Waters, E. & Wall, S. (1978). **Patterns of attachment**. Hillsdale, NJ: Erlbaum.
2. Baker, E. & Beech, A. R. (2004). Dissociation and variability of adult attachment dimensions and early maladaptive schemas in sexual and violent offenders. **Journal of Interpersonal Violence**, 19, 1119-1136.
3. Bartholomew, K. & Horowitz, L. M. (1991). **Relationship questionnaire**. Retrieved from: <http://www.sfu.ca/psyc/faculty/bartholomew/selfreports.htm> (01.04.2011.).
4. Bartholomew, K. & Shaver, P. R. (1998). Methods of assessing adult attachment. Do they coverage? In: Simpson, J. A. & Rholes, W. S. (eds.), **Attachment theory and close relationships**. New York: Guilford Press, 25-45.
5. Bowlby, J. (1968). **Attachment and loss. Vol. 1: Attachment**. New York: Basic Books.
6. Cicchetti, D. & Beeghly, M. (1987). Symbolic development in maltreated youngsters: An organizational perspective. In Cicchetti, D. & Beeghly, M. (eds.), **A typical symbolic development. New directions for child development**, 36, 5-29. San Francisco: Jossey-Bass.
7. Freeman, D., Garety, Ph., Kuipers, E., Fowler, D. & Bebbington, P. (2002). A cognitive model of persecutory delusions. **British Journal of Clinical Psychology**, 41, 331-347, Retrieved from: <http://onlinelibrary.wiley.com/doi/10.1348/014466502760387461/pdf> (10.02.2011.).
8. Hadžić Krnetić, A., Mirović, T. & Štefanec, Đ. (2011). Afektivna vezanost i rane maladaptivne sheme kod studenata iz Banja Luke, Beograda i Zagreba. **Empirijska istraživanja u psihologiji**, knjiga rezimea.
9. Holmes J. (1993). **John Bowlby and attachment theory**. London: Routledge.
10. Holmes, J. (2004). Disorganized attachment and borderline personality disorder. A clinical perspective. **Attachment and Human Development**, 6,181-190.
11. Kamenov, Ž. & Jelić, M. (2003). Validacija instrumenta za mjerenje privrženosti u različitim vrstama bliskih odnosa: Modifikacija Brennanova Inventara iskustava u bliskim vezama. **Suvremena psihologija**, 6, 73-91.
12. Lyons-Ruth, K. & Jacobvitz, D. (1999). Attachment disorganization: Unresolved loss, relational violence, and lapses in behavioral and attentional strategies (520 - 554). In: Cassidy, J. & Shaver, P. (eds.), **Handbook of attachment: Theory, research and clinical applications**. New York: Guilford Press.
13. Main, M. & Hesse, E. (1990). Parents' unresolved traumatic experiences are related to infant disorganized attachment status: Is frightened and/or frightening parental behavior the linking mechanism? In: Greenberg, M., Cicchetti, D. & Cummings, M. (eds.), **Attachment in the preschool years: Theory, research, and intervention**. Chicago: University of Chicago Press.

14. Main, M. (1999). Epilogue. Attachment theory: Eighteen points with suggestions for future studies. In: Cassidy, J. & Shaver, P. R. (eds.), **Handbook of attachment: Theory, research and clinical applications**, 845–888. New York: Guilford Press.
15. Mason, O., Platts, H. & Tyson, M. (2005). Early maladaptive schemas and adult attachment in a UK clinical population. **Psychology and psychotherapy: Theory, research and practice**, 78 (4), pages 549–564.
16. Meyer, C. & Gillings, K. (2004). Parental bonding and bulimic psychopathology: the mediating role of mistrust/abuse beliefs. **International Journal of Eating Disorders** 35 (2), 229-33.
17. Mihić, I., Zotović, M. & Petrović, J. (2008). Rane disfunkcionalne kognitivne šeme: povezanost sa afektivnom vezanošću u bliskim relacijama u mlađem odraslom dobu. **Primenjena psihologija**, 1 (1-2), 57-76.
18. Mirović, T. (2010). **Rane maladaptivne sheme – sheme koje prave problem**. Beograd: Zadužbina Andrejevic.
19. Nikoloski Končar, N. Zotović, M. & Hautekèete, M. (2006). Efekti bombardovanja pet godina posle: Uspostavljanje ranih nefunkcionalnih kognitivnih šema kod dece. **Psihologija**, 39 (2), 229-246.
20. Rittenmeyer, G. J. (1997). The relationship between early maladaptive schemas and job burnout among public school teachers. **Dissertation Abstracts International**, 58 (5-A), 1529.
21. Schmidt, N. B., Joiner, T. E., Young, J. E., & Telch, M. J. (1995). The Schema-Questionnaire: Investigation of psychometric properties and the hierarchical structure of a measure of maladaptive schemas. **Cognitive Therapy and Research**, 19, 295-231.
22. Štefanec, Đ. (2010). **Povezanost porodične afektivne vezanosti i nefunkcionalnih kognitivnih shema kod studenata Zagreba i Banja Luke**. Graduation thesis, defended at the Faculty of Philosophy in Banja Luka.
23. Stefanović Stanojević, T. & Tošić M., (2011). Seksualno ponašanje u odnosu na obrasce afektivnog vezivanja ili: da li postoji obrazac skloniji rizičnom seksualnom ponašanju? **Zbornik saopštenja sa Drugog naučnog simpozijuma Centra za naučna istraživanja SANU I Univerziteta u Nišu**. 167-189.
24. Thompson, R. A. (1999). Early attachment and later development. In: Cassidy, J. & Shaver, P. R. (eds.), **Handbook of attachment: Theory, research, and clinical applications** (pp. 265–286). New York: Guilford Press.
25. Young, J. E. (2003). **Listing of Schemas & Domains**. Retrieved from: <http://www.schematherapy.com/id73.htm> (20.12.2010.).
26. Young, J. E., Klosko, J. S. & Weishaar, M. E. (2003). **Schema therapy: a practitioner's guide**. Retrieved from: <http://www.schematherapy.com/id73.htm> (18.12.2010.).
27. Young, J. E. Brown, G. (1990). **Young schema questionnaire**. New York, Cognitive Therapy Centar od New York. Retrieved from: <http://www.schematherapy.com/id73.htm> (23.12.2010.).

Tatjana Stefanović Stanojević

Odsjek za psihologiju,

Filozofski fakultet, Niš

Jasmina Nedeljković

Fakultet za pravne i poslovne studije

Odjel za poslovnu psihologiju

Novi Sad

STILOVI PRIVRŽENOSTI IZ PERSPEKTIVE RANIH NEPRILAGOĐENIH SCHEMA

SAŽETAK

Cilj istraživanja je testirati značajnost razlike između stilova privrženosti u smislu učestalosti ranih maladaptivnih shema, posebno radi boljeg razumijevanja nesigurnih stilova privrženosti.

Istraživanje je provedeno na uzorku studenata Filozofskog fakulteta u Nišu (N=290). Privrženost je procijenjena pomoću Upitnika privrženosti RQ (Relationship Questionnaire, Bartholomew i Horowitz, 1991.). Rane maladaptivne sheme su operacionalizirane i izmjerene pomoću skraćenog oblika Upitnika Young Schema Questionnaire (Young, Klosko i Weishaar, 2003.).

Rezultati pokazuju da postoje značajne razlike među skupinama ispitanika grupiranim prema stilovima privrženosti u odnosu na izraz ranih maladaptivnih shema. Rani maladaptivni oblici značajno su više prisutni u skupinama ispitanika s nesigurnom privrženosti. Posebno se važnim čini nalaz da najviši ukupni rezultat na Upitniku Young Schema Questionnaire postižu ispitanici s neorganiziranim stilom privrženosti.

Ključne riječi: *stilovi privrženosti, rane neprilagođene sheme.*

