

Attachment Patterns of Arabs and Jews in Israel - Are We Really So Different?

Shiri Lavy, PhD,¹ Faisal Azaiza, PhD,² and Mario Mikulincer, PhD³

¹ Ariel University Center of Samaria, Ariel

² University of Haifa, Haifa, Israel

³ Interdisciplinary Center Herzliya, Herzliya, Israel

ABSTRACT

Background: Attachment orientations reflect internal representations of self, others, and relationships. Studies revealed meaningful cultural differences in attachment orientations, but few included Arab samples. To fill this gap, we compared attachment orientations of Jews and Arabs in Israel using valid measures.

Method: Israeli participants (292 Arabs and 206 Jews) described their attachment figures and completed the Experiences in Close Relationships questionnaire which measures anxious and avoidant attachment orientations in Arabic and Hebrew, respectively.

Results: Israeli Arabs reported higher attachment anxiety than Israeli Jews, but no difference was found in avoidance. Both groups reported that attachment figures were similar in gender and relationship type, and included romantic partners, relatives and friends.

Limitations: Findings should be considered cautiously due to sampling limitations.

Conclusions: The results complement previous cross-cultural findings and Arabs-Jews differences in relationship-related norms/values. Higher attachment-anxiety scores observed among Israeli Arabs may be considered culturally normative with implications for the development of culturally competent interventions.

Attachment theory was first developed by Bowlby (1), in an attempt to explain psychopathologies he encountered in his counseling experiences. Bowlby focused on the importance of close relationships throughout life, and argued for their effects on behaviors, feelings and cognitive appraisals in various settings. He suggested that attachment behaviors serve an evolutionary survival need, and thus are most salient in times of stress, when humans seek proximity to a specific stronger and wiser attachment figure (1). Attachment figures serve three major functions: First, they are target of proximity maintenance as the individual seeks and enjoys their closeness and opposes to separating from them. Second, attachment figures provide a safe haven in stressful or threatening situations, since they are a source of protection and comfort. Third, they provide a secure base for exploration and development (see also 2, 3 regarding attachment in adulthood).

Furthermore, experiences with attachment figures create mental representations or “scripts” for expected patterns of interactions and relationships (what Bowlby called attachment working models; 4). These working models shape perceptions, interpretations, and responses in future interactions with others, and guide emotion regulation later in life (1). Different kinds of internal working models were categorized as different attachment styles (5, 6): If the attachment figure successfully performs the three functions mentioned above and is accessible and responsive in times of need, the individual will develop a secure attachment style characterized by trust, positive expectations of relationships, and positive appraisals of self and others.

However, when the attachment figure fails to perform the above-mentioned functions, insecure attachment will develop. One kind of attachment insecurity – anx-

ious attachment – occurs when the attachment figure is intrusive or unreliable. In these cases, the individual may become clingy and over-dependent on relationship partners, and develops negative representations of the self (i.e., lower self-esteem). Anxious individuals are preoccupied about their interpersonal relationships and are afraid of rejection and abandonment.

Another kind of attachment insecurity – avoidant attachment – occurs when the attachment figure is rejecting or consistently unavailable, or when the attachment figure obsessively encourages independence. Individuals with an avoidant attachment pattern exhibit compulsive self-reliance, avoidance of intimacy in close relationships, and a general preference to do things alone (e.g., 2, 7).

A third kind of attachment insecurity – disorganized attachment – is relatively uncommon, and occurs when the attachment figure's behavior is unpredictable and disorganized. Disorganized attachment is characterized by odd, awkward behavior and unusual fluctuations between anxiety and avoidance (8, 9).

Studies of clinical and nonclinical populations associated attachment insecurities with various psychological problems. Attachment anxiety and avoidance were related to more negative affect and depression, more psychiatric problems (e.g., suicidal tendencies, eating disorders, conduct disorders), higher rates of substance abuse and criminal behavior, and overall lower well-being (2, 7). Moreover, Mikulincer and Shaver (7) argued that “severe disturbances in attachment-system functioning are a key feature of most personality disorders” (p. 399), basing their claim on findings from several studies. For example, high attachment anxiety was linked to histrionic personality disorder and borderline personality disorder, and high avoidance was associated with schizoid personality disorder and dissociative disorders (e.g., 10). Findings about disorganized attachment were even more extreme, linking this attachment pattern to several psychological problems, and generally characterizing patients with severe psychological psychopathologies (e.g., dissociative disorders and schizophrenia; 11, 12).

The attachment styles classification mentioned above (5) was empirically examined and validated in several studies (e.g., 5, 7, 8). More than a decade after the first empirical examination of attachment patterns in infancy (5), Bartholomew and Horowitz (13) developed a bi-dimensional model of attachment orientations in adulthood. According to the model they developed, attachment patterns are organized around two distinct,

continuous dimensions: attachment anxiety and attachment avoidance. Individuals who are high on attachment avoidance and low on attachment anxiety fit Ainsworth's (5) avoidant attachment category, individuals who are high on the anxiety dimension and low on avoidance fit Ainsworth's (5) anxious attachment classification, individuals who are low on both dimensions fit Ainsworth's (5) secure attachment category, and individuals who have high anxiety and avoidance scores fit Main and Solomon's (8) disorganized attachment classification.

Bartholomew and Horowitz's (13) model was empirically validated in several studies (e.g., 14), mainly using the Relationship Questionnaire (13; a 4-item measure containing prototype descriptions of the four attachment styles of types) and the Experiences in Close Relationships questionnaire (14; a measure, which is further discussed below, comprising of two 18-items scales, one to assess attachment anxiety and the other to assess avoidant attachment). Furthermore, attachment anxiety and avoidance proved to be associated with theoretically relevant variables in the study of close relationships (e.g., self-disclosure, interpersonal conflict resolution, and relationship satisfaction) and emotions (e.g., coping with stress, emotion regulation, self-esteem, and mental health; 7).

CULTURAL DIFFERENCES IN ATTACHMENT ORIENTATIONS

Most studies of attachment patterns and their correlates based their findings upon Caucasian populations in the U.S. and Europe (15, 16). However, the increasing interest in cultural and other contextual influences on attachment patterns has lead researchers to cross-culturally validate attachment theory's basic constructs, hypotheses and scales in both adulthood (17) and childhood (18, 19). As a result, some studies have revealed cultural differences in attachment patterns and in their associations with other psychological and social constructs (e.g., 17, 20).

To date, cross-cultural comparisons of attachment patterns in adulthood suggest that secure attachment is the most prevalent and adaptive pattern in most cultures (17). However, specific patterns of insecure attachment were especially prevalent in certain cultures, whereas other forms of insecure attachment were relatively rare. A well documented example is that people from Asian countries exhibit a more anxious attachment pattern than people from countries in other regions (i.e., North and South America, Europe, Middle East, Africa and Oceania).

The observed differences seemed to correspond with the prevalence of specific cultural values along the collectivism-individualism dimension (19, 21). For example, meaningful associations were found between participants' adult attachment orientations and their nation's individualism score. Thus, participants in more collectivistic cultures reported more anxious attachment than participants in more individualistic cultures (17, 21).

In the current study, we examined attachment patterns in Israel of the Arab minority as compared to those of the Jewish majority. Although quite heterogeneous, the Israeli Arab minority has been described as a distinct national-religious-linguistic, non-assimilating and dissident minority which has not accepted Jewish-Israeli (or Western) values and norms (22). The Arab minority differs from the Jewish majority in language, religion, and other traits (23), and embraces more traditional collectivist values (22) similar to those reported in Arab countries (e.g., 24). However, recent studies show changes in their values probably due to the modernization process observed in some of their communities (25).

Yet to be explored is the way these cultural characteristics are related to attachment patterns. The few studies in Lebanon, Jordan and Morocco reported higher attachment anxiety and somewhat lower attachment security among Arabs, compared with Israelis (assumed to represent the Hebrew-speaking student samples in the Israeli colleges where they were recruited). These results conform with the expectation (empirically examined and validated by Schmitt et al., 17) that participants from countries highlighting collectivistic values (e.g., emphasizing interdependence and communality), tend to have higher ratings of attachment anxiety (reflecting hyperdependence on others and concerns about relationships). However, the proportion of Israeli Arab participants who took part in this study (17) is unknown, making it difficult to draw clear conclusions about differences between Jews and Arabs in general, and impossible to make such inferences about Arabs and Jews in Israel.

Indeed, Israel-based studies about Arabs did not always match international data (i.e., 17). In Ben-Ari and Malach-Pines' (26) study of Israeli Arab and Jewish college students, no significant difference was found between the samples in attachment orientations. However, a subsequent study (27) did reveal that secure attachment was more prevalent among Jews than Arabs (although being the most common attachment pattern in both cultures), and that both anxious and avoidant patterns were more prevalent in the Arab sample.

THE CURRENT STUDY

In this study we aimed to broaden the knowledge about attachment orientations of Israeli Arabs, using valid measures and comparing them with attachment orientations of Israeli Jews. Because previous studies of Arabs' attachment orientations typically used single-item scales to assess attachment styles (e.g., 17, 27), our first goal was to use a well-researched measure of attachment orientations. For that purpose, we translated into Arabic and ensured the internal reliability of the Experiences in Close Relationships questionnaire (ECR) (14). This is an attachment measure, comprising 36 items tapping attachment anxiety and avoidance (with lower scores on both scales indicating attachment security).

ECR has been validated in several studies (7). For this purpose, it has been translated into several languages other than English, e.g., Spanish (28), Chinese (29) French (30) and Japanese (31). Several authors claimed that adaptation of a measure developed in one culture for usage in another culture requires more than mere translation of the tool (e.g., 32-34). Such adaptation requires examination of the measure's psychometric properties, as well as its conceptual, content and semantic equivalence (see also the International Test Commission guidelines for test adaptation) (35). The current study serve as the first step in the adaptation process of the ECR to the Israeli Arab population, using a translation process involving professionals from Jewish and Arab cultures, and providing preliminary results about the translation's reliability after conducting first qualitative examination of its equivalence to the Hebrew version and to the American English version.

After assuring the Arabic ECR scale's semantic equivalence and satisfactory reliabilities, we examined cultural differences in attachment orientations between Jews and Arabs living in Israel using the Hebrew and Arabic versions of the ECR. We hypothesized (Hypothesis 1) that Arabs living in Israel would report higher attachment anxiety than Israeli Jews due to their higher collectivism.

Regarding avoidance, Schmitt et al.'s (17) findings suggest no direct links between collectivism and avoidance. The differences in avoidance levels that they revealed were linked mainly to nation-level variables related to stress and inappropriate living conditions (that predicted higher levels of all attachment insecurities). However, studies conducted in the U.S. revealed consistent, interesting gender difference in avoidance: men typically scored significantly higher in avoidant attachment than women (e.g., 14, 36, 37). These findings fit common gen-

der schemas that portray men as less emotional and less willing to connect with others (38-40). However, Schmitt et al. (41) showed that these gender differences were not universal, and were less evident in cultures with high stress. Given the complex geopolitical situation in the Middle East, we suspected that both Jews and Arabs in Israel experience elevated stress levels. Being a minority group that experiences higher poverty and unemployment rates (42), we suspected that Arabs living in Israel generally experience higher stress levels than Jews (subjected to individual differences within each population).

Thus, we expected (Hypothesis 2) small or no gender differences in avoidance in both Israeli samples, with the possibility of yet smaller gender differences in the Arab sample.

Attachment figures identity. Another goal of this study was to examine cultural variations in the identities of attachment figures. Shaver et al. (43) wrote: “the identity of the represented person, persons, or agency (e.g., mother, spouse, the Dear Leader, Allah, Jesus, Virgin Mary) will depend on cultural, political, and religious socialization.” We hypothesized that differences in the social structure of Jewish and Arab communities in Israel would result in choosing different primary attachment figures in adulthood. Most studies on adult attachment found the romantic partner to be the principal attachment figure (for a review, see 7). This is not surprising because most of these studies have been conducted in western individualistic societies (mostly in the U.S. and Europe). In these countries, the closest familial connections are usually within the nuclear family (spouse and one’s children) and connections with the family of origin and the extended family are weaker. However, in more collectivistic and/or traditional societies, the extended family and the family of origin have a more important role in people’s daily lives (44, 45). Thus, we hypothesized (Hypothesis 3) that Jews would nominate their romantic partners as their principal attachment figure more often than Arabs, whereas Arabs would be more likely to nominate members of their extended family.

METHOD

PARTICIPANTS

Participants were recruited in public places (such as academic campuses) in northern and central Israel and in personal gatherings/meetings (i.e., snowball sample). The participants were recruited by research assistants from the same cultural background. Participants included, n=206 Jews, 78% were women, ranging in age from 19

to 48 (M = 24.3, SD = 4.7); and n= 292 Arabs, 66% were women, ranging in age from 19 to 38 (M = 26.2, SD = 4.7). Over 95% of the Israeli Arab participants were married, compared with 14% of the Israeli Jews (although 65.7% of the latter reported having a significant, meaningful relationship at the time of the study). This difference in marital status may result from the cultural differences in the normative marriage age, which is lower in the Arab sub-culture compared with that of secular Jews (secular Jews comprised 79.9% of this study’s Jewish sample). To identify marital status effects, all analyses were conducted first on the entire samples, and then only on married participants (in the two samples) (Table 1).

Table 1. Demographic Characteristics of Arab and Jewish Samples

	Israeli Arabs n=292	Israeli Jews n=206
Involved in a significant meaningful relationship	95.6%	65.7%
Married	95.6%	14%
Relationship duration	45.65 months*	42.40 months*
Have children	50.2%	7%
Occupation	36.4% Students 33.3% Teachers 4.2% Secretaries 3% Lawyers 3% Accountants 2.3% Engineers 2.3% Salespersons 15.5% Other occupations (doctors, managers, psychologists, housewives, social workers, pharmacists, electricians, etc.)	69.3% Students 4.8% Soldiers 3.2% Managers 3.2% Salespersons 2.6% Secretaries 22.3% Other occupations (teachers, lab technicians, instructors, waitresses, engineers, etc.)
Religion	77.7% Muslims 22% Christians 0.30% Druze	79.9 % Secular Jews 20.1 % Religious Jews
Ancestors		29% Ashkenazi Jews 20.5% Mizrahi Jews 15.1% Moroccan Jews 10.8% Ethiopian Jews 7.5% Mixed origins 6.5% Russian Jews 10.6% Other (Yemenite, North African, Iraqi, Hungarian, Asian Jews).

*excluding participants who were not involved in a meaningful relationship at the time of the study.

MEASURES

Experiences in Close Relationships questionnaire (ECR) (14) was used to assess attachment orientations. This questionnaire includes two 18-item scales, one measuring attachment anxiety (e.g., “I worry about being abandoned”) and the other measuring avoidance (e.g., “I prefer not to show a relationship partner how I feel deep down”). Participants rate the extent to which each item describes them in close relationships, using a 7-point scale ranging from 1 (not at all) to 7 (very much). The scale was translated from English into Hebrew by Mikulincer and Florian (46), who also demonstrated the measure’s intended two-factor structure in Israeli samples.

In this study, the ECR scale was translated into Arabic (see Appendix 1). To the best of our knowledge, this is the first published Arabic translation of the ECR. The translation and adaptation process included a few steps, in an attempt to address some of the methodological concerns of adaptations (e.g., 32, 34, 47). The 36 ECR items were first translated from Hebrew into Arabic by a bilingual psychology Israeli scholar, and back-translated by a bilingual MA student. This back-translated version was compared with the original version, and minor revisions were made (while consulting with bilingual experts from the field). This process was led by an Israeli Arab social work professor, to promote cultural relevance and equivalence of the tool, its instructions and its items (following Alegria et al.’s [32] and Kirmayer and Young’s [48] recommendations, although the need for generalizability of the results limited the revisions of items). Pilot data were collected using the revised form in a small student sample, which also provided qualitative feedback. Following this feedback, changes were made, and the final form was used to collect the data reported here.

Coefficient *alphas* for the two attachment scales were satisfactory in both samples, for the 18 attachment anxiety

items were .88 and .84, and .78 and .74 for the 18 avoidance items in the Jewish and Arab samples, respectively. Final scores were calculated for each scale by averaging participants’ responses on the various items in each scale. The scores of the two scales were only modestly correlated (as intended) in the Jewish sample, $r = .13$, $p = .05$, and in the Arab sample, $r = -.08$. Therefore they were treated as separate independent variables in the analysis.

Attachment figure identity was assessed using a question taken from the WHOTO scale (3) which identified a person’s primary attachment figures: *Please write the first name of a person who supports you and accepts you as you are. A person that you feel calm and comfortable in his presence, and you know you can count on him/her whenever you need.* Then participants were asked to provide information about the attachment figure’s gender, the nature of his/her relationship with the participant, and the relationship duration. Demographic questions (e.g., participants’ age, gender, relationship duration with the attachment figure) were included in the last page of the questionnaire.

PROCEDURE

Participants completed the questionnaires voluntarily. After their anonymity was assured and their consent for participation was received, participants completed the questionnaires in their native language. The protocol of the research project follows the guidelines of Ariel Center’s ethics committee and conforms to the provisions of the Declaration of Helsinki.

RESULTS

ATTACHMENT ORIENTATIONS

Means and standard deviations of attachment orientations among Arab and Jewish men and women are presented in Table 2.

Table 2. Means and Standard Deviations of Attachment Scores of Arabs and Jews by Gender

	Arabs			Jews		
	Men	Women	Total	Men	Women	Total
All participants						
Anxiety	3.96 .91	3.86 .99	3.91 .95	3.52 .75	3.59 .97	3.56 1.00
Avoidance	3.47 .72	3.29 .76	3.35 .75	3.52 .75	3.39 .77	3.42 .77
Participants in meaningful relationships						
Anxiety	3.93 .93	3.85 .97	3.88 .96	3.48 1.06	3.53 .92	3.51 .95
Avoidance	3.45 .75	3.27 .76	3.32 .76	3.47 .78	3.33 .75	3.37 .75

Table 3. Results of MANCOVA examining culture and gender differences in attachment orientations (anxiety and avoidance), with age and relationship duration covariants for entire sample ($n = 498$)

	Age	Relationship Duration	Culture	Gender	Culture x Gender
MANCOVA					
Wilks' λ	.98*	.98*	.97**	.997	.996
F	4.13*	3.51*	6.56**	.64	.94
Partial Eta Squared	.02	.02	.03	.003	.004
Post-Hoc ANOVAs					
-Anxiety					
F	3.68	.09	12.48***	.75	1.87
Partial Eta Squared	.01	.00	.03	.002	.004
-Avoidance					
F	4.70*	6.92**	.76	.52	.03
Partial Eta Squared	.01	.02	.002	.001	.00

* $p < .05$; ** $p < .01$; *** $p < .001$ **Table 4.** Results of MANCOVA examining culture and gender differences in attachment orientations (anxiety and avoidance), with age and relationship duration covariants- including only participant in a meaningful romantic relationship ($n=304$)

	Age	Relationship duration	Culture	Gender	Culture x Gender
MANCOVA					
Wilks' λ	.98	.99	.97**	.996	.996
F	2.84	1.12	5.80**	.71	.70
Partial Eta Squared	.02	.01	.03	.004	.004
Post-Hoc ANOVAs					
-Anxiety					
F	4.09*	.07	11.48***	.80	1.38
Partial Eta Squared	.01	.00	.03	.00	.00
-Avoidance					
F	1.85	2.02	.29	.55	.04
Partial Eta Squared	.005	.006	.00	.00	.00

** $p < .01$; *** $p < .001$

To eliminate artifacts, when examining cultural and gender differences in attachment orientations, we controlled for age and relationship duration. We conducted a two-way MANCOVA with attachment orientations (anxiety and avoidance) as dependent variables. Culture and gender were entered as independent variables, and age and relationship duration served as covariates. The relationship duration of participants who were not involved in a meaningful romantic relationship at the time of the study was 0. Participants who did not indicate whether or not they were involved in a meaningful relationship were not included in the analysis.

The MANCOVA (Table 3) revealed significant effects of the covariants age (Wilks' $\lambda = .98$, $F [2, 449] = 4.128$, $p = .02$) and relationship duration (Wilks' $\lambda = .98$, $F [2, 449] = 3.51$, $p = .02$) on the combined dependent variable. In order to investigate the detailed effects of the covariants,

four univariate F-tests were performed, indicating that both age and relationship duration were significantly related to avoidance, but not to anxiety (Table 3).

After adjusting for the effects of the covariants, the MANCOVA revealed a significant main effect of culture on the combined dependent variable (Wilks' $\lambda = .97$, $F [2, 449] = 6.56$, $p = .03$). The effect of gender and of the interaction between gender and culture were not significant. Post-hoc ANOVAs showed that Arabs' anxiety ratings (but not avoidance ratings) were significantly higher than among Jews (Tables 2 and 3).

A similar MANCOVA (with the same covariants and dependent and independent variables) was conducted only for participants who reported being in a meaningful romantic relationship at the time of the study (Table 4). In this MANCOVA age and relationship duration had no significant effects on the combined dependent

variable. However, subsequent post-hoc ANOVAs conducted separately for anxiety and for avoidance revealed a significant effect of age on attachment anxiety (Table 4). Similar to the results of the first MANCOVA, the results of the second MANCOVA also indicated a significant main effect of culture (Wilks' $\lambda = .97$, $F [2, 359] = 5.80$, $p < .001$). Post-hoc ANOVAs' results indicated that the source of this effect was significant differences between Arabs' and Jews' anxiety ratings (Tables 2 and 4).

ATTACHMENT FIGURE

The attachment figure most frequently reported by Jews (43.8%) and by Arabs (60.1%) was the romantic partner, while a minority of Jews (21.1%) and Arabs (18.3%) reported a same-sex friend as their primary attachment figure. Fewer participants nominated their mothers (8.8% and 6.4% of the Jewish and Arab participants, respectively); a member of their extended family (6.7% and 3.2% of Jews and Arabs, respectively); their sister (6.2% and 3.2% of Jews and Arabs, respectively); their brother (3.1% and 4.1% of Jews and Arabs, respectively); or their father (2.6% and 2.3% of Jews and Arabs, respectively). Few participants also mentioned a friend from the opposite sex (5.2% and 2.3% of Jews and Arabs, respectively); or an ex-romantic partner (1.5% of Jews).

Group differences in attachment figure's identity were significant ($\chi^2[10, N = 412] = 19.15$, $p < .05$), and remained significant when relationships were grouped by familial relationships, romantic relationships, and friendships ($\chi^2[2, N = 410] = 8.48$, $p = .01$). Although romantic partners were the most frequently nominated attachment figures in both groups, Jewish participants were more likely than Arab participants to nominate members of their family of origin or friends as their principal attachment figure. Arabs tended to nominate their romantic partners as their attachment figures even more than Jews did.

When the analysis was conducted only for married participants in both samples, the differences between the samples in attachment figure's identity were non-significant. Furthermore, although non-significant, differences in the married subsample were in line with our hypotheses: Jews were more likely to nominate their spouse as their attachment figure (70.4% of married Jews) than Arabs (60% of married Arabs). In this subsample, Arabs were more likely to nominate a relative (20%) or a friend (20%) as an attachment figure than Jews (14.8% for both relatives and friends).

A similar analysis conducted again only on participants (married and unmarried) who reported being

involved in a meaningful relationship, yielded similar results, with yet smaller differences between the samples: 63.4% of the Jews nominated their romantic partner as their attachment figure; 20.3%, a relative; and 16.3%, a friend. Among Arabs, 60% nominated their romantic partner; 20.5%, a relative; and 19.5%, a friend.

DISCUSSION

The study goal was to broaden our knowledge about attachment orientations of Arabs in Israel and compare them to those of Jews in Israel, while using a valid quantitative tool (the ECR questionnaire). Findings generally supported our hypotheses, but also included surprising similarities in the identities of attachment figures

ATTACHMENT ORIENTATIONS

As expected, attachment anxiety was higher among Israeli Arabs than Jews. This difference may be related to group differences in collectivism values, which is assumed to be higher among the more traditional, family-oriented Arab sample (e.g., 22).

As expected, there were no gender differences in avoidant attachment, in both samples. These findings correspond with Schmitt et al.'s (17) results implying small or no gender differences in avoidance in cultural regions with high stress levels.

ATTACHMENT FIGURES

Examination of attachment figures' identities yielded interesting results. Surprisingly, small and non-significant cultural differences were noted between Arabs and Jews in the identities of attachment figures: the most frequently nominated attachment figure in both cultures was a romantic partner. Also, relatives and friends were often nominated as attachment figures in both cultures. About one-third of married participants and more than half of the single participants nominated a relative or a friend as their attachment figure.

These findings highlight cultural similarities between Israeli Arabs and Jews (see also 26). It seems that Arab and Jewish participants were similar in their utilization of romantic partners and best friends as primary sources of support in times of emotional distress. This similarity may be related to behavioral and cultural norms in Western societies, in which the newly developed family (and not the family of origin) provides the daily, stable social needs of people. However, the close connections with friends may be related to social norms in Israel (e.g.,

the value and normative duration of friendships) or to the specific samples (i.e., young adults).

Our findings also broaden Hazan and Shaver's (2) assertion, later adopted by numerous attachment researchers and clinicians (see 7, 49), that the primary attachment figure in adulthood is one's romantic partner. Although differing in their level of traditionalism

and collectivism, both Arab and Jewish communities in Israel are considered to be more collectivistic than other Western societies, i.e., the U.S. (23, 24), and their members are thought to have stronger social and familial networks (e.g., 22, 25) compared with Americans. Developing attachment relationships with relatives or members of the social network may be foreseeable

Appendix 1: Experiences in Close Relationships Questionnaire - Arabic Translation

تطرق الجمل التالية إلى الشكل الذي تشعرين به داخل منظومة العلاقات القريبة التي تقيمينها \ تقيمينها مع أشخاص آخرين. يقصد بالكلمات "أشخاص آخرين" الواردة في الجمل التالية بالأشخاص الذين يقيمون معك علاقات قريبة. يرتكز اهتمامنا حول كيفية شعورك، عامة، داخل هذه المنظومة من العلاقات. أشركنا أشيري إلى مدى موافقتك أو عدم موافقتك إلى ما يرد في الجمل التالية من خلال استخدام سلم التدرج التالي:

1	2	3	4	5	6	7	أوافق جداً
---	---	---	---	---	---	---	------------

1	2	3	4	5	6	7	أفضل أن لا اظهر شعوري الداخلي للأشخاص الآخرين	1.
1	2	3	4	5	6	7	أخشى أن يبتعدوا عني وان اترك وحيداً	2.
1	2	3	4	5	6	7	اشعر براحة حين أكون قريباً من الأشخاص الآخرين	3.
1	2	3	4	5	6	7	أخشى من منظومة العلاقات التي أقيمها	4.
1	2	3	4	5	6	7	ابتعد حين يبدأ الأشخاص الآخرون الاقتراب مني	5.
1	2	3	4	5	6	7	أخشى من أن يكون اهتمام الأشخاص الآخرين بي ليس بمقدار اهتمامي بهم	6.
1	2	3	4	5	6	7	لا اشعر براحة حين يرغب الأشخاص الآخرون الاقتراب مني	7.
1	2	3	4	5	6	7	أخشى من فقدان الأشخاص القريبين مني	8.
1	2	3	4	5	6	7	لا اشعر براحة حين أتعامل بانفتاح مع أشخاص آخرين	9.
1	2	3	4	5	6	7	أود أن يكون شعور الأشخاص الآخرين نحوي قوياً مثل شعوري نحوهم	10.
1	2	3	4	5	6	7	أود الاقتراب من الأشخاص الآخرين لكنني لا أزال ابتعد عنهم	11.
1	2	3	4	5	6	7	أود أحياناً الاختلاط بشكل مطلق مع الأشخاص الآخرين الأمر الذي يعدهم عني أحياناً	12.
1	2	3	4	5	6	7	اشعر بالتوتر حين يقترب الأشخاص الآخرون مني أكثر مما يجب	13.
1	2	3	4	5	6	7	أخشى من أن أكون وحيداً	14.
1	2	3	4	5	6	7	اشعر براحة حين أشاطر الأشخاص الآخرين التفكير والأحاسيس الخاصة	15.
1	2	3	4	5	6	7	رغبتي في أن أكون قريباً تبعد الآخرين عني أحياناً	16.
1	2	3	4	5	6	7	أحاول أن امتنع من الاقتراب من الأشخاص الآخرين أكثر مما يجب	17.
1	2	3	4	5	6	7	احتج إلى الكثير من التأكيدات على أنني محبوب من الأشخاص القريبين مني	18.
1	2	3	4	5	6	7	اشعر بسهولة نسبية للاقتراب من الأشخاص الآخرين	19.
1	2	3	4	5	6	7	اشعر أحياناً بأنني اجبر الأشخاص الآخرين على إبداء الأحاسيس والالتزام بشكل اكبر	20.
1	2	3	4	5	6	7	اشعر بصعوبة حين أكون مرتبطاً بالأشخاص الآخرين	21.
1	2	3	4	5	6	7	في كثير من الأحيان لا اشعر بقلق من أنني ساترك وحيداً	22.
1	2	3	4	5	6	7	أفضل أن لا أكون قريباً من الأشخاص الآخرين أكثر مما يجب	23.
1	2	3	4	5	6	7	حين لا انجح في إثارة اهتمام الأشخاص الآخرين بي اشعر بالغضب والإحباط	24.
1	2	3	4	5	6	7	أخبر الأشخاص القريبين مني بكل شيء	25.
1	2	3	4	5	6	7	اشعر بأن الأشخاص الآخرين لا يرغبون الاقتراب كما أريد	26.
1	2	3	4	5	6	7	عادة أناقش مشكلاتي واهتماماتي مع الأشخاص القريبين مني	27.
1	2	3	4	5	6	7	حين لا أكون جزءاً من منظومة علاقات أشعر باضطراب وعدم ثقة بشكل ما	28.
1	2	3	4	5	6	7	أشعر براحة حين أكون مرتبطاً بأشخاص آخرين	29.
1	2	3	4	5	6	7	أصبح محبباً حين لا يتواجد الآخرون معي كما أريد	30.
1	2	3	4	5	6	7	لا أتردد في أن أتوجه إلى الآخرين لطلب المواساة، النصيحة أو المساعدة	31.
1	2	3	4	5	6	7	اشعر بالإحباط حين أكون بحاجة للآخرين ولا أجدهم	32.
1	2	3	4	5	6	7	يشكل التوجه للآخرين حين أكون بحاجة لهم دعماً لي	33.
1	2	3	4	5	6	7	حين لا يمنحني الآخرون تأكيداً أشعر سيئاً للغاية إزاء نفسي	34.
1	2	3	4	5	6	7	أتوجه للأشخاص الآخرين بأمور كثيرة بما في ذلك المواساة والتأكيد	35.
1	2	3	4	5	6	7	حين يقضي الأشخاص القريبون مني وقتاً طويلاً بعيداً عني، هذا الأمر يثير معارضي	36.

outcomes of these social characteristics, which are less prevalent in other Western societies.

The current findings also bear implications for the use of ECR in relational studies, suggesting its relevance to attachment figures other than romantic partners.

LIMITATIONS

This study's results are based on self-reports of nonrepresentative convenience samples of Israeli Arabs and Jews, differing in certain demographic characteristics (e.g., marital status). As such, they are subjected to social desirability and interpretation biases and one should be cautious in generalizing the current findings before replicating them in other samples. Furthermore, the assessed differences between Arabs and Jews are based on participants' ethnic affiliations, and not on their cultural orientations. Such inference about the nature of individuals from their group's characteristics (ecological fallacy) neglects individual differences within cultures, which can be substantial in heterogenic subcultures.

This study also lacks information about the ways other psychological constructs (e.g., high-order personality traits) and psychological outcomes (e.g., well-being) are related to cultural differences in attachment orientations and attachment figure's identity. These have yet to be explored.

CONCLUSIONS AND IMPLICATIONS

Our findings generally complement previous cross-cultural findings linking prevalence of attachment patterns to social and cultural contexts (e.g., 15, 17). More specifically, they support the use of the ECR scale for assessing attachment orientations among Arabs in Israel, and provide evidence for differences between Arabs and Jews in attachment orientations and similarities between these two groups in attachment figures' identities.

The findings described above should be considered in the clinical care of Arabs and Jews in Israel. Arabs' higher attachment anxiety should be considered in the therapeutic context, bearing in mind that the higher anxiety scores may reflect social processes reinforcing interdependence, and that it may have adaptive advantages in Arab society. Interventions should also be developed to fit expectations and behaviors of people with higher attachment-anxiety scores.

The results regarding attachment figures suggest that a notable proportion of the Israeli population (both Arabs and Jews) turns to people other than their romantic partner in times of need, and that such behav-

ior should not be considered abnormal or strange. As a result, when exploring and developing patients' support systems in treatment, clinicians should refer to a broader range of figures (beyond romantic partners), especially relatives and friends.

References

1. Bowlby J. Attachment and loss (Vol. 1). New York: Basic Books, 1982.
2. Hazan C, Shaver P. Romantic love conceptualized as an attachment process. *J Pers Soc Psychol* 1987; 52:511-524.
3. Hazan C, Zeifman D. Sex and the psychological tether. In: Bartholomew K, Perlman D., editors. Attachment processes in adulthood: Advances in personal relationships (Vol. 5). London: Jessica Kingsley, 1994: pp. 151-178.
4. Bowlby, J. Attachment and loss (Vol. 2). Separation: Anxiety and anger. New York: Basic Books, 1973.
5. Ainsworth MDS, Wall S. Patterns of attachment: A psychological study of the strange situation. New Jersey: Lawrence Erlbaum, 1978.
6. Ainsworth MDS. Attachments and other affectional bonds across the life cycle. In: Parkes CM, Stevenson-Hinde J, Marris P, editors. Attachment across the life cycle. New York: Tavistock/ Routledge, 1991: pp. 33-51.
7. Mikulincer M, Shaver PR., editors. Attachment in adulthood: Structure, dynamics, and change. New York: Guilford, 2007.
8. Main M, Solomon J. Procedures for identifying infants as disorganized/disoriented during the Ainsworth strange situation. In: Greenberg MT, Cicchetti D, Cummings M., editors. Attachment in the preschool years: Theory, research, and interventions. Chicago: University of Chicago, 1990: pp. 121-160
9. Lyons-Ruth K, Jacobvitz D. Attachment disorganization: Unresolved loss, relational violence, and lapses in behavioral and attentional strategies. In: Cassidy J, Shaver PR, editors. Handbook of attachment: Theory, research, and clinical applications. New York: Guilford, 1999: pp. 520-554.
10. Dozier M, Lee SW. Discrepancies between self- and other-report of psychiatric symptomatology: Effects of dismissing attachment strategies. *Dev Psychopathol* 1995; 7: 217-226.
11. Liotti G. Disorganized/disoriented attachment in the etiology of the dissociative disorders. *Dissociation: Progress in the Dissociative Disorders* 1992; 5: 196-204.
12. Ogawa JR, Sroufe LA, Weinfield NS, Carlson EA, Egeland B. Development and the fragmented self: Longitudinal study of dissociative symptomatology in a nonclinical sample. *Dev Psychopathol* 1997; 9: 855-879.
13. Bartholomew K, Horowitz LM. Attachment styles among young adults: A test of a four-category model. *J Pers Soc Psychol* 1991;61:226-244.
14. Brennan KA, Clark CL, Shaver PR. Self-report measurement of adult attachment: An integrative overview. In: Simpson JA, Rholes WS, editors. Attachment theory and close relationships. New York: Guilford, 1998: pp. 46-76.
15. Erdman P, Ng K. Attachment: Expanding the cultural connections. New York: Taylor & Francis, 2010.
16. Mizuta I, Zahn-Waxler C, Cole PM, Hiruma N. A cross-cultural study of preschoolers' attachment: Security and sensitivity in Japanese and US dyads. *Int J Behav Dev* 1996;19:141-159.
17. Schmitt DP, Alcalay L, Allensworth M, Allik J, Ault L, Austers I, et al. Patterns and universals of adult romantic attachment across 62 cultural regions. *J Cross Cult Psychol* 2004;35:367-402.
18. Van IJzendoorn MH, Sagi A. Cross-cultural patterns of attachment: Universal and contextual dimensions. In: Cassidy J, Shaver PR, editors. Handbook of attachment: Theory, research, and clinical applications. New York: Guilford, 1999: pp. 713-734.

19. Van IJzendoorn MH, Kroonenberg PM. Cross-cultural patterns of attachment: A meta-analysis of the strange situation. *Child Dev* 1988;59: 147-156.
20. Bretherton I. The origins of attachment theory: John Bowlby and Mary Ainsworth. *Dev Psychol* 1992;28:759-775.
21. Rothbaum F, Weisz J, Pott M, Miyake K, Morelli G. Attachment and culture: Security in the United States and Japan. *Am Psychol* 2000;55:1093-1104.
22. Smooha S. Index of Arab-Jewish Relations in Israel. Haifa, Israel: The Jewish-Arab Center, University of Haifa, 2004.
23. Al-Haj M. Kinship and modernization in developing societies: The emergence of instrumentalized kinship. *J Comp Fam Stud* 1995; 26:311-328.
24. Hofstede GH. *Culture's consequences: Comparing values, behaviors, institutions, and organizations across nations*. California: Sage, 2003.
25. Azaiza F, Abu-Baker K, Hertz-Lazarowitz R, Ghanem A. Arab women in Israel, current status and future trends. Tel Aviv: Ramot, 2009.
26. Ben-Ari A, Malach-Pines A. The changing role of family in utilization of social support: Views from Israeli Jewish and Arab students. *Fam Soc* 2002; 83:93-102.
27. Malach-Pines A. Adult attachment styles and their relationship to burnout: A preliminary, cross-cultural investigation. *Work Stress* 2004; 18: 66-80.
28. Alonso-Arbiol I, Balluerka N, Shaver PR. A Spanish version of the Experiences in Close Relationships (ECR) adult attachment questionnaire. *Pers Relat* 2007; 14: 45-63.
29. Mallinckrodt B, Wang CC. Quantitative methods for verifying semantic equivalence of translated research instruments: A Chinese version of the Experiences in Close Relationship Scale. *J Consult Psychol* 2004; 51: 368-379.
30. Lafontaine MF, Lussier Y. Structure bidimensionnelle de l'attachement amoureux: anxiété face à l'abandon et évitement de l'intimité [Bidimensional structure of attachment in love: Anxiety over abandonment and avoidance of intimacy]. *Can J Behav Sci* 2003; 35: 56-60.
31. Nakao T, Kato K. Constructing the Japanese version of the Adult Attachment Style Scale (ECR). *Jap J Psychol* 2004; 75: 154-159.
32. Alegria M, Vila D, Woo M, Canino G, Takeuchi D, Vera M, et al. Cultural relevance and equivalence in the NLAAS instrument: Integrating etic and emic in the development of cross-cultural measures for a psychiatric epidemiology and services study of Latinos. *Int J Methods Psychiatr Res* 2004; 13: 270-288.
33. Hamblton RK. Issues, designs, and technical guidelines for adapting tests into multiple languages and cultures. In: Hamblton RK, Merenda PF, Spielberger CD, editors. *Adapting educational and psychological tests for cross-cultural assessment*. New Jersey: Erlbaum, 2005: pp. 3-38.
34. Van de Vijver FJR, Poortinga YH. Conceptual and methodological issues in adapting tests. In: Hamblton RK, Merenda PF, Spielberger CD, editors. *Adapting educational and psychological tests for cross-cultural assessment*. New Jersey: Erlbaum, 2005: pp. 39-63.
35. Coyne I. International Test Commission Guidelines on Adapting Tests. http://www.intestcom.org/itc_projects.htm#ITC Guidelines on Adapting Tests. 2001; last updated 2007.
36. Kirkpatrick LA. Evolution, pair-bonding, and reproductive strategies: A reconceptualization of adult attachment. In: Simpson JA, Rholes WS, editors. *Attachment theory and close relationships*. New York: Guilford, 1998: pp. 353-393.
37. Scharfe E, Bartholomew K. Reliability and stability of adult attachment patterns. *Pers Relatsh* 1994;1:23-43.
38. Bem SL. *The lenses of gender*. New Haven: Yale University, 1993.
39. Bem SL. The measurement of psychological androgyny. *J Consult Clin Psychol* 1974;42:155-162.
40. Spence JT, Helmreich RL. *Masculinity and femininity: Their psychological dimensions, correlates, and antecedents*. Austin: University of Texas, 1978.
41. Schmitt DP. Are men universally more dismissing than women? Gender differences in romantic attachment across 62 cultural regions. *Pers Relat* 2003;10:307-331.
42. Israel National Insurance Institution. *Poverty and Social Inequalities Report*. 2010. http://www.btl.gov.il/Publications/oni_report/Pages/oni2009.aspx
43. Shaver PR, Mikulincer M, Alonso-Arbiol I, Lavy S. Assessment of adult attachment across cultures: Conceptual and methodological considerations. In: Erdman P, Ng K, editors. *Attachment: Expanding the cultural connections*. New York: Taylor & Francis, 2010: pp. 89-108.
44. Gore MS. The traditional Indian family. In: Nimkoff MF, editor. *Comparative family systems*. Boston: Houghton Mifflin, 1965: pp. 209-231.
45. D'Cruz P, Bharat S. Beyond joint and nuclear: The Indian family revisited. *J Comp Fam Stud* 2001;32:167-194.
46. Mikulincer M., Florian V. Exploring individual differences in reactions to mortality salience: Does attachment style regulate terror management mechanisms? *J Pers Soc Psychol* 2000; 79: 260-273.
47. Brislin RW. Back-translation for cross-cultural research. *J Cross Cult Psychol* 1970;1:185-216.
48. Kirmayer LJ, Young A. Culture and context in the evolutionary concept of mental disorders. *J Abnorm Psychol* 1999; 108: 446-452.
49. Rholes W, Simpson JA. *Adult attachment: Theory, research, and clinical implications*. New York: Guilford, 2004.