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Love Attitudes Scale - Short form: The preliminary assessment of the factor structure of its Italian version

Mirian Agus[1], Luisa Puddu[2], Claudia Gonnelli[3], Rosalba Raffagnino[4]

[1] Department of Pedagogy, Psychology, Philosophy, Faculty of Humanistic Studies, University of Cagliari
[2] Department of Education Sciences and Psychology, University of Florence
[3] Local Health Unity (USL), Psychiatric service, Siena
[4] Department of Health Sciences, University of Florence

ABSTRACT. In questo articolo viene proposta una preliminare valutazione psicometrica della versione italiana del *Love Attitudes Scale: Short Form* (LAS; Hendrick, Hendrick & Dicke, 1998), una delle più utilizzate misure dell'amore. I risultati confermano la struttura a sei fattori della scala e la sua validità convergente con alcune dimensioni della relazione di coppia. Sono state rilevate anche differenze di genere in vari stili amorosi. Si conferma l'utilità dello strumento.

SUMMARY. This study aims to make a preliminary evaluation of the psychometric features of the Italian version of the Love Attitudes Scale: Short Form (LAS; Hendrick, Hendrick & Dicke, 1998), which is one of the most commonly used measurements of love in literature. Our results confirmed the six-factor structure and its convergent validity with several affective dimensions (e.g., intimacy, fear of intimacy, sexuality, relational talk) in couple relationships and marital satisfaction (dyadic and familial). For discriminant validity, there were gender differences in several love styles. Our findings indicated that this tool might be useful in both scientific and clinical contexts when used in the Italian framework.

Keywords: *Factor structure, Psychometric proprieties, Love styles, Love Attitudes Scale - Short Form*

INTRODUCTION

Since Kephart's work in 1967 (Kephart, 1967) which examined whether love was important for marriage, romantic love has been considered essential for marriage and marital quality. Scholars have distinguished different experiences of love, such as passionate, companionate, romantic, and adult-attachment love (Berscheid, 2010) and various love attitudes or styles (Lee, 1973), as well as assessing immature and pathological ways to live love (Doron, Derby & Szepsenwol, 2014).

Interest in the different experiences of love has brought not only fruitful findings and theoretical models, but also a number of useful measurements for quantifying these experiences. Among these, the *Love Attitudes Scale: Short Form* (LAS; Hendrick et al., 1998) is one of the most widely used and validated tools in many countries. In Italy, it received attention in a first empirical validation

in a sample of people aged between 20 and 30 (Ortalda & Canale, 2010).

Considering the importance of this tool and the lack of its systematic empirical validation in Italy, the main aim of our study is to make a first validation with an Italian sample and verify its factorial structure. In addition, we intend to verify the association between love styles and some key dimensions of marital quality, such as affectivity and satisfaction. In this regard, we assess the construct validity while relying on convergent and discriminant validity.

Background

Lee (1973) conceptualized the nature of love through colors that correspond to specific typologies of love styles. He proposed that different attitudes toward love influence emotions and behavior and can be classified in six styles: Eros, Ludus and Storge (the primary styles), and Mania, Pragma and Agape (the secondary styles). The primary styles are characterized by passion, physical and emotional attraction and commitment (*Eros style*); game playing and uncommitted love (*Ludus style*); and friendship and companionship-driven love (*Storge style*). The secondary styles are derived by combining features of the primary styles: for instance, the union of Eros and Ludus results in the *Mania style*, which is connoted by an insecure and dependent experience of love (Hendrick & Hendrick, 1986); the combination of Ludus and Storge leads to the *Pragma style*, which is a rational love style; and the *Agape style*, an altruistic and selfless style of love, is the result of the combination of Eros and Storge.

Several of these styles correspond to other love taxonomies in psychological literature, such as that proposed by Berscheid (2010), who distinguished among *romantic* (passionate), *companionate* (friendship), *compassionate* (altruistic), and *attachment* love (strong affective bonds). The Storge style is often used as a measure of companionate love, and Agape and compassionate love are similar concepts in close relationships (Fehr, Sprecher, Hojjat, & Cramer, 2013). Scholars have also delineated the association between love styles through specific pathological love pathways, such as the *Relationship Obsessive Compulsive Disorder* (*ROCD*; Doron et al., 2014). ROCD includes preoccupations and doubts about one's own intimate relationships and partners and is thus closely related to the Mania style (Graham, 2011). In addition, the Mania and Agape styles are similar to the concept of Pathological love (PL), which is characterized by an excessive need to remain with the partner and provide attention and care for him/her to the detriment of one's own personal interests.

Following Lee's proposal, several empirical studies have examined the existence and consistence of these love styles and their relation to different variables in cultural and personal dimensions. Several cross-cultural comparative studies (Kanemasa et al., 2004; Neto, 2007) have supported the six dimensions of love proposed by Lee (1973).

With regard to gender differences, while some research has found that men accept more the Eros, Ludus and Agape love styles, and women prefer the Pragma style and companionate love, others have failed to obtain similar results (Wan Shahrazad, Hoesni, & Chong, 2012).

Research has found that love styles influence relationship behavior and feelings (Levine, Aune & Park, 2006) and have different effects on the partners' relationship. In fact, the Eros, Agape and Storge styles are related to positive features in the couple's relationship, whereas the Ludus, Mania and Pragma types reflect negative aspects of the marriage. For instance, using couples, Morrow, Clark & Brock (1995) found that partners who had the Eros and Agape styles expressed more marital satisfaction, commitment, lower costs and poorer alternative qualities than did partners who preferred the Ludus style. In addition, scholars found that Eros and Agape are the strongest predictors of relationship satisfaction (Vedes et al., 2016), whereas the Ludus style was negatively associated with marital satisfaction and stability (Goodboy & Myers, 2010). The Eros style distinguished individuals who had secure attachment, whereas the Ludus style reflected avoidant attachment and the Mania style was related to an anxious/resistant attachment style (Fricker & Moore, 2002; Levy & Davis, 1988). Among undergraduate students, Kanemasa et al. (2004) found that Eros was typical of people who expressed positive feelings and self-perceptions, Ludus and Pragma characterized people with negative feelings in romantic relationships, and Ludus was related to less attraction toward the partner. Goodboy, Horan & Booth-Butterfield (2012) found that the Ludus and Mania styles positively predicted jealousy-evoking behavior, and Attridge (2013) determined that Mania was primarily associated with jealousy.

In some cases, the associations between love styles and aspects of marital quality appear to change after accounting for gender differences. For example, Vedes et al. (2016) found

that both the Eros and Agape styles had positive effects on support for the partner and dyadic coping (partners who cope with a joint stressor together), but that the Ludus style was detrimental for relationship satisfaction for women and not men. Generally, scholars have observed a more frequent Agape style in men than in women (Regan, 2016).

Measuring love and love styles

Hatfield, Bensman and Rapson (2012) proposed a compendium of the existing scales on passionate love. They observed how scholars' conceptions of the nature of love have changed over the years and how these historical and scientific changes are reflected in the scales designed to measure it. Currently, scholars often view love from a narrow theoretical perspective and assume that it is a multi-faceted phenomenon.

Although several measurements of love experiences are ad-hoc tools for research objectives (Sprecher & Hatfield, 2017) or qualitative measurements such as the narrative method (Gawda, 2012), many additional validated scales have been constructed from Lee's love theory (1973). Among the most popular tools, there are the *Passionate Love Scale* (*PLS*; Hatfield & Sprecher, 1986), which assesses the physiological, cognitive, and behavioral aspects of love types, and the *Triangular Love Scale* (*TLS*; Sternberg, 1997), which assesses the three love components (passion, intimacy, commitment) recognized by the author (for a review of love measures, see Hatfield et al., 2012). There are also specific tools that assess specific aspects and types of love. For instance, Sprecher and Fehr (2005) developed a compassionate love scale that assesses altruistic love in all close relationships. They observed many associations of this scale with social and relationship dimensions, including prosocial behavior, religion, and social support.

Today, among the most popular and used scales of love measurements, there is the *Love Attitudes scale* (Hendrick & Hendrick, 1986), which assesses the six types of love (Eros, Ludus, Storge, Pragma, Mania, Agape) based on Lee's theory. Given the criticism about the clarity of the focus of the measurement on general or specific relationships, Hendrick and Hendrick (1990) developed the relationship version of the LAS but found that the two tools were equivalent. The original scale included 42 items. Hendrick et al. (1998) also created two short versions of the LAS. The short forms assessed the six types of love: the first version included 18 items (three items for each love type), and the second included 24 items (four items for each love type). The scholars found that these two short forms had stronger psychometric properties than the original LAS (Hendrick et al., 1998).

The most frequently used version is the LAS 24-item short form that has established reliability and validity (Hendrick & Hendrick, 1986, 1990; Hendrick et al., 1998) across cultural contexts, as attested by Wan Shahrazad et al. (2012). Researchers have proposed several revisions to the LAS. Bierhoff, Grau and Ludwig (1993) developed a German adaptation, which resulted in the *Marburg Attitude Scales toward Love Styles* (*MEIL*) with 60 items (e.g., Vedes et al., 2016). Todosijević, Arančić and Ljubinković (2009) reviewed the LAS in Serbia and introduced new items.

AIMS

The purpose of this study was to investigate the psychometric proprieties of the LAS-Short form (Hendrick et al., 1998) in this Italian version in a sample of adults. This instrument was chosen because it is widely used in the clinical and academic contexts and has been adapted to many different cultures, showing good psychometric proprieties (Kanemasa et al., 2004; Neto, 2007; Wan Shahrazad et al., 2012). The absence of data related to the application of LAS in the Italian context might be considered a difficulty in the assessment of couple relationships in academic and clinical research.

METHOD

Participants

The participants consisted of 415 Italian citizens (women 50.1%), aged from 19 to 70 years (M_{age} = 40.15; SD_{age} = 11.92), of whom 32.2% were college graduates, 49.8% had a high school education, 18% had a lower school education; 92% were employed. Furthermore, 63.7% of participants were in the mid-socio-economic range. Overall, 59.1% were married; 20.8% were cohabiting (mean years of cohabitation = 12.04 ± 12.27), and 20.1% were not cohabiting. Additionally, 57.9% of the participants had children. The sampling strategy was non-probabilistic (a convenience sample), and participants took part in the

study on a voluntary basis after providing written consent. To obtain consent, qualified researchers informed them of the aim of the study. They were recruited in Tuscany with the collaboration of a group of professional clinicians; they did not receive any incentive for their participation. The response rate was approximately 80% of the individuals contacted. In order to be included in the study, they had to be engaged in a stable heterosexual relationship for almost six months and be Italian citizens from birth.

Materials and procedure

Participants were required to fill in a battery of self-report measurements that were individually managed. The questionnaires, which were administered in a paper-and-pencil format and compiled in a quiet room in the presence of a trained researcher, took approximately 30 minutes to complete.

The battery was structured in several sections.

Participants first reported socio-demographic characteristics (age, educational attainment, residence, socioeconomic status) and aspects related to familiar relationships (type of relationship, length of relationship, presence of children).

– *Love Attitudes Scale-Short Form (LAS-SF)* - Following, they completed the Italian Love Attitudes Scale-Short form (LAS-SF) (Hendrick et al., 1998). This 24-item questionnaire assesses different aspects of love behavior that reflect love styles. The original questionnaire identified six dimensions (Eros, Ludus, Storge, Pragma, Mania and Agape), for which the Alpha reliability coefficients ranged from .71 to .84 in the research of White, Hendrick and Hendrick (2004). For each sentence, participants were asked to respond according to a five-point Likert scale (from 0 to 4), for which a low score corresponded to higher agreement with the statement. Examples of items for each dimensions included: "My partner and I have the right physical 'chemistry' between us" (*Eros*); "I enjoy playing the 'game of love' with my partner and a number of other partners" (*Ludus*); "Our love is really a deep friendship, not a mysterious, mystical emotion" (*Storge*); "One consideration in choosing my partner was how he/she would reflect on my career" (*Pragma*); "When my partner doesn't pay attention to me, I feel sick all over" (*Mania*); "I would rather suffer myself than let my partner suffer" (*Agape*). An Italian translation of the LAS-SF was presented; this version was back-translated into English by a native English speaker. The back-translation and the original English version were matched and discrepancies were clarified during a discussion between the translators (Brislin, 1986).

– *Dyadic-Familial Relationship Satisfaction Scale (DFRS)* - The next section included the Dyadic-Familial Relationship Satisfaction Scale (DFRS; Raffagnino & Matera, 2015), with 14 items, measured according to a Likert scale (from 0 to 4), which measure Dyadic satisfaction (Alpha = .95) and Familial satisfaction (Alpha = .91). For the dyadic dimension, 13 domains were identified such as relationship stability, support, comprehension, respect, and communication of feelings, while for the familial dimension, six domains were covered including familial responsibility and commitment, house management, and family roles. The introductory statement asks: "Below are some areas related to life as a couple. Please think about your current relationship and express your degree of satisfaction with each area".

– *The Couple's Affectivity Scale (CAS)* - The last section was the Couple's Affectivity Scale (CAS; Raffagnino & Penzo, 2015) that has 39 items structured in eleven factors; their reliability ranged from .73 to .90. The factors were:
  - Self-Disclosure (SD) regarding the person's availability to be open to express feelings, fear, information to his/her partner ("During the past month, how frequently have you expressed your fears to your partner?");
  - Partner Disclosure (PD) related to the person's perception of the partner's ability to express his/her thoughts and ideas, feelings and love ("During the past month, how frequently has your partner openly expressed his/her positive feelings towards you?");
  - Perceived Partner Responsiveness (PPR) concerning the perception of comprehension, affect, esteem and protection received from the partner ("During the past month, how frequently has your partner demonstrated understanding towards you?");
  - Relational communication (RC) measured the partner's attitude to talk with the other about their relationship ("During the past month, how frequently have you told your partner what you want from your relationship?");
  - Relational Fears (RF) included the fears of emotional involvement (FEIN/ "During the past month, how frequently have you felt afraid to express yourself to your partner?"); the fears of being abandoned and

rejected (FAR/ "During the past month, how frequently have you experienced fear of being alone?"); the fears of dependency and control (FDC/ "During the past month, how frequently have you experienced fear of being controlled by your partner?");

- Sexual Behaviors (SB) involved physical attraction and sexual satisfaction (PASS/ "During the past month, how frequently have you felt physically attracted to your partner?"); anxiety and sexual inhibition (ASI), regarding both the worry about sexual performance and the difficulty of speaking about sexuality ("During the past month, how frequently have you experienced sexual difficulties and, if so, do you tend to ignore them for a long time before saying something?"); partner initiative (PI) concerning the initiative in sexual intercourse ("During the past month, how frequently have you wanted to have sexual intercourse with your partner?");
- Closeness-Distance between Partners (CDP) was measured by means of a graphic representation "The Intimacy Line" (Raffagnino & Occhini, 2000) that allows the respondent to express his/her perception about the physical and emotional closeness-distance to their partner, as well as the respondent's perception about the partner's physical and emotional closeness-distance to them.

For all dimensions, participants indicated their answers using a five points Likert-type scale, ranging from never (0) to always (4), with the exception of one item of the PASS, implying the frequency measure of sexual intercourse (ranging from 0 = none, to 7 = several times a day) and of the CDP using a six points Likert-type scale (ranging from 0 = maximum closeness to 5 = maximum distance).

In addition, two supplementary items assessed happiness and satisfaction in the dyadic relationship, and participants reported the extent to which each statement was true on a scale from 0 (not at all) to 4 (extremely).

Data analysis

Statistical analyses were conducted using R 3.4.1 and EQS software (v 6.3; Bentler, 1995).

First, item distributions were checked for normality and statistical analyses were performed based on these assessments. In order to evaluate the construct validity, the Confirmatory Factor Analysis (CFA) was applied to assess the original first-order factor structure, having six factors.

Because the variables had a nonsymmetrical curve and a non-normal multivariate distribution, we used a robust estimator to perform the Confirmatory Factor Analysis (CFA), the Elliptical Least Square Solution (ELS), which uses the covariance matrix. The factor variance was set to 1.0, and the factor loadings were freely estimated (Kline, 2015).

To evaluate the goodness-of-fit, the indications of Hu and Bentler's (1999) and Schermelleh-Engel Moosbrugger and Müller (2003) were applied. Specifically, we used the following criteria: a ratio $\chi^2/df<2$ was defined as good, a ratio $\chi^2/df<3$ as tolerable; acceptable fit values for the GFI, AGFI and CFI were ≥.90; a RMSEA ≤.08 and a SRMR ≤.08 denoted a satisfactory fit, a NNFI between .97 and ≤1.00 indicated a good fit; and a NNFI between .95 and .97 implied a suitable fit.

Reliability was assessed using the Cronbach's Alpha coefficient.

To demonstrate construct validity, Pearson's correlations coefficients were computed between the LAS scales and dimensions from the Couple's Affectivity Scale (CAS) (Raffagnino & Penzo, 2015) and the Dyadic-Familial Relationship Satisfaction Scale (DFRS) (Raffagnino & Matera, 2015); these data might provide evidence for convergent and discriminant validity (Shaughnessy, Zechmeister & Zechmeister, 2012).

Indeed, whereas the LAS measures love attitudes, the other measurements assess the individual's actual experiences in intimate relationships for the couple's affective expression and the partner's perceptions of relational satisfaction. Therefore, the LAS and CAS allowed us to examine two psychological aspects of the affective dimension of the couple's relationship: attitude and experience. The LAS and DFRS allowed us to evaluate the relationship between love styles and perceptions of marital quality, as measured through relational satisfaction.

Specifically, on the basis of the most recent findings in literature, it is assumed that some dimensions of the LAS (e.g. Eros, Agape and Storge styles) might have a positive correlation with the dimensions of dyadic and familial satisfaction and affectivity; while other dimensions of LAS (e.g. Ludus, Mania and Pragma) may have a negative correlation with these relational variables.

Moreover, to assess the discriminant validity of the LAS-SF Italian version, we evaluated the differences in the LAS factor scores in relation to the gender of participants.

RESULTS

We tested a CFA model, including 24 items and six first-order factors (based on the original version of the LAS-SF; Hendrick, et al., 1998). The CFA had an acceptable fit (see Table 1). All items except one loaded onto their respective factors; however, item 5 had a low standardized factor loading on the Ludus factor (see Table 2). The remaining items had good factor loadings on their respective factors, which confirmed the original factorial structure (Hendrick et al., 1998). Given the aforementioned recommendations for evaluating CFA models, there were a few problems. The NNFI had values <.95; and the GFI and AGFI were <.90. It is important to consider that χ^2, GFI and AGFI are affected by sample size and the degrees of freedom; thus, one cannot completely rely on these indicators (Sharma, Mukherjee, Kumar & Dillon, 2005). The reliabilities for the dimensions were adequate; only the Ludus factor had a poor Cronbach's Alpha (α = .450), which improved after deleting item 5 (α = .713).

To assess convergent and discriminant validity, we computed Pearson's *r* correlations between the LAS-SF factors and the other measurements (i.e., CAS, DFRSS, Satisfaction and Happiness). Coherently with the results of previous CFA and reliability analyses, the Ludus score included items 6, 7 and 8 from the LAS-SF. To evaluate these coefficients, agreement with the statements was characterized by a low score on the Likert scale (0 = strongly agree), whereas disagreement was characterized by a higher score (4 = strongly disagree). In order to account for multiple correlation assessments, we considered the linear relationships of the indices having a *p* value lower than .0001 as relevant. The bivariate linear correlations were first assessed for the total sample (see Table 3a), then separately for males and females (see Table 3b and Table 3c).

The total score of Eros had a significant positive correlation with Agape and the CAS dimensions of CDP (Closeness-distance between partners), FDC (Fear of dependence and control), FEIN (Fear of emotional involvement), FAR (Fear of abandonment and rejection), and ASI (Anxiety and sexual inhibition), which ranged from .178 to .365. Moreover, Eros had a significant negative correlation with Ludus, DFRSS Dyadic Satisfaction, DFRSS Familial Satisfaction, with the item of general Perception of Couple Satisfaction and Happiness and with the CAS dimensions of PD (Partner disclosure), PPR (Perceived partner responsiveness) and PASS (Physical attraction and sexual satisfaction), which ranged from –.240 to –.462.

While Ludus had a significant negative linear relation with CAS-FDC and CAS-FEIN (ranging from –.109 to –.219) it had a significant positive correlation with Storge, Pragma, Mania and the CAS dimension of SD (ranging from .171 to .453).

Storge was positively related to Pragma (*r* = .413).

Pragma was positively correlated with Mania (*r* = .345).

The LAS-SF Mania was positively associated with Agape (*r* = .320).

Finally, Agape was negatively and significantly related to the CAS dimensions of PPR, PASS and the general Perception of Couple Satisfaction and Happiness (ranging from –.192 to –.207).

As regards the male sample (see Table 3b), we found various correlations, mainly in the Eros dimension, and also in Ludus. In particular, Eros had a significant and positive correlation with Agape and the CAS dimensions of CDP (Closeness-distance between partners), FDC (Fear of dependence and control), FEIN (Fear of emotional involvement), FAR (Fear of abandonment and rejection), and ASI (Anxiety and sexual inhibition) (ranging from .288 to .302). It also had a significant and negative correlation with Ludus, Pragma, DFRSS Dyadic Satisfaction, PPR (Perceived partner responsiveness), PASS (Physical attraction and sexual satisfaction), and with the item of general Perception of Couple Satisfaction and Happiness (ranging from –.302 to –.400).

Table 1 – Goodness-of-fit indices for two CFA models

df	χ^2	χ^2/df	p	RMSEA	RMSEA [90%CI]	SRMR	NNFI	CFI	GFI	AGFI
221	541.164	2.44	.0001	.061	.054, .067	.073	.938	.950	.886	.846

Legenda. df = degrees of freedom; χ^2 = Chi Square; RMSEA [90% CI] = Root Mean Square Error of Approximation with Confidence Interval; SRMR = Standardized Root Mean Square Residual; NNFI = Non-normed Fit Index; CFI = Comparative Fit Index; GFI = Goodness-of- Fit; AGFI = Adjusted Goodness-of- Fit Index.

Table 2 - CFA standardized factor loadings for 24-item version of LAS

	Mean	SD	F1	F2	F3	F4	F5	F6
1. My partner and I have the right physical "chemistry" between us.	.77	1.02	.820					
2. I feel that my partner and I were meant for each other.	.79	1.05	.922					
3. My partner and I really understand each other.	.95	1.01	.807					
4. My partner fits my ideal standards of physical beauty/handsomeness.	.86	1.02	.682					
5. I believe that what my partner doesn't know about me won't hurt him/her.	1.49	1.31		**.193**				
6. I have sometimes had to keep my partner from finding out about other partners.	3.24	1.41		–.767				
7. My partner would get upset if he/she knew of some of the things I've done with other partners.	2.60	1.52		–.461				
8. I enjoy playing the "game of love" with my partner and a number of other partners.	3.40	1.28		–.803				
9. Our love is the best kind because it grew out of a long friendship.	2.50	1.43			.748			
10. Our friendship merged gradually into love over time.	2.53	1.52			.847			
11. Our love is really a deep friendship, not a mysterious, mystical emotion.	2.97	1.35			.696			
12. Our love relationship is the most satisfying because it developed from a good friendship.	2.69	1.40			.913			
13. A main consideration in choosing my partner was how he/she would reflect on my family.	2.95	1.37				.581		
14. An important factor in choosing my partner was whether or not he/she would be a good parent.	2.20	1.49				.456		
15. One consideration in choosing my partner was how he/she would reflect on my career.	3.21	1.27				.784		
16. Before getting very involved with my partner, I tried to figure out how compatible his/her hereditary background would be with mine in case we ever had children.	3.45	1.20				.860		
17. When my partner doesn't pay attention to me, I feel sick all over.	2.01	1.26					.441	
18. Since I've been in love with my partner, I've had trouble concentrating on anything else.	2.81	1.29					.683	
19. I cannot relax if I suspect that my partner is with someone else.	2.21	1.53					.632	
20. If my partner ignores me for a while, I sometimes do stupid things to try to get his/her attention back.	2.73	1.34					.705	
21. I would rather suffer myself than let my partner suffer.	1.36	1.28						.786
22. I cannot be happy unless I place my partner's happiness before my own.	1.75	1.26						.806
23. I am usually willing to sacrifice my own wishes to let my partner achieve his/hers.	1.79	1.17						.804
24. I would endure all things for the sake of my partner.	1.80	1.35						.746
Alpha Reliability			.878	.450	.872	.779	.703	.862

Note. F1: EROS; F2: LUDUS; F3: STORGE; F4: PRAGMA; F5: MANIA; F6: AGAPE.
The factor loading in bold was not significant.

Table 3a – Pearson's r correlations between LAS-SF and other variables

		LAS-F1	LAS-F2	LAS-F3	LAS-F4	LAS-F5	LAS- F6
LAS-EROS-F1	r	/					
	p						
LAS-LUDUS-F2	r	−.356***	/				
	p	.0001					
LAS-STORGE-F3	r	−.077	.261***	/			
	p	.118	.0001				
LAS-PRAGMA-F4	r	−.185***	.453***	.413***	/		
	p	.0001	.0001	.0001			
LAS-MANIA-F5	r	−.143**	.261***	.147**	.345***	/	
	p	.003	.0001	.003	.0001		
LAS-AGAPE-F6	r	.246***	−.060	.011	.170**	.320***	/
	p	.0001	.219	.818	.001	.0001	
DFRSS-DYADIC SATISFACTION	r	−.462***	.155**	−.048	.013	.060	−.163**
	p	.0001	.002	.328	.786	.226	.001
DFRSS-FAMILIAL SATISFACTION	r	−.307***	.065	−.063	−.020	.009	−.178**
	p	.0001	.223	.231	.711	.870	.001
CAS-PD	r	−.240***	.066	.005	−.003	−.008	−.092
	p	.0001	.178	.913	.949	.869	.060
CAS-FDC	r	.304***	−.219***	−.027	−.060	−.144**	.057
	p	.0001	.0001	.586	.225	.003	.246
CAS-PPR	r	−.391***	.119*	−.026	.015	−.047	−.196***
	p	.0001	.015	.601	.766	.338	.0001
CAS-SD	r	−.142**	.171***	−.006	.026	−.094	−.028
	p	.004	.0001	.910	.601	.056	.570
CAS-PASS	r	−.326***	.108*	−.017	.028	.028	−.192***
	p	.0001	.027	.725	.571	.572	.0001
CAS-FEIN	r	.297***	−.195***	.018	−.029	−.109*	.110*
	p	.0001	.0001	.709	.557	.027	.025
CAS-RC	r	−.031	.000	−.050	−.011	−.113*	−.081
	p	.530	.993	.310	.824	.021	.099
CAS-CDP	r	.365***	−.140**	−.021	−.031	−.075	.125*
	p	.0001	.006	.682	.541	.142	.013
CAS-FAR	r	.193***	−.109*	−.054	−.054	−.150*	−.005
	p	.0001	.026	.274	.269	.002	.919
CAS-ASI	r	.178***	−.135**	−.052	−.079	−.147**	.024
	p	.0001	.006	.294	.110	.003	.619
CAS-PI	r	−.031	.056	.047	−.007	−.022	.121*
	p	.535	.252	.335	.893	.655	.014
HAPPINESS	r	−.403***	−.121*	−.018	−.015	.039	−.195***
	p	.0001	.013	.718	.760	.431	.0001
SATISFACTION	r	−.414***	−.140**	−.039	−.010	.071	−.207***
	p	.0001	.004	.426	.840	.152	.0001

Note. CAS-PD: Partner disclosure; CAS-FDC: Fear of dependence and control; CAS-PPR: Perceived partner responsiveness; CAS-SD: Self-disclosure; CAS-PASS: Physical attraction and sexual satisfaction; CAS-FEIN: Fear of emotional involvement; CAS-RC: Relational communication; CAS-CDP: Closeness-distance between partners; CAS-FAR: Fear of abandonment and rejection; CAS-ASI: Anxiety and sexual inhibition; CAS-PI: Partner initiative.
* $p \leq .05$; ** $p \leq .01$; *** $p \leq .001$.

Table 3b – Pearson's r correlations between LAS-SF and other variables - Males

		LAS-F1	LAS-F2	LAS-F3	LAS-F4	LAS-F5	LAS-F6
LAS-EROS-F1	r	/					
	p						
LAS-LUDUS-F2	r	−.400***	1				
	p	.0001					
LAS-STORGE-F3	r	−.189**	.310***	1			
	p	.007	.0001				
LAS-PRAGMA-F4	r	−.302***	.514***	.453***	1		
	p	.0001	.0001	.0001			
LAS-MANIA-F5	r	−.226**	.311***	.171*	.458***	1	
	p	.001	.0001	.014	.0001		
LAS-AGAPE-F6	r	.302***	−.205**	−.123	.064	.220**	1
	p	.0001	.003	.080	.364	.002	
DFRSS-DYADIC SATISFACTION	r	−.381***	.215**	.065	.072	.059	−.143*
	p	.0001	.002	.358	.302	.400	.040
DFRSS-FAMILIAL SATISFACTION	r	−.228**	.178*	−.006	.033	.022	−.157*
	p	.002	.019	.941	.664	.777	.038
CAS-PD	r	−.188**	.061	.088	.021	−.085	−.131
	p	.007	.383	.210	.763	.224	.060
CAS-FDC	r	.288***	−.202**	−.067	−.015	−.125	.123
	p	.0001	.004	.343	.834	.074	.079
CAS-PPR	r	−.327***	.144*	.078	.062	−.003	−.203**
	p	.0001	.040	.263	.378	.967	.004
CAS-SD	r	−.126	.087	.002	.022	−.117	−.084
	p	.073	.212	.978	.751	.096	.233
CAS-PASS	r	−.313***	.139*	.064	.079	.005	−.231**
	p	.0001	.047	.361	.259	.938	.001
CAS-FEIN	r	.358***	−.255***	−.049	−.103	−.049	.197**
	p	.0001	.0001	.489	.140	.489	.005
CAS-RC	r	−.035	.051	−.026	.022	−.120	−.104
	p	.615	.465	.716	.752	.087	.138
CAS-CDP	r	.309***	−.198**	−.187**	−.117	−.113	.085
	p	.0001	.006	.009	.106	.117	.242
CAS-FAR	r	.295***	−.154*	−.058	−.114	−.160*	.056
	p	.0001	.027	.407	.104	.022	.427
CAS-ASI	r	.288***	−.251***	−.084	−.123	.0001	.141*
	p	.0001	.0001	.229	.080	.996	.044
CAS-PI	r	−.040	−.012	−.098	−.064	.015	.058
	p	.567	.869	.163	.359	.827	.410
HAPPINESS	r	−.396***	.193**	.119	.064	.035	−.200**
	p	.0001	.005	.090	.362	.623	.004
SATISFACTION	r	−.357***	.161*	.078	.035	.016	−.219**
	p	.0001	.022	.271	.615	.818	.002

Note. CAS-PD: Partner disclosure; CAS-FDC: Fear of dependence and control; CAS-PPR: Perceived partner responsiveness; CAS-SD: Self-disclosure; CAS-PASS: Physical attraction and sexual satisfaction; CAS-FEIN: Fear of emotional involvement; CAS-RC: Relational communication; CAS-CDP: Closeness-distance between partners; CAS-FAR: Fear of abandonment and rejection; CAS-ASI: Anxiety and sexual inhibition; CAS-PI: Partner initiative.

* $p \leq .05$; ** $p \leq .01$; *** $p \leq .001$.

Table 3c – Pearson's r correlations between LAS-SF and other variables - Females

		LAS-F1	LAS-F2	LAS-F3	LAS-F4	LAS-F5	LAS-F6
LAS-EROS-F1	r	/					
	p						
LAS-LUDUS-F2	r	−.301***	1				
	p	.0001					
LAS-STORGE-F3	r	.070	.177*	1			
	p	.311	.010				
LAS-PRAGMA-F4	r	−.030	.374***	.362***	1		
	p	.662	.0001	.0001			
LAS-MANIA-F5	r	−.049	.225**	.136*	.224**	1	
	p	.479	.001	.049	.001		
LAS-AGAPE-F6	r	.206**	.031	.097	.274***	.448***	1
	p	.003	.657	.160	.0001	.0001	
DFRSS-DYADIC SATISFACTION	r	−.558***	.113	−.149*	−.043	.055	−.165*
	p	.0001	.102	.031	.538	.428	.016
DFRSS-FAMILIAL SATISFACTION	r	−.397***	.016	−.074	−.057	−.023	−.149*
	p	.0001	.834	.318	.444	.758	.044
CAS-PD	r	−.297***	.069	−.076	−.028	.059	−.071
	p	.0001	.317	.274	.688	.393	.303
CAS-FDC	r	.326***	−.231**	.034	−.113	−.173*	.013
	p	.0001	.001	.623	.103	.012	.850
CAS-PPR	r	−.465***	.086	−.144*	−.038	−.084	−.214**
	p	.0001	.215	.037	.584	.225	.002
CAS-SD	r	−.163*	.217**	−.075	.012	−.051	−.076
	p	.018	.002	.277	.858	.464	.276
CAS-PASS	r	−.361***	.126	−.059	−.011	.032	−.106
	p	.0001	.068	.396	.875	.649	.124
CAS-FEIN	r	.239***	−.155*	.071	.044	−.158*	.014
	p	.0001	.024	.309	.530	.022	.835
CAS-RC	r	−.026	−.054	−.074	−.047	−.108	−.059
	p	.703	.436	.283	.498	.119	.392
CAS-CDP	r	.434***	−.116	.112	.047	−.029	.120
	p	.0001	.105	.118	.511	.689	.094
CAS-FAR	r	.084	−.069	−.055	.007	−.138*	−.065
	p	.226	.318	.426	.923	.045	.351
CAS-ASI	r	.081	−.061	−.050	−.048	−.262***	−.103
	p	.241	.379	.475	.489	.0001	.138
CAS-PI	r	−.011	−.018	.066	.005	.003	−.043
	p	.874	.800	.340	.937	.966	.537
HAPPINESS	r	−.425***	.079	−.134	−.093	.031	−.153*
	p	.0001	.254	.052	.181	.658	.027
SATISFACTION	r	−.493***	.161*	−.124	−.049	.105	−.148*
	p	.0001	.020	.073	.482	.129	.032

Note. CAS-PD: Partner disclosure; CAS-FDC: Fear of dependence and control; CAS-PPR: Perceived partner responsiveness; CAS-SD: Self-disclosure; CAS-PASS: Physical attraction and sexual satisfaction; CAS-FEIN: Fear of emotional involvement; CAS-RC: Relational communication; CAS-CDP: Closeness-distance between partners; CAS-FAR: Fear of abandonment and rejection; CAS-ASI: Anxiety and sexual inhibition; CAS-PI: Partner initiative.
* $p \leq .05$; ** $p \leq .01$; *** $p \leq .001$.

Ludus had a significant negative linear relation with CAS-FEIN and CAS-ASI (ranging from –.251 to –.255), and had a significant positive correlation with Storge, Pragma, Mania.

Storge was only positively related with Pragma; and Pragma with Mania. In relation to the LAS-SF Mania and Agape, no significant correlation level emerged.

Also for the female sample (see Table 3c), we found various correlations, mainly in the Eros dimension, but they are much weaker in the Ludus dimension compared to the male sample. In particular, Eros had a significant positive correlation with the CAS dimensions of CDP (Closeness-distance between partners), FDC (Fear of dependence and control), FEIN (Fear of emotional involvement) (ranging from .239 to .434). It had a significant and negative correlation with Ludus, DFRSS Dyadic Satisfaction, DFRSS Familial Satisfaction, with the item of general Perception of Couple Satisfaction and Happiness; and the CAS dimensions of PD (Partner disclosure), PPR (Perceived partner responsiveness), and PASS (Physical attraction and sexual satisfaction) (ranging from –.297 to –.558). Both Ludus and Storge only showed a significant positive correlation with Pragma (respectively .374 and .362). This last dimension was positively correlated with Agape (.274); and the LAS-SF Mania was positively associated with Agape (.448) and negatively correlated with the CAS dimensions of ASI (–.262). We did not observe any significant correlations for Agape.

To evaluate discriminant validity, we examined gender differences in the means for each LAS-SF factor (see Table 4). A Multivariate Analysis of Variance demonstrated a significant multivariate effect for gender (Wilk's Lambda = .894, p = .0001) and significant univariate effects for Ludus [$F_{(1;405)} = 6.101$; $p = .014$], Storge [$F_{(1;405)} = 5.838$; $p = .016$] and Agape [$F_{(1;405)} = 17.879$; $p = .0001$]. Specifically, women had a higher score in Ludus, where a high score denoted greater disagreement with the sentences. Moreover, women also had higher scores on Storge and Agape (indicating stronger disagreement with the sentences).

DISCUSSION

This study describes the psychometric proprieties of the Italian version of the LAS-Short form (Hendrick et al., 1998) in a sample of adults. The analyses highlighted promising psychometric results for the factor structure, as well as the original English LAS-SF. The application of CFA confirmed the original six-factor structure (Hendrick et al., 1998), demonstrating the strength of the theoretical assumptions related to the scale construction and supporting the results of studies in other contexts and cross-cultural comparisons (Kanemasa et al., 2004; Neto, 2007; Wan Shahrazad et al., 2012). The data indicate adequate internal consistency and

Table 4 – MANOVA comparing the LAS-SF factors by gender (univariate effects)

	Male		Female		Total		F
	Mean	SD	Mean	SD	Mean	SD	(df = 1;405)
LAS-EROS	.857	.952	.833	.805	.845	.880	.082
LAS-LUDUS	2.948	1.182	3.218	1.045	3.084	1.121	6.101*
LAS-STORGE	2.528	1.278	2.815	1.140	2.674	1.217	5.838*
LAS-PRAGMA	2.913	1.107	2.989	.965	2.952	1.037	.555
LAS-MANIA	2.494	.998	2.389	.982	2.441	.990	1.158
LAS-AGAPE	1.459	.999	1.892	1.083	1.678	1.063	17.879**

Legenda. df = degrees of freedom.

Note. * p<.05; ** p<.01.

construct validity. Therefore, the LAS-SF Italian version is a reliable instrument for assessing the attitudes towards love classified by Lee (1973) in the six love styles.

However, item five ("I believe that what my partner doesn't know about me won't hurt him/her") had a low factor loading on the Ludus factor. Nevertheless, additional assessments of the factorial structure indicated that the model with 24 items was the best fit to the data.

Wan Shahrazad et al. (2012) investigated the measurement's reliability and validity in a Malaysian context and found critical issues with a few items, such as item five, that loaded more in Mania than in Ludus style in their sample.

In this study, the issue with item five could be related to the Italian translation, which may not clearly exemplify the concept that the Ludus style represents. As such, future research should define the Italian translation for this item differently; specifically, the problem might be linked to the request to agree with a sentence that contains a double negative.

Furthermore, we can assume that the specific aspect assessed by this item is linked to the heterogeneity of the participants' age.

For the relations among the six love styles, there were several associations. These findings are in contrast to those of Todosijević et al. (2009), who adapted the LAS in Serbia and only found one association between Mania and Agape. Our correlations also diverge from the assumptions of Hendrick et al. (2006) about the independence of the six love styles.

The first aspect explaining the convergences between styles that we found might be linked to the peculiarity of the sample. If these results are confirmed across various Italian samples, we can hypothesize that the current love attitude may be more fluid and less delineated in absolute categories. Each of the specific associations we found between the different love styles, as affirmed by Todosijević et al. (2009) regarding the relationship between Mania and Agape "seems to require at least a speculative explanation" (p. 72).

To examine the construct validity for the LAS-SF, we assessed convergent and discriminant validity and correlated the factor scores with dimensions from the Couple's Affectivity Scale (CAS; Raffagnino & Penzo, 2015) and the Dyadic-Familial Relationship Satisfaction Scale (DFRS; Raffagnino & Matera, 2015).

Our findings highlighted relevant associations among some different love styles and partners' affective expressions as well as perceptions of couple's satisfaction and happiness. To explain these findings, it is useful to note that LAS-SF has reverse score questions, where a positive correlation with other variables means that when there are high scores in LAS-SF, the scores in the other variables are low, and vice-versa. As such, a negative correlation implies a positive relationship between the examined concepts.

With regard to the perceived couple satisfaction, we only found one negative correlation with the Eros dimension of the LAS. Therefore, partners who have a love attitude characterized by passion, physical and emotional attraction and commitment also express a good dyadic and familial satisfaction, thus confirming the findings of other works that have measured marital satisfaction in both women and men (Gana, Saada & Untas, 2013). In general, our data confirm the positive connotation of this love style for a high-quality marital relationship (Kanemasa et al., 2004; Vedes et al., 2016). Besides, the general Perception of Couple Satisfaction and Happiness negatively correlate not only with Eros but also with the Agape dimension of the LAS. As a result, the partners who have an altruistic and selfless style of love (Agape) also declare to be satisfied and happy with their couple relationship, in line with research on compassionate love that is often associated with this love style and is important for marital quality and stability (Berscheid, 2010).

Also with respect to the partners' affective expressions, measured by different dimensions of the CAS, we found the highest number of correlations with the Eros style. In particular, the partners who have this style experience a good intimacy dialogue with the partner (self-disclosure, partner disclosure, and perceived partner responsiveness), strong physical attraction and sexual satisfaction. These last results are consistent with the characterization of this person as an "erotic lover" (Lee, 1973), which appears also to be expressed in his/her actual relationship. In literature, the importance of sexuality and sexual satisfaction has been indicated as a key factor for couple satisfaction among people with this love style (Fricker & Moore, 2002). The importance of sexuality is also confirmed by research that found an association between romantic love, which involves feelings of attachment and the search for commitment with a partner, and sexuality, particularly sexual desire (Gonzaga, Turner, Keltner, Campos & Altemus, 2006). We also found that Eros people do not perceive a good closeness-distance between the partners (CDP) in their current couple relationship. Such data can perhaps be linked to the fact that these individuals show a fear of dependency and control (FDC) and of emotional involvement (FEIN), but they are not afraid of being abandoned and rejected (FAR).

Few affectivity dimensions also correlate with the Ludus (game playing, uncommitted love and a desire for multiple relationships) or Agape style (altruistic and selfless style of love). In particular, Ludus is negatively correlated with CAS-FDC (Fear of Dependence and Control) and CAS-FEIN (Fear of emotional involvement), and positively with CAS-SD (Self-disclosure). This suggests that individuals who express a playful and uncommitted attitude toward love, according to the characterization of this love style proposed by Lee (1973), also seem to have an uncommitted intimacy relationship with the partner. We noticed that, in contrast with research that characterizes this attitude style as typical of poor or negative marital aspects (Goodboy et al., 2012; Goodboy & Myers, 2010; Levy & Davis, 1988), in our research there is no correlation with other dimensions of couple relationship, such as satisfaction and happiness. For Agape, partners express physical attraction, sexual satisfaction (CAS-PASS) and perceived partner responsiveness (CAS-PPR). Given Agape's altruistic attitude, there is a clear association with the relational affective dimension of the spouses' perception of the other's ability to listen to, understand and support them. Indeed, the individual orientation toward love appears to be consistent with the couple's actual affective experience that is related to reciprocal responsiveness. Considering also that in our research Agape is associated with the partners' general perception of their happiness and satisfaction in the couple, a link to the empirical research can be observed, indicating that reciprocal responsiveness may improve couple happiness and satisfaction (Raffagnino, Penzo & Bertocci, 2012).

As regards the absence of any correlation, the LAS-SF did not appear to have discriminant validity with the relational dimensions of the Storge (friendship and companionship-driven love) or the Pragma (a rational love attitude) styles. A possible explanation for this finding might be related to Graham's (2011) statement that "the Pragma and Storge subscales may not be truly measuring love, rather friendship" (p. 763). Moreover, because the word "love" is polysemous (Berscheid, 2010) and can reflect affective bonds with parents, nature, friends, animals, and activities, it does not always refer to romantic love. Therefore, our results signal that these two attitudes towards love are not commensurate with these relational dimensions because they demonstrate the partners' experience about their affectivity and perceptions of couple satisfaction in the actual relationship. This does not refute the fact that the Storge and Pragma styles might also be associated with other dimensions of marital quality.

These findings suggest that there is a need to distinguish between positive and negative love styles and their association with relationship quality. Our data demonstrate that the facets of the relational dimensions (in our case, couple affectivity and satisfaction) are positively and negatively related to love styles based on the relationship dimension. Additionally, in some cases, lack of or a weak relationship between the variables suggests that couple relationships may be independent from conceptualizations of the ways of loving.

For *gender*, there were no differences in the Eros, Pragma and Mania styles, although there were differences in the Agape, Ludus and Storge styles. These results confirm the studies that do not indicate any gender differences in love style attitudes (Wan Shahrazad et al., 2012), as well as those that affirm the existence of gender divergences (Ferrer-Pérez, Bosch-Fiol, Navarro-Guzmán, Ramis-Palmer & Garcia-Buades, 2009). As regards the love style, women were more likely to adopt a Ludus, Storge or Agape style. These data are not consistent with several studies that found a prevalence of Agape and Ludus for men and not for women (Ferrer-Pérez et al., 2009; Neto, 2007; Regan, 2016). In addition, for the Agape style, research on compassionate love did not find any gender differences (Rauer, Sabey & Jensen, 2014). Our results are not consistent with research that found that men are more likely to use the Eros style (Ferrer-Pérez et al., 2009). The correlation analysis among the different variables for the two - male and female - samples provides further information about gender differences. A first observation concerns the correlations among the six love styles, more frequent in the male than in the female sample. As hypothesized for the total sample, if future research confirms these results, we will be able to affirm that men have a more fluid and less delineated love attitude than women, especially for the Eros style.

Our findings revealed that among the love styles, Eros contributed to dyadic and familial satisfaction for both men and women as also revealed by other studies (Gana et al. 2013; Vedes et al. 2016).

A further observation regards the correlation between LAS and CAS. For both males and females we found the highest number of correlations with the Eros style; and for men also a lower association with the Ludus style. These findings are supported in literature by Goodboy and Booth-Butterfield (2009) that had similar results concerning the association between Eros and the closeness of couple partners in research with a general sample.

In relation to the specific dimensions of the affectivity construct, we observed few gender differences in correlations with the Eros style. Male partners with a love attitude characterized by passion, physical and emotional attraction and commitment, did not express fear of abandonment and rejection, anxiety or sexual inhibition; the female partners with this love style tended to perceive partner disclosure. These results appear in line with the study highlighting the importance of sexuality and sexual satisfaction for males with the Eros style (Raffagnino et al., 2012; Raffagnino & Penzo, 2015). Similarly, the fact that compared to males, females with the Eros style expressed a deeper appreciation of their partner's openness and feelings (one of the three dimensions of intimate dialogue) seems to be in line with the studies affirming that intimacy is experienced differently by men and women (the latter being more susceptible to intimacy) (De Andrade, Wachelke & Howat-Rodrigues, 2015; Raffagnino et al., 2012).

Besides, men with Eros style are not afraid of being abandoned by their partners, a feeling which is present in the men with a Ludus attitude toward love. Therefore, the tendency of males to tolerate this fear should be able to find a distinction on the basis of love styles.

As regards the Ludus style, we found very few correlations with affectivity, and only in the male sample. In fact, in our sample Ludus is related to FEIN and ASI dimensions, as we observed in the Eros style, but in an opposite manner to men with a game playing, uncommitted love and a desire for multiple relationships who tend to express worry about sexual performance, the difficulty of speaking about sexuality (CAS-ASI) and fear of emotional involvement (CAS-FEin). As stated about the general sample, this correlation might express an uncommitted emotional and sexual intimacy in the male sample and not in the female sample.

Our research has several limitations; among these, there is the problem related to the geographical area involved in the research. We used a convenience sample consisting of predominantly white, Tuscany, middle-class individuals with high education levels. It would be desirable, in a subsequent phase of the work, to validate the LAS-SF in a larger and more heterogeneous sample. Another limitation is related to the variables that were examined in the convergent analysis. We focused on two dimensions: affectivity and relational satisfaction. It would be useful to examine additional relational dimensions that assess primary risk and protective factors for marital quality and stability. For example, it might be relevant to include the adult attachment bond and relational aspects (e.g., the partner's commitment, couple communion and leisure, emotional and cognitive jealousy) which could be associated with the different characteristics of each love style. These aspects might differentiate between good and bad love styles for relational quality and provide a more comprehensive picture of how love attitudes can affect the couple's experience. In particular it would be interesting to evaluate the convergent validity of the LAS with respect to the two dimensions of Anxiety and Avoidance in adult attachment, measured through one of the most widely used tools – the ECR-R questionnaire - for which an Italian validation exists (Busonera, San Martini, Zavattini & Santona, 2014). Furthermore, our study did not examine changes in the association between love styles and relationship experiences over time. Several researchers have noted the importance of the relationship stage for marital quality and stability (McNulty, Wenner & Fisher, 2016) as well as the role of age in the acceptance and preference of love styles (Ferrer-Pérez et al., 2009; Hendrick & Hendrick, 1986; Rauer et al., 2014). Asking questions about love attitudes and marital experiences among partners of different ages and relationship stages may be essential for understanding the love styles as risk and protective factors of marital stability and quality, as well as points of strength for the associations among different relational and personal variables.

Another limitation is related to the controversial aspect of the calculation of multiple correlations between the set of variables; in order to overcome the problems related to the multiplicity adjustment of the *p*-value, in future phases of the research it might be useful to consider the application of bootstrap methods for *p*-value adjustment, in order to look more closely at these issues.

For the data analysis, we accounted for individual scores in a sample of married, cohabiting couples or boy/girlfriends. Given that the love attitude is expressed in a couple relationship, future research should analyze the couple dyads for love style. While this method is rarely used in love research (to our knowledge, only two studies have used a dyadic approach; i.e., Gana et al., 2013; Rauer et al., 2014), it is widely used to analyze couple coping and adult attachment (Bodenmann & Randall, 2012). As Rauer et al. (2014) stated with regard to compassionate love, "by including both spouses, we were able to find complex associations not only between the provision and receipt of compassionate love and health but also the extent to which these links differed

based on who was reporting on the compassionate love and whose health was in question" (p. 690). This type of analysis could help overcome the limitations related to studying love in student samples that do not identify the romantic relationships in which participants should refer to when completing a love questionnaire (Berscheid, 2010).

As far as the gender differences are concerned, we found some different correlations between the various variables; in order to broaden this relevant topic it might be useful, in the following phases of the work, to apply two different confirmatory factor analyses in relation to the gender.

The current version of LAS-SF in the Italian context definitely has good psychometric proprieties with 23 items; nevertheless, in a following phase of the work, it would be desirable to define a new translation for the item five. This fact could help us to understand whether a new phrasing would more adequately communicate the real meaning of the original item five devised by the authors (Hendrick et al., 1998).

In short, love is an essential component of marital quality and stability. Therefore, understanding the partners' love attitudes could help clinicians identify functional and dysfunctional aspects of the couple's relationship. Clinically, partners' different love attitudes (for example, husbands with ludic and wives with commitment attitudes) proved to be a source of couple conflict. Integrating love attitudes and couple affectivity in a theoretical model and in relational clinical interventions might be useful for helping couples face and overcome crises in their intimacy, trust, and partners' emotional distance.

CONCLUSIONS

Our preliminary study examined the validity of the Italian LAS-SF and confirmed the presence of the six hypothesized love styles; it also highlighted a good convergent validity between love styles and several dimensions of the multidimensional construct of couple affectivity. Moreover, the results indicate that there are gender differences in some love styles thus stressing the importance of examining both similarities and differences between men and women in couple relationships.

In general, this evidence supports the utility of the LAS-SF for both clinical and research purposes. Indeed, this tool might allow for in-depth understanding of the risk and protective factors in couple relationships as they relate to love attitudes which are crucial for marital quality and stability (Sprecher & Hatfield, 2017). In a clinical context, the LAS-SF can be used by psychologists to identify the spouse's love style and gather information about its association with psychological correlates in order to enable more focused and effective counseling.

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