

## Relationship beliefs and relationship quality

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Relationships beliefs and relationship quality across cultures: country as a moderator of  
dysfunctional beliefs and relationship quality in three former Communist societies

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Abstract

Research on the correlation between relationship beliefs and quality has rarely considered the impact of culture. In this study, 206 manual workers, students and entrepreneurs from Georgia, Hungary and Russia completed a modified Relationships Belief Inventory (Eidelson & Epstein, 1982) and the Abbreviated Dyadic Adjustment Scale (Sharpley & Rogers, 1984). Results indicated a significant pan-cultural correlation between dysfunctional beliefs and relationship quality but a moderating effect for country, with dysfunctional beliefs in Hungary explaining more than four times of the variance in relationship quality than in the other countries. Findings are interpreted in the light of major value and ecological differences between the three countries.

(105 words)

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Introduction

The last decade has seen dramatic changes in the economic, political and social structure of the Former Communist states of Central and Eastern Europe. Widening disparities in economic opportunities, rapid increases in alcohol consumption and drug abuse, and a widespread sense of cultural and interpersonal fatalism have placed a considerable burden on individual relationships (Bobak, Pikhart, Hertzman, Rose, & Marmot, 1998; Goodwin, Allen, Nizharadze, Emelyanova, Dedkova, Saenko & Bugrova, 2002), and may be seen as important contributors to a marked rise in relationship breakdown in this region as a whole (UN Secretariat, 2000). However as yet very little research has investigated the personal relationships of those living in this region.

Our present investigation examined the association between relationship beliefs and relationship quality in three diverse population samples in three post-Communist societies, Russia, Georgia and Hungary. The study of relationship beliefs forms a major topic of interest in the analysis of social cognition and relationship processes (Karney, McNulty & Bradbury, 2001; Knee, 1998). Epstein and his colleagues have argued that certain beliefs about relationships may be functional or dysfunctional (Epstein & Eidelson, 1981). “Functional” relationship beliefs – such as the belief that partners can change - may encourage relationship maintenance behaviours and help promote relationship quality (Karney et al, 2001). In contrast, “dysfunctional” relationship beliefs – such as disagreement is destructive - may act as “enduring vulnerabilities” that restrict a partner’s ability to deal with relational challenges (Karney & Bradbury, 1995). Dysfunctional beliefs are have been related to poor relationship quality (e.g. Emmelkamp, Krol, Sanderman & Rüphan 1987; Holtzworth-Munroe & Stuart, 1994; Kurdek, 1991; Whisman & Allan, 1996) and negative problem-solving behaviours (Christian, O’Leary, & Vivian, 1994; Knee, 1998). To the extent that

relationship beliefs help drive relationship quality, they must also be seen as major contributors to an individual's personal commitment to remain in a close relationship (Fehr, 2001).

Building on models of rational emotive therapy and depression, Eidelson & Epstein (Epstein & Eidelson, 1981; Eidelson & Epstein, 1982) have identified a range of dysfunctional relational beliefs that they associate with marital quality, and a number of studies have found that poor marital quality is positively correlated with these irrational relationship beliefs (e.g. Emmelkamp et al, 1987). However, there has been little cross-cultural work on the relationship between these dysfunctional beliefs and relationship quality, an omission with important theoretical implications. Drawing on Kelley & Thibaut's (1978) interdependence theory, Karney et al (2001) argue that the values of a perceiver are likely to be important mediators in the relationship between beliefs and relational satisfaction – some individuals may simply not expect that much from a close relationship. Such relationship expectations are likely to be strongly influenced by the societal context in which the relationship occurs (Duck, 1993; Goodwin, 1999). An emphasis on intrapsychic, individual cognitive level processes may miss the relevance of important structural and institutional influences on relationship quality, which may be highly significant for relationship processes in less “Western” settings (Wallach & Wallach, 1983). Our first research question was therefore: to what extent does the relationship between dysfunctional relationship beliefs and relationship quality also pertain to Russia, Georgia and Hungary?

The Relationships Beliefs Inventory (Eidelson & Epstein, 1982) employed in this questionnaire includes assessments of four dimensions of dysfunctional beliefs<sup>1</sup>. These are Disagreement is Destructive (the avoidance of direct communication about conflicts), Mind-reading is Expected (leading to less effort to directly communicate with a partner), Partners Cannot Change (leaving little hope for problems that arise) and The Sexes are Different (leading to stereotyped views of partners). The strongest correlation between the relationship beliefs and marital quality scores has generally been found for the Disagreement is Destructive subscale (Eidelson & Epstein, 1982; Emmelkamp et al, 1987). However, marital therapy work even within a “Western setting”

Relationship beliefs and relationship quality (amongst minority groups in the US) has demonstrated variability amongst different ethnic groups in a willingness to tolerate disagreement and conflict within a marriage (Beinstein Miller, 1994). At present the lack of research into personal relationship processes in this region gives us little guidance as to the likely expected impact of different forms of beliefs on relationship satisfaction. Our second research question therefore investigated the extent to which these four different subscales were predictors of relationship quality in the three Central and Eastern European nations under investigation.

Our final research question investigates the extent to which the country in question may moderate the association between dysfunctional relationship beliefs and marital quality. Above, we argue that the relative role of relationship beliefs in predicting reported relationship quality may vary according to the impact of structural and institutional features on interpersonal relationships. The three countries in the present study were chosen for a number of reasons. First, the countries vary significantly on levels of divorce. Divorce rates are some of the highest in the world in Russia (UN Secretariat, 2000) but are lower in Hungary and far lower in the Georgian Republic (annual number of divorces per 1000 population of 3.66, 2.58 and .36 for Russia, Hungary and Georgia respectively: United Nations, 2001). Second, the three nations differ on important distal variables, including economic performance and religion. These factors are likely to have significant impacts on relationship processes, with degree of religiosity a positive correlate of relationship stability but with economic wealth having a more complex, curvilinear relationship with such stability (Goodwin, 1999, Inglehart, 1997). Finally, although three countries have experienced a substantial period of Communist rule, different levels of exposure and responses to Communist rule have combined with religious and economic factors to help contribute to significant variations in autonomy values between the cultures (Schwartz & Bardi, 1997). These values are in turn significant correlates of the dimensions of individualism and collectivism (Schwartz, 1994). In individualistic societies close relationships are important, but partners can be changed relatively easily if they frustrate individual goal achievement. (Kim, 1994; Triandis, 1995). In contrast, strong,

cohesive in-groups dominate the lives of individuals in collectivist societies (Hofstede, 1991). In Schwartz & Bardi's data (Schwartz & Bardi, 1997), Georgia is the most collectivist of these three nations and Hungary the most autonomous/ individualistic. As such we would anticipate dysfunctional relationship beliefs to explain a greater proportion of the variance in relationship quality in Hungary than in the other two societies we investigate.

## Method

### Participants

Respondents were from the Russian city of Tver ( $N = 68$ ,  $M$  age 35.81, 32% female) and from the capital cities of Tblisi, Georgia ( $N = 78$ ,  $M$  age 39.89, 47% female) and Budapest, Hungary ( $N = 60$ ,  $M$  age 36.24, 44% female). There were no significant age ( $F(3, 212) = 2.31$ ,  $p = .08$ ) or gender ( $\chi^2(2) = 3.67$ ,  $p = .16$ ) differences in sample distribution between nations. The participants analysed in this sample were all married, and were drawn from three samples chosen to represent a generation of relatively young workers strongly influenced by the social changes in their societies. Manual workers were employed at large industrial plants on production lines ( $N = 109$ ), entrepreneurs were owners of small kiosk chains ( $N = 76$ ) whilst students were drawn from major universities in their respective countries ( $N = 21$ ). Similar proportions of each occupational group participated in each country ( $\chi^2(2) = 4.61$ ,  $p = .10$ ): 59% of the Russians, 46% of the Georgians and 55% of the Hungarians were manual workers; 34% of Russians, 39% of Georgians and 38% of Hungarians were business people and 7% of Russians, 15% of Georgians and 7% of Hungarians were students. Overall, approximately 70% of those contacted agreed to participate in the study.

### Procedure

All respondents were presented with the questionnaires at their place of work or study during winter 1995 and spring 1996 by members of the research team in each country. The study was presented to the participants as a university-sponsored study. Participants completed a

Relationship beliefs and relationship quality questionnaire that included measures of relationship beliefs and relationship quality. All items employed in this study were first discussed at length by the research team during extensive planning meetings. Questions were translated and back translated using bilingual translators in each country (Brislin & Baumgardner, 1971) and “decentered” so as to remove or rephrase inappropriate items (Werner & Campbell, 1970). Items were further piloted using samples similar to those from the target sample, with participants challenged on the meaning of their answers to ensure full comprehension (Schuman, 1966). Participants were informed that they could refuse to answer any questions that made them uncomfortable, and could withdraw from the study at any time. They were not paid for their participation in the study.

Relationship beliefs were assessed using twelve items drawn from the Relationships Belief Inventory (RBI: Eidelson & Epstein, 1982) a forty-item scale that assesses dysfunctional relationship beliefs. This scale has previously been found to be relatively unaffected by social desirability and to have reasonable internal consistency and test-retest reliability (Emmelkamp et al., 1987). Three questions from four of the subscales employed in the RBI were used in this study, with respondents replying “true” or “false” to each item. Because of the lack of previous use of this scale in this region we conducted an exploratory factor analysis on the RBI to investigate the structure of the scale used in this study. Using principal components analysis and varimax rotation four factors emerged which accounted for 56% of the variance. Further details of the results of this factor analysis are available from the authors. Overall alpha for the complete relationship beliefs scale were .63 for Georgia, .59 for Russia and .68 for Hungary: country specific reliabilities are reported in table 1.

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Insert Table 1 about here  
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Relationship quality was measured using the Abbreviated Dyadic Adjustment Scale (Sharpley & Rogers, 1984). This scale is a seven-item version of the Dyadic Adjustment Scale

Relationship beliefs and relationship quality (Spanier, 1976), one of the most widely employed measures of relationship quality. The scale has seven items measuring aspects of relationship quality e.g. “agreeing on aims and goals”, scored on four point scales (from “always agree” to “always disagree”). Alpha reliability was acceptable (.81 for Russia, .84 for Georgia, .69 for Hungary).

## Results

Our first research question explored the overall relationship **between** dysfunctional relationship beliefs and relationship quality in these post-Communist societies. There were no significant differences in the level of relationship satisfaction across the three countries ( $F(2, 198) = 2.10, p = .13$ ). Overall, there was small but significant negative correlation between scores on the relationships beliefs scale and relationship quality ( $r(201) = -.18, p < .01$ ). This correlation ranged from  $-.12$  (Georgia) to  $-.19$  (Russia).

Our second research question investigated the extent to which these four different subscales were predictors of relationship quality in the three Central and Eastern European nations under investigation. Table 1 provides the means and variances of the four relationship belief subscales and the alphas for each subscale within each culture. As can be seen in Tables 2 and 3, the relationship beliefs subscale most predictive of relationships quality of the data set was “the sexes are different” subscale (overall  $r(198) = -.32, p < .001$ ). This relationship was strongest in Hungary ( $r(57) = -.57 < .01$ ), the weakest was in Georgia ( $r(76) = -.23, p < .10$ ).

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Insert Tables 2 and 3 about here

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### Results of Structural Equation Analyses prior to Controlling for Lack of Reliability

To examine the extent to which nation moderated the impact of relationship beliefs on relationship quality we conducted a structural equation model using LISREL (Jöreskog & Sorbom, 1996) to fit the three-nation model. Prior to controlling for lack of reliability in the measured

Relationship beliefs and relationship quality variables, we compared the goodness-of-fit of an equal-path model (in which path coefficients from relationship cognitions to relationship quality were constrained to be equal across the three nations) and an unequal-path model (in which path coefficients were allowed to vary across the three nations). In the equal-path model, we used individuals' scores on the measured (i.e., observed) variables as single indicators of the latent (i.e., unmeasured) variables of relationship cognitions and relationship quality. Within the measurement error (i.e., theta epsilon, or TE) matrix, the uncorrelated measurement error terms (associated uniquely with each measured variable) were freed but constrained to be equal to each other; and all correlated measurement error terms (associated with pairs of measured variables) were fixed at 0.00. Within the latent-observed (i.e., lambda Y, or LY) matrix, loadings of the measured variables on the latent variables or factors were fixed at 1.00. Within the variance-covariance (i.e., psi, or PS) matrix, all unique unexplained variance in relationship cognitions was fixed at 1.00 (i.e., any unique variance in factor scores for relationship cognitions was due to variables that were not considered in the present study); unique unexplained variance in relationship quality was freed (i.e., some, but not necessarily all, of the unique variance in factor scores for relationship quality was due to the influence of relationship cognitions) but constrained to be equal across nations; and all instances of unexplained variance shared by pairs of factors was fixed at 0.00. Finally, in the path coefficient (i.e., beta, or BE) matrix, all paths from relationship cognitions to relationship quality were freed and allowed to vary across the four cognitions.

Results of a structural equation analysis indicated that, as expected, the equal-paths model could be rejected ( $\chi^2 = 56.03$ , CFI = .60,  $df = 39$ ,  $\chi^2/df$  ratio = 1.43,  $p < .05$ ). Next, we conducted a structural equation analysis of the unequal-paths model, in which all parameters were the same as the equal-paths model, except that the paths from relationship cognitions to relationship quality were allowed to vary across the three nations; and the unique unexplained variance in relationship quality was allowed to vary across nations. Unexpectedly, the unequal-paths model initially could be rejected ( $\chi^2 = 44.26$ , CFI = .60,  $df = 27$ ,  $\chi^2/df$  ratio = 1.64,  $p < .05$ ). However, inspection of

Relationship beliefs and relationship quality residuals (Jöreskog & Sorbom, 1996) revealed that two instances of correlated measurement error involving relationship cognitions (i.e., between “Partners Cannot Change” and “Mind-reading is Expected”; and between “Disagreement is Destructive” and “Mind-reading is Expected”) should be freed rather than fixed at 0.00 for Georgia but not for Russia or Hungary. After these two instances of correlated measurement error were freed, results of a structural equation analysis indicated that, as expected, the unequal-paths model could not be rejected ( $\chi^2 = 28.74$ , CFI = .91,  $df = 25$ ,  $\chi^2/df$  ratio = 1.14,  $p = .27$ ). Moreover, the final version of the unequal-paths model yielded a significant reduction of chi-square (i.e., reduction of error), compared with the equal-paths model (difference in  $\chi^2 = 27.29$ , difference in  $df = 14$ ,  $p = .018$ ).

Path coefficients for relationship cognitions as predictors of relationship quality across the three nations, prior to controlling for lack of reliability, are shown in Table 4. In Russia and Hungary (but not in Georgia), the path from the “Sexes are Different” to relationship quality was negative and significant; and in Hungary (but not in Russia or Georgia), the path from “Disagreement is Destructive” to relationship quality was positive and significant. All other path coefficients were non-significant. In order to determine whether paths for specific relationship cognitions differed across the three nations (and in order to rule out the possibility that the goodness-of-fit of the final unequal-paths model was due solely to differences in correlated measurement error across nations), we compared the goodness-of-fit of the final unequal-paths model with a series of models in which one path at a time was constrained to be equal across nations. Results of the comparisons indicated that the path from the “Sexes are Different” to relationship quality differed significantly across nations (increase in chi-square resulting from constraining the path to be equal = 6.09, increase in  $df = 2$ ,  $p = .048$ ); the path from “Disagreement is Destructive” to relationship quality differed significantly across nations (increase in chi-square resulting from constraining the path to be equal = 7.01, increase in  $df = 2$ ,  $p = .03$ ) and the paths from “Partners cannot Change” and “Mind-reading is Expected” to relationship quality did not differ significantly or marginally across the three nations (for “Partners cannot Change”, increase in

$df = 2$ , increase in chi-square resulting from constraining the path to be equal = .21,  $p = .90$ , for “Mind-reading is Expected”, increase in  $df = 2$ , increase in chi-square resulting from constraining the path to be equal = .63,  $p = .73$ ). Overall, prior to controlling for lack of reliability, the impact of relationship cognitions in general (and the impact of the “Sexes are Different” and “Disagreement is Destructive” in particular) upon relationship quality differed across nations.

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Insert Table 4 about here  
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#### Results of Structural Equation Analyses after Controlling for Lack of Reliability

Some of the reliabilities for relationship cognitions were very low (even if the number of items per scale is taken into account). In order to determine whether lack of reliability would affect our conclusions regarding the impact of relationship cognitions on relationship quality, we conducted a subsequent series of structural equation analyses in which we fixed uncorrelated measurement error terms at 1.00 minus the corresponding reliabilities (thus allowing us to control statistically for lack of reliability; Jöreskog & Sorbom, 1996). After controlling for lack of reliability in the measured variables, we compared the goodness-of-fit of equal-paths and unequal-paths models. The equal-paths model after controlling for lack of reliability differed from the equal-paths model before controlling for lack of reliability (described above) in that, after controlling for lack of reliability, the uncorrelated measurement error terms were fixed rather than freed and the factor loadings were freed (albeit constrained to be equal across relationship cognitions and across nations) rather than fixed. The unequal-paths model after controlling for lack of reliability differed from the unequal-paths model before controlling for lack of reliability: after controlling for lack of reliability, the uncorrelated measurement error terms were fixed rather than freed and the factor loadings were freed (and allowed to vary across nations, albeit constrained to be equal across relationship cognitions within each nation). By making these changes, we were able to construct equivalent alternative models (i.e., models with the same degrees of freedom; Marsh,

Balla, & McDonald, 1988).

Results of a structural equation analysis indicated that, as expected, the equal-paths model could be rejected ( $\chi^2= 65.68$ , CFI = .38,  $df= 39$ ,  $\chi^2/df$  ratio = 2.43,  $p < .01$ ). Unexpectedly, the unequal-paths model initially could be rejected ( $\chi^2= 51.16$ , CFI = .44,  $df= 27$ ,  $\chi^2/df$  ratio = 1.89,  $p < .01$ ). However, inspection of residuals revealed that the same instances of correlated measurement error involving relationship cognitions that surfaced before controlling for lack of reliability (i.e., between “Partners cannot Change” and “Mind-reading is Expected”, and between “Disagreement is Destructive” and “Mind-reading is Expected”) should be freed rather than fixed at 0.00 for Georgia (but not for Russia or Hungary) after controlling for lack of reliability. After these two instances of correlated measurement error were freed, results of a structural equation analysis indicated that, as expected, the unequal-paths model could not be rejected ( $\chi^2= 35.62$ , CFI = .75,  $df= 25$ ,  $\chi^2/df$  ratio = 1.42,  $p < .08$ ). Moreover, the final version of the unequal-paths model yielded a significant reduction of chi-square (i.e., reduction of error), compared with the equal-paths model (difference in  $\chi^2= 30.06$ , difference in  $df= 14$ ,  $p = .007$ ).

Path coefficients for relationship cognitions as predictors of relationship quality across the three nations, after controlling for lack of reliability, are shown in Table 4. In Hungary (but not in Russia or Georgia), the path from the “Sexes are Different” to relationship quality was negative and significant; and in Hungary (but not in Russia or Georgia), the path from “Disagreement is Expected” to relationship quality was positive and significant<sup>3</sup>. All other path coefficients were non-significant. In order to determine whether paths for specific relationship cognitions differed across the three nations (and in order to rule out the possibility that the goodness-of-fit of the final unequal-paths model was due solely to differences in correlated measurement error across nations), we compared the goodness-of-fit of the final unequal-paths model with a series of models in which one path at a time was constrained to be equal across nations. Results of the comparisons indicated that the path from the “Sexes are Different” to relationship quality differed marginally across nations (increase in chi-square resulting from constraining the path to be equal = 5.61, increase in

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$df = 2, p = .061$ ); the path from disagreement is destructive to relationship quality differed significantly across nations (increase in chi-square resulting from constraining the path to be equal = 6.95, increase in  $df = 2, p = .03$ ); and the paths from “Partners cannot Change” and “Mind-reading is Expected” to relationship quality did not differ significantly or marginally across the three nations (for “Partners cannot Change”, increase in  $df = 2$ , increase in chi-square resulting from constraining the path to be equal = .25,  $p = .88$ ; for “Mind-reading is Expected”, increase in  $df = 2$ , increase in chi-square resulting from constraining the path to be equal = .60,  $p = .74$ ). Overall, after controlling for lack of reliability, the impact of relationship cognitions in general upon relationship quality (and the impact of the “Sexes are Different” and “Disagreement is Destructive” in particular) differed across nations.

### Summary of Results of Structural Equation Analyses

Overall, results of the structural equation analyses demonstrate the moderating impact of nation on the relationship between dysfunctional beliefs and relationship quality. Kline (1998, p.32) suggests that percentage of variance explained can be calculated by multiplying zero-order correlations by the beta weight for each path in the analysis. Significantly greater variance in relationship quality was explained by these beliefs in Hungary (34% before controlling for lack of reliability, 50% after controlling for lack of reliability) compared to Georgia (10% before controlling for lack of reliability, 14% after controlling for lack of reliability) and Russia (7% before controlling for lack of reliability, 10% after controlling for lack of reliability).

### Discussion

Despite a growing body of research investigating relationship beliefs and their implications for relationship quality, previous research in this area has failed to explore the impact of country as a moderator of this association. Working in the context of three, previously understudied post-Communist nations, and with married couples from a range of backgrounds, the present study found

a significant, negative correlation between dysfunctional relationship beliefs and relationship quality. This association was strongest for the dysfunctional relationship belief that “The Sexes are Different”. However, the link between dysfunctional beliefs and relationship quality was moderated by country, with more than four times as much of the variance in relationship quality explained by relationship beliefs in Hungary than in the other two nations investigated.

The overall, “pan-cultural” correlation between relationship beliefs and relationship quality was relatively small, and generally lower than that achieved elsewhere when using our dysfunctional relationship beliefs inventory (RBI). For a combined sample of 200 Clinical and Non-clinical couples, Eidelson & Epstein (1982) report correlations between the RBI and the Locke-Wallace Marital Adjustment Scale (Locke & Wallace, 1959) of -.57, -.24, -.38 and -.25 for the “Disagreement is Destructive”, “Mind-reading is Expected”, “Partners Cannot Change” and “The Sexes are Different” subscales respectively. Emmelkamp et al (1987) report correlations between the Maudsley Marital Questionnaire (Crowe, 1978) and the RBI subscales of .31/.38 for the Disagreement subscale (for non-distressed and distressed couples), .04/.21 for Mind-reading, .22/.43 for Change and .19/.05 for the Sex Differences subscales. Recent reviews using a greater diversity of relationship belief and quality indices have suggested that the link between these beliefs and relationship quality are only moderate and may be mediated by the strength of relationship expectations (Karney et al, 2001). Such relationship expectations may be rather low in post-Communist Europe: high levels of State intervention and surveillance contributed to widespread interpersonal distrust in this region (Markova et al., 1998; Schwartz & Bardi, 1997), with such distrust likely to significantly inhibit the development of satisfying and supportive relationships (Bandura, 1995; Hobfoll, Freedy, Lane & Geller, 1990). Gender relations may play a particularly complex role in wider marital interactions in post-Communist Europe. During the communist era discussions of gender relations were rare (Kerig, Aloyshina & Volovich, 1993), but *perestroika* led to a paradoxical situation where the role of women became caught between a widening feminist discourse and the efforts of governments to encourage “traditional” sex roles and a return to the

“womanly mission” of family responsibility, a propagation which reflected both traditional gender stereotypes and growing fears of male unemployment (Gorbachev, 1987; Vannoy, 1998). The result was conflicting relationship norms and expectations which often spilled over into marital violence (Vannoy, 1998). Given the contentious nature of these relations it is thus perhaps unsurprising that beliefs about the sexes being different played the greatest role in predicting relationship quality in our post-Communist samples and was the only significant negative predictor of relationship quality for both male and female respondents.

As anticipated, the raw correlations suggest that the association between fatalistic beliefs and relational quality was strongest in the most individualistic of our countries, Hungary, and weakest in our most collectivist nation, Georgia. As evidenced by the mean differences on relationship beliefs reported in table 1, the Hungarians were significantly less likely to believe that “The Sexes are Different” or that “Disagreement is Destructive”, but were more willing to believe that they could read the minds of their partners. Although our sample was not a nationally representative one, and generalisations here must be made with caution, our Hungarian results may reflect the greater individualism and the associated egalitarian beliefs in this particular country (Williams & Best, 1990). One unexpected finding for Hungary was the positive association between the belief that disagreement is destructive and relationship quality, an association that emerges as significant in our path analysis only in this nation. This pattern of findings occurred only for male respondents: there was a significant positive correlation between the belief that “Disagreement is Destructive” for male respondents but a negative one for female respondents ( $r_s = .36$  vs.  $-.26$  respectively). The tendency for wives to avoid conflict more than their husbands has been reported elsewhere (Beinstein Miller, 1994) – indeed, taken across our data, it was only our female respondents “Disagreement is Destructive” beliefs that correlated significantly with relationship quality (overall  $r(81) = -.39$ ) - but the significant correlation between this belief and relationship quality amongst Hungarians males is an intriguing finding and requires further study with a wider range of items and respondents.

Of course, our study had a number of important limitations. In this study we used only abbreviated measures of relationships beliefs, some of which had low internal reliability, and further studies should aim to use fuller inventories that include a wider range of such beliefs. Although our sample was recruited from a range of occupational backgrounds, the majority of our sample was relatively young (75% of our sample was under 45 years of age), and cannot be seen as representative of these fast-changing societies. Furthermore, the small sample sizes does not allow us to further systematically examine occupational differences in our findings. From an eco-cultural perspective (Georgas, Berry, Van de Vijver, Kagitcibasi, & Poortinga., in press) we might also expect salient physical characteristics of the environment (such as whether the couple live in a rural or urban location) to have a further influence on relational expectations, negotiations and outcomes. Such factors should fruitfully be explored in a larger, more representative study of this region.

What are the wider implications of our findings? To some extent, our findings underline previous work in other cultures that suggests that certain dysfunctional relationship beliefs are, indeed, dysfunctional for marital quality. Our results also reflect previous sociological and political commentaries concerning post-Communist Europe in underlining the significance of gender role related issues in predicting relationship outcomes. Countries from Central and Eastern Europe currently lead the world in rates of marital breakdown, and addressing the part played by gender role beliefs in these dissolutions might be seen as an important priority for those keen to enhance relationship well-being. At the same time, our findings also emphasise the moderating effect of country on the operation of individual-level, socio-cognitive variables. Such a cross-cultural perspective is unfortunately rare in personal relationships research, but we believe it is likely to be of increasing significance as “mainstream” “Western” psychological theories assert themselves in post-Communist Central and Eastern Europe.

Footnotes

<sup>1</sup> The RBI also includes a fifth subscale assessing sexual perfectionism. This scale was dropped as the items were adjudged by the overseas research advisors as inappropriate in the countries studied. Previous studies have also found that subjects are less likely to complete this scale and may find this invasive or threatening (e.g. Whisman & Allan, 1996).

<sup>2</sup> We also looked at occupational effects on the four dysfunctional beliefs subscales and on relationship satisfaction in a 3 (nation) x 3 (occupation) MANOVA. Although the overall effect of nation was larger than either occupation or occupation x nation (respective multivariate *F*s of 2.90 vs. 1.98 and 1.23), occupation did have a significant effect on the *Disagreement is Destructive* subscale and the relationship quality measure and there was a nation x occupation effect for the *Mindreading is Expected* subscale. Specifically, scores on the *Disagreement is Destructive* were highest amongst the manual workers and this group was also lowest on relationship quality. The *Mindreading is Expected* subscale score was highest amongst the Hungarian entrepreneurs. However, there were only small numbers of students in our sample and the sub-groups for students per country were very small, so we do not discuss these findings further in this short report.

<sup>3</sup> Paradoxically, controlling for lack of reliability resulted in a higher path coefficient for the “Sexes are Different” in Russia. However, controlling for lack of reliability also increased the standard error for every variable. The higher standard error thus rendered the path coefficient non-significant.

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Table 1:

Relationship beliefs, relationship satisfaction and alphas for each scale by country: Means and standard deviations

	Russia	Georgia	Hungary	F
The sexes are different	1.81 <sup>b</sup> (1.67, .73)	1.91 <sup>b</sup> (0.89, .65)	1.07 <sup>a</sup> (1.16, .70)	11.81 <sup>**</sup>
Partners cannot change	1.32 (0.96, .30)	1.09 (1.07, .55)	1.30 (1.13, .75)	.90
Disagreement is destructive	1.56 <sup>b</sup> (0.85, .30)	1.73 <sup>b</sup> (1.00, .60)	0.93 <sup>a</sup> (1.04, .64)	14.05 <sup>**</sup>
Mind-reading is expected	1.83 <sup>b</sup> (0.85, .34)	1.84 <sup>b</sup> (1.08, .63)	2.28 <sup>a</sup> (0.81, .38)	4.29 <sup>*</sup>
Total Beliefs Scale	6.53 <sup>b</sup> (2.32, .59)	6.60 <sup>b</sup> (2.33, .63)	5.57 <sup>a</sup> (2.56, .68)	5.30 <sup>**</sup>
Relationship satisfaction	3.29 (0.54, .81)	3.23 (0.57, .81)	3.42 (0.36, .65)	2.10

Note: \*  $p < .05$ ; \*\*  $p < .001$ . <sup>a</sup> is significantly different from <sup>b</sup>. The first figures in parentheses are standard deviations, the second figures scale alphas.

Table 2:

Correlations between relationship belief subscales and relationship quality by nation

	Russia	Georgia	Hungary
The sexes are different	-.26*	-.23	-.51**
Partners cannot change	.00	.16	.10
Disagreement is destructive	-.12	-.19	.14
Mind-reading is expected	-.06	-.06	-.06
Total scale	-.19	-.12	-.16

Note: \*  $p < .05$ ; \*\*  $p < .001$

Table 3:

Correlations between dysfunctional beliefs across and within nations

	Russia				Georgia				Hungary			
	SD	PC	DD	ME	SD	PC	DD	ME	SD	PC	DD	ME
Russia												
SD	1.00											
PC	.27*	1.00										
DD	.24	-.02	1.00									
ME	.20	.11	.19	1.00								
Georgia												
SD					1.00							
PC					-.14	1.00						
DD					.19	.07	1.00					
ME					-.00	.31**	.33**	1.00				
Hungary												
SD									1.00			
PC									.09	1.00		
DD									.23	.30*	1.00	
ME									-.02	.17	.19	1.00

Note: \* p < .05; \*\* p < .001. SD = The sexes are different; PC = Partners Cannot Change, DD = Disagreement is Destructive, ME = Mind-reading is expected.

Table 4:

Path Coefficients for Relationship Beliefs as Predictors of Relationship Quality before and after Controlling for Lack of Reliability

Russia ( $n = 64$ )				
<u>Predictor</u>	Before controlling for lack of reliability		After controlling for lack of reliability	
	<u>Beta weight</u>	<u>p</u>	<u>Beta weight</u>	<u>p</u>
The sexes are different	-.26	< .05	-.32	<u>NS</u>
Partners cannot change	.07	<u>NS</u>	.14	<u>NS</u>
Disagreement is destructive	-.05	<u>NS</u>	-.10	<u>NS</u>
Mind-reading is expected	.00	<u>NS</u>	-.01	<u>NS</u>

  

Georgia ( $n = 74$ )				
<u>Predictor</u>	Before controlling for lack of reliability		After controlling for lack of reliability	
	<u>Beta weight</u>	<u>p</u>	<u>Beta weight</u>	<u>p</u>
The sexes are different	-.18	<u>NS</u>	-.25	<u>NS</u>
Partners cannot change	.15	<u>NS</u>	.22	<u>NS</u>
Disagreement is destructive	-.17	<u>NS</u>	-.24	<u>NS</u>
Mind-reading is expected	-.06	<u>NS</u>	-.08	<u>NS</u>

  

Hungary ( $n = 52$ )				
<u>Predictor</u>	Before controlling for lack of reliability		After controlling for lack of reliability	
	<u>Beta weight</u>	<u>p</u>	<u>Beta weight</u>	<u>p</u>
The sexes are different	-.56	< .01	-.81	< .01
Partners cannot change	.09	<u>NS</u>	.12	<u>NS</u>
Disagreement is destructive	.26	< .05	.40	< .05
Mind-reading is expected	-.13	<u>NS</u>	-.26	<u>NS</u>