

Motivation for and commitment to social values: The roles of age and gender

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Abstract The primary aim of this study was to examine how motives and commitment to social values influence well-being in men and women of different ages. College students and older adults in the community reported on their motivational orientation (intrinsic vs. extrinsic), behavioral commitment to idiographic social values, and their current well-being (satisfaction with life, positive and negative affect). We tested a series of path models with motivational orientation mediating the relationship between commitment to values and well-being. Consistent with self-determination theory, we found that behavioral commitment to intrinsically motivating social values was related to greater life satisfaction and positive affect, whereas being committed to extrinsically motivating values was related to greater negative affect. While age and gender did not

moderate these relationships, meaningful age and gender differences emerged across value-based motivations, commitment, and indices of well-being. This work adds to our understanding of how values are a guiding influence for successful navigation of one's social world.

Keywords Values · Intrinsic motivation · Self-determination · Happiness · Life satisfaction · Positive emotion · Negative emotion

Social relationships are fundamental to human development and well-being (Reis et al. 2000). The only characteristic that distinguishes very happy people from people of average happiness is that very happy people possess more satisfying, lasting relationships (Diener and Seligman 2002). Thus, how people are motivated and committed to their values about relationships, or social values, should be relevant to well-being (Schwartz and Bilsky 1987). Despite an extensive literature on the relationships between value-based motivation and well-being, few studies have looked at these relationships in the context of meaningful individual differences such as age and gender. Therefore, we sought to understand motives for and commitment to social values and how these elements are associated with well-being across age and gender. To our knowledge, this is also the first study to examine motivation orientation and commitment in the context of personally-endorsed social values.

Values serve as guiding life principles—influencing our daily decision-making and providing a basis from which we devise meaningful goals. There is reason to believe that strong social values are most relevant to well-being when people are behaviorally committed and intrinsically motivated. People who are behaviorally committed to deeply-held personal values are more likely to develop goals

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congruent with these values and to experience fulfillment (Sheldon and Elliot 1998, 1999). Thus, commitment to social values should be directly relevant to well-being with people who are most committed to their values reaping the greatest psychological benefits.

Similarly, maintaining intrinsically motivating values increases the probability of creating self-concordant goals and the benefits linked to them; extrinsic motivation often hinders potentially desirable outcomes. This is because people with an intrinsic motivation adopt values and commit to goals and behaviors that are inherently satisfying (Deci 1975). People who are extrinsically motivated, in contrast, are guided by pressures from the outside world (e.g., parent preferences, financial rewards) or internally (e.g., guilt, prestige). When our goals are intrinsically motivating, we extract greater well-being on a daily basis (Deci and Ryan 2000; Sheldon and Elliot 1998, 1999). Being guided by goals that are extrinsically motivated, or the result of someone else's aspirations, compromises well-being (e.g., Kasser and Ryan 2001). To extend this line of research, we examined how commitment and motives for personally-endorsed values about relationships influences well-being.

Much of the existing work on behavioral commitment, motivational orientations, and associations with well-being has ignored potentially heterogeneity. There is strong reason to believe that men and women of different ages approach social values differently (Fredrickson and Carstensen 1990; Schwartz and Rubel 2005). Intuitively, one might expect older people to become less happy with time, as they experience declining cognitive functioning and physical agility. Instead, research shows that older people often report more positive emotions than younger people (e.g., Carstensen and Mikels 2005; Lockenhoff and Carstensen 2004). Older people perceive their time as being limited and based on past experience, intentionally invest their finite resources into goals that are likely to provide maximum enjoyment (Carstensen et al. 1999). As a result, older people tend to report a greater sense of meaning in their lives whereas younger adults invest more time into pursuits to find meaning a journey often linked to an abundance of negative thoughts and emotions (Erikson 1968; Pulkkinen and Kokko 2000; Steger et al. 2008, 2009). For instance, creating and attempting to sustain new relationships is a challenging endeavor (e.g., Eastwick and Finkel 2008). On average, older adults have passed this phase, cementing long-standing satisfying relationships while disbanding toxic relationships.

Unless time boundaries are readily apparent, younger people tend to view time as expansive and invest their time in acquiring knowledge, meeting new people, and preparing for the future. When time boundaries are imposed, such as when college students are in their last year before entering the real-world, younger and older people show a

similar preference for familiar people reliable sources of pleasurable, meaningful communication (Fredrickson and Carstensen 1990). Taken together, this research suggests that older people may be more committed to intrinsically motivating social values. Because older people generally show a greater preference for spending time with people who are familiar to them, commitment to social values may offer a particularly salient contribution to their well-being. Conversely, it is expected that younger adults will pursue both intrinsically and extrinsically-motivating social values, experiencing benefits in well-being only when these pursuits are intrinsically motivating and they are behaviorally committed to them.

Gender is another individual difference variable theoretically relevant to understanding motivation for and commitment to social values. There is evidence that women, compared to men, have a greater need for affiliation and are more willing to openly express emotions and self-disclose, increasing opportunities for positive moral emotions and strong social bonds (Kashdan et al. 2009; Reis 1998; Taylor et al. 2000). Women are also more likely than men to strive toward interpersonally-based goals (Greene and DeBacker 2004; Helgeson 1994). There is one study to suggest these gender differences extend to value priorities. Across 70 countries, women have shown a preference for intimacy, compassion, and nurturance of other people whereas men prioritize values linked to power, novelty seeking, hedonism, and achievement (Schwartz and Rubel 2005). While informative, this study focused exclusively on surface content by asking men and women to rate the importance of having a given social or non-social value as a guiding principle in their life. The present study extends this work by examining gender-based differences in motivation and commitment to personally-endorsed social values, and assessing how these processes influence well-being. In line with prior theory, we expected that women would be more intrinsically motivated and committed to social values and experience the associated rewards with these pursuits. In contrast, we anticipated that men would report greater commitment to extrinsically-motivating social values and experience compromised well-being.

In this study, well-being was measured with the most commonly used indicators: life satisfaction and a greater abundance of positive compared with negative emotions (Ryan and Deci 2001). Researchers consistently show that life satisfaction and affect ratings correlate in expected ways with biological markers of positive thoughts, feelings, and reward seeking (e.g., dopaminergic circuits and opiates), relevant behavior such as smiles and laughter, and the generation of and responsiveness to positive life events (Diener et al. 1999; Lyubomirsky et al. 2005). Besides being a marker of well-being, positive emotions create well-being. In particular, the experience of positive

emotions speeds recovery from negative events, increases resilience, broadens executive functioning capacities such as attention and stamina, leads to greater openness and creativity, and attracts other people in the creation of satisfying social interactions and relationships (Fredrickson 1998; Isen 2002).

In summary, the extant research suggests being committed to intrinsically-motivating goals contributes positively to well-being. We extend this work by exploring how motivation for and commitment to idiographic social values are relevant to well-being in men and women at various life stages. We hypothesized a moderated mediation model whereby behavioral commitment to social values influences well-being via one's motivation toward those values, with age and gender as potential moderators in these relationships. Intrinsic motivation and commitment to social values were expected to be associated with greater well-being. Being intrinsically motivated to work toward these values by devoting effort to create observable goals and engage in concrete actions to make progress implies a promotion-focus. This includes a concern with accomplishment and the fulfillment of hopes and aspirations, approach behavior as a strategy, and sensitivity to the presence or absence of positive outcomes (Higgins 1997). Thus, of the dimensions of well-being under study, positive affect and life satisfaction were proposed to be most relevant; negative affect is of greater relevance to concerns about security and the avoidance of failure, and being motivated by extrinsic concerns about what should or ought to be done (Higgins 2006).

Based on their ongoing identity formation and search for meaning, we expected that younger adults would display greater intrinsic and extrinsic motivation as well as commitment toward social values compared with older adults, resulting in greater well-being when committed to intrinsically motivating social values. In contrast, older adults, showing stronger interest in the stable and familiar, were expected to display greater intrinsic motivation and commitment toward social relationships than younger adults. In regards to gender, we hypothesized women would be more intrinsically motivated and behaviorally committed to social values, an approach we expect will contribute to greater positive affect and life satisfaction. We expected men to show a greater extrinsic motivation for pursuing social values and experience fewer benefits in terms of well-being.

Method

Participants

Participants were 200 college students (143 women and 57 men) ranging in age from 18 to 25 years ($M = 19.66$,

$SD = 1.69$). The majority of the sample was Caucasian (55.3%) with the rest defining themselves as Asian/Asian-American (18.6%), African-American (9.0%), Hispanic/Hispanic-American (7.5%), Middle-Eastern (5.0%), Mixed or Other (3.0%), and 1.5% provided no response. College students received course credit for participation.

We also recruited 77 older adults (47 women, 29 men, and 1 did not report gender) from the Osher Lifelong Learning Institute (OLLI) at George Mason University. The OLLI is a non-profit organization focused on the continuing education of retired older adults. Interested participants were reached through advertisements in the OLLI office and e-newsletter. Participants ranged in age from 59 to 85 ($M = 69.58$, $SD = 6.39$) and the majority were Caucasian (98.7%). Volunteers did not receive compensation.

Measures

Both samples received identical paper-and-pencil surveys that included the measures described for this study. To capture demographic information, we asked questions on age, gender, romantic relationship status, socio-economic status, and race/ethnicity.

Social values

The Social Values Survey (SVS) (Blackledge et al. 2007; Ciarrochi et al. 2006) contains 27 items assessing intrinsic motivation ($\alpha = 0.80$), extrinsic motivation ($\alpha = 0.86$), and level of commitment ($\alpha = 0.76$) to personal values in the context of friendships, family, and romantic relationships. Prior to completing questions about motivation and commitment, participants were provided with an open-ended format to generate their fundamental values at the foundation of relationships, conducted separately for friends, family, and romance (extending work on personal strivings; Emmons 1986; Little 1983). For instance, they were given an instruction page for friendships that stated:

Think about what it means to you to be a good friend, and about ways you like your friends to treat you. If you were able to be the best friend possible, how would you behave toward your friends? Describe the qualities you would want to have in your friendships.

Examples:

Building fun, supportive friendships.

Building loyal, honest, considerate, caring, and/or accepting friendships.

After these instructions, they were given space to complete the following sentence stem: "In regards to friendships, I value:" After writing in their idiographic value, participants completed additional items to assess

intrinsic motivation (4 items; e.g., “I value this because doing these things makes my life better, more meaningful, and/or more vital”), extrinsic motivation (2 items; e.g., “I value this because I would feel ashamed, guilty, or anxious if I didn’t”), and behavioral commitment to one’s values (2 items; e.g., “I am committed to living this value and acting consistently with this value”) for each relationship type. Participants were asked how true each statement is for them and responses are rated on a 5-point Likert scale from 1 (not at all for this reason) to 5 (entirely for this reason). Higher scores reflect greater intrinsic motivation, extrinsic motivation, and commitment, respectively. Preliminary analyses suggested a single factor for each motivational orientation and commitment to values across friendships, family, and romantic relationships. Thus we chose to create composite scores for intrinsic motivation, extrinsic motivation, and commitment by collapsing participants’ ratings across the three relationship types. This approach also allowed us to increase reliability while reducing the number of statistical tests required (limiting the chances of alpha inflation).

Prior evidence suggests that the SVS has criterion-related validity. For example, people endorsing greater intrinsic motivation for social values experience greater positive affect, mindfulness, psychological flexibility, social support, and less guilt. In contrast, extrinsic motivation is associated with greater hostility and less psychological flexibility and mindfulness (Blackledge et al. 2007; Ciarrochi et al. 2006). Research involving adults diagnosed with cancer suggests that greater intrinsic motivation is associated with greater well-being and less cancer-related distress (Fisher et al. 2009).

Satisfaction with life scale (SWLS)

The SWLS (Diener et al. 1985) contains five items measuring global self-appraisals of life satisfaction (e.g., “In most ways my life is close to my ideal”). Responses are

rated using a 7-point Likert scale rated from 1 (strongly disagree) to 7 (strongly agree). In this study, the alpha coefficient was 0.87.

Trait global affect

The 20-item trait version of the *Positive and Negative Affect Schedule* (PANAS; Watson et al. 1988) measures two distinct dimensions. The 10-item Positive Affect subscale ($\alpha = 0.84$) assesses activated positive emotions (e.g., excited, interested) and the 10-item Negative Affect subscale ($\alpha = 0.86$) assesses activated negative emotions (e.g., nervous, distressed). Participants are asked how they generally feel using a 5-point Likert scale where higher scores reflect greater activation of positive and negative emotions, respectively. The PANAS has demonstrated consistent independence between the two affect subscales and excellent psychometric properties (Watson 2000).

Results

Our study is the first to examine idiographic social values and the motivation for and commitment to them in younger (college students) and older adults (from the community). Specifically, we were interested in how value-based motivation and commitment are related to well-being and whether age and gender influence these relationships. Table 1 displays descriptive statistics and the correlations between value-based motivations and three dimensions of well-being. As expected, people who were more intrinsically motivated and committed to social values reported greater life satisfaction and positive affect, and lower negative affect. Conversely, being extrinsically motivated toward social values was related to less commitment to social values and greater negative affect.

Table 1 Means, standard deviations, internal consistency coefficients for, and correlations among variables

| Variables | 1 | 2 | 3 | 4 | 5 | 6 |
|---------------------------|---------------------|---------------------|--------------------|----------------------|----------------------|-------|
| 1. Commitment to values | – | | | | | |
| 2. Intrinsic motivation | 0.62 ^{***} | – | | | | |
| 3. Extrinsic motivation | –0.17 ^{**} | –0.13 [*] | – | | | |
| 4. Satisfaction with life | 0.28 ^{***} | 0.32 ^{***} | –0.10 | – | | |
| 5. Positive affect | 0.28 ^{***} | 0.29 ^{***} | 0.00 | 0.43 ^{***} | – | |
| 6. Negative affect | –0.12 | –0.01 | 0.16 ^{**} | –0.32 ^{***} | –0.23 ^{***} | – |
| <i>M</i> | 8.91 | 17.01 | 2.99 | 25.61 | 37.04 | 20.28 |
| <i>SD</i> | 0.96 | 1.94 | 1.47 | 6.00 | 5.63 | 6.48 |
| α | 0.76 | 0.80 | 0.86 | 0.87 | 0.85 | 0.86 |

* $p < .05$; ** $p < .01$; *** $p < .001$

Moderated mediation models

We tested a multiple mediation model hypothesizing that motives for social values mediate the relationship between commitment to values and well-being. To test this hypothesis, we examined three path models with intrinsic and extrinsic motivation included as potential mediators of the relationships between commitment to values and satisfaction with life, positive affect, and negative affect, respectively. To evaluate the influences of age and gender on the relationships that emerged in the aforementioned models, we conducted a series of tests of group invariance, comparing the models with paths free to vary across gender and age to models with paths constrained to be equal across men and women, and then across college students and older adults.

We estimated our path models using Mplus (Muthen and Muthen 2004). We evaluated each of the models using the chi-square test. The chi-square (χ^2) test is a measure of exact fit, with non-significant values indicating no discrepancies between the model-reproduced covariance matrix and the sample covariance matrix. We also evaluated the Tucker-Lewis-index (TLI; Tucker and Lewis 1973), the comparative-fit-index (CFI; Bentler 1990), and the root-mean-square-error-of-approximation (RMSEA; Browne and Cudeck 1993). Values for TLI, and CFI above 0.90 are considered acceptable fit (Tabachnick and Fidell 1996). Values of RMSEA less than 0.05 indicate a good-fitting model, and values larger than 0.10 indicate a poor-fitting model. RMSEA is also accompanied by a p -value; non-significant values imply close fit (Browne and Cudeck 1993).

Satisfaction with life

The first model assessed the roles of intrinsic and extrinsic motivation as mediators of the relationship between commitment to values and satisfaction with life (see Fig. 1). This model fit the data well, $\chi^2(2) = 3.70$, $p = 0.16$; CFI = 0.99; TLI = 0.97; RMSEA = 0.06, $p < 0.05$. As predicted, greater commitment to one's values was positively associated with being intrinsically motivated ($\beta = 0.62$, $p < 0.001$) and was negatively associated with being extrinsically motivated ($\beta = -0.17$, $p < 0.01$). The relationships between commitment to values and motivation are mirrored in the subsequent models examining positive and negative affect as outcome variables. In the current model, intrinsic motivation was related to greater levels of satisfaction with life ($\beta = 0.31$, $p < 0.001$), while no such relationship was found between extrinsic motivation and life satisfaction ($\beta = -0.06$, $p > 0.05$). Intrinsic motivation partially mediated the relationship between commitment to values and satisfaction with life ($\beta = 0.19$,

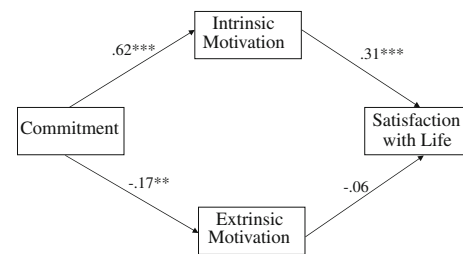


Fig. 1 Standardized path coefficients for direct effects among commitment to values, intrinsic and extrinsic motivation, and satisfaction with life. * $p < 0.05$; ** $p < 0.01$; *** $p < 0.001$

$p < 0.001$). Specifically, greater commitment to values predicted greater intrinsic motivation, which in turn, predicted higher levels of life satisfaction. The indirect effect of commitment to values on satisfaction with life via extrinsic motivation was not significant ($\beta = 0.01$, $p > 0.05$). As indicated by their non-significant χ^2 difference tests, neither gender ($\Delta\chi^2(4) = 3.73$, $p > 0.05$) nor age ($\Delta\chi^2(4) = 2.29$, $p > 0.05$) emerged as moderators of the relationships found in this model.

Positive affect

The second model assessed intrinsic and extrinsic motivation as mediators of the relationship between commitment to values and positive affect (see Fig. 2). This model fit the data reasonably well, $\chi^2(2) = 5.82$, $p = 0.05$; CFI = 0.98; TLI = 0.93; RMSEA = 0.08, $p < 0.05$. Similar to the model including satisfaction with life as the outcome variable, intrinsic motivation was related to greater levels of positive affect ($\beta = 0.30$, $p < 0.001$), while no such relationship was found between extrinsic motivation and positive affect ($\beta = 0.04$, $p > 0.05$). Intrinsic motivation partially mediated the relationship between commitment to values and positive affect ($\beta = 0.18$, $p < 0.001$). Specifically, greater commitment to values predicted greater intrinsic motivation, which in turn, predicted higher levels of positive affect. The indirect effect of commitment to values on positive affect via extrinsic motivation was significant ($\beta = -0.01$,

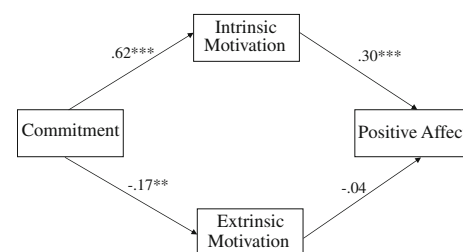


Fig. 2 Standardized path coefficients for direct effects among commitment to values, intrinsic and extrinsic motivation, and positive affect. * $p < 0.05$; ** $p < 0.01$; *** $p < 0.001$

$p > 0.05$). Once again, neither gender ($\Delta\chi^2(4) = 9.27, p > 0.05$) nor age ($\Delta\chi^2(4) = 6.56, p > 0.05$) emerged as moderators of the relationships found in this model.

Negative affect

The third model included intrinsic and extrinsic motivation as mediators of the relationship between commitment to values and negative affect (see Fig. 3). This model fit the data well, $\chi^2(2) = 4.61, p = 0.10$; CFI = 0.98; TLI = 0.95; RMSEA = 0.07, $p < 0.05$. In this model, extrinsic motivation was positively associated with negative affect ($\beta = 0.16, p < 0.01$), while intrinsic motivation was unrelated to negative affect ($\beta = 0.01, p > 0.05$). The indirect effect of commitment to values on negative affect via intrinsic motivation was not significant ($\beta = 0.01, p > 0.05$). However, the route from commitment to values to negative affect via extrinsic motivation was significant ($\beta = -0.03, p < 0.05$). People less committed to social values reported greater extrinsic motivation for these values and subsequently, experienced more negative affect. Neither gender ($\Delta\chi^2(4) = 3.39, p > 0.05$) nor age ($\Delta\chi^2(4) = 3.59, p > 0.05$) emerged as moderators of the relationships found in this model.

Age and gender related considerations

While age and gender did not moderate relationships between motivation orientation, commitment to values, and well-being, we wanted to evaluate the presence of age and gender differences in value-based motivations, commitment, and indices of well-being. To test whether value-based motivations and commitment differed between our student and older adult samples and between men and women, we conducted two multivariate regression models—one model with value-based motivation and commitment as outcomes and a second model with indices of well-being as outcomes. These regression models account for the covariance between the outcome variables, as well as between the predictors. The beta coefficients provided for these two models show the magnitude of change in the

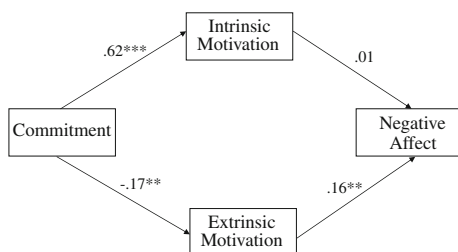


Fig. 3 Standardized path coefficients for direct effects among commitment to values, intrinsic and extrinsic motivation, and negative affect. * $p < 0.05$; ** $p < 0.01$; *** $p < 0.001$

Table 2 Multivariate regression model statistics of age and gender predicting value-based motivation and commitment

| Outcome | Effects | B | Z-ratio | p-value |
|----------------------|-----------|-------|---------|---------|
| Intrinsic motivation | Intercept | -0.15 | -2.14 | 0.03 |
| | Age | -0.17 | -2.62 | <0.01 |
| | Gender | 0.19 | 3.00 | <0.01 |
| Extrinsic motivation | Intercept | 0.03 | 0.46 | 0.65 |
| | Age | -0.16 | -2.49 | 0.01 |
| | Gender | -0.27 | -4.53 | <0.001 |
| Commitment | Intercept | -0.09 | -1.23 | 0.22 |
| | Age | -0.08 | -1.26 | 0.21 |
| | Gender | 0.13 | 2.01 | 0.04 |

All p -values were two-tailed. Age was coded as 0 = college student and 1 = older adult. Gender was coded as 0 = male and 1 = female

Table 3 Multivariate regression model statistics of age and gender predicting indices of well-being

| Outcome | Effects | B | Z-ratio | p-value |
|-------------------|-----------|-------|---------|---------|
| Life satisfaction | Intercept | 0.07 | 1.04 | 0.30 |
| | Age | 0.19 | 2.86 | <0.01 |
| | Gender | 0.03 | 0.42 | 0.67 |
| Positive affect | Intercept | 0.09 | 1.33 | 0.18 |
| | Age | 0.17 | 2.63 | <0.01 |
| | Gender | -0.04 | -0.66 | 0.51 |
| Negative affect | Intercept | -0.16 | -2.37 | 0.02 |
| | Age | -0.34 | -5.76 | <0.001 |
| | Gender | 0.01 | 0.19 | 0.85 |

All p -values were two-tailed. Age was coded as 0 = college student and 1 = older adult. Gender was coded as 0 = male and 1 = female

outcome variable (in standard deviations) when the level of the predictor changes (college student to older adult, male to female).

We found theoretically relevant differences between college students and older adults in their intrinsic and extrinsic motivation for and commitment to social values (see Table 2). College students reported greater intrinsic motivation for values ($\beta = -0.17, p < 0.01$), but also greater extrinsic motivation for values ($\beta = -0.16, p < 0.05$), compared to older adults. As for goal-related efforts, age group was not predictive of commitment to values ($\beta = -0.08, p > 0.05$). Women reported greater intrinsic motivation ($\beta = 0.19, p < 0.01$), while men endorsed greater extrinsic motivation ($\beta = -0.27, p < 0.001$). Commitment to social values also differed by gender with women reporting greater commitment than men ($\beta = 0.13, p < 0.05$).

We hypothesized that motivation and behavioral commitment would be relevant to greater well-being. Thus, we examined how age group and gender influenced well-being

indicators (see Table 3), as both factors were found to have differing levels of intrinsic and extrinsic motivation. In general, being a member of the older adult sample was predictive of greater well-being than being in the student sample, as older adults reported greater life satisfaction ($\beta = 0.19$, $p < 0.01$), and positive affect ($\beta = 0.17$, $p < 0.01$), and less negative affect ($\beta = -0.34$, $p < 0.001$). Gender was not predictive of any indicators of well-being ($ps > 0.05$).

Discussion

In this study, we explored how people's most meaningful, idiographic social values and their motives for adopting them influence well-being and are affected by age and gender. Our findings shed light on the importance of value-based motivation and commitment to well-being. Intrinsic motivation and behavioral commitment were positively associated with life satisfaction and the frequency of positive emotions. Conversely, being extrinsically motivated for social values was linked to lower levels of commitment and a greater frequency of negative emotions. By examining age and gender as predictors of value-based motivation, commitment, and well-being, we found that men and women of different ages pursue social values and experience well-being differently.

Our work adds to extensive theory and empirical findings on self-determination theory (Deci and Ryan 2000). Relating to prior work (Sheldon and Elliot 1998, 1999), we found that being committed to intrinsically motivating social values was associated with greater life satisfaction and positive affect (but not negative affect). Conversely, being committed to extrinsically motivated values was related with greater negative affect and had no effect on positive indices of well-being. This fits with work suggesting the negative and positive experiences are distinct at subjective, motivational, behavioral, and biological levels of analysis (e.g., Carver et al. 2000).

Relations between value-based motivation and commitment with positive affect suggest avenues for cultivating various elements of a fulfilling life. Being intrinsically motivated implies adopting a social value because it is inherently enjoyable or meaningful, providing a relatively sustainable source of positive experiences. In addition, the devotion of cognitive and behavioral resources to make effort toward goals linked to these values is another source of positive experiences (Kashdan and McKnight 2009; McKnight and Kashdan 2009). Temporal sequencing can be addressed with longitudinal, experimental, and experience-sampling methodologies—determining whether benefits linked to motivation and commitment are mediated by

positive emotions and appraisals such as life satisfaction that effectively change the quality of relationships.

Other findings suggest that heterogeneity exists across age and gender categories in how people approach and commit to social values. While age and gender did not moderate relationships between motivation and commitment to social values on well-being, meaningful age and gender differences emerged across these variables. Fitting with the notion that younger adults are still in the process of expanding their knowledge, experiences, and social network (an emerging identity), college students reported higher levels of intrinsic and extrinsic motivation for social values than older adults. However, this did not translate into greater well-being; compared with college students, older adults endorsed greater life satisfaction and positive affect, and less negative affect. These findings fit with prior work showing that older adults are more content with their existing social network and behavior—extracting more pleasure and meaning from the preferences sculpted over a lifetime (Fredrickson and Carstensen 1990; Lockenhoff and Carstensen 2004). Contrary to predictions, commitment to values did not differ by age. These null results might be a consequence of using a limited older adult sample comprised of retired workers in continuing education classes. Further, differences exist in the composition of social relationships in the lives of older and younger adults. For instance, “family” for older adults often includes spouses, children, and grandchildren whereas the family composition of younger adults often is limited to parents and siblings. Despite questionable generalizability, our results converge with studies with more global community sampling of older adults (Carstensen and Mikels 2005). Studies with larger samples can adopt a person-centric approach (e.g., latent class analyses) to determine the presence of distinct subsets of older adults that can be differentiated by values, motivations, commitment, and well-being.

Besides age, gender has been consistently shown to be relevant in understanding relationship processes (e.g., Reis 1998) and social values (Schwartz and Rubel 2005). The one study on gender differences in social values (Schwartz and Rubel 2005) showed that women were more likely to list social values as central to their lives (e.g., benevolence, obedience) compared with non-social values (e.g., stimulation, achievement). Extending this work, we focused on the motivation and behavioral commitment to personally endorsed values, and found that men and women differed in expected ways. Women endorsed greater intrinsic motivation for and behavioral commitment to social values; men were more extrinsically motivated. However, there were no differences between men and women in well-being, raising questions as to the discernible benefits of particular value-based motivations for women.

A key question addressed by this study is whether motivational orientations and individual differences such as age and gender provide insights into how human beings successfully navigate their world with values as a guiding influence. Prior theory and research suggest a universal need to belong and satisfaction of this need provides the greatest opportunities for well-being (Baumeister and Leary 1995; Deci and Ryan 2000). Motivational orientations toward existing relationships can help explain the presence of these opportunities. When people are intrinsically motivated to adopt their values, this indicates the absence of pressure or coercion and that the guiding principles of a relationship are chosen because of interest, enjoyment, or meaning in the activity itself (Sheldon and Elliot 1998, 1999). To the extent that a person chooses values of how to live in a relationship for intrinsic reasons, a path toward sustainable well-being is more readily available (McKnight and Kashdan 2009; Wilson and Murrell 2004).

Future research should examine the real-world benefits of younger adults adopting greater intrinsic and extrinsic motivation and commitment to social values. Benefits are best captured by developmental trajectories focusing on healthy identity formation, personal growth, and the satisfaction of basic psychological needs. Also, research is needed on whether there are psychological and social costs to men's tendencies to be less intrinsically motivated and committed to social values compared with women. A primary benefit of this study is that findings on value-based living offer additional questions that remain to be explored. Compared with happiness, far too little research is devoted to meaningful, value-based living. When everyday behaviors are aligned with a person's core interests and values, a rich, meaningful life becomes more accessible.

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