A comparison of domain-specific evaluations of life in predicting overall life evaluations and biological inflammation

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Which domain of life evaluation is more important? Using a large-scale public sample of 1888 adults from the United States (880 males, 1008 females; $M_{age} = 53.28$), we addressed this question by comparing the predictive strength of six domains of life evaluations on overall life evaluation as well as biomarkers of inflammation. Specifically, we examined individuals' self-rated evaluations of the domains of social belonging, romantic relationships, work, subjective social status, self-esteem and finances, and we examined biological inflammation using an index of five biomarkers of inflammation: interleukin-6, fibrinogen, C-reactive protein, E-selectin and intercellular adhesion molecule 1. Adjusting for demographic variability, romantic evaluation, work evaluation, self-esteem and financial evaluation were equally and uniquely predictive of overall life evaluation. Social belonging remained predictive but was relatively weaker in magnitude, while subjective social status was no longer a significant predictor. Conversely, only financial evaluation was significantly linked to reduced biomarkers of inflammation. The findings suggest that depending on domain-specificity and whether well-being is assessed via subjective or objective indicators, links between life evaluations and well-being may show substantial nuance. In particular, financial evaluation appears to have unique links to biomarkers of inflammation even after accounting for other domains of life evaluations.

Keywords: Life evaluation; Domain-specificity; Well-being; Biomarkers; Inflammation.

What contributes to a good life? Though diverse in their focus, this question underlies many empirical investigations in positive psychology and well-being. For example, many researchers have argued that social relationships are among the most important ingredients to living a good life (Bowling, 1995; Reis & Gable, 2003). Others have hotly debated the role of money in bringing about happiness, with the most recent findings concluding that increasing income is indeed linked to happiness for most people in the United States (Killingsworth et al., 2023). Several other investigations have also contrasted subjective monetary evaluations against objective indices of socioeconomic status such as income, with some suggesting that subjective evaluations may matter even more than objective indicators in predicting well-being outcomes (Navarro-Carrillo et al., 2020). Still others have examined self and status evaluations as antecedents of well-being (e.g., Haught et al., 2015; Orth & Robins, 2014). Clearly, the good life is a multifaceted concept with numerous contributors, which raises one question: what are their relative contributions to wellness when compared against each other?

The idea that specific domains of life contribute to overall well-being has its roots in bottom-up theories of well-being, which argue that evaluations of life in individual domains contribute to overall evaluations of life, and various studies since then have attempted to compare the relative contributions of these domains (Diener, 1984; Loewe et al., 2014). However, findings resulting from these studies have not always been consistent. For example, whereas Loewe et al. (2014) reported that evaluations of one's finances were the strongest predictor of the overall evaluation of life, Milovanska-Farrington and Farrington (2022) found that evaluations of financial status were least important to the overall evaluation of life. Moreover, while highly valuable as key indices of well-being, self-reported assessments may not always correspond to objective measurements (Dang et al., 2020).

Indeed, among researchers who examined both objective and subjective outcomes, the predictiveness of different domains of life evaluations has been found to diverge. For example, whereas evaluating one's marriage positively was linked to both subjective health and hospitalisation, positive evaluations of one's job were linked only to subjective health but not hospitalisation (Bi et al., 2022). Further research that compares domain-specific life evaluation indices and their associations with both subjective and objective indicators of wellness would thus be of substantial value in clarifying these relationships.

In particular, we highlight the theoretical and practical relevance of examining biomarkers of inflammation, which are well-validated indicators of biological health risk. Substantial evidence suggests that these biomarkers are reliable indicators of adverse health and wellness outcomes, including disease and longevity (Singh & Newman, 2011), and an examination of these biomarkers is thus of strong practical importance. Some evidence has indeed linked various aspects of life evaluations to such markers. For example, overall life evaluation (Uchino et al., 2018), financial hardships (Surachman et al., 2023), evaluations of one's job (Amati et al., 2010) and evaluations of one's marriage (Whisman & Sbarra, 2012) have each been linked to lower levels of biological inflammation, supporting the idea that domains of life evaluations are associated with objective biological indicators of wellness. However, these works have examined individual domains and their relations to biological inflammation separately, and to our awareness, no integrative work to date has compared domain-specific life evaluations and their predictive strength for biological inflammation. Moreover, given the logistical difficulties of collecting biological data, a further limitation with many past investigations using such biomarkers is that they are commonly limited by small sample sizes.

We believe that a large-scale investigation that integrates the line of research comparing the relative importance of domain-specific life evaluation indices and the line of research examining links to biological inflammation is both timely and of substantial theoretical and practical relevance. In the present analyses, we seek to address this issue by comparing domains of life evaluations and their relative predictive strength for both overall life evaluation as well as objective biological inflammation. We believe the present approach makes several key contributions. Firstly, this would provide a methodologically strong and highly statistically powered analysis which adds to growing (albeit inconsistent) evidence on the relative importance of specific domains for overall life evaluation. Secondly, it would provide to our awareness the first available comparison of domain-specific life evaluation not just for subjective life evaluation but for objective biomarkers of inflammation. Results from this analysis can thus highlight key nuances in how specific domains of life could differentially relate to subjective life evaluations and objective indicators of wellness.

In general, biomarkers of inflammation represent immunological responses that are indicative of environmental and social threat—in line with previous evidence (e.g., Uchino et al., 2018), we thus expect that higher life evaluations should be reflective of life conditions that are less threatening and should thus predict lower biological inflammation. However, it is difficult to predict the relative importance of each of these domains for either general life evaluation or biological inflammation given substantial inconsistencies and uncertainties in previous work. There is evidence that even in individualistic cultures, social relationships are often prioritised over the self and may play a particularly important role in wellness outcomes (Krys et al., 2021), which would suggest the hypothesis that social domains of life evaluations would likely be most predictive of overall life evaluation and biological inflammation. Indeed, Malvaso and Kang (2022) also reported that positive evaluations of one's spousal relationship and social life were the strongest predictors of overall life evaluation. However, studies comparing the relative predictive strength of different domains have not always supported this view, as domains related to evaluations of monetary wealth or personal pursuits have often been found to be equally or even more important (Bi et al., 2022; Loewe et al., 2014). Further complicating clear predictions is the absence of previous comparisons of these domains for biological inflammation. As such, an exploratory approach was most appropriate for the present research, and we hence made no a priori hypotheses on which domain is likely to be most predictive.

In summary, we focus on examining the relative predictive strength of various domain-specific life evaluations on overall life evaluation as well as biological inflammation among a large-scale public sample of American adults, which enables more reliable and naturalistic analyses. Specifically, we examine six domains of life evaluations. Firstly, in line with studies emphasising the importance of social relationships (Reis & Gable, 2003), we examined two domains of relational evaluations: social belonging and evaluation of one's romantic relationship. Secondly, in line with evidence on the contributive role of self-esteem to overall wellness (Orth & Robins, 2014), we examined self-evaluations as operationalised based on self-esteem. Thirdly, in line with examinations of status-based concerns for well-being, we examined evaluations of one's status as operationalised based on the subjective social status ladder (Cundiff et al., 2013). Fourthly, given the substantial empirical focus on financial wealth and subjective financial evaluations in previous research (Tan et al., 2020), evaluation of one's financial status was also examined as an indicator of subjective socioeconomic evaluation.

Finally, given that there are close ties between money and work and given that workplace well-being is also linked to positive wellness outcomes (Malvaso & Kang, 2022), evaluations of one's work were also included. In line with procedures utilised in previous research (Hartanto et al., 2021), we examined a composite of five biomarkers of inflammation: interleukin-6, fibrinogen, C-reactive protein, E-selectin and intercellular adhesion molecule 1. In all analyses, we adjusted for age, gender, education level and income, given that these demographics have been linked both to life evaluations and biomarkers of inflammation (e.g., Ershler & Keller, 2000; Tan et al., 2020).

METHOD

Participants

Data for this study came from a subset of the Midlife Development in the United States (MIDUS) study, which draws from a nationally representative random-digit-dial sample of participants from the United States. Specifically, we analysed data from 1888 participants (880 males, 1008 females; $M_{age} = 53.28$, $SD_{age} = 12.75$, age range: 25–84 years) who provided data on their subjective ratings of life evaluation domains as well as biological data containing information about markers of inflammation. Power analyses indicated that the present sample size would be adequate for detecting even small effect sizes with larger than .99 power. Data were obtained from participants who took part in MIDUS2 and the MIDUS2 Biomarker Project which took place between 2004 and 2009, as well as the MIDUS Refresher Project and the MIDUS Refresher Biomarker Project, which took place between 2011 and 2016. As the MIDUS2 and MIDUS Refresher projects were identical in procedure but involved a different set of participants, we combined the samples to maximise sample size and statistical power. Participants who took part in MIDUS2 and the MIDUS Refresher Project completed a phone interview and a questionnaire. Participants who took part in the MIDUS2 and MIDUS Refresher Biomarker Projects visited and stayed overnight at a clinical research centre, where data on biological markers of health and functioning were obtained via a fasting blood sample by trained clinical staff. On average, biomarker information was collected approximately two years after the collection of subjective ratings, thereby allowing chronological order to be established in the predictive models examined in this study. Missing data occurred for approximately 37.3% of participants, and complete data was available for 1184 participants. Little's test of missing completely at random (MCAR) indicated that patterns of missingness were missing not at random (MNAR), $\chi^2 (961) = 1653.43$, $p < .001$. Differences between included and excluded participants were generally small and are reported in detail under the Supplementary Analyses section in the supporting information. The study is not pre-registered given that data analysed is based on secondary data that was already fully collected at the time of conceptualization. The materials for the study as well as data for the study are accessible from MIDUS at https://midus.wisc.edu/, while analytic codes are uploaded at https://osf.io/n536j/?view_only=fad2a46e65804683a0336d0aa6601ece.

Measures

Biological inflammation

Biomarkers of inflammation were examined using an index calculated from the aggregate of five well-validated biological indicators of inflammation: interleukin-6 (IL6), fibrinogen, C-reactive protein (CRP), E-selectin and intercellular adhesion molecule 1 (ICAM-1). Participants provided information on these biomarkers by staying overnight at a clinical research centre, where fasting blood samples were taken the following morning. In line with the procedures of previous research utilising these biomarkers (Hartanto et al., 2021), we log-transformed and winsorized each measure at 3SD to reduce deviations from normality. Each measure was then standardised and specified as indicators of the latent factor for biomarkers of inflammation. Internal consistency for the index was adequate ($\alpha = .64$; $\omega = .67$).

Overall life evaluation

Overall life evaluation was assessed using one item on an 11-point Likert scale (*"Using a scale from 0 to 10 where 0 means 'the worst possible life overall' and 10 means 'the best possible life overall', how would you rate your life overall these days?"*).

Domain-specific life evaluation indices

We examined six different domains of life evaluations. First, *romantic evaluation* was assessed using one item on a 11-point Likert scale ("*Using a scale from 0 to 10 where 0 means 'the worst possible marriage or close relationship' and 10 means 'the best possible marriage or close relationship', how would you rate your marriage or close relationship these days?*"). Second, *social belonging* was assessed using three items ($\alpha = .78$) assessing a sense of belonging with others in the community (e.g., "*I feel close to other people in my community.*"), one of which was reverse-coded. Third, *subjective social status* was assessed using one item in which participants were asked to rank their standing within their community on a 10-point Likert scale from 1 ("*bottom-rung*") to 10 ("*top-rung*"). Fourth, *work evaluation* was assessed using one item on a 11-point Likert scale ("*Please think*

of the work situation you are in now, whether part-time or full-time, paid or unpaid, at home or at a job. Using a scale from 0 to 10 where 0 means 'the worst possible work situation' and 10 means 'the best possible work situation', how would you rate your work situation these days?"). Fifth, *self-evaluation* was assessed using a measure of self-esteem comprising six items ($\alpha = .85$), of which three were reverse-coded (e.g., "*I am able to do things as well as most people.*", "*I certainly feel useless at times.*"). A seventh item ("I am no better and no worse than others.") was initially included in the dataset for self-esteem, but factor analyses revealed that this item did not load into the factor for self-esteem and had near-zero factor loadings (standardised $\lambda = -.039$, $p = .19$). As such, this item was excluded from the measure. Sixth, *financial evaluation* was assessed using one item on a 11-point Likert scale (*"Using a scale from 0 to 10 where 0 means 'the worst possible financial situation' and 10 means 'the best possible financial situation', how would you rate your financial situation these days?"*).

Demographics

We included demographic variables as covariates. Specifically, we examined age, gender (1 = *male*, 0 = *female*), education level (from 1 representing "*no education or some grade school*" to 12 representing "*PhD or other comparable qualifications*") and annual household income in absolute values. Due to the large numerical values for annual household income, values for income were standardised prior to analyses to improve the interpretability of regression coefficients. Values for age were divided by 10 to improve the interpretability of regression coefficients.

Analytic approach

Preliminary bivariate correlations were performed to analyse the linear relationships between each domain of life evaluation with overall life evaluation and biological inflammation. Thereafter, we performed latent variable structural equation modelling using the *lavaan* package on *R*. This analytic approach was chosen as it can account for measurement error and also provide more precise estimates (Ledgerwood & Shrout, 2011), and also enables the use of full-information maximum likelihood (FIML) estimations. FIML provides the gold standard approach to addressing missing data even under conditions where the data is MNAR, which is typical of large-scale public datasets such as this (Enders & Bandalos, 2001; Muthén et al., 1987).

RESULTS

Descriptive statistics are summarised in Table 1, and inter-correlations between all variables are reported in Table S1.

Initial bivariate correlations provide preliminary indications that, unsurprisingly, all domains of life evaluations were associated with higher overall life evaluation: social belonging ($r = .35$, $p < .001$); romantic evaluation ($r = 51$, $p < .001$), subjective social status ($r = .36$, $p < .001$), work evaluation ($r = .49$, $p < .001$), self-esteem ($r = .50$, $p < .001$) and financial evaluation ($r = 50$, $p < .001$). Moreover, as expected, higher ratings on various domains of life evaluations were generally related to lower biomarkers of inflammation. However, these correlations were not significant for the social domains of social belonging ($r = -.03$, $p = .17$) and romantic evaluation ($r = -.05$, $p = .072$). Bivariate correlations were significant for subjective social status ($r = -.05$, $p = .035$), work evaluation ($r = -.10$, $p < .001$),

TABLE 1
Descriptive statistics for all key variables

	M	SD	*Range*
Age	53.28	12.75	25–84
Gender	0.47	0.50	1008 Females, 880 Males
Education level	8.02	2.43	1–12
Household income	82,785.81	63,256.71	0–300,000
Biological inflammation	0	0.64	−2.23 to 2.62
Social belonging	4.94	1.36	1–7
Romantic Evaluation	8.05	2.02	0–10
Subjective Social Status	6.56	1.76	1–10
Work Evaluation	7.38	2.34	0–10
Self-Esteem	5.71	1.18	1–7
Financial Evaluation	6.34	2.27	0–10
Overall Life Evaluation	7.83	1.53	1–10

Note: Gender was coded as 1 = male, 0 = female; the means reported for gender, hence, represent the average proportion of males in the sample.

TABLE 2

Regression coefficients predicting overall life evaluation and biological inflammation in latent variable structural equation modelling

	Overall life evaluation					*Biological inflammation*				
	b	SE	p	*95% CI*	β	b	SE	p	*95% CI*	β
Age	−0.03	0.02	.19	[−0.07, 0.01]	−.02	0.14***	0.02	<.001	[0.10, 0.17]	.25
Gender	−0.07	0.05	.21	[−0.17, 0.04]	−.02	−0.18***	0.04	<.001	[−0.26, −0.11]	−.13
Education level	−0.03*	0.01	.013	[−0.05, −0.01]	−.05	−0.04***	0.01	<.001	[−0.06, −0.02]	−.14
Household income	0.03	0.03	.35	[−0.03, 0.09]	.02	−0.02	0.02	.39	[−0.06, 0.02]	−.03
Social belonging	0.07*	0.03	.039	[0.00, 0.13]	.05	0.01	0.02	.62	[−0.03, 0.06]	.02
Romantic evaluation	0.25***	0.02	<.001	[0.21, 0.28]	.33	−0.02	0.01	.16	[−0.04, 0.01]	−.05
Subjective social status	0.03	0.02	.16	[−0.01, 0.06]	.03	0.002	0.01	.90	[−0.02, 0.03]	.004
Work evaluation	0.13***	0.01	<.001	[0.11, 0.16]	.20	−0.02	0.01	.085	[−0.04, 0.002]	−.06
Self-esteem	0.42***	0.04	<.001	[0.34, 0.49]	.28	−0.04	0.03	.17	[−0.09, 0.02]	−.05
Financial evaluation	0.13***	0.02	<.001	[0.10, 0.16]	.19	−0.04**	0.01	.001	[−0.06, −0.02]	−.12

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

self-esteem ($r = −.08$, $p = .001$) and financial evaluation ($r = −.15$, $p < .001$).

Main analyses

We further probed the above correlations using latent variable structural equation modelling. We first specified and tested the measurement model using confirmatory factor analyses. Biological inflammation was specified as a latent variable indicated by the five biomarkers of inflammation. Social belonging was specified as a latent variable indicated by three items, while self-esteem was specified as a latent variable indicated by six items. Romantic evaluation, work evaluation, subjective social status, financial evaluation and overall life evaluation were each specified as single-item latent variables. The results of the confirmatory factor analysis indicated that the measurement model fit the data well, χ^2 (129) = 507.65, $p < .001$, CFI = 0.95, RMSEA = 0.049, SRMR = 0.036. We thus proceeded with testing the structural model.

The latent factor for biological inflammation and overall life evaluation were specified as the outcome variables, while the latent factors for social belonging, romantic evaluation, subjective social status, work evaluation, self-esteem and financial evaluation were specified as predictors. The observed variables for age, gender, education level and household income were controlled for. All predictor variables were allowed to covary to account for their shared variances, and FIML was applied to address missing data. Results showed that the structural model fit the data well, χ^2 (173) = 1121.21, $p < .001$, CFI = 0.93, RMSEA = 0.054, SRMR = 0.036.

As shown in Table 2, controlling for age, gender, education level, household income, all domains of life evaluations remained associated with overall life evaluation except subjective social status. Conversely, only financial evaluation significantly predicted reduced biomarkers of inflammation.[1] The overall measurement and structural model are summarised in Figure 1.

Additional analyses

We performed a series of model comparisons to test whether the regression coefficients of each domain-specific life evaluation differed from each other in predicting overall life evaluation. We focused specifically on comparing the domain of life evaluation which had the largest standardised regression coefficient (romantic evaluation) with the remaining domains which were also supported as statistically significant. We first standardised all variables to ensure comparability, and we then specified a series of structural equation models. Model 1 is a baseline unconstrained model equivalent to the model performed in our main analyses. Model 2 constrained the regression coefficients for romantic evaluation and self-esteem to be equal. Model 3 constrained the regression coefficients for romantic evaluation and financial evaluation to be equal. Model 4 constrained the regression coefficients for romantic evaluation and work evaluation to be equal. Model 5 constrained the regression coefficients for romantic evaluation and social belonging to be equal. A significant comparison indicates that the constrained model should be rejected. Model comparisons performed using chi-square difference

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[1] To test the robustness of the findings, we also examined several alternative models: (a) a model without applying FIML to test the robustness of the results despite missing data procedures; (b) a model in which overall life evaluation was specified as a covariate predicting biological inflammation to test whether the association between financial evaluation and biological inflammation could be fully explained by overall life evaluation; (c) a model in which two indicators which loaded relatively less strongly into the latent factor for biological inflammation were dropped from analyses and additional indicator covariances were specified to improve model fit for the self-esteem scale to test whether model fit issues for these scales could influence the results. All key findings remained unchanged in these models. We report them in more detail under Supplementary Analyses.
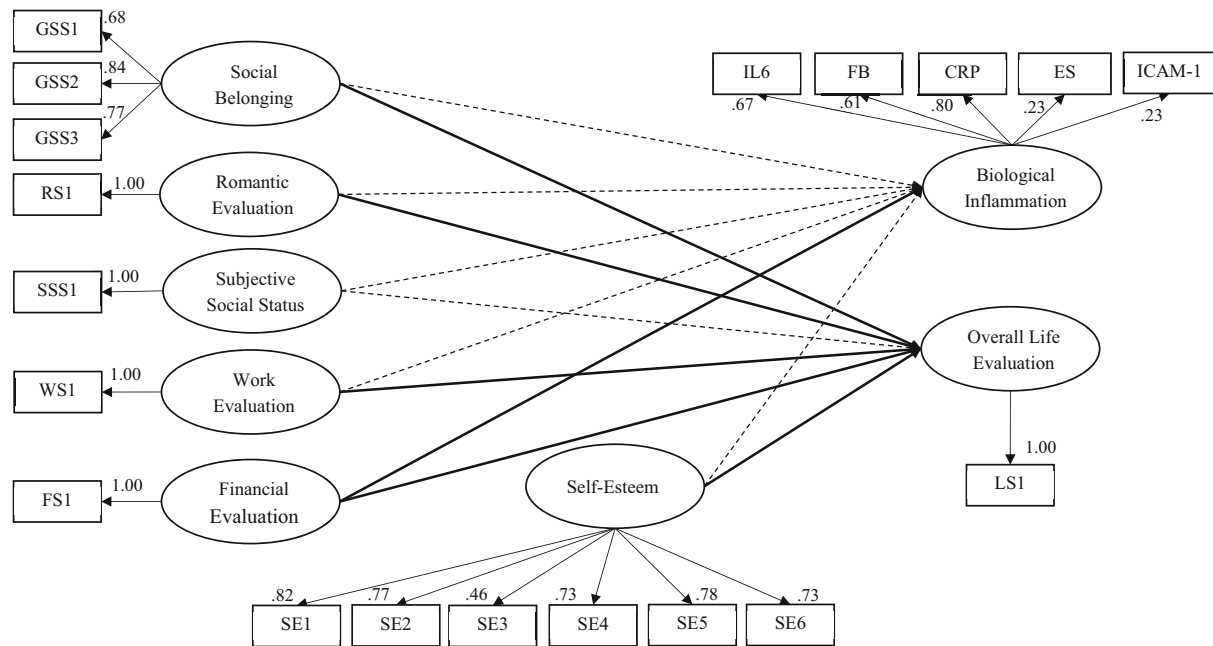
Figure 1. Measurement and path model for structural equation modelling predicting biological inflammation with FIML estimation, χ^2 $(173) = 1121.21$, $p < .001$, CFI = 0.93, RMSEA = 0.054, SRMR = 0.036. Age, gender, education level and household income were controlled for in pathways predicting biological inflammation. Dashed lines indicate non-significant predictive pathways, while bolded lines indicate significant pathways. Factor loadings indicated represent standardised factor loadings.

tests indicated that there were no significant differences between Model 1 with Model 2 [χ^2 (1) = 0.05, $p = .82$], Model 3 [χ^2 (1) = 1.15, $p = .28$] and Model 4 [χ^2 (1) = 2.10, $p = .15$]—thus, the regression coefficient for romantic evaluation did not significantly differ from self-esteem, work evaluation and financial evaluation. However, there were significant differences between Model 1 and Model 5 [χ^2 (1) = 18.04, $p < .001$]—thus, the regression coefficient for romantic evaluation was significantly larger than that for social belonging in predicting overall life evaluation.

DISCUSSION

After adjusting for demographic variability (age, gender, education level and income) and comparing six domains of life evaluation, we found that social belonging, romantic evaluation, work evaluation, self-esteem and financial evaluation (but not subjective social status) each uniquely predicted variance in overall life evaluation. Among the domains that were significantly related to overall life evaluation, romantic evaluation was equal in magnitude to work evaluation, self-esteem and financial evaluation, but was larger in magnitude than social belonging. When examining biomarkers of inflammation, only financial evaluation remained a significant predictor of reduced biological inflammation. While effect sizes were small, they were comparable to previous work focusing on large-scale public samples and are likely to be of

substantial practical significance (Funder & Ozer, 2019). The findings are noteworthy in several ways.

In contrast to analyses that focus only on subjective indices of overall well-being, the present analyses provide the first attempt to compare different domains of life evaluations for predicting not just subjective life evaluation but also objective biological indicators of wellness. Moreover, in line with previous evidence suggesting that findings for objective indices often diverge from findings for subjective indices (Bi et al., 2022; Johnston et al., 2009), our findings similarly suggest nuances in the domains that are most relevant for overall life evaluation versus biological inflammation. For example, when examining overall life evaluation, romantic evaluation appeared to have the largest effect size (though this was not significantly different from other domains), which is in line with evidence reported by some previous work (Malvaso & Kang, 2022) and is consistent with the wealth of evidence suggesting that social relationships are particularly crucial to well-being (Reis & Gable, 2003). Interestingly and surprisingly, we found no evidence that positive evaluations of one's romantic relationships or social belonging were predictive of biological inflammation, which implies that social domains of evaluation may be more strongly predictive of well-being when operationalised at the subjective level (e.g., Milovanska-Farrington & Farrington, 2022) than at the biological level. These findings

again highlight the importance of complementing findings focusing on subjective measures with objective biological indices.

Two further findings for overall life evaluation are also noteworthy. Upon controlling for other domain-specific life evaluations and demographics, social belonging remained a significant and unique predictor of overall life evaluation but was relatively weaker in magnitude. Given that social belonging was operationalised using a measure of belonging to one's community, it is possible that social closeness to close relationships such as one's romantic partner may ultimately play a larger role in overall well-being rather than a general sense of belonging to one's community. Indeed, other works have similarly found that being satisfied with close relationships may be most strongly predictive of overall life evaluation (Malvaso & Kang, 2022). Furthermore, despite a significant and moderate bivariate correlation, subjective social status had no significant relationships with overall life evaluation upon controlling for demographics and all other domains. Thus, the present findings also suggest that status-based concerns may not add uniquely to one's overall evaluation of one's life upon accounting for other related domains such as one's self-esteem.

The finding that financial evaluation appeared to be the sole unique predictor of biological inflammation is of note and is consistent with some previous evidence that subjective evaluations of wealth may have independent or even stronger associations with well-being outcomes than objective measures of wealth (Navarro-Carrillo et al., 2020). Indeed, we found that financial evaluation predicted lower biological inflammation independently of education level and objective income levels. Notably, in bivariate correlations, both education level and income were correlated with lower biological inflammation at similar magnitudes with subjective financial evaluation. However, in the full regression models, while education level remained significant, income levels were no longer a unique predictor of reduced biological inflammation, suggesting that subjective financial evaluation may play a more crucial explanatory role than actual monetary wealth in biological inflammation. Thus, rather than the objective presence of socioeconomic indicators such as wealth, the subjective evaluation of financial wellness may be even more critical to attaining objective biological wellness outcomes. There is previous work suggesting that subjective socioeconomic evaluations may be linked to the tendency to fall ill (Cohen et al., 2008), and the present findings further suggest that the wellness benefits of financial evaluation may even be found when examining biomarkers of inflammation.

A comparison of financial evaluation, work evaluation, self-esteem and subjective social status is pertinent as well given that these domains are conceptually related and are indeed positively correlated. Despite their conceptual and statistical overlaps, only financial evaluation

emerged as a significant independent predictor of reduced biological inflammation—this suggests that the benefits of financial evaluation may not be explained simply by the self-evaluation or status gains afforded by feeling wealthy, nor by evaluating one's work more positively. Financial evaluation may hence be uniquely important in predicting lowered biological inflammation, possibly because the perception of financial satiation may reduce materialist concerns. Indeed, there is mounting evidence that excessively focusing on materialistic gains is generally predictive of adverse well-being outcomes (Bradshaw et al., 2023), and other work has similarly linked financial hardships to biological inflammation (Surachman et al., 2023). Beyond other domains of life evaluation, evaluating one's finances positively may thus uniquely reflect a sense of material contentment that reduces the expression of psychobiological markers of stress and ill health.

Several limitations to the present findings and key future directions are notable. Firstly, limitations pertain to the measurements used in the present analyses. Though the approach of aggregating the five markers of biological inflammation is based on past research (e.g., Hartanto et al., 2021), two of the markers loaded relatively weakly into the latent factor. However, supplementary analyses excluding these indicators produced no changes to the findings, which suggest that this is unlikely to have biased the findings, though alternative, more reliable ways of indexing overall biological inflammation should be explored in future research. Moreover, the measures used in the present work involve evaluations that are closely related to satisfaction but do not precisely ask participants to evaluate their satisfaction levels. Future replications of the present findings would thus benefit from an analysis of alternative measures of the same domains of life evaluations examined in the present work. For example, though the single-item measure of romantic evaluation used in the present work was not found to be predictive of biological inflammation, it is possible that other measures of romantic satisfaction or romantic passion could be more strongly predictive, in line with previous evidence on the health benefits of romantic love (e.g., Fletcher et al., 2015). Secondly, there was also evidence of non-random missingness, which is a common limitation in large-scale public-sample studies. We have thus addressed this using both gold-standard imputation procedures (FIML) as well as listwise deletion, and regardless of the method used to address missing data, our findings remained similar, suggesting that the main findings are likely to remain robust despite this issue.

Thirdly, the present analyses focus only on participants from the United States, which limits generalizability to other cultures. There is evidence that the antecedents and consequences of biomarkers of inflammation may differ between individualistic and collectivistic cultures (Yong et al., 2021), and the present conclusions may not

generalise elsewhere. Given the strong cultural focus on personal success and monetary pursuits in the United States (Bradshaw et al., 2023), the cultural value of financial evaluation may be particularly large, which may translate into larger psychobiological effects on wellness. Whether or not this is true in other cultures remains to be examined. Thirdly, the present analyses do not allow for strong causal conclusions to be drawn. Nevertheless, given the large and naturalistic sample of American adults analysed here, the present analyses nevertheless allow substantial external validity within the United States and support chronological prospective relationships between domain-specific life evaluation and later biological inflammation. One possible avenue of further exploration is to test whether temporary lab-induced changes in financial evaluation (e.g., Briers & Laporte, 2013) could lead to short-term changes in biomarkers of inflammation.

Researchers will no doubt continue to examine the fascinating question of what contributes to a good life. Going beyond the traditional focus on subjective ratings of overall life evaluation, the present research joins this large body of literature and provides the first comparison of whether domain-specific life evaluations would differentially predict wellness as reflected based on biological inflammation, suggesting that financial evaluation could be particularly important in this context.

COMPLIANCE WITH ETHICAL STANDARDS

As secondary data that is publicly available was used, the present study was exempted from review by the Singapore University of Social Sciences Institutional Review Board under the code APL-0195-2023-EXE-01. Informed consent was obtained from all participants by MIDUS.

SUPPORTING INFORMATION

Additional supporting information may be found online in the Supporting Information section at the end of the article.

Table S1. Correlation matrix for all key variables.

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