Homeostatically Protected Mood as a Source of Information for Self-Report Measures of Subjective Wellbeing: Research Proposal

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Aims and Objectives

The theory of subjective wellbeing homeostasis has recently emerged as an alternative to the dominant view of subjective wellbeing (SWB) as primarily a cognitive construct controlled by personality. A substantial body of evidence now supports the alternate position that SWB dominantly comprises Homeostatically Protected Mood (HPMood). Furthermore, preliminary evidence suggests that self-report measures of SWB automatically correlate with one another due to shared variance with HPMood. This could indicate that individuals use HPMood as a source of information, to facilitate heuristic processing of the personal, abstract, and non-specific evaluations required for measures of SWB; heuristics provide an alternative to effortful cognitive comparisons. This study investigates whether the covariances between General Life Satisfaction and the cognitive buffers of self-esteem, perceived control, and optimism are reduced after controlling for HPMood. Such findings would suggest that future research should control HPMood to enable meaningful interpretation of correlational SWB results.

Literature Review

Subjective Wellbeing

Subjective wellbeing (SWB) emerged in the 1970’s as an alternative to the economic growth view of quality of life that has dominated government policy in modern times (Land, Michalos, & Sirgy, 2012). Influential major studies by Andrews and Withey (1976), and Campbell, Converse, and Rodgers (1976), highlighted the importance of differentiating between subjective and objective measures, recognising that each represented different aspects of wellbeing. Confirmatory research has shown that objective measures are generally poor predictors of SWB (Kesebir & Diener, 2008), which is both highly stable over time at the population level, and is normally positive at the individual level (Cummins, 2016).

Early researchers attributed this stability to personality, which was considered to be both genetically determined (Block, 1981), and linked to SWB (Costa & McCrae, 1980). This view was refined by Headey and Wearing (1989) who observed that changes in SWB following significant life events, typically returned towards previous levels. Their proposal that individuals have a stable, adaptive, equilibrium level of SWB determined by personality, foreshadowed the idea that individuals have a genetically determined set-point (McGue, Bacon, & Lykken, 1993). A strong body of evidence now supports the stable and positive nature of SWB. For example, in a study that combined 16 estimates of life satisfaction from six Western countries, Cummins (1995) reported a narrow normative range of SWB at the population level between 70–80 percentage points; this has been subsequently supported by a major study involving 32 surveys over 14 years which reported population means between 73.2 to 76.4 percentage points, with only 4% of total reported individual scores falling below the positive 50 percentage point range (Capic et al., 2015).

While the stability of SWB is widely supported, the relative contribution of the different elements to SWB remains contentious (Cummins, 2016). The affective view suggests that the evaluation of positive affect and negative affect shapes the experience of an individual's life to form the basis of SWB (Watson & Tellegen, 1985). This contrasts with the cognitive view that an individual's life evaluations produce discrepancies which result in net satisfaction and regulate SWB (Michalos, 1985). The cognitive-affective view, which combines these approaches, considers SWB as primarily a cognitive construct, with separable affective, life satisfaction and domain specific elements, based on the underlying assumption that trait-positive mood derives from personality (Diener, Scollon, & Lucas, 2004). The majority of current SWB research is based on this cognitive-affective approach (e.g. Oishi & Diener, 2001; Durayappah, 2011), despite evidence that suggests a large proportion of the variance in SWB is actually dominated by mood (e.g. Davern, Cummins, & Stokes, 2007).

Theory of SWB Homeostasis

The theory of SWB homeostasis proposed by Cummins (2010), offers an alternative consistent with this evidence. It suggests that SWB is maintained by underlying mechanisms analogous to the homeostatic systems that manage physiological states, such as body temperature. Central to this theory is Homeostatically Protected Mood (HPMood), which is conceptualised as a stable, genetically endowed, positive, and underlying mood that operates within a normal, individually determined, set-point range (Cummins 2010). When an individual is faced with challenges, SWB may move outside of the set-point range, but HPMood remains unaffected. Homeostatic stabilizing forces are then activated, which work to restore SWB to its normal range using a system of behaviours, adaptation, and cognitive buffers including self-esteem, perceived control, and optimism (Cummins & Wooden, 2014). These deeply embedded and biologically determined processes are considered to provide the stability in SWB, in the most abstract, non-specific, and highly personalised sense (Cummins, 2010).

This theory is supported by a growing body of evidence. It has been demonstrated that individual SWB set-points normally range between 70-90 percentage points (Cummins, Li, Wooden, & Stokes, 2014); and in normal conditions, SWB is dominated by mood rather than cognition, with personality providing little additional contribution to the variance in SWB after controlling for mood (Davern, Cummins, & Stokes, 2007; Blore, Stokes, Mellor, Firth, & Cummins, 2011; Tomyn & Cummins, 2011). It has also been argued that the abstract, non-specific, and highly personalised background affect of HPMood explains the correlation between personality and SWB (Cummins, 2011), and is involved in the widespread correlation reported between measures of SWB (Cummins & Wooden, 2014). It was Meehl who argued that everything in self-report psychology correlates with everything else, due to obscure causal influences which he called the “crud factor” (1990, p. 204). This seems consistent with the conceptualisation of HPMood as a pervasive background influence, which also seems consistent with the idea that non-specific mood may infuse judgements to inform decision-making (Forgas, 1995).

HPMood as Information for Heuristics

While most people believe they use rational thought processes to make evaluations, they are actually cognitive misers who avoid effortful comparisons where possible (Fiske & Taylor, 1991). People use heuristics, or cognitive shortcuts, to simplify complex judgemental processes, based on the ease with which information comes to mind rather than accuracy (Tversky & Kahneman, 1973). An example is current mood, which is commonly used to inform judgments (Blaney, 1986; Schwarz & Strack, 1991). This type of processing is most likely to be employed for complex evaluations that have no personal consequences (Branscombe & Cohen, 1991), and where no prior evaluations or strong motivational goals are available to help determine the outcome (Forgas, 1995).

For example, when considering SWB, this type of processing is likely to occur for self-report judgements such as General Life Satisfaction (GLS), which is typically measured with a question like: “How do you feel about your life as a whole?” (Andrews & Withey, 1976, p. 66). Many people will not have explicit information available to answer this novel, abstract, non-specific and personally relevant question, and with responses usually treated as confidential, there is little likelihood of personal consequences. So rather than performing the complex integration of multiple aspects of life that would be required to process this question cognitively (Diener, Scollon, Oishi, Dzokoto and Suh, 2000), people are likely to use HPMood as a heuristic (Cummins, 2011).

If HPMood is used to inform all abstract and personally relevant SWB responses, the measures will automatically correlate (Cummins & Wooden, 2014). This has been supported by initial evidence that showed GLS correlations with self-esteem, optimism and control all reduced after controlling for HPMood (Lai & Cummins, 2013). This highlights the importance of controlling for the effects of mood, an issue identified by Diener, Sandvik, Pavot, and Gallagher (1991) more than two decades ago. However, under the cognitive-affective model of SWB, the role of affect is typically conceptualised in relation to powerful events and emotions (e.g. Diener, Scollon, & Lucas, 2004; Durayappah, 2011). While these foreground emotions drive our highly variable, conscious experience of affect (Cummins & Wooden, 2014), it appears that when no other salient information is available, the subtle, but continuously accessible HPMood dominates our judgements of SWB.

In summary, the theory of SWB homeostasis challenges the cognitive-affective view that SWB is primarily a cognitive construct controlled by personality. Instead, there is now a substantial body of evidence to support the position that SWB mainly comprises HPMood. With initial evidence suggesting that self-report measures of SWB automatically correlate with one another due to shared covariance with HPMood, it appears that individuals use HPMood as a heuristic to avoid the effortful cognitive comparisons required for non-specific, complex, and personal SWB evaluations. The next step is to investigate the correlations between SWB variables after controlling for HPMood.

Hypotheses

Therefore, this study explores the relationships between GLS, HPMood, and the cognitive buffers of self-esteem, perceived control, and optimism. It is hypothesised that:

1. In a sample from the general population, these variables will all approximate the homeostatic set-point range.

Rationale. The general, abstract and personal nature of the questions for each measure will facilitate common heuristic processing using HPMood as information, and will therefore approximate the level of HPMood.

2. After controlling for HPMood, any unique covariances between the cognitive buffers and GLS will be reduced.

Rationale. Prior to controlling for HPMood, unique covariances between the cognitive buffers and GLS will be saturated with HPMood. Controlling for HPMood will convert this into shared variance.

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