The Impact of Wealth on Subjective Well-Being: 
A Comparison of Three Welfare-State Regimes

This study provides new insight on subjective well-being (hereafter SWB) and its association with individuals' objective economic standing. In particular, we are interested in how one's relative position in the distribution of wealth influences his or her general satisfaction with life (hereafter GLS), representing the cognitive and most stable dimension of SWB. Most studies on the relationship between economic standing and SWB have used income as an indicator of economic standing. Yet, income seems to account for only a small part of the variation in SWB (e.g., Diener, Sandvik, Seidlitz & Diener 1993). In addition, income is restricted to a certain time interval (income per week, per month, or per year) and, to periods of labor market activity. Recent studies thus argue that other measures of economic standing such as socioeconomic status, deprivation, and wealth might be more useful for understanding its relationship with SWB (e.g., Christoph 2010). Wealth is a stock graph accumulated throughout a person's life course. Additionally, in contrast to earned income, which requires time, effort, and working ability, wealth offers access to capital and goods independent of individual investment and ability, for example, through intergenerational transfers (Elmelech 2008). Wealth may also be a better indicator of an individual's long-term consumption potential (Spilerman 2000). Considering the unique properties of wealth, we see it fit to measure the consequences of economic standing to SWB, over and above the consequences income may have on it.

A second contribution of this study is the focus it places on macro-level factors, and specifically, state-level welfare systems. The relevance of the welfare-state system to the relation between wealth and SWB is best explained through the concept of decommodification, referring to the extent to which citizens in a country are economically independent from the market through the provision of social benefits. These benefits can be understood as a cushion against the consequences of shortage of financial resources (Puck & Radcliff 2008). Because the extent to which these benefits are provided by the welfare-state strongly differs between the three regimes, we predict that the association between wealth and SWB will also differ.

Linking wealth to SWB:
Needs theory

Needs theory defines the relations between economic standing and SWB through the function of economic standing and mostly income, in providing individuals' needs (Diener & Biswas-Diener 2002). In general, needs theory assumes that individual income, as a principal indicator of economic standing, augments individual SWB primarily because income enables people to better provide for their needs. The main premise of needs theory is that low income implies a disadvantage in SWB while high income leads only to a small advantage (Maslow 1943, 1954), if any (Veenhoven & Ouwe­neel 1995; Veenhoven 1993). Importantly, in this study we move away from the typical understanding of economic standing as represented by income, and investigate a different form of economic well-being namely, wealth.

In order to test for the empirical validity of the needs-based mechanism our models not only control for the position of the respondents in the wealth distribution. They additionally include a subjective measure for economic hardship - that is, individuals' self-reported responses about having "problems to make ends meet." If the relevant mechanism behind the relation of wealth with SWB is the fulfillment of basic needs, then we would expect subjective economic hardship to mediate the supposed negative effect of being poor on SWB.

The comparative setting:
Do different contexts imply differences in the wealth-SWB relation?

One important aim of our study is to investigate the contribution of the welfare-state system, operationalized through the concept of decommodification, to the wealth-SWB relation. Decommodification determines whether personal wealth is necessary for individuals in order to maintain their SWB or not, and what is the level of wealth required to do so. Given our focus on the relation between wealth and SWB among aging individuals who are either close to retirement or already retired, we demonstrate the workings of decommodification referring to state pension systems. State pension systems intervene in individuals' saving behavior by taking over the task of old-age provision through mandatory saving. Moreover, the level of minimum pension benefits provided is likely to affect the intensity of the wealth SWB relation among those individuals who did not have the possibility to choose how much they are willing to save namely, the poor.

In order to put these predictions to an empirical test we compare three countries, each representing a different welfare-state system complying with a different regime type, specified in Esping-Andersen's typology (1990, 1999). The social-democratic welfare-state represented in our study by Sweden, secures its citizens the highest level of decommodification, with relatively generous public pensions (OECD 2011a). The relative minimum pension benefits as percentage of average earnings have been at 25% in 2008 (OECD, 2011a). In Sweden therefore, persons are less dependent on their income for old-age provision. Under such conditions, the wealth-SWB relation is predicted to be comparatively weak. In the liberal model, represented in this study by Israel, the general decommodification level is low and accordingly, public pensions are relatively prudent. Old-age allowance in Israel, which is universally distributed, is insufficient even for a minimal living standard (Dagan-Busaglo 2007), with minimum pension benefits at a level of 13% of average earnings in 2008 (OECD 2011b). Under these conditions wealth is expected to be a necessary instrument to secure SWB in old age and the wealth-SWB relation is therefore expected to be rather strong. In the conservative welfare-state, represented in our study by Germany, the level of decommodification is intermediate. The German system does not have a general minimum retirement pension. However, individuals without mandatory and personal savings are eligible for basic social security in retirement, which equals the standard rate of the basic support for employmentseekers (Hartz 4) that was 21% of average earnings in 2008 (OECD 2011b). The conservative model thus suggests a relation of medium strength between wealth and SWB. From our theoretical considerations, we derive the following hypotheses:

H1: Income and wealth together account for the variance in GLS better than does income alone.

H2: Individuals of poor wealth have lower GLS than those in the middle of the wealth distribution. The wealthy group...
has only slightly higher, or the same, GLS than does the middle group.

H3: The negative effect of poor wealth on GLS is strongest in Israel. It will be weaker in Germany, and similar or slightly weaker in Sweden.

H4: The negative effect of poor wealth on GLS is mediated by individuals’ subjective feelings about their respective economic hardship.

Data, Variables, Hypotheses & Methods

For our empirical analyses we make use of the Survey of Health, Ageing and Retirement in Europe (SHARE) that is an international, representative panel study of the population aged 50 years and over. Observing individuals aged 50 or more, we analyse the consequences of differential wealth levels, measured as household gross wealth on their GLS. In order to account for the socio-economic and socio-demographic factors that affect GLS, we apply a linear regression model (OLS regression) with the Huber-White Sandwich estimator for cluster sampling (individuals clustered in households) that provides robust standard error estimates. The analyses are carried out separately for each of the three countries.

General life satisfaction was measured using an 11-point single item scale which we standardized to have a mean of zero and a standard deviation of one to enable international comparison. Consequently, a one-unit change in one of the independent variables results in a change in GLS of one standard deviation. Income and wealth are measured on the household level and presented in Euro, adjusted for purchasing power parity. We operationalize income as total net annual income, divided by the root of the number of persons living in a household. Wealth was measured by positive (gross) wealth, while controlling for household debt (negative wealth).

Following our theoretical considerations, the effect of wealth on SWB is expected to differ depending on an individual’s, respectively a household’s position in a country’s wealth distribution. We account for three main positions: The two middle quartiles represent the middle category hereinafter, “middle wealth” or the “middle group”), which serves as the reference category. Those in the highest quartile are hereinafter referred to as the “wealthy” or as being of “high wealth.” Those in the lowest quartile are hereinafter referred to as the „poor“ or as „being of poor wealth“.

Subjective economic hardship is captured by respondents’ self-evaluation of their ability to “make ends meet” in their household. Originally, responses range from 1 (“with great difficulty”) to 4 (“easily”). We combined the responses of 1 and 2 to create a dummy variable representing people with economic hardship. Following previous research (Diener, Suh, Lucas, & Smith 1999), we control for family characteristics (marital status and children); immigrant status (in Israel, we also control for Arab origin due to the unique position of this minority in the Israeli stratification system); and health.

Results

Descriptive results

Graph 1 shows the mean values of GLS by country and wealth group. The predictors were weighted (calibrated cross sectional weights) in order to reduce problems of unit non-response and sample attrition (Mannheim Research Institute for the Economics of Aging 2010: 43). As can be seen, the Swedish respondents report the highest mean values of GLS, while Israelis report the lowest. Mean (in blue) and median (in orange) levels of household wealth are illustrated in Graph 2. It is highest in Israel, lower in Sweden, and lowest in Germany. Country differences in mean GLS and average household wealth are statistically significant at the 0.01 level. Graph 3 illustrates mean and median debts. Compared with the Israeli and German respondents, the Swedish respondents are the most indebted. In Germany and Israel, the median value is 0, suggesting that 50% of German and Israeli respondents are not in debt at all. Here too, mean differences were statistically significant at the 0.01 level.

Graph 4 below further indicates that over half of the respondents in Israel report problems making ends meet. This statistic increases to almost 75% among poor Israelis, and decreases to about 22% among wealthy Israelis reporting to possess gross wealth between €575,000 and €7,670,000. Considering that the poor in Germany possess the lowest mean gross wealth, and that the wealthy in Israel possess the highest mean gross wealth (see Graph 1 above) this finding is particularly interesting.

Table 1 shows the results of our multivariate regression models. For reasons of clarity we only report those measures and coefficients that are relevant for the hypotheses. The first hypothesis states that wealth and income together should account for the GLS of the respondents better than does income alone. The findings (Model 2) indeed show that controlling for income, wealth has an impact on GLS in Germany and Israel, with
the poor reporting lower GLS than households in the middle of the wealth distribution and the rich reporting higher GLS. Debt is significantly associated with SWB only among the Israeli respondents, where debt is found to slightly decrease their GLS. The R$^2$ of Models 1 and 2 indicate that income and wealth, when taken together, explain a greater part of the variance in SWB than does income alone. The increase in R$^2$ is significant at the one per cent level in Germany and at the five per cent level in Israel (F-test). Hypothesis 1 is thus supported by our analysis for Germany and Israel.

In Model 2 we further test hypothesis 2, which following the needs theory predicts that the gap in SWB between the middle group and the poor will be greater than the gap between the middle group and the wealthy. The regression model conveys that in both Germany and Israel, the poor penalty and the wealth premium are similar in magnitude. In Sweden, the GLS of both the poor and the wealthy are not significantly different from the GLS of their middle wealth counterparts. Hypothesis 2 is thus not supported by the SHARE data.

Hypothesis 3, proposes that the negative effect of being of poor wealth on GLS will be strongest in Israel, and weaker in Germany and Sweden. The findings in Model 2 indicate that in Sweden individuals of poor wealth do not differ significantly in their GLS compared with individuals in the middle of the wealth distribution. Regarding the size of the poor effects on GLS in Germany and Israel, interaction based coefficients provide some evidence that being poor is more detrimental for GLS in Israel than in Germany. However, this difference is not statistically significant. Hypothesis 3 is thus not supported by the data.

Model 3 finally tests hypothesis 4, which suggests that the effect of poor wealth on GLS will be mediated by an individual’s subjective sense of economic hardship. The findings presented in Model 3 indicate that respondents who report having problems making ends meet are significantly less satisfied with their life compared to those who do not have problems. Furthermore, Model 3 demonstrates that the poor penalty we found in Germany and in Israel diminishes after this subjective measure of economic hardship is introduced. In Germany, the remaining effect is no longer statistically significant implying full mediation, but in Israel it remains significant, implying only partial mediation. Therefore, hypothesis 4 is supported by the data for Germany, but only partially supported by the data for Israel.

<table>
<thead>
<tr>
<th>Table 1</th>
<th>OLS regression predicting general life satisfaction</th>
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<tr>
<td></td>
<td>M1: only income</td>
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<tr>
<td></td>
<td>DE</td>
</tr>
<tr>
<td>Log(Income)</td>
<td>0.07 **</td>
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<tr>
<td>Log(Debts)</td>
<td>0.00</td>
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<tr>
<td>Poor</td>
<td>-0.11 *</td>
</tr>
<tr>
<td>Rich</td>
<td>-0.46 ***</td>
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<td>Df</td>
<td>12</td>
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<tr>
<td>R²</td>
<td>0.207</td>
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<tr>
<td>N</td>
<td>2,390</td>
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</tbody>
</table>

*We controlled for gender, household size, age, migrant status, Arab origin (IL), married, child, education, employed, unemployed, homemaker and health. All analyses based on 5 sets of imputations (using the ‘mim’-prefix command in Stata 12). See Hochman & Skopek (2013) for full models and details.

* p<0.05, ** p<0.01, *** p<0.001.

Database: SHARE Wave 2, release 2.5.0, own calculations, data unweighted.
Conclusions

Needs theory claims that wealth augments SWB by enabling a person to better provide for his or her basic needs, economic and/or recreational. This proposition implies that the poor will most likely enjoy a lower level of SWB compared to the middle wealth group, while the wealthy will differ from the middle wealth group only slightly, if at all. Our findings show that net of income, gross household wealth has a significant impact on SWB, measured as GLS, in Germany and Israel. More specifically, we find a poor penalty and a rich premium on GLS in these two countries. Against the predictions of needs theory the two coefficients do not differ in magnitude, suggesting that wealth can buy happiness. In Sweden, neither the poor nor the wealthy differ significantly in their SWB from the middle wealth group.

Our study contributes to the contemporary literature on SWB by demonstrating that: 1) the SWB of individuals aged 50 or older, is strongly associated with wealth, representing an important source for economic standing, in Germany and Israel, yet, not in Sweden; 2) needs are the predominant mechanism linking economic standing to SWB in Germany, and they also partially explain the wealth-SWB relations in Israel; and 3) the degree of social support provided by the state has an impact on the magnitude of the association between wealth and SWB. Our study might thus serve as a fertile ground for the on-going debate on whether and how welfare policy instruments can improve a population’s SWB.


2 Although this paper is centered on needs theory and its contribution to an understanding of the individual-level relation between wealth and SWB, it is important to note that there are two alternative explanations to the wealth-SWB nexus: the relative standards approach and the cultural norms concept. Relative standards theorists would argue that individuals evaluate their current SWB by comparing it with either their SWB in the past or to the current SWB of relevant others (Easterlin 2001; Michalos 1985). Cultural norms are suggested to serve as a mediating factor in the association between income and SWB. The strength of this association depends on the cultural importance of income (e.g. Diener et al. 1999).

3 The original question was: “On a scale from 0 to 10, how satisfied are you with your job?”

Börsch-Supan, Axel; Brugiavini, Agar; Jürges, Hendrik; Mackenbach, Johan; Siegrist, Johannes; Weber, Guglielmo (Eds.), 2005: Health, ageing and retirement in Europe: First Results from the Survey of Health, Ageing and Retirement in Europe. Mannheim: MEA.


Abwärtsmobilität beim Haushaltseinkommen ohne langfristigen Einfluss auf die Lebenszufriedenheit


Die nachfolgend vorgestellte Analyse beschäftigt sich mit zwei Fragestellungen:

- Wie verändert sich die Lebenszufriedenheit bei Abwärtsmobilität in der relativen Einkommensposition?
- Lassen sich Unterschiede in der Abfolge von Geburtskohorten finden?


Abstieg zumeist nur um ein Einkommensquintil

Der ökonomische Abstieg eines Haushalts kann als Verlust einer vom Menschen wert-