# 1 Introduction

In his path-breaking book “Capital in the Twenty-First Century”, Piketty (2014) recites Balzac’s novel *Le Père Goriot* and its penniless main character Eugéne de Rastignac, who is pondering how to become affluent. His shady companion Vautrin explains unmistakably that hard work is not paying off and marrying rich is the key. While this anecdote mirrors the social relations in the early nineteenth century in France, the quantitative importance of inherited wealth to the accumulation of life-cycle wealth has also been intensively discussed in past decades (Kotlikoff and Summers, 1981; Modigliani, 1988; Kotlikoff, 1988; Kessler and Masson, 1989; Gale and Scholz, 1994; Piketty et al., 2014). In essence, the question is whether bequests or self-made income facilitate social advancement to the top in the wealth distribution.

In modern western societies the opinion prevails that the willingness to work hard paves the way for material well-being and upward social mobility. In contrast, the role of inter vivos gifts and bequests for wealth accumulation is a controversial topic in the political discourse and also in social sciences. Empirical evidence shows that limited social mobility is strongly connected to wealth transfers between generations and there is a manifest nexus between social mobility and actual economic inequality (Corak, 2013; Clark and Cummins, 2015). This line of argument concludes that current inequalities in income and wealth transform into unequal intergenerational wealth transfers and consequently lead to constrained social mobility. In the same vein, recent research shows that inheritances add a substantial source of wealth heterogeneity among households even with similar lifetime earnings (De Nardi and Yang, 2014). However, there is also recent evidence from Scandinavian countries, which suggests that inheritances might reduce overall wealth inequality, although absolute values of inherited wealth are strongly correlated with pre-bequest wealth of heirs. This is due to the greater relative importance of bequests in lower parts of the distribution (Adermon et al., 2015; Elinder et al., 2015; Boserup et al., forthcoming 2016).

The role of wealth transfers becomes all the more important given the substantial rise in wealth concentration over the last decades (Piketty and Zucman, 2014; Saez and Zucman, 2016). Rising wealth inequality appears to correspond with imbalances of economic power, social privileges and influences on political decision processes to maintain social inequalities (Rehm and Schnetzer, 2015). Thus, the link between a skewed distribution of intergenerational wealth transfers and wealth concentration may entail considerable disparities in social, economic and political opportunities. The literature provides inconclusive results whether earnings or inheritances have a greater effect on wealth inequality since it varies from country to country (Semyonov and Lewin-Epstein, 2013; Arrondel et al., 2014). A closer look on the Eurozone countries shows that dispersion in bequests and inter vivos transfers have a stronger impact on wealth inequality than income differences (Leitner, 2016). Thus, the contributions to wealth accumulation from bequests or earnings is decisive for social cohesion and perceptions of fairness.

Households mainly acquire wealth from two sources: earned income (wages and earnings from self-employment) and inheritances (Gale and Scholz, 1994; Piketty et al., 2014). Both income
channels allow for an increase in the relative wealth position conditional on the size of either component and the underlying circumstances of wealth accumulation. The former condition is trivial in its nature but subject to a number of constraints which may influence the magnitude of the contribution to net worth. These circumstances include a variety of socio-economic parameters, reaching from the arrangement of tax and welfare systems to cultural aspects shaping consumption and savings patterns (Fessler and Schürz, 2015). In addition to this aspect, earnings uncertainty may also have a significant impact upon the savings pattern over the lifecycle (Irvine and Wang, 2001).

Analyzing transfer wealth entails the challenge of conceptually defining transfers versus self-made wealth, which also caused a lively debate between Kotlikoff (1988) and Modigliani (1988). There is no consensus on whether returns to inherited wealth are counted as transfer wealth or as life-cycle wealth. In addition, inheritances and inter vivos gifts normally do not cover implicit gifts like appointing an offspring as an equal partner in a lucrative family business or paying the costs for college education. Moreover, meeting the costs of food and clothing for dependents is not considered a gift but as provisioning for the family.

In this paper, we pursue an econometric approach to assess the relative role of bequests and income for private household wealth. With harmonized survey data, we calculate cross-country estimates for the impact of inheritances on the likelihood of being at the top of the Eurozone wealth distribution. Similar calculations have been carried out by Fessler and Schürz (2015), however, merely by means of OLS estimations. We extend existing research using quantile regressions to calculate non-linear elasticities between the distribution of earned income (wages and earnings from self-employment) and inheritances, and the distribution of net household wealth. Section 2 therefore provides our methodological approach of multivariate quantile regressions. In section 3, we describe the survey data and address considerations concerning cross-country comparability of wealth data. We then present the results in section 4. First, we show how country shares in the Eurozone top wealth percentiles are associated with the receipt of bequests. Thereafter, the results of the quantile regressions allow to compare the influence of income versus inheritances on climbing in the net wealth distribution. Finally, section 5 draws some concluding remarks.

2 Methodological Approach: Quantile Regression

Linear regressions are useful to gain first insights into the data and the relationships between variables. Especially with wealth and income data these are, however, only rough approximations to the truth. This is due to the fact that the conditional mean is a bad approximation for very skewed distributions such as for wealth and income. One method commonly applied to model such responses is quantile regression, which was originally used as a robust method of estimation when the normality assumption was not strictly satisfied. This will especially be the case if unobservable constituents (Koenker and Bassett, 1978) influence the conditional distribution of the variable regressed on. In wealth regressions, this can be considered a severe problem, since the