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individual performance?**

**The determinants of high
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Dierk Hirschel*

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Summary

In neoclassical economic theory the level of individual income is predominantly determined by individual job performance. Thus high incomes reflect the high marginal productivity of labour of the affluent working population. While the scientific research of poverty has a long tradition, nearly nothing is known about the rich. This study tries to diminish this research gap by investigating the structure of high labour incomes in Germany. By revealing the determinants of high incomes by descriptive and paneconometric analyses mit Daten des Sozio-ökonomischen Panels, we want to answer the question if high incomes are especially the result of individual job performance or rather the result of social selection through social background or sexual discrimination.

Theme: Welfare, income distribution and poverty

JEL: J30, J31J41, J71

Keywords: *High incomes, social background, discrimination, human capital, job performance, GSOEP, theory of justice.*

Zusammenfassung

In der neoklassischen ökonomischen Theorie wird das individuelle Einkommen durch die individuelle Job-Performanz bestimmt. Somit reflektiert ein hohes Einkommen eine hohe marginale Arbeitsproduktivität der reichen Arbeitenden. Während die wissenschaftliche Forschung zur Armut eine lange Tradition hat, ist nur sehr wenig über Reiche bekannt. Mit dieser Studie wollen wir diese Forschungslücke verkleinern, indem wir die Struktur hoher Arbeitseinkommen in Deutschland untersuchen. Durch die Quantifizierung der Determinanten hoher Einkommen mit deskriptiven und panelökonometrischen Methoden mit Daten des Sozio-ökonomischen Panels wollen wir die Frage beantworten, ob hohe Einkommen vor allem das Resultat individueller Job-Performanz oder eher das Resultat sozialer Selektion mit dem sozialen Hintergrund oder geschlechtsspezifischen Diskriminierung ist.

Thema: Wohlfahrt, Einkommensverteilung und Reichtum

JEL: J30, J31J41, J71

Schlagwörter: *Hohe Einkommen, Soziale Herkunft, Diskriminierung, Humankapital, Leistung, Sozio-ökonomisches Panel, Theorie der Gerechtigkeit*

Do high incomes reflect individual performance? The determinants of high incomes in Germany

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Do high incomes reflect individual performance? The determinants of high incomes in Germany

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1 Introduction

In neoclassical economic theory the level of individual income is predominantly determined by individual job performance. Thus high incomes reflect the high marginal productivity of labour of the affluent working population. Despite the popularity of the thesis, empirical evidence is scarce. While the scientific research of poverty has a long tradition, nearly nothing is known about the rich, although the research of high incomes is of central socio-political significance. The questions of the role and legitimacy of high incomes can only be answered, when we have empirical information about the amount and formation of high incomes. This study tries to close this research gap by investigating the structure of high labour incomes in Germany. By revealing the determinants of high incomes, we can make positive statements about the general direction: Are high incomes mainly the result of individual job performance or rather the result of social selection through social background or sexual discrimination? Furthermore the reasons of the financial success answer the question of its legitimacy. The paper is structured as follows:

In chapter 2 we link the debate about high incomes to the discussion about wealth, which has a long tradition in the history of economics. The theoretical foundations of the study are the economical and sociological theories of income determination. The different theories are well known amongst the scientific community. For that reason we go straight to the construction of the hypotheses in chapter 3. In chapter 4 we discuss some relevant methodological questions and present the database. The database is the German-Socioeconomic-Panel (GSOEP). By using this database we establish the determinants of high incomes and the structural differences between the determinants of high incomes and those of the remaining economically active population. For the econometric analysis we used a panel-econometric Probit-Model. In chapter 5 we show the empirical results of the descriptive and econometric analysis, concluding (chapter 6) with the discussion of these results in a political context.

2 High incomes in an interdisciplinary perspective

The scientific debate about high incomes is embedded into the socioeconomic discourse about wealth. This discourse can be traced back to the beginnings of the political economy of Adam Smith (1993) and David Ricardo (1953). These economists interpreted the accumulation of wealth as a central characteristic of capitalist societies. In Economics, research of wealth concentrates itself on the analyses of economic resources and the individual utility which emanates from these resources.

The resources income and wealth determine the opportunities of individual activity. In the centre of mainstream economic debate about wealth is the trade-off between distribution and economic growth. An unequal distribution of income and wealth sets the incentives for economic growth in the way that the individuals try to improve their socio-economic status. In that sense the recipients of high incomes are promoters of economic growth because their high saving ratio boosts investment and economic growth. On the other side the Keynesian Theory accentuates the dysfunctional effects of a high concentration of income and wealth on the business activity (cp. Kalecki 1933; Keynes 1936). The low consumer demand of the low and middle income recipients reduces the dynamic of economic growth. Microeconomics is concentrated on the determination of personal income and wealth.

From a sociological perspective wealth is not only based on economic resources. Dimensions like education, health, the family background and social networks are included. The sociological analysis of the genesis of individual wealth is concentrated on the transmission of economic, social and cultural capital (Bourdieu 1997).

Table 1: Legitimacy of economic inequality and high incomes

Theory of Justice	Legitimacy of Inequality	Implications for the determinants of high incomes ¹
Utilitarianism	Growth of total utility	Without significance
Liberalism	General effects of wealth, Fair uniform rules Social mobility	Individual determinants ² which represent the individual job performance
John Rawls	Fair uniform rules Equal uniform fundamental freedoms ³ , Rising position of wealth of the underclass if inequality grows; Social mobility	Individual determinants ² which represent the individual job performance
Marxism	no legitimacy of inequality produced by capitalist societies	Structural determinants ⁴ dominate in capitalist societies

¹ Which determinants dominate according to the particular theory of justice?

² Endowment with human capital, working time etc.

³ Fundamental freedoms are: Personal rights of freedom, political and civil rights

⁴ Sexual discrimination, class and Stratification-affiliation, social background etc.

From a philosophical point of view we ask for the legitimacy of wealth. Theories of social justice developed criteria for the legitimacy of high incomes and wealth. From the

great variety of theories of social justice we selected four theories which played a central role in the intellectual history of Europe: Utilitarianism, Liberalism, Rawls Theory of Justice and Marxism (Bentham 1992; Hajek 1981; Rawls 1979; Marx 1959).

The utilitarian and liberal (including Rawls) theories of justice legitimate high incomes if they are based on individual job performance. The liberal theories add equal opportunities as a necessary requirement (cp. Rawls 1979: 46). This implicates the domination of individual determinants (endowment with human capital, working time, etc.) in the genesis of high incomes. If this is not the case and structural factors like discrimination and social background explain the majority of the determination process of high incomes this outcome would undermine the legitimacy of high incomes in free market economies.

3 Determinants of high incomes

The theoretical explanation of the genesis of personal income is an object of economics, sociology and political science. We concentrate our study on labour income, which is the most important source of income of individuals and households. In the past economists developed different taxonomies to distinguish systematically between different theoretical approaches of the determination of labour income (cp. Wolff 1997; Hübler 1984). None of these proposals can fully satisfy (cp. Hübler 1984: 34). In our study we distinguish between individual and structural approaches. The individual approaches put the characteristics of the individual in the centre of their explanation of the genesis of labour income. These are the ability-theory, the well known human capital theory and the screening-approach. The block of structural theories includes discrimination theory, segmented labour markets, regional and inter-industrial wage differences and class- and stratification-theories integrating the family background. These theories explain the determination of labour income out of the policy of enterprises and of the social structure of society. The different theories are part of the common knowledge of labour economics and sociology and must not be explained in detail (cp. Ashenfelter/Layard 1986; Becker 1971, 1975; Dworschak 1986; Wolff 1997). We apply these theoretical approaches to the determination of high incomes and derivate 19 different hypotheses. These hypotheses have been constructed for the probability of receiving a high labour income.

3.1 Individual Determinants

As conventional in labour economics we used human capital as a proxy for individual job performance (cp. Mincer 1970; Becker 1975). The schooling model was fundamental for the empirical operationalization (cp. Mincer 1974). With consideration to the database we can generate the hypotheses one until three of table 2.

3.2 Structural Determinants

Discrimination theory focuses on citizenship, colour of the skin, age and sex as further reasons for differences in the level of incomes (cp. Becker 1971; Cain 1986; Wolff 1997; Rosenfeld 1990). In our study we concentrate on sex and citizenship. Different regions represent a different business environment and different advantages or disadvantages of agglomeration. In congested urban areas with a developed infrastructure and historical high economic growth the chances of receiving high incomes are higher than in rural areas (cp. Bade 1984; Franz 1996). The employment in

different industrial sectors implies different levels of incomes depending on the economic characteristics of the industrial sectors (cp. Dickens/Lang 1985; Galbraith/Calistri 1999; Haisken-DeNew/Schmid 1999). The same applies for firm size (cp. Abwod et. al. 1998; Schmid/Zimmermann 1991).

Table 2: Hypotheses for the determinants of high incomes

<i>Individual (meritocratic) determinants</i>		
(H1)	Human Capital	„The probability of receiving a high labour income, rises ceteris paribus (c.p.) with increasing duration of training“.
(H2)		„With increasing working experience c.p. the probability of receiving a high labour income grows“.
(H3)		„Increasing last job tenure rises c.p. the probability of receiving a high labour income“.
<i>Structural (non-meritocratic) determinants</i>		
(H4)	Discrimination	„Women have c.p. a lower probability of receiving a high labour income than men“.
(H5)		„The labour force without German citizenship has c.p. a lower probability of receiving a high income than German citizen“.
(H6)	Regional and Inter-industry Income differences	„The affiliation to a prospering metropolitan area increases c.p. the probability of receiving a high labour income“.
(H7)		„The probability of receiving a high labour income rises c.p. with the size of the firm“.
(H8)		„The affiliation to different industrial sectors characterized by high capital intensity, a high degree of monopoly, high profits and/or a dynamic economic growth rises c.p. the probability of receiving a high labour income.“
(H9)	Class- and Stratification-Theory	„The affiliation to one of the upper classes of society rises c.p. the probability of receiving a high labour income.“
(H10)		„The probability of receiving a high labour income rises c.p. with an occupational status which expresses a high endowment of human capital.“
(H11)	Family Background	„A high occupational status of the father rises c.p. the probability of a high level of educational attainment.“
(H12)		„A high school leaving certificate of the father rises c.p. the probability of a high level of educational attainment.“
(H13)		„A high level of professional training of the father rises c.p. the probability of a high level of educational attainment.“
(H14)		„A high occupational status of the father rises c.p. the probability of receiving a high labour income.“
(H15)		„A high school leaving certificate of the father rises c.p. the probability of receiving a high labour income.“
(H16)		„A high level of vocational training of the father rises c.p. the probability of receiving a high labour income.“
(H17)	Structure of household and marital status	„A high number of (employable) household members rises c.p. the probability of receiving a high labour income.“
(H18)		„A low number of children in the own household rises c.p. the probability of receiving a high labour income.“
(H19)		„Not married singles have c.p. the highest probability to receive a high labour income.“

Class-Theories classify society into different social groups which are characterized by their homogeneous position in the process of production, a comparable endowment with economical and cultural resources and as a consequence common chances of living and individual development (cp. Erikson/Goldthorpe 2002). The classification criteria of stratification-theories are the occupational prestige or the socio-economic status of individuals. The class-theory has a stronger economic and historical foundation (Geißler 1996: 70).

According to the influence of family background on high labour income we distinguish between direct and indirect effects (cp. Schnapp 1997). Indirect effects connect family background and labour income via the level of educational attainment: Because of restrictions of the database the father has to represent the family background. The direct effects between family background and high individual labour income are interpreted as intergenerational transmission of social and cultural capital via social networks (cp. Bourdieu 1997). The structure of the household determines via selection of working time and labour mobility the level of labour income. The same applies for marital status.

4 Methodological Aspects

Before we start with the presentation of the empirical results we have to clarify some methodical questions about the concept of income, the threshold of high incomes, the data base and the applied econometric methods.

The concept of income

There is a great diversity in the interpretation of income. For our study we used the concept of individual gross labour income. The individual gross labour income is the most important income source for the majority of individuals. It defines the income which is obtained by employees and self-employed on the labour market. Taxes and social contributions are included. Additional monthly wages, gratifications and bonuses are as well included. In our study we took the time period of one month.

The threshold of high incomes

The definition of high incomes demands the setting of a specific threshold. In general we distinguish between absolute and relative measures of wealth. Because of the low representation of high incomes in our database we did not use an absolute measure like the million. We would not have got a representative sample. Thus we took the relative measure of the 200%-threshold in our study. Depending on this threshold, we call an individual rich, when she or he earns more than 200% of the average income of the whole working population we analyze.

The database and sample selection

The analysis of high incomes requires an adequate data base which got the necessary information about incomes as well as information about the socio-economic background. The data base we used for our study is the German Socio-Economic-Panel (GSOEP). Compared to alternative German data bases it has the most extensive accumulation of the socio-economic information. This compensates the disadvantage of the low representation of high incomes in the sample. The GSOEP is a panel dataset from 1984 to the present consisting of some 13,500 individuals and roughly 7,000 households living in West and East Germany (since 1990) (cp. Hasiken-DeNew et al.

2001). The representative sample of households and individuals is repeated annually. All adult persons in a household aged 16 years and older are surveyed. The central issues of the panel dataset are the structure of households, labour participation, labour mobility, income trends, living conditions, regional mobility, education and training, health, socioeconomic status etc. In our study we analyzed the period from 1986 to 1999. We selected the active population from the age of 16 to 65. We only selected full-time employees.

Econometric Methods

To analyse the determinants of high incomes we used a panel-econometric Probit-Model. The binary dependent variable in that model is the variable “rich”, which represents the status of being rich or not being rich. The Probit-Model assumes a normal distribution for the critical value. The Probit-Estimation is based on a latent model for the observable status (rich/not rich). The not observable variable (y^*) determines the value of the variable which has to be explained (y). If the not observable variable exceeds a certain threshold the observable variable gets the value one. If not it gets the value zero. The not observable variable (y^*) depends on the independent variables and a additive stochastic error term.

$$y_i^* = x_i \mathbf{b} + \mathbf{e}_i \quad (1)$$

$$y_i = \begin{cases} 1 & \text{if } y_i^* > a \\ 0 & \text{else} \end{cases}$$

The Probit-Model calculates the probability of the occurrence of a certain status (rich/not rich) as follows (McFadden 1974):

$$p_i = \int_{-\infty}^z \frac{1}{\sqrt{2\pi}} \exp\{-0.5 u^2\} du \quad (2)$$

, whereas:

$$z = \mathbf{b}_0 + \mathbf{b}_1 x_1 + \dots + \mathbf{b}_K x_K$$

The coefficients are represented by β_K , the independent variables by x_K . For the estimation of the model we used the Maximum-Likelihood-Method. The significance of the model can be verified with a Likelihood-Ratio-Test. The goodness of the fit can be calculated with the McFadden Pseudo R^2 . The longitudinal construction of our database allows us to control for unobserved individual heterogeneity (cp. Greene 1997: 615). To do this we have to transform the Probit-Model into a panel structure. In our study we estimated a Random Effects Model¹:

$$y_{it} = \mathbf{a} + x_{it} \mathbf{b} + \mathbf{e}_{it} \quad \mathbf{e}_{it} = u_i + \mathbf{h}_{it} \quad (3)$$

In the Random Effects Model u_i is specified as a group specific stochastic error term. The parameter u_i is a random distribution of observations. The individual effects are

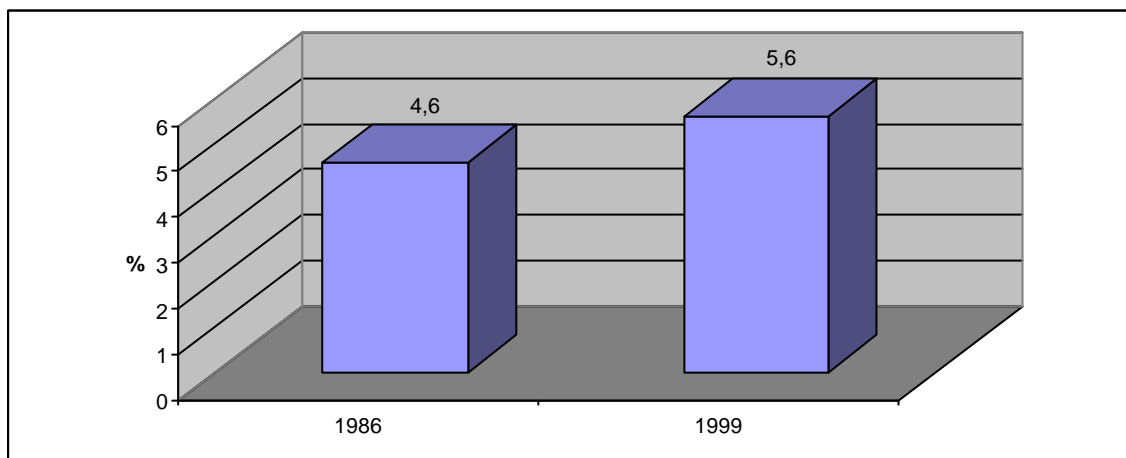
¹ We could not estimate a fixed effect model cause of the high number of time invariant variables.

assumed as not correlated with other independent variables. For the panel-econometric Probit-Modell we use equation 3 to calculate the non observable variable.

5 Empirical results

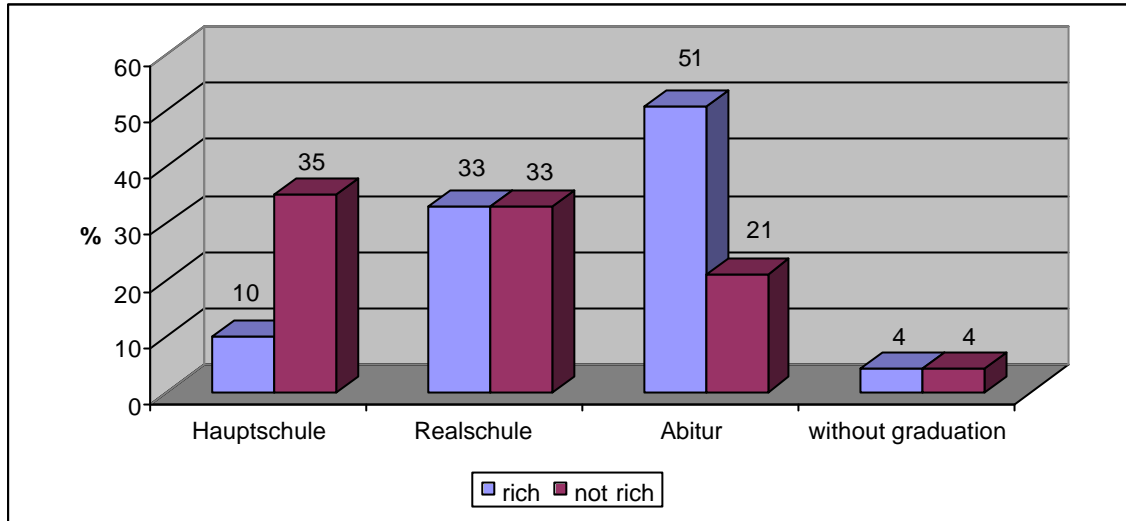
Before we start with the econometric analysis of the determinants of high labour incomes we present some selected descriptive information about the sample. The number of rich employees and self-employed earning more than 200% of the mean income of the full time working population increased in the observation period.

Figure 1: Percentage of the rich (200% threshold)



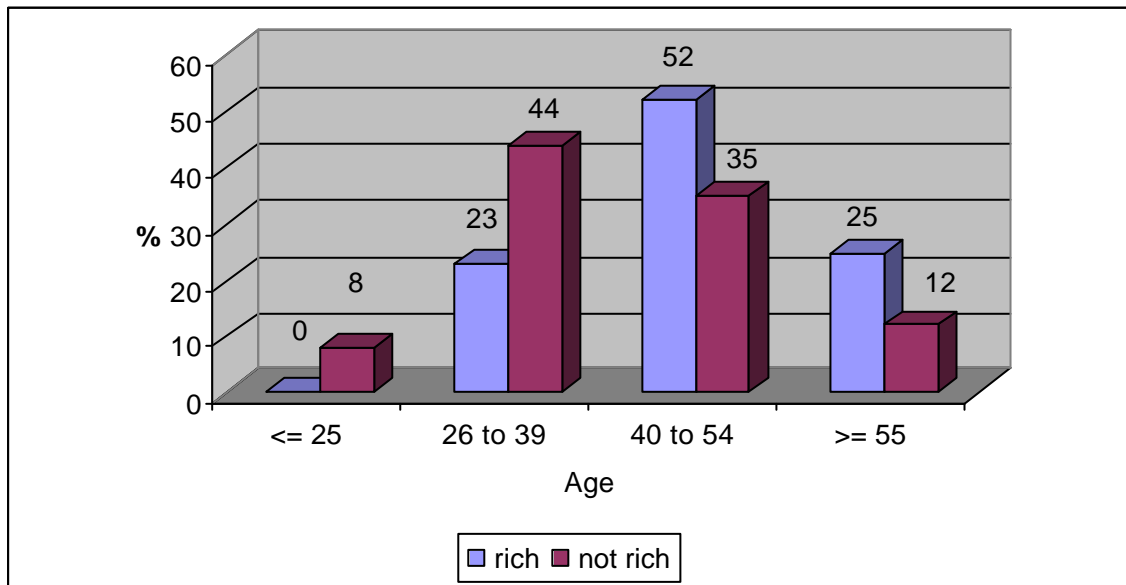
Source: GESOP, waves C (1986) and P(1999), weighted, own calculations

First of all we look at the individual characteristics. As expected employees and self employed with high incomes have a better formal educational attainment compared to the rest of the observed working population. The quota of high school diplomas (Abitur) along rich working population is around 50%.

Figure 2: School leaving certificates, rich – not rich, 1999

Source: GESOP, waves C (1986) and P (1999), weighted, own calculations

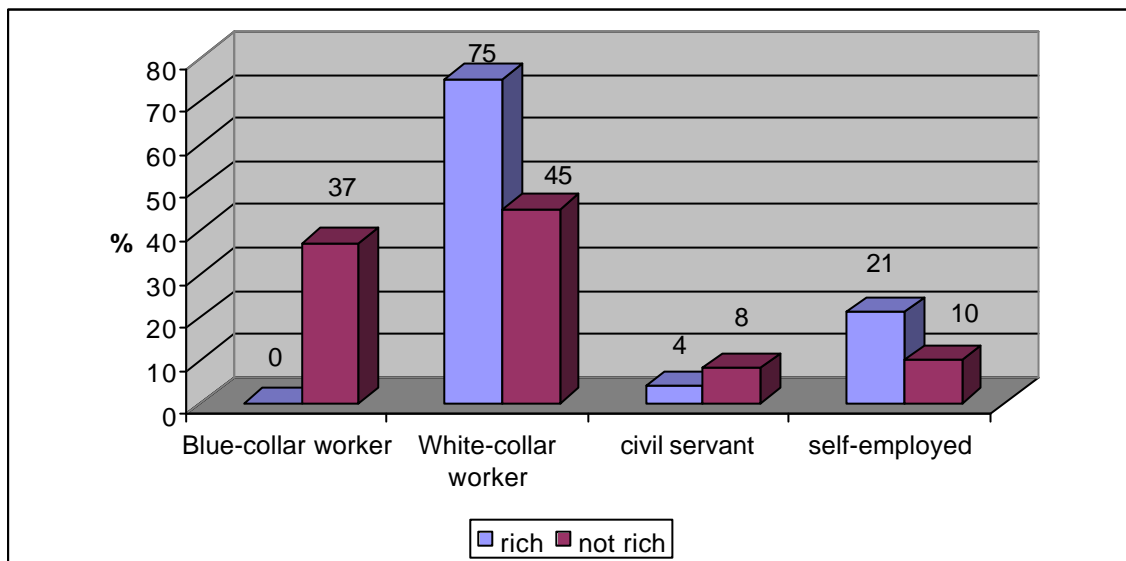
We get a similar picture for vocational training and working experience. Rich employees and self-employed have a better vocational training and more working experience compared to the reference group (cp. table 3). The age structure of the rich differs significantly from the age structure of the rest of the working population. The rich are predominantly in their 40ties and 50ties. Rich employees and self-employed work more than the reference group without high incomes.

Figure 3: The age structure, rich - not rich, 1999

Source: GESOP, waves C (1986) and P (1999), weighted, own calculations

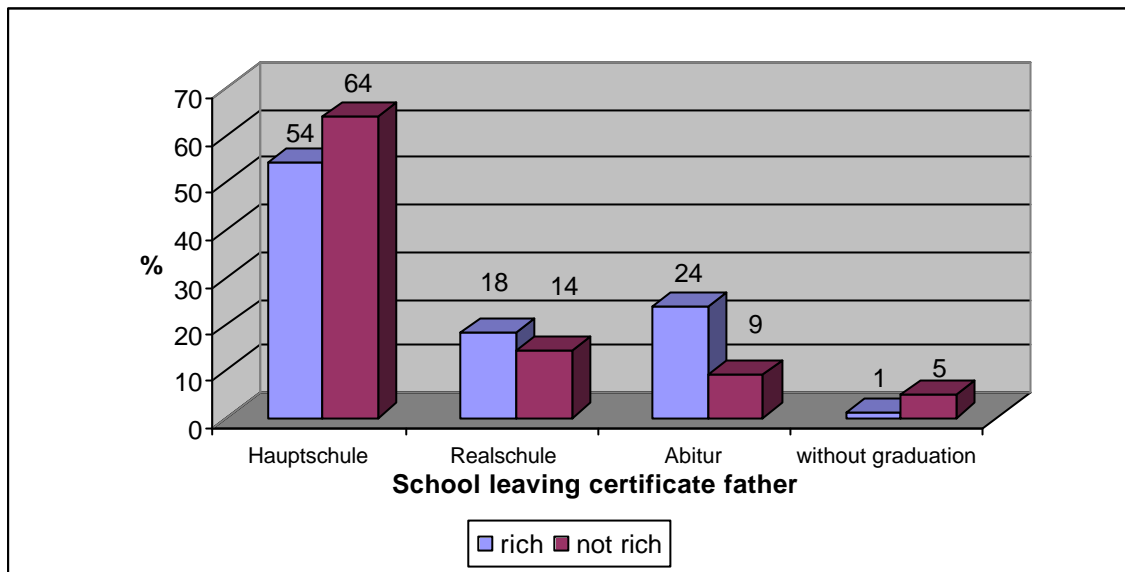
From recent research in labour economics it is a well known fact that women earn less than men despite having the same qualification (cp. Cain 1986; Wolff 1997; Rosenfeld 1990). Discrimination increases if we go up the income-ladder. The representation of women amongst the group of rich employees and self employed is below the representation of women amongst the whole working population (cp. table 3). The social background also has a strong effect on high labour incomes. If we look at the occupational status of rich employees we can see that blue-collar workers are not represented. High incomes are predominantly received by white-collar workers and self-employed.

Figure 4: Occupational status, rich – not rich, 1999



Source: GESOP, waves C (1986) and P (1999), weighted, own calculations

Another important field of research concerning the determination of high incomes is the family background. What we found from the descriptive analysis was the importance of the parents' high economic, cultural and social capital.

Figure 5: School leaving certificate of the father, rich – not rich

Source: GESOP, waves C (1986) and P (1999), weighted, own calculations

Figure 5 documents the relevance of cultural capital expressed by the school leaving certificate of the father for high incomes. Furthermore we found comparable results for the occupational status and the vocational training of the father. The following table represents an overview of the most important results of the descriptive analyzes.

Table 3: Selected results of the descriptive analyzes of high incomes

	Not rich 1999	rich 1999	? x_{rich}, not-rich²	? x₉₉/? x₈₆³
Ratio of the sample	94,4%	5,6%	X	X
Labour income ¹	4388 DM	12.948 DM	+8.560 DM	+21%
Individual determinants				
Real working time ¹	43,3 Std.	50,1 Std.	+6,8 Std.	-5,6%
Human Capital				
Duration of training ¹	12,2 Years	14,5 Years	+2,3 Years	-20,7%
Last job tenure ¹	10,3 Years	15,0 Years	+4,7 Years	+38%
Potent. working experience ¹	21,9 Years	26,7 Years	+5,8 Years	+41,4%
Ratio from the age of 40 till 54	35,4%	52,3%	+16,9	-21,4%
Ratio of people with highest school leaving certificate	21,2%	50,7%	+29,5	-19,2%
University degree	15,7%	54,2%	+38,5	-14,8%
Structural determinants				
Social background				
Highest class	10,1%	56,0%	+45,9	-15,9%
Ratio of blue collar workers	36,5%	0,3%	-36,2	-5,5%
Ratio of white collar workers	45,4%	74,7%	+29,3	+ 61%
Father with Abitur	9,2%	24,3%	+15,1	+10,2%
Father with university degree	11,2%	20,5%	+9,3	-6,1%
Rato of white collar fathers	26,0%	42,7%	+16,7	+24,9%
Discrimination				
Ratio of women	35%	7%	-28	+13,8%
Ratio of foreigners	9,1%	4,0%	-5,1	+4,1%
Branches				
Ratio of manufacturing employees	32,2%	46,4%	+14,2	+29%
Ratio of employees in the finance sector	4,0%	10,6%	+6,6	+23,8%
Firmsize				
Ratio of small firms	25,2%	16,9%	-8,3	-65%
Regions				
Bavaria	13,7%	18,3%	+4,6	-22%
Baden-Württemberg	12,5%	17,8%	+5,3	+23,3%
Marital Status				
Maried	55,4%	80,8%	+25,4	+7,6%
Wealth				
Ratio of heritages	14,9%	23,7%	+8,8	X

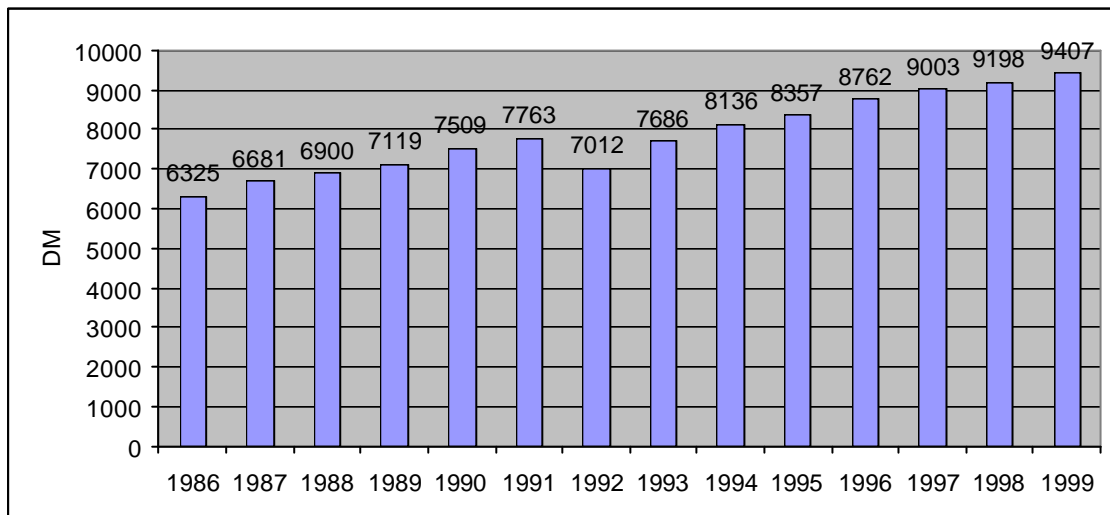
¹ Mean² Difference: rich – not-rich³ Growth rate.

Source: SOEP, wave C (1986), wave P (1999), weighted, own calculations

Multivariate Analysis

Multivariate econometric methods allow us to let the different theories of income determination compete against each other. This method allows us to ascertain if either individual or structural determinants are dominant in the explication of high labour incomes. To estimate the probability of receiving a high labour income we have build two different models. The major difference between the two models is the way we tried to map the social structure of the German society. The Stratification-Model distinguishes between different social groups by occupational status. The Class-Model uses the class schema of Goldthorpe (2002) to structure the German society.² Because of the panel structure of the models we can control for individual heterogeneity. In the Probit-Estimation the endogenous variable is the variable “rich” with its parameter values “rich” and “not rich”. The threshold for the state “rich” is defined by the 200%-frontier. This threshold was constructed for every year of the observation period.

**Figure 6: Annual thresholds of high incomes (200%)
Germany 1986 until 1999**



Source: SOEP, waves C (1986) to P (1999), unweighted, own calculations

² The Class Schema of Goldthorpe is a combination of occupational grouping and the regulation of employment.

Table 4: Probability to receive a high labour income, Panel Econometric Probit-Estimation, Random Effects (Pooled), Stratification- and class-model (Model 1 and 2), Germany 1986 to 1999

	Stratification-Model (Model 1)		Class-Model (Model 2)	
	Coefficient	Marginal Effect	Coefficient	Marginal Effect
<i>Endogenous Variable</i>				
Not rich – rich (0/1)				
<i>Human Capital Variables</i>				
Duration of training	0,454***	0,0066 (19)	0,257***	0,0023 (26)
Duration of last job tenure	0,017***	0,0002 (46)	0,004	0 (56)
Potential working experience	0,233***	0,0034 (29)	0,193***	0,0017 (31)
Potential working experience ²	-0,353***	-0,0051 (26)	-0,274***	-0,0024 (25)
<i>Discrimination</i>				
Sex (1=Woman)	-2,256***	-0,0331 (2)	-1,704***	-0,0149 (8)
Nationality (1=German)	-0,576***	-0,0085 (15)	-0,115	-0,0010 (44)
<i>Occupational Status</i>				
Blue-collar worker (Reference)	X	X	X	X
White-collar worker	0,343***	0,0050 (27)	X	X
Civil servant	-0,724***	-0,0106 (13)	X	X
Self-employed	1,088***	0,0160 (9)	X	X
<i>Social Class</i>				
Upper service-class (Reference)	X	X	X	X
Lower service-class	X	X	-1,051***	-0,0092 (14)
Simple clerical occupations	X	X	-1,537***	-0,0134 (11)
Self-employed, 1-20 employees	X	X	-0,267**	-0,0023 (26)
Self-employed without employees	X	X	-0,529	-0,0005 (49)
Farmers	X	X	-0,804*	-0,0070 (16)
Executive employees, engineers	X	X	-1,759***	-0,0154 (7)
Skilled manual worker	X	X	-2,529***	-0,0222 (4)
Blue-collar worker	X	X	-2,896***	-0,0253 (3)
Agricultural labourer	X	X	-1,104*	-0,0097 (13)
Simple manual occupations	X	X	-15,022	-0,1317 (1)
<i>Social background</i>				
<i>Graduation father</i>				
Secondary school I (Hauptschule) (Reference)	X	X	X	X
Secondary school II (Realschule)	0,483***	0,0071 (18)	0,415***	0,0036 (22)
High School Diploma (Abitur)	1,374***	0,0201 (8)	0,737***	0,0065 (17)
Other certificate	-0,026	-0,0003 (45)	0,192	0,0017 (31)
No certificate	-1,072**	-0,0157 (10)	-0,193	-0,0017 (31)
<i>Vocational training father</i>				
Apprenticeship (Reference)	X	X		
Job training (Ausbildung)	0,092	0,0013 (36)	0,038	0,0003 (52)
University	-1,035***	-0,0152 (11)	-0,143	-0,0013 (41)
No training	-0,354**	--0,0051 (26)	0,157	0,0014 (39)
<i>Occupational status father</i>				
Blue-collar worker (Reference)	X	X	X	X
White-collar worker	0,180*	0,0026 (31)	0,120	0,0010 (44)
Civil servant	0,401***	0,0059 (21)	0,243**	0,0021 (29)
Self-employed	0,170	0,0025 (34)	-0,081	-0,0007 (47)

	Stratification Model		Class Model	
	Coefficient	marg. Effect	Coefficient	marg. Effect
Industrial sector				
services (Reference)	X	X	X	X
Agriculture	-0,139	-0,0020 (37)	-0,052	-0,0005 (49)
Energy	0,148	0,0022 (36)	0,159	0,0014 (39)
Mining	-0,050	-0,0007 (40)	0,026	0,0002 (55)
Manufacturing	0,531***	0,0077 (17)	0,724***	0,0063 (18)
Construction	0,553***	0,0081 (15)	0,543***	0,0048 (20)
Trade	0,390***	0,0057 (24)	0,446***	0,0039 (21)
Transport	-0,083	-0,0012 (37)	0,126	0,0011 (42)
Financial services	0,445***	0,0065 (20)	0,628***	0,0055 (19)
Regions				
NRW (Reference)	X	X	X	X
Schleswig Holstein	0,233	0,0005 (43)	-0,125	-0,0011 (42)
Hamburg	-0,353	-0,0004 (44)	0,035	0,0003 (52)
Lower Saxony	0,075	0,0011 (38)	-0,204	-0,0018 (30)
Bremen	-0,848	-0,0124 (12)	-0,886	-0,0078 (15)
West Berlin	0,367**	0,0054 (25)	-0,282	-0,0025 (24)
Hessen	0,403**	0,0059 (21)	0,144	0,0016 (37)
Rheinland-Pfalz, Saarland	0,287*	0,0042 (28)	-0,063	-0,0006 (48)
Baden-Württemberg	0,425***	0,0062 (20)	0,251**	0,0022 (28)
Bavaria	0,616***	0,0090 (14)	0,324**	0,0028 (23)
East Berlin	-2,252***	-0,0331 (2)	-2,103***	-0,0184 (5)
Mecklenburg-Vorpommern	-1,399***	-0,0205 (7)	-1,85***	-0,0130 (12)
Brandenburg	-2,943***	-0,0432 (1)	-3,232***	-0,0264 (2)
Saxony-Anhalt	-1,788***	-0,0262 (5)	-1,652***	-0,0145 (9)
Thuringia	-1,764***	-0,0259 (6)	-1,604***	-0,0141 (10)
Saxony	-2,112***	-0,0310 (4)	-1,828***	-0,0160 (6)
Firm Size				
Firm Size < 20 employees (Reference)	X	X	X	X
Firm size >=20 < 200	-0,178**	-0,0026 (31)	-0,198**	-0,0017 (31)
Firm size >= 200 > 2000	0,062	0,0009 (39)	0,004	0 (56)
Firm size > 2000	0,176*	0,0026 (31)	0,106	0,0009 (46)
Firm without employees	0,043	0,0006 (42)	-0,052	-0,0005 (49)
Further socio-demographic background				
Household membership	0,051*	0,0007 (40)	0,021*	0,0003 (52)
Number of children	0,143***	0,0021 (35)	0,194***	0,0017 (31)
Marital status (married and living together)	0,205**	0,0030 (30)	0,181**	0,0016 (37)
Rho	0,822***		0,781***	
Constant	-13,099***		-8,825***	
N		46152		46005
Random-Effects				
McFadden-R ²		0,572		0,588
Log-Likelihood Function		-4439		-4265
LR-Test		4706***		3704***
Pooled				
McFadden-R ²		0,345		0,409
Log-Likelihood Function		-6792		-6117
Random vs. Pooled: LM-Test		665***		535***

Level of significance: *(90%), **(95%), ***(99%)

Marginal effects as partial derivations calculated at the particular mean of all observations

Source: SOEP, waves C (1986) to P (1999), own calculations

Concerning the interpretation of the results, first of all we control for the right specification of the model we used. The high and significant values for the Lagrange-Multiplier-Test tell us for both models that we should prefer the random-effects-model instead of the pooled-model. Class- and Stratification-Model are both statistically significant. The results for the McFadden Pseudo R^2 are satisfactory. The coefficients have to be interpreted qualitatively as effects on the probability of receiving a high labour income. The marginal effects at the mean represent the particular contributions to the overall probability. The interpretation of the coefficients in detail:

The coefficients of the human capital variables are all significant and have the expected algebraic signs. The duration of training and the last job tenure as well as the working experience have all positive effects on the probability of receiving a high labour income (only the last job tenure in the Class-Model lacks statistical significance). Sexual discrimination also has a significant effect on the probability of receiving a high labour income. This holds for both models. The results for discrimination of citizenship are negligible. The occupational status has a significant effect on the probability of receiving a high labour income. Compared to blue-collar workers self-employed and white-collar workers have a significant higher probability of receiving a high labour income. The same applies to the affiliation to the upper classes of society compared to the bottom of the class-hierarchy.

In our models the family background determines the probability of receiving a high labour income via the economic, cultural and social capital of the parents. The fathers' graduation, his vocational training and his occupational status are used as a proxy. A higher graduation of the father increases the probability of receiving a high labour income. Employees with a father as civil servant or white-collar-worker have a higher probability belonging to the "rich" than employees with a blue-collar-worker family background. Class- and Stratification-Model differ in the significance of the variables that represent the family background.

The place of residence is a further factor that determines the probability of receiving a high labour income. Compared to NRW employees, employees resident in the states of Hessen, Baden-Württemberg and Bavaria have a higher probability of belonging to the rich. The opposite is the case for people living in the eastern states of Germany. Compared to the sector of services employees who work in the industrial sectors of construction, energy, trade and financial services have a significant higher probability of receiving a high labour income. As expected an increasing firm size also leads to a higher probability. Regarding the further socio-demographic variables the married working population as well as the working population with children has a higher probability of receiving a high labour income.

If we look at the marginal effects we can see for the Stratification-Model that the fields of discrimination, regions, social background and the occupational status have the variables with the highest economic impact for the explanation of a high labour income. For the Class-Model these are discrimination, regions and social class.

Interaction: Education and Social Background

The variables that represent formal schooling and job training as well as the social background of the employees and self-employed have been significant determinants in the multivariate analyses. The results proved a direct effect of social background on high labour incomes. Consecutively we want to verify if there are relevant indirect effects between the social background and labour income at the same time. We suggest a transmission via the determination of school performance by social background. For this purpose we constructed two models. In the first model we try to explain the duration of training by the economical, social and cultural capital of the father. In the second model we estimated the probability of receiving a high school diploma (Abitur) subject to the family background.

Table 5: Panel Econometric Estimation of the duration of training, Random Effects (Pooled) (Model 3), Germany 1986 to 1999

Endogenous Variable: Duration of training	Coefficient
<i>Social background</i>	
<i>Graduation father</i>	
Secondary school I (Hauptschule) (Reference)	X
Secondary school II(Realschule)	0,675***
High school diploma (Abitur)	1,416***
Other certificate	-0,194
No certificate	0,675***
<i>Vocational training father</i>	
Apprenticeship (Reference)	X
Job training (Ausbildung)	0,375***
University	0,849***
No training	-0,030***
<i>Occupational status father</i>	
Blue-collar worker (Reference)	X
White-collar worker	0,050***
Civil servant	0,442***
Self-employed	1,086***
<i>Constant</i>	11.389***
<i>N</i>	54168
<i>Random-Effects</i>	
R ²	0,902
Log-Likelihood Function	-63935
<i>Pooled</i>	
R ²	0,196
Log-Likelihood Function	-120880
Random vs. Pooled: LM-Test	2198***

Level of significance: *(90%), **(95%), ***(99%)

Source: SOEP, waves C (1986) to P (1999), own calculations

Table 6: Determinants of the probability of receiving a high school diploma (Abitur), Panel Econometric Probit-Estimation, Random Effects (Pooled) (Model 4), Germany 1986 to 1999

	Coefficient	Marginal Effects
Endogeneous Variable: A-level (Yes/No)		
<i>Social background</i>		
<i>Graduation father</i>		
Secondary school I (Hauptschule) (Reference)	X	X
Secondary school II (Realschule)	0,650***	0,028 (4)
High school diploma (Abitur)	5,202***	0,224 (1)
Other certificate	0,347	0,015 (7)
No certificate	-3,788***	-0,163 (3)
<i>Vocational training father</i>		
Apprenticeship (Reference)	X	X
Job training (Ausbildung)	-0,162	-0,007 (9)
University	-0,235	-0,010 (8)
No training	-4,632***	-0,199 (2)
<i>Occupational status father</i>		
Blue-collar worker (Reference)	X	X
White-collar worker	0,265	0,011 (8)
Civil servant	0,411***	0,018 (6)
Self-employed	0,622***	0,027 (5)
<i>Constant</i>	-5,132***	
<i>Rho</i>	0,978	
<i>n</i>	54174	
<i>Random-Effects</i>		
McFadden R ²		0,795
Log-Likelihood Function		-5568
LR-Test		7420***
<i>Pooled</i>		
McFadden R ²		0,137
Log-Likelihood Function		-23406
Random vs. Pooled LM-Test		3268***

Level of significance: *(90%), **(95%), ***(99%)

Source: SOEP, waves C (1986) to P (1999), own calculations

Both models are statistically significant. The coefficients that represent the social background are predominantly significant. Therefore the endowment with human capital depends on the social background of the employees. Those from the upper social classes acquired significantly more schooling than those from poorer backgrounds. This suggests that schooling opportunity is strongly correlated with family background. There are relevant indirect effects between social (family) background and labour income.

6 Concluding remarks

The analysis of the determinants of high labour income is part of the income theory in general. On the one side the controversial positions are represented by the neoclassical approach on basis of the theorem of marginal productivity and on the other side by the Marxian-Keynesian approach which puts the emphasis on structural effects. The empiric-econometric analysis of the determinants of high incomes showed a heterogeneous picture. High labour incomes depend on individual as well as on structural determinants. But finally the effects of the structural determinants have a strong empirical relevance. The social structure of society, the characteristics of the work place and institutions determines high incomes.

Thus the determination of high incomes cannot be reduced to individual job performance. In fact general and specific human capital determines the probability of receiving high labour incomes. But as we can see from the analysis of the interaction between human capital and social background the human capital variables are not independent. They rather conceal the indirect effects of social background on high labour incomes.

Table 7: Hypothesis Test I (Interaction: Education –Family background)

	Panel Econometric Regression-Model (Model 3)	Panel Econometric Probit-Model (Model 4)
Hypothesis	verified: Yes/No	verified: Yes/No
H11 (Occupational status father – Educational attainment)	Yes	Yes
H12 (Graduation father – Educational attainment)	Yes	Yes
H13 (Vocational training father – Educational attainment)	Yes	Yes

The empirical evidence of discrimination by sex is obviously. High incomes are predominantly received by men. Unfortunately we do not have significant results for the discrimination by citizenship.

Further structural determinants like the place of residence, the industrial sector and the firm size also have a strong effect on the probability of receiving a high income. Rich employees live in economically prosperous regions, work in big firms and in sectors with a high capital intensity, a high degree of monopoly, high profits and/or a dynamic economic growth rate. In addition the occupational status as well as the class affiliation have a strong effect on high labour incomes. As mentioned above the family background has, via educational attainment, a strong indirect effect on the probability of receiving a high income. Furthermore there exists a strong direct effect of the family background on high income. This can be interpreted as the intergenerational transmission of cultural and social capital by social networks.

Table 8: Hypotheses Test II

	Panel Econometric Probit-Model (Model 1 and 2)
Hypothesis	Verified Yes/No
Human Capital	
H1 (Duration of training – rich/not rich)	Yes
H2 (Working experience – rich/not rich)	Yes
H3 (Duration of last tenure – rich/not rich)	Yes
Discrimination	
H4 (Sex – rich/not rich)	Yes
H5 (Nationality – rich/not rich)	No
Regions, Industrial sectors and firm size	
H6 (Region – rich/not rich)	Yes
H7 (Firm Size – rich/not rich)	Yes
H8 (Industrial sector – rich/not rich)	Yes
Socio-economic background	
H9 (class affiliation – rich/not rich)	Yes
H10 (occupational status – rich/not rich)	Yes
Family background	
H14 (occupational status father – rich/not rich)	Yes
H15 (graduation father – rich/not rich)	Yes
H16 (vocational training – rich/not rich)	No
Further socio-demographic background	
H17 (Household size – rich/not rich)	Yes
H18 (number of children – rich/not rich)	No
H19 (marital status – rich/not rich)	No

Household size and the marital status had also significant effects on the probability of receiving a high income. The number of children has a significant effect but not in the way to be expected.

If we embed the empirical results in the framework of theories of justice we can draw some important conclusions. The fact that structural determinants have a strong effect on high incomes undermines the legitimacy of high incomes according to the liberal justice theory. The strong influence of social and family background vitiates the publicly suggested strong relevance of job performance and equal opportunities. What we can see from the German case is that rich employees and self-employed do not earn high incomes because of their high job performance but of the fact that they got the right family background, sex and place of residence.

References

Books

- Ashenfelter, O.C. and Layard, R. (Editors) [1986-1999], Handbook of Labor Economics, Vol. 1-3c, Amsterdam.
- Becker, G.S (1964), Human Capital: A theoretical and empirical Analysis, New York.
- Becker, G.S. (1975), Human Capital, Chicago.
- Becker, G.S. (1971), The Economics of Discrimination, London.
- Bentham, J. (1992), An Introduction to the principles of morals and legislation. In: Hoeffe, O. (Hrsg.): Einführung in die utilitaristische Ethik: klassische und zeitgenössische Texte, Tübingen, pp. 35-69.
- Bourdieu, P. (1997), Die verborgenen Mechanismen der Macht, Schriften zu Politik & Kultur 1, Hamburg.
- Dworschak, F. (1986), Struktur von Arbeitseinkommen. Methodische und inhaltliche Probleme von Regressionsanalysen mit Querschnittsdaten für Mikrosimulationsmodelle, Hallstadt.
- Franz, W. (1996), Arbeitsmarktökonomik, Berlin.
- Geißler, R. (1996), Die Sozialstruktur Deutschlands, Opladen.
- Greene, W.H. (1997), Econometric Analysis, New Jersey.
- Haisken-DeNew, J.P. and Frick, J.R. (2001), Desktop Companion to the German Socio-Economic Panel Study (GSOEP), Berlin.
- Hayek, F.A. (1981), Recht, Gesetzgebung und Freiheit. Eine neue Darstellung der liberalen Prinzipien der Gerechtigkeit und der politischen Ökonomie, Vol. 1-3, Landberg am Lech.
- Keynes, J.M. (1994), Allgemeine Theorie der Beschäftigung, des Zinses und des Geldes, Berlin.
- Marx, K. and Engels, F. (1956), Marx Engels Werke, Berlin.
- Merz, J. (2001): Hohe Einkommen, ihre Struktur und Verteilung – Mikroanalysen auf der Basis der Einkommensteuerstatistik. Studie im Auftrag des Bundesministeriums für Arbeit und Sozialordnung, Berlin.
- Mincer, J. (1974), Schooling, Experience and Earnings, Hampshire.
- Rawls, J. (1979), Eine Theorie der Gerechtigkeit, Frankfurt a.M.
- Ricardo, D. (1951), On the Principles of Political Economy and Taxation, Cambridge.
- Smith, A. (1993), Der Wohlstand der Nationen, München.
- Wolff, E.N. (1997), Economics of Poverty Inequality and Discrimination, New York.

Journal Articals

- Abowd, J., Kramarz, F. and Margolis, D. (1998), High Wage Workers and High Wage Firms. In: Econometrica 67, pp. 251-333.
- Altonji, J.G and Dunn, T.A (1996), The Effects of Family Characteristics on the Return to Education. In: Review of Economics and Statistics, pp. 692-703.
- Bade, F.-J (1984), Die funktionale Struktur der Wirtschaft und ihre räumliche Arbeitsteilung, in: Discussion Paper des internationalen Instituts für Management, pp. 20-45.
- Becker, G.S. and Chiswick, B.R. (1966), The Economics of Education. In: American Economic Review 76, pp. 358-369.

- Erikson, R. and Goldthorpe, J.H. (2002), Intergenerational Inequality: A Sociological Perspective. In: *Journal of Economic Perspectives* 16 (3), pp. 31-44.
- Galbraith, J.K. and Calistri, A.D (1999), Inter-Industry Wage Structures: New Evidence from the OECD. In: *UTIP Working Paper* 13.
- Haisken-DeNew, J.P. and Schmidt, C.M. (1999), Industry Wage Differentials Revisited: A Longitudinal Comparison of Germany and USA (1984-1996). In: *IZA Discussion Paper* 98.
- McFadden, D. (1974), The Measurement of Urban Travel Demand. In: *Journal of Public Economics* 3 , pp. 303-328.
- Mincer, J. (1958): Investment in Human Capital and Personal Income Distribution. In: *Journal of Political Economy* 57, pp. 280-302.
- Mincer, J. (1970), The Distribution of Labour Incomes: A Survey with special Reference to the Human Capital Approach. In: *Journal of Economic Literature* 8 (8), pp. 1-25.
- Mincer, J. and Polachek, S. (1974): Family Investments in Human Capital: Earnings of Women. In: *Journal of Political Economy*, 82. (2), pp. 76-108.
- Rosenfeld, R. and Kalleberg, A. (1990), A Cross-National Comparison of the Gender Gap. In: *American Journal of Sociology* 96, pp. 69-106.
- Schmidt, C.M. and Zimmermann, K.F. (1991), Work Characteristics, Firm Size and Wages. In: *Review of Economics and Statistics* 73, pp. 705-710.

Articles in Books

- Cain, G.G. (1986), The Economic Analysis of Labor Market Discrimination: A Survey. In: Ashenfelter, O.C. and Layard, R. (Ed.): *Handbook of Labor Economics* Amsterdam, pp. 693-785.
- Dickens, W.T. and Katz, L. (1987), Inter-Industry Wage Differences and Industry Characteristics. In: Lang, K and Leonard, J. (Ed.): *Unemployment and the structure of labour markets*, New York.
- Hübler, O. (1984), Zur empirischen Überprüfung alternativer Theorien der Verteilung von Arbeitseinkommen - Ökonometrische Ein- und Mehrgleichungsmodelle. In: Bellmann, L.; Gerlach, K. and Hübler, O. (Ed.): *Lohnstruktur in der Bundesrepublik Deutschland. Zur Theorie und Empirie der Arbeitseinkommen*, Frankfurt a.M. pp. 17-189.
- Kalecki, M. (1987), Umriss einer Theorie des Konjunkturzyklus. In: Kalecki, M. (Ed.): *Krise und Prosperität im Kapitalismus. Ausgewählte Essays 1933-1971*, Marburg, pp. 31-44.
- Schnapp, K.-U. (1997), Soziodemographische Merkmale der bundesdeutschen Eliten. In: Bürklin, W.; Rebenstorf, H. (Ed.): *Eliten in Deutschland Rekrutierung und Integration*, Opladen, pp. 101-122.

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3 FFB-Bücher

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- Merz, J. und J. Wagner (Hrg.), 2004, Perspektiven der MittelstandsForschung – Ökonomische Analysen zu Selbständigkeit, Freien Berufen und KMU, Merz, J., Schulte, R. and J. Wagner (Series Eds.), Entrepreneurship, Professions, Small Business Economics, CREPS-Schriftenreihe Vol. 1, 520 Seiten, Lit Verlag, ISBN 3-8258-8179-2, Münster. *Preis: € 39,90*
- Merz, J. und M. Zwick (Hrg.), 2004, MIKAS – Mikroanalysen und amtliche Statistik, Statistisches Bundesamt (Serie Editor), Statistik und Wissenschaft, Vol. 1, 318 Seiten, ISBN 3-8246-0725-5, Wiesbaden. *Preis: € 24,80*
- Hirschel, D., 2004, Einkommensreichtum und seine Ursachen – Die Bestimmungsfaktoren hoher Arbeitseinkommen, Hochschulschriften Band 82, 416 Seiten, Metropolis-Verlag Marburg, ISBN 3-89518-441-1.
- Merz, J., 2001, Hohe Einkommen, ihre Struktur und Verteilung, Lebenslagen in Deutschland, Der erste Armuts- und Reichtumsbericht der Bundesregierung, Bundesministerium für Arbeit und Sozialordnung, 128 Seiten, Bonn, zu beziehen über: Bundesanzeiger Verlagsgesellschaft mbH, Südstraße 119, 53175 Bonn.
- Ehling, M. und J. Merz u. a., 2001, Zeitbudget in Deutschland – Erfahrungsberichte der Wissenschaft, Band 17 der Schriftenreihe Spektrum Bundesstatistik, 248 Seiten, Metzler-Poeschel Verlag, ISBN 3-8246-0645-3, Stuttgart. *Preis: € 16,-*
- Krickhahn, T., 1995, Die Verbände des wirtschaftlichen Mittelstands in Deutschland, 351 Seiten, DUV Deutscher Universitäts Verlag, ISBN 3-8244-0245-9, Wiesbaden. *Preis: € 62,-*
- Spahn, P. B., Galler, H. P., Kaiser, H., Kassella, T. und J. Merz, 1992, Mikrosimulation in der Steuerpolitik, 279 Seiten, Springer Verlag, ISBN 3-7908-0611-0, Berlin. *Preis: € 45,-*

4 FFB-Reprints

- Merz, J., Kumulation von Mikrodaten – Konzeptionelle Grundlagen und ein Vorschlag zur Realisierung, in: Allgemeines Statistisches Archiv, Issue 88, S. 451-472, 2004 **FFB-Reprint Nr. 35**
- Merz, J., Einkommens-Reichtum in Deutschland - Mikroanalytische Ergebnisse der Einkommensteuerstatistik für Selbständige und abhängig Beschäftigte, in: Perspektiven der Wirtschaftspolitik, Vol. 5, Issue 2, S. 105-126, 2004 **FFB-Reprint Nr. 34**

Merz, J., Vorgrimler, D. und M. Zwick, Faktisch anonymisiertes Mikrodatenfile der Lohn- und Einkommensteuerstatistik 1998, in: *Wirtschaft und Statistik*, Issue 10, S. 1079-1091, 2004

FFB-Reprint Nr. 33

Ackermann, D., Merz, J. and H. Stolze, Erfolg und Erfolgsfaktoren freiberuflich tätiger Ärzte – Ergebnisse der FFB-Ärzteumfrage für Niedersachsen, in: Merz, J. and J. Wagner (Eds.), *Perspektiven der MittelstandsForschung – Ökonomische Analysen zu Selbständigkeit, Freien Berufen und KMU*, Merz, J., Schulte, R. and J. Wagner (Series Eds.), *Entrepreneurship, Professions, Small Business Economics*, CREPS-Schriftenreihe Vol. 1, Lit Verlag, Münster, pp. 165-190, 2004

FFB-Reprint Nr. 32

Hirschel, D. und J. Merz, Was erklärt hohe Arbeitseinkommen Selbständiger – Eine Mikroanalyse mit Daten des Sozioökonomischen Panels, in: Merz, J. and J. Wagner (Eds.), *Perspektiven der MittelstandsForschung – Ökonomische Analysen zu Selbständigkeit, Freien Berufen und KMU*, Merz, J., Schulte, R. and J. Wagner (Series Eds.), *Entrepreneurship, Professions, Small Business Economics*, CREPS-Schriftenreihe Vol. 1, Lit Verlag, Münster, pp. 265-285, 2004

FFB-Reprint Nr. 31

Burgert, D. und J. Merz, Wer arbeitet wann? – Arbeitszeitarrangements von Selbständigen und abhängig Beschäftigten: Eine mikroökonomische Analyse deutscher Zeitbudgetdaten, in: Merz, J. and J. Wagner (Eds.), *Perspektiven der MittelstandsForschung – Ökonomische Analysen zu Selbständigkeit, Freien Berufen und KMU*, Merz, J., Schulte, R. and J. Wagner (Series Eds.), *Entrepreneurship, Professions, Small Business Economics*, CREPS-Schriftenreihe Vol. 1, Lit Verlag, Münster, pp. 303-330, 2004

FFB-Reprint Nr. 30

Merz, J. und M. Zwick, Hohe Einkommen – Eine Verteilungsanalyse für Freie Berufe, Unternehmer und abhängige Beschäftigte, in: Merz, J. and M. Zwick (Eds.), *MIKAS – Mikroanalysen und amtliche Statistik*, Statistik und Wissenschaft, Vol. 1, pp. 167-193, 2004

FFB-Reprint Nr. 29

Merz, J., Schatz, C. and K. Kortmann, Mikrosimulation mit Verwaltungs- und Befragungsdaten am Beispiel ‚Altersvorsorge in Deutschland 1996‘ (AVID ‚96), in: Merz, J. und M. Zwick (Hg.), *MIKAS – Mikroanalysen und amtliche Statistik*, Statistik und Wissenschaft, Vol. 1, S. 231-248, 2004

FFB-Reprint Nr. 28

Merz, J., Was fehlt in der EVS ? – Eine Verteilungsanalyse hoher Einkommen mit der verknüpften Einkommensteuerstatistik für Selbständige und abhängig Beschäftigte, in: *Jahrbücher für Nationalökonomie und Statistik*, Vol. 223/1, p. 58-90, 2003

FFB-Reprint Nr. 27

Merz, J. und M. Zwick, Verteilungswirkungen der Steuerreform 2000/2005 im Vergleich zum ‚Karlsruher Entwurf‘ – Auswirkungen auf die Einkommensverteilung bei Selbständigen (Freie Berufe, Unternehmer) und abhängig Beschäftigte, in: *Wirtschaft und Statistik*, 8/2002, p. 729-740, 2002

FFB-Reprint Nr. 26

Merz, J., Time Use Research and Time Use Data – Actual Topics and New Frontiers, in: Ehling, M. and J. Merz (Eds.), *Neue Technologien in der Umfrageforschung – Anwendungen bei der Erhebung von Zeitverwendung*, p. 3-19, 2002

FFB-Reprint Nr. 25

Merz, J., 2002, Time and Economic Well-Being – A Panel Analysis of Desired versus Actual Working Hours, in: *Review of Income and Wealth*, Series 48, No. 3, p. 317-346, FFB-Reprint Nr. 24, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg.

FFB-Reprint Nr. 24

Schatz, Ch., Kortmann, K. und J. Merz, 2002, Künftige Alterseinkommen - Eine Mikrosimulationsstudie zur Entwicklung der Renten und Altersvorsorge in Deutschland (AVID'96), in: *Schmollers Jahrbuch, Journal of Applied Social Sciences, Zeitschrift für Wirtschafts- und Sozialwissenschaften*, 122. Jahrgang, Heft 2, S. 227-260, FFB-Reprint Nr. 23, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg.

FFB-Reprint Nr. 23

- Merz, J. und M. Zwick, 2001, Über die Analyse hoher Einkommen mit der Einkommensteuerstatistik – Eine methodische Erläuterung zum Gutachten „Hohe Einkommen, ihre Struktur und Verteilung“ zum ersten Armuts- und Reichtumsbericht der Bundesregierung, in: *Wirtschaft und Statistik* 7/2001, S. 513-523, FFB-Reprint Nr. 22, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 22**
- Merz, J., 2001, Was fehlt in der EVS? Eine Verknüpfung mit der Einkommensteuerstatistik für die Verteilungsanalyse hoher Einkommen, in: Becker, I., Ott, N. und G. Rolf (Hrsg.), *Soziale Sicherung in einer dynamischen Gesellschaft*, S. 278-300, Campus Verlag, Frankfurt/New York, FFB-Reprint Nr. 21, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 21**
- Merz, J., 2001, 10 Jahre Forschungsinstitut Freie Berufe (FFB) der Universität Lüneburg – Forschungsschwerpunkte und Perspektiven, in: Bundesverband der Freien Berufe (Hrsg.), *Jahrbuch 2000/2001, der freie beruf*, S. 158-174, Bonn, FFB-Reprint Nr. 20, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 20**
- Merz, J., 2000, The Distribution of Income of Self-employed, Entrepreneurs and Professions as Revealed from Micro Income Tax Statistics in Germany, in: Hauser, R. and I. Becker (eds.), *The Personal Distribution of Income in an International Perspective*, S. 99-128, Springer Verlag, Heidelberg, FFB-Reprint Nr.19, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 19**
- Merz, J., 1998, Privatisierung, Deregulierung und staatlich gebundene Freie Berufe – Einige ökonomische Aspekte, in: Herrmann, H. und J. Backhaus (Hrsg.), *Staatlich gebundene Freiberufe im Wandel*, S. 67-114, FFB-Schriften Nr. 9, NOMOS Verlagsgesellschaft, Baden-Baden, FFB-Reprint Nr. 18, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 18**
- Merz, J., 1997, Die Freien Berufe – Laudatio zur Verleihung der Ehrendoktorwürde des Fachbereiches Wirtschafts- und Sozialwissenschaften der Universität Lüneburg an Prof. J. F. Volrad Deneke, in: Bundesverband der Freien Berufe (Hrsg.), *Jahrbuch 1997, der freie beruf*, S. 133-151, Bonn, FFB-Reprint Nr. 17, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 17**
- de Kam, C. A., de Haan, J., Giles, C., Manresa, A., Berenguer, E., Calonge, S., Merz, J. and K. Venkatarama, 1996, Who pays the taxes? The Distribution of Effective Tax Burdens in Four EU Countries, in: *ec Tax Review*, p. 175-188, FFB-Reprint No. 16, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 16**
- Merz, J., 1996, MICSIM – A PC Microsimulation Model for Research and Teaching: A Brief View on its' Concept and Program Developments, *SoftStat '95 – Advances in Statistical Software* 5, in: Faulbaum, F. and W. Bandilla (eds.), Stuttgart, p.433-442, FFB-Reprint No. 15, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 15**
- Burkhauser, R. V., Smeeding, T. M. and J. Merz, 1996, Relative Inequality and Poverty in Germany and the United States using Alternative Equivalence Scales, in: *Review of Income and Wealth*, Series 42, No. 4, p. 381-400, FFB-Reprint No. 14, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 14**
- Merz, J. 1996, Schattenwirtschaft und Arbeitsplatzbeschaffung, in: Sadowski, D. und K. Pull (Hrsg.), *Vorschläge jenseits der Lohnpolitik*, S. 266-294, Frankfurt/New York, FFB-Reprint Nr. 13, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 13**
- Merz, J., 1996, MICSIM – Concept, Developments and Applications of a PC Microsimulation Model for Research and Teaching, in: Troitzsch, K. G., Mueller, U. Gilbert, G. N. and J. E. Doran (eds.), *Social Science Microsimulation*, p. 33-65, Berlin/New York, FFB-Reprint No. 12, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 12**

- Merz, J., 1996, Market and Non-Market Labour Supply and the Impact of the Recent German Tax Reform – Incorporating Behavioural Response, in: Harding, A. (ed.), *Microsimulation and Public Policy*, p. 177-202, Amsterdam/Tokyo, FFB-Reprint No. 11, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 11**
- Merz, J. und R. Lang, 1996, Alles eine Frage der Zeit!?! – Bericht über ein FFB-Forschungsprojekt zum Thema 'Zeitverwendung in Erwerbstätigkeit und Haushaltsproduktion – Dynamische Mikroanalysen mit Paneldaten', in: *Uni Lüneburg – 50 Jahre Hochschule in Lüneburg, Jubiläums-Sonderausgabe*, Heft 19/Mai 1996, S. 51-55, FFB-Reprint Nr. 10, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 10**
- Merz, J. und D. Kirsten, 1996, Freie Berufe im Mikrozensus – Struktur, Einkommen und Einkommensverteilung in den neuen und alten Bundesländern, in: *BFB Bundesverband der Freien Berufe (Hrsg.), Jahrbuch 1996*, S. 40-79, Bonn, FFB-Reprint Nr. 9, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 9**
- Deneke, J. F. V., 1995, Freie Berufe – Gestern, Heute, Morgen, in: *BFB Bundesverband der Freien Berufe (Hrsg.), Jahrbuch 1995*, S. 57-72, Bonn, FFB-Reprint Nr. 8, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 8**
- Merz, J. and J. Faik, 1995, Equivalence Scales Based on Revealed Preference Consumption Expenditures – The Case of Germany, in: *Jahrbücher für Nationalökonomie und Statistik*, Vol. 214, No. 4, p. 425-447, Stuttgart, FFB-Reprint No. 7, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 7**
- Merz, J., 1993, Statistik und Freie Berufe im Rahmen einer empirischen Wirtschafts- und Sozialforschung, in: *BFB Bundesverband der Freien Berufe (Hrsg.), Jahrbuch 1993*, S. 31-78, Bonn, FFB-Reprint Nr. 6, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 6**
- Merz, J., 1993, Wandel in den Freien Berufen – Zum Forschungsbeitrag des Forschungsinstituts Freie Berufe (FFB) der Universität Lüneburg, in: *BFB Bundesverband der Freien Berufe (Hrsg.), Jahrbuch 1993*, S. 164-173, Bonn, FFB-Reprint Nr. 5, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Reprint Nr. 5**
- Merz, J. and K. G. Wolff, 1993, The Shadow Economy: Illicit Work and Household Production: A Microanalysis of West Germany, in: *Review of Income and Wealth*, Vol. 39, No. 2, p. 177-194, FFB-Reprint No. 4, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 4**
- Trautwein, H.-M. und A. Rönnau, 1993, Self-Regulation of the Medical Profession in Germany: A Survey, Faure, in: *M., Finsinger, J., Siegers, J. und R. van den Bergh (eds.), Regulation of Profession*, p. 249-305, ISBN 90-6215-334-8, MAKLU, Antwerpen, FFB-Reprint No. 3, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 3**
- Herrmann, H., 1993, Regulation of Attorneys in Germany: Legal Framework and Actual Tendencies of Deregulation, in: *Faure, M., Finsinger, J., Siegers, J. und R. van den Bergh (eds.), Regulation of Profession*, p. 225-245, ISBN 90-6215-334-8, MAKLU, Antwerpen, FFB-Reprint No. 2, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 2**
- Merz, J., 1991, *Microsimulation – A Survey of Principles, Developments and Applications*, in: *International Journal of Forecasting* 7, p. 77-104, ISBN 0169-2070-91, North-Holland, Amsterdam, FFB-Reprint Nr. 1, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Reprint Nr. 1**

5 FFB-Diskussionspapiere, ISSN 0942-2595

- Merz, J. und Paic, P., 2005, Start-up success of freelancers – New microeconomic evidence from the German Socio-Economic Panel. FFB-Diskussionspapier Nr. 56, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 56**

- Merz, J. und Paic, P., 2005, Erfolgsfaktoren freiberuflicher Existenzgründung – Neue mikroökonomische Ergebnisse mit Daten des Sozio-ökonomischen Panels, FFB-Diskussionspapier Nr. 55, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 55**
- Merz, J. und Stolze, H., 2005, Representative Time Use Data and Calibration of the American Time Use Studies 1965-1999, FFB-Diskussionspapier Nr. 54, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 54**
- Paic, P. und Brand, H., 2005, Die Freien Berufe im Sozio-ökonomischen Panel - Systematische Berichtigung der kritischen Wechsel innerhalb der Selbständigengruppe, FFB-Diskussionspapier Nr. 53, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 53**
- Merz, J., und Paic, P., 2005, Zum Einkommen der Freien Berufe – Eine Ordered Probit-Analyse ihrer Determinanten auf Basis der FFB-Onlineumfrage, FFB-Diskussionspapier Nr. 52, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 52**
- Burgert, D., 2005, Schwellenwerte im deutschen Kündigungsschutzrecht – Ein Beschäftigungshindernis für kleine Unternehmen?, FFB-Diskussionspapier Nr. 50, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 51**
- Merz, J., Böhm P. und Burgert D., 2005, Arbeitszeitarrangements und Einkommensverteilung – Ein Treatment Effects Ansatz der Einkommenschätzung für Unternehmer, Freiberufler und abhängig Beschäftigte, FFB-Diskussionspapier Nr. 50, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 50**
- Burgert, D., 2005, The Impact of German Job Protection Legislation on Job Creation in Small Establishments – An Application of the Regression Discontinuity Design, FFB-Diskussionspapier Nr. 49, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 49**
- Merz, J. und D. Burgert, 2005, Arbeitszeitarrangements – Neue Ergebnisse aus der nationalen Zeitbudgeterhebung 2001/02 im Zeitvergleich, FFB-Diskussionspapier Nr. 46, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 48**
- Merz, J., Böhm, P. und D. Burgert, 2005, Timing, Fragmentation of Work and Income Inequality – An Earnings Treatment Effects Approach, FFB-Diskussionspapier Nr. 47, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 47**
- Merz, J. und P. Paic, 2004, Existenzgründungen von Freiberuflern und Unternehmer – Eine Mikroanalyse mit dem Sozio-ökonomischen Panel, FFB-Diskussionspapier Nr. 46, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 46**
- Merz, J. und D. Burgert, 2004, Wer arbeitet wann? Arbeitszeitarrangements von Selbständigen und abhängig Beschäftigten – Eine mikroökonomische Analyse deutscher Zeitbudgetdaten, FFB-Diskussionspapier Nr. 45, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 45**
- Hirschel, D. und J. Merz, 2004, Was erklärt hohe Arbeitseinkommen der Selbständigen – Eine Mikroanalyse mit Daten des Sozio-ökonomischen Panels, FFB-Diskussionspapier Nr. 44, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 44**
- Ackermann, D., Merz, J. und H. Stolze, 2004, Erfolg und Erfolgsfaktoren freiberuflich tätiger Ärzte – Ergebnisse der FFB-Ärztbefragung für Niedersachsen, FFB-Diskussionspapier Nr. 43, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 43**
- Hirschel, D., 2003, Do high incomes reflect individual performance? The determinants of high incomes in Germany, FFB-Diskussionspapier Nr. 42, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 42**

- Merz, J., and D. Burgert, 2003, Working Hour Arrangements and Working Hours – A Microeconomic Analysis Based on German Time Diary Data, FFB-Diskussionspapier Nr. 41, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 41**
- Merz, J. und M. Zwick, 2002, Hohe Einkommen: Eine Verteilungsanalyse für Freie Berufe, Unternehmer und abhängig Beschäftigte, Eine Mikroanalyse auf der Basis der Einkommensteuerstatistik, FFB-Diskussionspapier Nr. 40, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 40**
- Merz, J., and D. Hirschel, 2003, The distribution and re-distribution of income of self-employed as freelancers and entrepreneurs in Europe, FFB-Diskussionspapier Nr. 39, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 39**
- Stolze, H. 2002, Datenbankgestützte Internetpräsenzen – Entwicklung und Realisation am Beispiel der Homepage des Forschungsinstituts Freie Berufe (FFB) der Universität Lüneburg <http://ffb.uni-lueneburg.de>, FFB-Diskussionspapier Nr. 38, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 38**
- Merz, J., 2002, Zur Kumulation von Haushaltsstichproben, FFB-Diskussionspapier Nr. 37, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 37**
- Merz, J., 2002, Reichtum in Deutschland: Hohe Einkommen, ihre Struktur und Verteilung – Eine Mikroanalyse mit der Einkommensteuerstatistik für Selbständige und abhängig Beschäftigte, FFB-Diskussionspapier Nr. 36, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 36**
- Merz, J. und M. Zwick, 2002, Verteilungswirkungen der Steuerreform 2000/2005 im Vergleich zum ‚Karlsruher Entwurf‘ Auswirkungen auf die Einkommensverteilung bei Selbständigen (Freie Berufe, Unternehmer und abhängig Beschäftigte), FFB-Diskussionspapier Nr. 35, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 35**
- Merz, J., Stolze, H. und M. Zwick, 2002, Professions, entrepreneurs, employees and the new German tax (cut) reform 2000 – A MICSIM microsimulation analysis of distributional impacts, FFB-Diskussionspapier Nr. 34, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 34**
- Forschungsinstitut Freie Berufe, 2002, Freie Berufe im Wandel der Märkte - 10 Jahre Forschungsinstitut Freie Berufe (FFB) der Universität Lüneburg, Empfang am 4. November 1999 im Rathaus zu Lüneburg, FFB-Diskussionspapier Nr. 33, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 33**
- Merz, J., 2002, Time Use Research and Time Use Data – Actual Topics and New Frontiers, FFB-Discussion Paper No. 32, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 32**
- Merz, J., 2001, Freie Berufe im Wandel der Arbeitsmärkte, FFB-Diskussionspapier Nr. 31, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 31**
- Merz, J., 2001, Was fehlt in der EVS? Eine Verteilungsanalyse hoher Einkommen mit der verknüpften Einkommensteuerstatistik für Selbständige und abhängig Beschäftigte, FFB-Diskussionspapier Nr. 30, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 30**
- Merz, J., 2001, Informationsfeld Zeitverwendung – Expertise für die Kommission zur Verbesserung der informationellen Infrastruktur zwischen Wissenschaft und Statistik, FFB-Diskussionspapier Nr. 29, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 29**
- Schatz, C. und J. Merz, 2000, Die Rentenreform in der Diskussion – Ein Mikrosimulationsmodell für die Altersvorsorge in Deutschland (AVID-PTO), FFB-Diskussionspapier Nr. 28, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 28**

- Merz, J., 2000, The Distribution of Income of Self-employed, Entrepreneurs and Professions as Revealed from Micro Income Tax Statistics in Germany, FFB-Discussion Paper No. 27, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 27**
- Merz, J., Loest, O. und A. Simon, 1999, Existenzgründung – Wie werde ich selbständig, wie werde ich Freiberufler? Ein Leitfaden, FFB-Diskussionspapier Nr. 26, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 26**
- Merz, J. und D. Kirsten, 1998, Extended Income Inequality and Poverty Dynamics of Labour Market and Valued Household Activities – A Ten Years Panelanalysis for Professions, Entrepreneurs and Employees in Germany, FFB-Discussion Paper No. 25, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 25**
- Merz, J., Quiel, T., und K. Venkatarama, 1998, Wer bezahlt die Steuern? – Eine Untersuchung der Steuerbelastung und der Einkommenssituation für Freie und andere Berufe, FFB-Diskussionspapier Nr. 24, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 24**
- Merz, J. und R. Lang, 1997, Preferred vs. Actual Working Hours – A Ten Paneleconometric Analysis for Professions, Entrepreneurs and Employees in Germany, FFB-Discussion Paper No. 23, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 23**
- Merz, J., 1997, Privatisierung und Deregulierung und Freie und staatlich gebundene Freie Berufe – Einige ökonomische Aspekte, FFB-Diskussionspapier Nr. 22, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 22**
- de Kam, C. A., de Haan, J., Giles, C., Manresa, A., Berenguer, E., Calonge, S., Merz, J. and K. Venkatarama, 1996, The Distribution of Effective Tax Burdens in Four EU Countries, FFB-Discussion Paper No. 21, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 21**
- Deneke, J. F. V., 1996, Freie Berufe und Mittelstand – Festrede zur Verleihung der Ehrendoktorwürde, FFB-Diskussionspapier Nr. 20, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 20**
- Merz, J., 1996, Die Freien Berufe – Laudatio zur Verleihung der Ehrendoktorwürde des Fachbereiches Wirtschafts- und Sozialwissenschaften der Universität Lüneburg an Prof. J. F. Volrad Deneke, FFB-Diskussionspapier Nr. 19, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 19**
- de Kam, C. A., de Haan, J., Giles, C., Manresa, A., Berenguer, E., Calonge, S. and J. Merz, 1996, Who pays the taxes?, FFB-Discussion Paper No. 18, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 18**
- Merz, J., 1996, Schattenwirtschaft und ihre Bedeutung für den Arbeitsmarkt, FFB-Diskussionspapier Nr. 17, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 17**
- Merz, J. und D. Kirsten, 1995, Freie Berufe im Mikrozensus II – Einkommen und Einkommensverteilung anhand der ersten Ergebnisse für die neuen und alten Bundesländer 1991, FFB-Diskussionspapier Nr. 16, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 16**
- Merz, J. und D. Kirsten, 1995, Freie Berufe im Mikrozensus I – Struktur und quantitative Bedeutung anhand der ersten Ergebnisse für die neuen und alten Bundesländer 1991, FFB-Diskussionspapier Nr. 15, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 15**
- Merz, J., 1995, MICSIM – Concept, Developments and Applications of a PC-Microsimulation Model for Research and Teaching, FFB-Discussion Paper No. 14, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 14**
- Rönnau, A., 1995, Freie Berufe in der DDR, der Bundesrepublik Deutschland und im wiedervereinten Deutschland: Auswertungen von Berufstätigenerhebung und Arbeitsstättenzählung, FFB-Diskus-

- sionspapier Nr. 13, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 13**
- Burkhauser, R. V., Smeeding, T. M. and J. Merz, 1994, Relative Inequality and Poverty in Germany and the United States Using Alternative Equivalence Scales, FFB-Discussion Paper No. 12, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 12**
- Widmaier, U., Niggemann, H. and J. Merz, 1994, What makes the Difference between Unsuccessful and Successful Firms in the German Mechanical Engineering Industry? A Microsimulation Approach Using Data from the NIFA-Panel, FFB-Discussion Paper No. 11, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 11**
- Merz, J., 1994, Microdata Adjustment by the Minimum Information Loss Principle, FFB-Discussion Paper No. 10, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 10**
- Merz, J., 1994, Microsimulation – A Survey of Methods and Applications for Analyzing Economic and Social Policy, FFB-Discussion Paper No. 9, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 9**
- Merz, J., Garner, T., Smeeding, T. M., Faik, J. and D. Johnson, 1994, Two Scales, One Methodology – Expenditure Based Equivalence Scales for the United States and Germany, FFB-Discussion Paper No. 8, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 8**
- Krickhahn, T., 1993, Lobbyismus und Mittelstand: Zur Identifikation der Interessenverbände des Mittelstands in der Bundesrepublik Deutschland, FFB-Diskussionspapier Nr. 7, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 7**
- Merz, J., 1993, Market and Non-Market Labor Supply and Recent German Tax Reform Impacts – Behavioral Response in a Combined Dynamic and Static Microsimulation Model, FFB-Discussion Paper No. 6, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 6**
- Merz, J., 1993, Microsimulation as an Instrument to Evaluate Economic and Social Programmes, FFB-Discussion Paper No. 5, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 5**
- Merz, J., 1993, Statistik und Freie Berufe im Rahmen einer empirischen Wirtschafts- und Sozialforschung, Antrittsvorlesung im Fachbereich Wirtschafts- und Sozialwissenschaften der Universität Lüneburg, FFB-Diskussionspapier Nr. 4, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 4**
- Merz, J. and J. Faik, 1992, Equivalence Scales Based on Revealed Preference Consumption Expenditure Microdata – The Case of West Germany, FFB-Discussion Paper No. 3, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 3**
- Merz, J., 1992, Time Use Dynamics in Paid Work and Household Activities of Married Women – A Panel Analysis with Household Information and Regional Labour Demand, FFB-Discussion Paper No. 2, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-DP Nr. 2**
- Forschungsinstitut Freie Berufe, 1992, Festliche Einweihung des Forschungsinstituts Freie Berufe am 16. Dezember 1991 im Rathaus zu Lüneburg, FFB-Diskussionspapier Nr. 1, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-DP Nr. 1**

6 FFB-Dokumentationen, ISSN 1615-0376

- Merz, J. und P. Paic, 2005, Die FFB-Onlineumfrage Freie Berufe – Beschreibung und Hochrechnung, FFB-Dokumentation Nr. 12, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 12**
- Stolze, H., 2004, Der FFB-Server mit Microsoft Windows Server 2003, FFB-Dokumentation Nr. 11, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 11**
- Stolze, H., 2004, Zur Repräsentativität der FFB-Ärzteumfrage – Neue Hochrechnungen für Niedersachsen, Nordrhein und Deutschland, FFB-Dokumentation Nr. 10, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 10**
- Merz, J., Stolze, H. und S. Imme, 2001, ADJUST FOR WINDOWS – A Program Package to Adjust Microdata by the Minimum Information Loss Principle, Program-Manual, FFB-Dokumentation No. 9, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Dok. Nr. 9**
- Merz, J., Fink, F., Plönnigs, F. und T. Seewald, 1999, Forschungsnetz Zeitverwendung – Research Network on Time Use (RNTU), FFB-Dokumentation Nr. 8, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 8**
- Merz, J., 1997, Zeitverwendung in Erwerbstätigkeit und Haushaltsproduktion – Dynamische Mikroanalysen mit Paneldaten, DFG-Endbericht, FFB-Dokumentation Nr. 7, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 7**
- Merz, J. und F. Plönnigs, 1997, DISTRI/MICSIM – A Softwaretool for Microsimulation Models and Analyses of Distribution, FFB-Dokumentation No. 6, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Dok. Nr. 6**
- Merz, J. und R. Lang, 1997, Neue Hochrechnung der Freien Berufe und Selbständigen im Sozio-ökonomischen Panel, FFB-Dokumentation Nr. 5, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 5**
- Merz, J. und F. Plönnigs, 1995, Forschungsinstitut Freie Berufe – Datenschutz und Datensicherung, FFB-Dokumentation Nr. 4, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 4**
- Merz, J., Hecker, M., Matusall, V. und H. Wiese, 1994, Forschungsinstitut Freie Berufe – EDV-Handbuch, FFB-Dokumentation Nr. 3, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 3**
- Merz, J., 1993, Zeitverwendung in Erwerbstätigkeit und Haushaltsproduktion – Dynamische Mikroanalysen mit Paneldaten, DFG-Zwischenbericht für die erste Phase (1992-1993), FFB-Dokumentation Nr. 2, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 2**
- Merz, J. 1993, ADJUST – Ein Programmpaket zur Hochrechnung von Mikrodaten nach dem Prinzip des minimalen Informationsverlustes, Programm-Handbuch, FFB-Dokumentation Nr. 1, Fachbereich Wirtschafts- und Sozialwissenschaften, Universität Lüneburg, Lüneburg. **FFB-Dok. Nr. 1**
- Available also in English as:
- Merz, J., 1994, ADJUST – A Program Package to Adjust Microdata by the Minimum Information Loss Principle, Program-Manual, FFB-Dokumentation No. 1e, Department of Economics and Social Sciences, University of Lüneburg, Lüneburg. **FFB-Dok. Nr. 1e**

7 Sonstige Arbeitsberichte, ISSN 0175-7275

Matusall, V., Kremers, H. und G. Behling, 1992, Umweltdatenbanken – vom Konzept zum Schema, Arbeitsbericht Nr. 112, Universität Lüneburg, Lüneburg. Mikrosimulation in der Steuerpolitik, 279 Seiten, Springer Verlag, ISBN 3-7908-0611-0, Berlin. *Preis: € 6,-*

Rönnau, A., 1989, Freie Berufe in Niedersachsen – Numerische und wirtschaftliche Entwicklung; Bedeutung als Arbeitgeber, Arbeitsbericht Nr. 60, Universität Lüneburg, Lüneburg. Mikrosimulation in der Steuerpolitik, 279 Seiten, Springer Verlag Berlin, ISBN 3-7908-0611-0, Berlin. *Preis: € 6,-*

Sahner, H., 1989, Freie Berufe im Wandel, Arbeitsbericht Nr. 59, Universität Lüneburg, Lüneburg. Mikrosimulation in der Steuerpolitik, 279 Seiten, Springer Verlag, ISBN 3-7908-0611-0, Berlin. *Preis: € 6,-*

Sahner, H., 1988, Die Interessenverbände in der Bundesrepublik Deutschland – Ein Klassifikationssystem zu ihrer Erfassung, Arbeitsbericht Nr. 41, Universität Lüneburg, Lüneburg. Mikrosimulation in der Steuerpolitik, 279 Seiten, Springer Verlag, ISBN 3-7908-0611-0, Berlin. *Preis: € 6,-*