## SMEs and employment dynamics: an analysis based on the Employee History

The article contains a detailed analysis of workplace dynamics in Germany, paying special attention to differences in firm size. Using the Employee History ("Beschäftigten-Historik") of the IAB we were able to include all sectors and all firms, provided that they employed at least one person liable to the social security system. The main goal of our work is to reassess the so-called "small-business hypothesis", i.e. that small and medium-sized enterprises (SMEs) are the main contributors to job growth in Germany. This reasoning is often used for setting up special programmes in favour of SMEs. In the following, we define SMEs as firms employing fewer than 500 persons.

We use the mean of the firm size in two years to categorize an establishment. Doing so, we avoid statistical pitfalls, which could otherwise easily lead to a misinterpretation of the results. Additionally, the size and structure of the data allows further distinction within the group of SME and therefore a more detailed analysis for individual firm size classes. In the period from 1994 to 2005 we observe an increase in the employment share of SME. In 2005 nearly 80 % of all social-insured workers were employed in SME. 70 % of this share in firms with less than 250 employees. Differences between the western and the eastern part of Germany are negligible. The only major difference is the share of employment of big firms with at least 500 employees, which was about 22 % in West Germany and approximately 15 % in East Germany. Existing empirical studies for Germany show a much smaller employment share of SME. The difference amounts to up to 20 percentage-points. The higher shares which are found in this study are most likely based on the inclusion of all economic sectors.

The analysis of employment gains and losses by size shows a distinct pattern. Job turnover is always highest in SMEs, they exhibit above-average contributions to both employment gains and employment losses. In 2005, SMEs contributed 87% to the employment increase but were responsible for approximately 83% of the employment losses as well. Especially the smallest firms within the group of SMEs seem to be the driving force behind this reallocation process. Such high turnover has a significant influence on the expected "life-cycle" of a job. The mean job duration is shortest, at 2.5 years, in small (West German) businesses with up to nine employees, and largest, at 11 years, in (West German) firms with more than 500 workers. The respective values for East Germany are two and seven years.

The net employment changes of the individual size classes are always above average in SMEs, regardless of the direction of the overall change. In the light of this result, the presumption that SMEs can compensate for any number of job losses in large firms, seems to be more than questionable.

Another part of the study is an application of the described analysis to single economic sectors. Such an analysis was feasible for the years 2004 and 2005 and the manufacturing and service sectors. The employment share of SMEs in the service sector is slightly smaller than its respective share in all sectors. The exclusive analysis of the manufacturing sector, on the other hand, overestimates the importance of SMEs. Employment dynamics in the manufacturing sector are high, especially in the eastern parts of Germany. SMEs with fewer than 250 workers account for 91 % of net employment change. In West Germany the corresponding share is 76 %.

Previous studies for Germany used the same methodology, but they were limited to particular federal states and/or economic sectors, in most cases the manufacturing sector. These studies showed clear results with respect to the "small-business hypothesis", i.e. its meaninglessness, but received some critique. Much of this critique was based on the suspected lack of representativeness. Our study fills this gap and still yields the same results as the previous studies. SMEs are important for the allocation and reallocation of labour, but have no distinct advantage over larger firms. Especially in periods of weak domestic economic activity, large firms exhibit relatively smaller employment losses than SMEs.