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Temporary agency work and the Great Recession

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ABSTRACT

We investigate with German data how the use of temporary agency work has helped establishments to manage the economic and financial crisis in 2008/09. We examine the (regular) workforce development, use of short-time work, and business performance of establishments that made differential use of temporary agency work prior to the crisis. Overall, our results suggest that establishments with a greater use of temporary agency work coped better with the sharp decline in demand and made less frequent use of government-sponsored short-time work schemes.

1. Introduction

The performance of the German labour market during the economic and financial crisis 2008–09 ("Great Recession") has spurred a lot of interest from academics and policy makers. Total employment in Germany remained almost constant, although output declined even more heavily than in the USA. This remarkable resilience of the German labour market has been linked to differences in the way that German establishments responded to the crisis. Rather than laying off workers on a large scale, German establishments adjusted their labour input primarily at the intensive margin, by reducing overtime, by using working time accounts, and by taking recourse to government-sponsored short-time work schemes (STW).[1]

However, there was also one source of external adjustment that German establishments have used heavily: temporary agency work (TAW). The number of temporary agency workers in Germany declined by almost 200, 000 between the second quarter of 2008 and the second quarter of 2009 – a larger absolute decline than the fall in total employment in Germany during the economic and financial crisis. The magnitude of this decline is all the more remarkable given that temporary

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[1] Section 2 provides background information on the economic and financial crisis in Germany and reviews the terms and use of government-sponsored short-time work schemes by German establishments.

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agency work accounts for only about 2% of total employment in Germany. Surprisingly, however, the role of temporary agency work has so far received little attention in studies on the "German labour market miracle". We explore this role in detail, making use of high-quality establishment panel data. In particular, we relate various employment outcomes and measures of establishments' business performance in the years 2009 (main crisis period) and 2010 (early recovery period) to the pre-crisis share of temporary agency workers in establishments' workforces.

Our main findings are the following. Between 2008 and 2009, establishments with a greater pre-crisis use of TAW experienced a larger decline in total employment (regular plus temporary agency employment) and a similar decline in regular employment. But between 2008 and 2010, they showed a (weakly significant) smaller decline in regular employment. Moreover, establishments with a greater pre-crisis use of TAW made less use of government-sponsored short-time work schemes and were less likely to report a financial loss in the main crisis year 2009. Overall, these results suggest that (the reduction of) temporary agency work served as an alternative to short-time work and that establishments with a greater pre-crisis use of TAW coped better with the sharp and unforeseen decline in demand. These results are mostly driven by the intensive as opposed the extensive margin of TAW usage, and they vary with the strength of the crisis-induced demand shock. Importantly, these results are not driven by differences in pre-crisis business performance.

Our research relates to two strands in the literature. First, we add to the existing studies on the German labour market performance in the Great Recession (Bellmann et al., 2015; Burda and Hunt, 2011; Boeri and Bruecker, 2011; Bohachova et al., 2011; Möller, 2010).[2] These studies, however, do not focus on the role of temporary agency employment as a potentially stabilizing factor. In this context, we also add to the literatures investigating external and internal means of labour input adjustment by studying the effect that TAW usage by firms has on their likelihood to take recourse to STW schemes and the intensity of their use of STW. From a policy perspective, it is of great interest to learn whether a linkage exists between such a market-mediated external and a publicly subsidized internal tool of personnel management and whether the relationship is substitutive and strong in nature.

Second, we address the more general question whether temporary agency employment is able to stabilize regular employment. In general, this question is notoriously difficult to answer as establishments choose all labour inputs jointly, taking business expectations into account. The 2008/2009 economic and financial crisis, however, provides an attractive setting for identification as the drop in demand faced by the establishments was not only exceptionally large, but also unanticipated and fast. Exploiting this variation, our study complements recent micro- and macroeconometric work for Germany by Hirsch (2016) and Jahn and Weber (2016). Hirsch (2016) uses German linked employer-employee data to analyse the relationship between an establishment's use of temporary agency work and regular workers' job stability. Hirsch finds that individual job stability among an inflow sample of jobs in Germany starting in 2002–2010 is significantly larger at establishments which use TAW than at establishments which do not. Jahn and Weber (2016), in turn, apply econometric volatility models to German time series data in the period 1999–2010 to estimate the substitution effect of TAW on regular employment at the aggregate level. Jahn and Weber (2016) also produce evidence that TAW employment buffers non-TAW employment. Not all workers in regular jobs, however, benefit from higher job stability. Young workers, migrants and low-skilled workers, who are also over-represented in TAW jobs, do not enjoy higher stability when employed in regular jobs. In contrast to the studies by Hirsch (2016) and Jahn and Weber (2016), we explicitly focus on the period of the Great Recession, which should aid identification, as it allows us to reduce concerns about reverse causality and simultaneity bias. In addition, we do not only consider regular workforce stability as an outcome, but also the use of short-time work and business performance.

The remainder of the paper is structured as follows. The next section provides some background on the German (labour market) experience during the Great Recession. Section 3 describes the data and Section 4 the empirical strategy we employ in the analysis. Section 5 presents our main results. Section 6 discusses various robustness checks we conducted. Finally, Section 7 summarizes our main findings and concludes.

2. The Great Recession in Germany

The performance of the German labour market in the Great Recession has already been studied in a number of papers.[3] We therefore review only briefly some key characteristics which serve as a starting point for our subsequent empirical analysis.

These key characteristics are illustrated in Fig. 1. The dotted line (*GDP*) shows that Germany experienced a pronounced decline in output during the Great Recession. Between the first quarter of 2008 (peak) and the first quarter of 2009 (trough), real GDP declined by 6.8% (seasonally adjusted data), a fall in GDP that is larger than the one suffered in the US (Burda and Hunt, 2011). However, the nature of the recession differed considerably between both countries. In the US, the main driver of the recession was domestic demand, which plummeted as a consequence of the bursting of the housing bubble. In Germany, in contrast, the recession was primarily export-led, a consequence of the collapse of world trade.[4] In the aforementioned time interval, 2008Q1–2009Q1, German exports declined by 16%. What is more, this decline in exports accounted for more than 100% of the decline in GDP. Although the contribution of the export decline to the fall in GDP was partly offset by a

[2] For a cross-country overview, see, e.g., OECD (2009, 2010).

[3] See Bellmann et al., 2015; Burda and Hunt, 2011; Boeri and Bruecker, 2011; Bohachova et al., 2011; Möller, 2010.

[4] According to the World Trade Organization (2010, p. 18), this was the "[. . .] largest decline in world trade in more than 70 years."