

Initiated by Deutsche Post Foundation

POLICY PAPER SERIES

IZA Policy Paper No. 128

The European Youth Guarantee: A Preliminary Assessment and Broader Conceptual Implications

Werner Eichhorst Ulf Rinne

MAY 2017



Initiated by Deutsche Post Foundation

POLICY PAPER SERIES

IZA Policy Paper No. 128

The European Youth Guarantee: A Preliminary Assessment and Broader Conceptual Implications

Werner Eichhorst IZA

Ulf Rinne

MAY 2017

Any opinions expressed in this paper are those of the author(s) and not those of IZA. Research published in this series may include views on policy, but IZA takes no institutional policy positions. The IZA research network is committed to the IZA Guiding Principles of Research Integrity.

The IZA Institute of Labor Economics is an independent economic research institute that conducts research in labor economics and offers evidence-based policy advice on labor market issues. Supported by the Deutsche Post Foundation, IZA runs the world's largest network of economists, whose research aims to provide answers to the global labor market challenges of our time. Our key objective is to build bridges between academic research, policymakers and society.

IZA Policy Papers often represent preliminary work and are circulated to encourage discussion. Citation of such a paper should account for its provisional character. A revised version may be available directly from the author.

IZA – Institute of Labor Economics

Schaumburg-Lippe-Straße 5–9	Phone: +49-228-3894-0	
53113 Bonn, Germany	Email: publications@iza.org	www.iza.org

ABSTRACT

The European Youth Guarantee: A Preliminary Assessment and Broader Conceptual Implications^{*}

This paper assesses the current situation of youth unemployment in the European Union. In this context, the main questions are whether the *European Youth Guarantee* has had any effects and how the school-to-work transitions of young individuals in Europe could be improved.

JEL Classification:	J08, J13, J21, J24, J38, J61, J68, J88
Keywords:	labor policy, labor market institutions, vocational education
	and training

Corresponding author:

Werner Eichhorst IZA Schaumburg-Lippe-Straße 5-9 53113 Bonn Deutschland E-mail: eichhorst@iza.org

^{*} Dr. Werner Eichhorst is Coordinator of Labor Policy in Europe at the IZA Institute of Labor Economics in Bonn. His main research area is the comparative analysis of labor market institutions and performance as well as the political economy of labor market reform strategies. He also specializes in different aspects of the future of labor and in European employment policies.

Dr. Ulf Rinne is Head of Scientific Management at the IZA Institute of Labor Economics in Bonn. As an empirical labor economist, he is particularly interested in the evaluation of labor policies, immigration policies, education policies and anti-discrimination policies.

1. Introduction

The Great Recession from 2008/09 increased the urgency of many labor-market related policy issues at a global, European and national level. Among these issues, youth unemployment is typically rated high, mainly because of its potentially long-lasting impacts and scarring effects on young individuals that could ultimately result in a "lost generation" incapable of catching up later in life (Cahuc et al., 2013; Schmillen and Umkehrer, 2013). Figure 1 shows that in the European Union, youth unemployment peaked around 2013, declining since then, but is still above pre-crisis levels now. The depicted share of 23.7 percent implies that more than 5.5 million youth were unemployed in that year.¹ At the same time, nearly 14 million young people were neither in employment, education or training – the so-called NEETs (Andor, 2016).

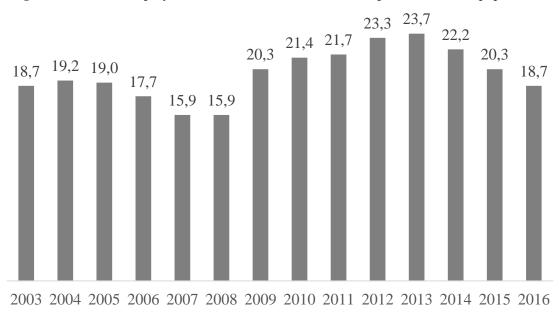


Figure 1: Youth unemployment rate in EU-28 (2000-2016, in percent of active population).

Source: Eurostat.

Against this background, a number of EU initiatives were launched since 2010, among which the *European Youth Guarantee*, proposed in December 2012, is the most prominent measure.² But also related measures such as *Youth on the Move* in 2010 and the *Youth Employment Initiative* in 2013 (with a budget of \notin 6.4 billion) are important elements of what may be labelled as a EU "action plan" to decrease youth unemployment or, more precisely, to reduce the number of NEETs.

¹ Throughout this paper, we use the United Nations' youth definition of persons aged 15 to 24 years (see, e.g., O'Higgins, 1997, for a discussion).

² See Andor (2016) for an overview about important EU initiatives since 2010.

The *European Youth Guarantee* can be viewed as an EU-wide framework comprising a system of measures to be taken by each Member State, which were for example encouraged to also use demand-side initiatives such as hiring subsidies (Andor, 2016). More generally, the *European Youth Guarantee* is "a commitment by all Member States to ensure that all young people under the age of 25 years receive a good quality offer of employment, continued education, apprenticeship or traineeship within a period of four months of becoming unemployed or leaving formal education" (European Commission, 2017).³ In this context, best practices in the context of school-to-work transitions should be transferred from well-performing countries such as Austria and Finland to all Member States (Andor, 2016).

Past examples of youth guarantees in Scandinavian countries show that these policy measures, if successfully implemented, usually involve not only adjustments of active labor market policies (ALMPs), but typically also require broader structural reforms of vocational education and training systems, general education systems and public employment services.⁴ Accordingly, the estimated costs associated with the *European Youth Guarantee* are very substantial and amount to approximately \notin 45 billion for the entire European Union (Escudero and López Mourelo, 2015).

Whether this substantial investment is worth spending, depends of course on how effective the *European Youth Guarantee* is in reaching its goals. In this context it is important to note that its aim was indeed not to eliminate youth unemployment at all, but rather to reduce the incidence of longer unemployment spells among vulnerable young individuals at a very early stage of their professional career (Andor, 2016).

2. A Preliminary Assessment of the European Youth Guarantee

Being officially launched in April 2013, 14 million young people have entered the various schemes under the umbrella of the *European Youth Guarantee* between January 2014 and October 2016, which means that on average 2 million young people were registered at any given point in time (European Commission, 2016). However, these relatively impressive figures on the number of participants are not very informative about the actual effectiveness of the program.

Also the development of youth unemployment alone may not be very helpful for assessing its effectiveness. In fact, even if the *European Youth Guarantee* would have been very successful, youth unemployment could have initially risen as (previously inactive) NEETs were activated and, as a first step, register as unemployed (Andor, 2016). However, the available evidence suggest that the *European Youth Guarantee* has so far been primarily successful in supporting unemployed

³ 13 Member States extended coverage to people under the age of 30 years (instead of 25 years as set out in the Council Recommendation; see European Commission, 2016).

⁴ Sweden, Norway, Denmark and Finland implemented youth guarantees in the 1980s and 1990s. See, for example, Escudero and López Mourelo (2015) for more details.

NEETSs rather than in bringing inactive NEETs back into employment, education and training (European Commission, 2016). As a result, EU-wide youth unemployment has indeed dropped by 5 percentage points between 2013 and 2016 (see Figure 1). Still, the question remains whether and how much of this drop in youth unemployment has been caused by the implementation of the *European Youth Guarantee* or whether a similar decrease would have also occurred in its absence (i.e., the decrease has been due to a more favorable economic situation with increasing labor demand and not due to the policy change). As the *European Youth Guarantee* cannot substitute a favorable economic environment (Andor, 2016), its impacts should be assessed against the background of given macroeconomic conditions.

Accordingly, comparing the development of youth unemployment to the evolution of adult unemployment may be more informative for assessing the effectiveness of the *European Youth Guarantee*. This comparison may give at least a first indication of its causal effects as the two age groups were similarly affected by the Great Recession. When calculating the youth-to-adult unemployment ratio, it can be shown that this ratio has practically been constant in the European Union between 2000 and 2012 (Cahuc et al., 2013). Figure 2 confirms this and additionally shows that this ratio has remained also rather constant since the implementation of the *European Youth Guarantee* – not only on average in the entire European Union, but also in many Member States. Hence, the decrease in youth unemployment during the same period. In other words: The analysis of the youth-to-adult unemployment ratio does *not* broadly confirm the statement that the decrease in youth unemployment for a statement that the decrease in youth unemployment for a statement that the decrease in youth unemployment for a statement that the decrease in youth unemployment since 2013 has been stronger than the corresponding drop in adult unemployment since 2016, which includes such a statement). One exception is the Netherlands, where the youth-to-adult unemployment ratio has indeed markedly dropped since 2013.⁵

Pastore (2015) argues along similar lines. Although his assessment is mainly based on a case study for Italy, he concludes that many Member States, especially in Southern Europe, were not very well-prepared for successfully implementing the rather ambitious elements of the *European Youth Guarantee*. Its effectiveness, however, crucially depends on a successful implementation as a first step. One could even argue that those countries that needed effective policies to reduce youth unemployment and NEET rates were exactly those countries where the institutional capacities to deliver such policies were least developed. Successful examples of early youth guarantees in Austria or Scandinavia benefitted from a highly elaborated public employment service and, all in all, more limited youth unemployment.

⁵ Note that the youth-to-adult unemployment ratio in the Netherlands started to drop already around 2009.

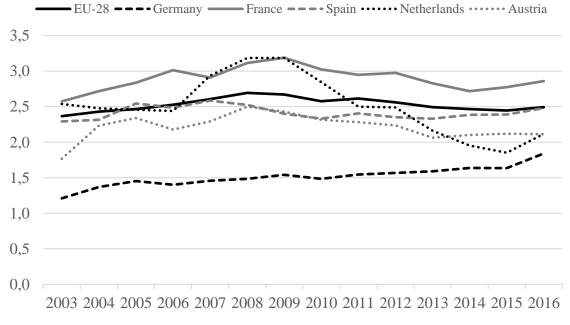


Figure 2: Youth-to-adult unemployment ratio in EU-28 and select Member States (2000-2016).

Source: Eurostat.

The challenges encountered when it came to the implementation of the *European Youth Guarantee* and the Youth Employment Initiative were analyzed more in-depth in a recent report by the European Court of Auditors (2017). While acknowledging the progress made in the EU Member States studied with respect to policy focus and the design of youth-oriented schemes, the main expectations of the *European Youth Guarantee* could not be met so far. One issue concerns the budget restrictions in countries and regions with large NEET populations; a second major obstacle concerns the limited outreach of responsible public employment service agencies as shown by only partial registration of the NEET group. Hence, it was not possible to deliver good quality offers to all young people in the target group and improve the employment situation of those concerned (see also Dhéret and Roden 2016).

Andor (2016) concludes that the *European Youth Guarantee* "provides a very good framework for seriously addressing the youth employment challenge." He adds that long-term term efforts are required, which implies that a similar perspective should be taken when evaluating its impacts. An important problem that arose during its implementation is the need for an adequate capacity of public employment services. Accordingly, Andor (2016) views the *European Youth Guarantee* as a longer-term structural reform aimed at fundamentally improving the school-to-work transition process. It is thus not primarily a crisis-related measure, but rather a measure for "repairing the precrisis models of labor markets and education" (Andor, 2016).

3. Broader Conceptual Implications

Conceptually, the *European Youth Guarantee* is a labor market policy aimed at activating young individuals and at facilitating their school-to-work transitions.

3.1 School-to-work transitions

Vocational education and training are core factors in smoothing school-to-work transitions.⁶ In this context, the quality of the education system is very important in ensuring that the skills provided match the needs of the labor market, and thus in avoiding educational mismatch. Existing studies on the relative effectiveness of different types of vocational training on the labor market outcomes of participants, mostly referring to high-income countries, are summarized in Zimmermann et al. (2013) and Eichhorst et al. (2015). Accordingly, cross-country studies typically find a comparative advantage in countries with a dual apprenticeship system (e.g., Quintini and Manfredi, 2009), although this relationship is not necessary causal. Country-specific studies also identify a relative advantage of dual apprenticeship training, in particular with respect to early labor market outcomes, as this initial advantage fades over time (e.g., Winkelmann, 1996; Plug and Groot, 1998; Bonnal et al., 2002; Parey, 2009).

It thus appears that dual apprenticeship systems are relatively effective in smoothing school-towork transitions of young individuals. Youth completing school-based vocational education and training do as well as (and sometimes better than) if they had instead remained in purely academic studies (Eichhorst et al., 2015). This is particularly the case when the occupation of the training matches the future career path. Rigorous studies evaluating the effectiveness of vocational education and training show that vocational training makes the transition to gainful employment easier and may improve wage and employment outcomes, in particular for low-ability youths and those working in low-skill jobs (Eichhorst et al., 2015). In several settings, an extension or prolongation of the academic schooling for these youth does not result in additional gains in terms of labor market entry, but instead may entail an increased risk of dropout.

Comparing across types of vocational education and training, the dual system, which is very prominent in a number of continental European countries including Germany, is more effective than alternative academic or training education at helping youth transition into employment; though no wage differences are observed. Hence, it seems fair to say that vocational training elements generate some added value both to employers providing training and to the trainees, and they facilitate the timely entry into more stable and better-paid jobs at the beginning of the working life.

Yet, given that economic and institutional conditions are highly diverse across industrialized countries, when it comes to promoting vocational education and training, policymakers need to take into account the resources available and to build on them. The ideal type of a dual vocational

⁶ This section draws on earlier work of the authors, in particular Eichhorst and Rinne (2016).

education and training model relies on the support of important societal groups that are involved, namely employers, young people and their families, trade unions, and the government. Hence, while Germany's dual system may serve as a role model for other countries (see, e.g., Eichhorst et al., 2015; Zimmermann et al., 2013), it is generally not advisable to simply copy the German model. Establishing a dual vocational training model is a demanding task that requires a longer-term perspective. Structural reforms to revive the economy and reduce entry barriers to employment are also needed, in particular a model of employment protection legislation that allows for a smoother transition from entry level jobs, also fixed-term contracts, to permanent positions. Since most countries already have some form of vocational training program, they could start with existing elements to bring vocational education and training closer to employer and labor market needs. Starting from regional and sectoral clusters of firms sharing the demand for similar skills could be a good starting point, and in countries with high shares of graduates, a closer link between higher education and practical experiences could help.

3.2 Activation Strategies

Activation strategies are rather imprecisely defined, but they usually comprise a relatively broad range of active labor market policy schemes (and are often combined with passive labor market policies; e.g., "benefit conditionality"). While it is clearly the case that "activation" constitutes an important element of the *European Youth Guarantee*, its actual impacts and effects in this specific context are yet to be determined. However, one can nevertheless assess potential and actual effects of various strategies based on currently available evaluation studies.⁷

For example, Zimmermann et al. (2013) give an overview of the available empirical evidence which is in turn based on summaries included in different studies (e.g., Card et al., 2010; Martin and Grubb, 2001; Quintini et al., 2007). However, the program effects which are discussed in this studies may not necessarily reflect the specific effects for the group of young individuals. In this context, Card et al. (2010) and, more recently, Card et al. (2015) and Kluve et al. (2016) note that most active labor market policy schemes that are specifically targeted at young unemployed individuals appear to be less effective than broader schemes targeted at the unemployed in general. Although these studies cannot establish a general hierarchy of types of interventions in terms of their effectiveness (at least not in developed countries), they stress that with a proper targeting and during recession periods, the effects of participants. At the same time, there is compelling evidence pointing towards the important role of profiling, early interventions and following-up with those young people who are most vulnerable. This type of activation should preferable take place at an early stage of their unemployment spell (e.g., Martin and Grubb, 2001; Quintini et al., 2007).

⁷ Eichhorst and Rinne (2015, 2016) perform similar, albeit more detailed, analyses.

In order to draw more specific conclusions, in particular for the group of young unemployed individuals, it is useful to review available evaluation studies of specific programs applied in specific contexts, i.e., mainly at the national level. Studies assessing the effectiveness of a single measure, i.e., the impacts of a given program that may be part of a broader activation strategy, can be most frequently found. However, studies of this type may have the disadvantage of only being able to draw conclusions that are not necessarily generalizable. In addition, when taking into account the available findings regarding the effectiveness of active labor market programs specifically targeting young people, we can clearly see that these instruments cannot solve massive youth unemployment alone – especially when labor demand is weak and when larger structural reforms are needed. Furthermore, not all active programs are equally effective, and their effectiveness also depends on the general functioning of the labor market.

Results of such studies show that attention should also be paid to paving the way for a mediumterm integration of young people into gainful and productive employment. In this context, evaluation findings that deal with subsidized temporary employment suggest that it is not necessarily a good path into regular employment as it can lead to repeated fixed-term employment, in particular in segmented labor markets and when training is underdeveloped. Subsidized employment, preferably located in the private sector, should be combined with substantial jobrelated training with employers to increase the employability and productivity of young people. Start-up support can be a useful tool to create jobs for young people and to contribute to a more dynamic development of the economy, particularly in a difficult economic environment (Caliendo and Künn, 2011). Structural reforms lowering institutional barriers to employment facilitate the working of activation policies.

Hence, when initial education has been completed, activation policies can play a certain role in promoting youth employment. Activation schemes in the form of job search assistance, monitoring and sanctioning should also not be suspended in a situation of crisis and high unemployment when labor demand is weak. Even in such a situation, which can generate long-term benefit dependency that will be hard to overcome regardless of an improving economic environment, early intervention makes sense. For example, job search assistance can be relatively effective in the short run, and it is often combined with monitoring and sanctioning. While monitoring and sanctioning certainly have to play a crucial role in any activation strategy as necessary ingredients of actual benefit conditionality, sanctioning should not be too excessive, but well-balanced and complemented with suitable supportive measures – in particular in the case of young people as they might otherwise leave the labor force (see also Caliendo and Schmidl, 2016).

Monitoring and sanctions during periods of benefit receipt are central policy tools allowing public employment services to keep track of young people, but also to check (and potentially react on) compliance or noncompliance of the unemployed through introducing obligations as part of activation policies. Such obligations can, for example, be defined in terms of accepting suitable job offers, participating in offered active labor market policy schemes, sending out a specific number of applications, or being present at meetings with the caseworker. Non-compliance with any of such obligations may result in a sanction. This could imply, for example, that welfare benefits are reduced for a specific time period, or even completely withdrawn. Sanctions therefore set incentives to comply with job search requirements, and they ultimately aim at increasing the transition rate from unemployment into employment (by combatting moral hazard).

Monitoring is a necessary tool to detect noncompliance of the unemployed with their obligations. However, the effect of monitoring alone is usually not analyzed. Instead, the empirical literature mainly focuses on the effects of sanctions on various outcomes, most importantly on the transition from unemployment to employment. Additionally, the implementation of a system of monitoring and sanctions generally requires a specific level of capacity in the public employment service.

The available empirical evidence on the effects of sanctions can be summarized as follows (see van den Berg et al., 2014, and references therein): First, most studies detect a positive impact of sanctions on job-finding rates. Second, evidence also points towards an increased probability of leaving the labor force and welfare receipt. Third, some studies suggest negative impacts of sanctions on job match quality, i.e., wages are lower and/or jobs are less stable. Fourth, findings suggests that an increased use of sanctions reduces their effectiveness (van der Klaauw and van Ours, 2013). Finally, although the vast majority of empirical studies do not explicitly focus on youth, some research indicates that the effectiveness of sanctions increases with age (at least up to a certain age; van den Berg et al., 2004; van der Klaauw and van Ours, 2013). However, a more recent study explicitly analyzing the effects of sanctions on young job seekers confirms positive impacts on the transition rate into employment also for this group, which appear moreover independent of their timing within the unemployment spell (van den Berg et al., 2014).

To summarize, activation policies in a broader sense should also be applied vis-à-vis young people, with a particular focus on the acquisition of skills early in life. While a binding link between the availability for policy interventions and the access to benefits makes sense, sanctioning should not be excessively strict in the case of young people as this might mean that they withdraw from the labor market or end up in low-skilled, more vulnerable casual jobs – and both scenarios would have long-term impacts on their career patterns.

4. Conclusions

To combat youth unemployment, many different policy areas have to be addressed simultaneously and systematically. On the one hand, the macroeconomic environment plays a crucial role in facilitating youth integration into the labor market. However, favorable economic conditions are not sufficient to solve the problem effectively. Here, institutional reforms have to set in, focusing in particular on the regulation of labor market entry by way of employment protection and through the design of school-to-work transition regimes that put strong emphasis on the acquisition of skills and competences that are relevant to the labor market. Furthermore, youth activation policies have to be reinforced so that fewer young people are excluded from promising pathways into stable employment. A combination of benefit provision with targeted active labor market policies, in particular training, is most desirable. This, in turn, depends on appropriate funds and on effective delivery agencies.

How essential these latter two factors are can be shown in context of the *European Youth Guarantee*. While this instrument probably is as good as it could be as a European measure, the actual implementation in countries with high youth unemployment falls short of initial expectations.

References

- Andor, Lásló (2016): "Youth Guarantee Four Years After EU youth employment initiatives and their evaluation," available at <u>https://www.academia.edu/30448774/Youth_Guarantee_Four_Years_After</u> (last accessed on April 12, 2017).
- Bonnal, Liliane, Sylvie Mendes and Catherine Sofer (2002): "School-to-work transition: apprenticeship versus vocational school in France," International Journal of Manpower 23(5), 426-442.
- Cahuc, Pierre, Stéphane Carcillo, Ulf Rinne and Klaus F. Zimmermann (2013): "Youth Unemployment in Old Europe: The Polar Cases of France and Germany," IZA Journal of European Labor Studies 2:18.
- Caliendo, Marco and Steffen Künn (2011): "Start-Up Subsidies for the Unemployed: Long-Term Evidence and Effect Heterogeneity," Journal of Public Economics 95(3-4), 311-331.
- Caliendo, Marco and Ricarda Schmidl (2016): "Youth unemployment and active labor market policies in Europe," IZA Journal of Labor Policy 2016 5:1.
- Card, David, Jochen Kluve and Andrea Weber (2010): "Active Labor Market Policy Evaluations: A Meta-Analysis," Economic Journal 120, F452-F477.
- Card, David, Jochen Kluve and Andrea Weber (2015): "What Works? A Meta Analysis of Recent Active Labor Market Program Evaluations," IZA Discussion Paper No. 9236.
- Dhéret, Claire and Julie Roden (2016): "Towards a Europeanisation of Youth Employment Policies? A Comparative Analysis of Regional Youth Guarantee Policy Designs", European Policy Centre Issue Paper No. 81.
- Eichhorst, Werner and Ulf Rinne (2015): "Promoting Youth Employment Through Activation Strategies," IZA Research Report No. 65.
- Eichhorst, Werner and Ulf Rinne (2016): "Promoting Youth Employment in Europe: Evidence-based Policy Lessons," IZA Policy Paper No. 119.
- Eichhorst, Werner, Núria Rodríguez-Planas, Ricarda Schmidl and Klaus F. Zimmermann (2015): "A Roadmap to Vocational Education and Training in Industrialized Countries," Industrial and Labor Relations Review 68 (2), 314-337.

- Escudero, Verónica and Elva López Mourelo (2015): "The Youth Guarantee programme in Europe: Features, implementation and challenges," Research Department Working Paper No. 4, International Labour Office (ILO).
- European Commission (2016): "The Youth Guarantee and Youth Employment Initiative three years on," available at <u>https://ec.europa.eu/transparency/regdoc/rep/1/2016/EN/1-2016-646-EN-F1-1.PDF</u> (last accessed on April 18, 2017).
- European Commission (2017): "Youth Guarantee," available at <u>ec.europa.eu/social/youthguarantee</u> (last accessed on April 12, 2017).
- European Court of Auditors (2017): "Youth unemployment have EU policies made a difference? An assessment of the Youth Guarantee and the youth Employment Initiative", Special Report No. 05.
- Kluve, Jochen, Susana Puerto, David Robalino, Jose Manuel Romero, Friederike Rother, Jonathan Stöterau, Felix Weidenkaff and Marc Witte (2016): "Do Youth Employment Programs Improve Labor Market Outcomes? A Systematic Review," IZA Discussion Paper No. 10263.
- Martin, John P. and David Grubb (2001): "What Works Among Active Labour Market Policies: Evidence from OECD Countries' Experiences," OECD Labour Market and Social Policy Occasional Paper No. 35.
- O'Higgins, Niall (1997): "The challenge of youth unemployment," International Social Security Review 50(4), 63-93.
- Parey, Matthias (2009): "Vocational Schooling versus Apprenticeship Training Evidence from Vacancy Data," mimeo.
- Plug, Erik and Wim Groot (1998): "Apprenticeship versus vocational education: Exemplified by the Dutch situation," mimeo.
- Quintini, Glenda and Thomas Manfredi (2009): "Going Separate Ways? School-to-Work Transitions in the United States and Europe," OECD Social, Employment and Migration Working Paper No. 90.
- Quintini, Glenda, John P. Martin and Sébastien Martin (2007): "The Changing Nature of the School-to-Work Transition Process in OECD Countries," IZA Discussion Paper No. 2582.
- Schmillen, Achim and Matthias Umkehrer (2013): "The Scars of Youth: Effects of Early-Career Unemployment on Future Unemployment Experiences," IAB Discussion Paper No. 6/2013.
- van den Berg, Gerard. J., Bas van der Klaauw and Jan C. van Ours (2004): "Punitive sanctions and the transition rate from welfare to work," Journal of Labor Economics 22(1), 211-241.
- van den Berg, Gerard J., Arne Uhlendorff and Joachim Wolff (2014): "Sanctions for Young Welfare Recipients," Nordic Economic Policy Review, 1, 177-208.
- van der Klaauw, Bas and van Ours, Jan C. (2013): "Carrot and Stick: How Re-employment bonuses and benefit sanctions affect exit rates from welfare," Journal of Applied Econometrics 28(2), 275-296.
- Winkelmann, Rainer (1996): "Employment Prospects and Skill Acquisition of Apprenticeship-Trained Workers in Germany," Industrial and Labour Relations Review 49(4), 658-672.
- Zimmermann, Klaus F., Costanza Biavaschi, Werner Eichhorst, Corrado Giulietti, Michael J. Kendzia, Alexander Muravyev, Janneke Pieters, Núria Rodríguez-Planas and Ricarda Schmidl (2013): "Youth Unemployment and Vocational Training," Foundations and Trends in Microeconomics 9(1-2), 1-157.