

THE MACRO-ECONOMIC EFFECTS OF ACTIVATING LABOUR MARKET POLICY

Author(s): Joost Bollens and Vicky Heylen

1. Abstract

This literature review examines the available information on the macro-economic effects of an active labour market policy (ALMP). In recent years, several micro-economic evaluations have been conducted in this field. The situation in terms of macro-economic evaluations is clearly different. The number of available macro studies is rather limited, they tend to use very different methodologies, and the search results are often contradictory.

This should not be a reason for shelving these macro-economic effects as unimportant. On the contrary even, these macro-economic effects (and a fortiori, the absence or very limited scope of these effects as suggested by contemporary empirical literature) are the ultimate test for assessing whether it makes sense to continue a given policy. In view of the social justification of the huge budgets that are going towards activating policy, it is safe to say that more money needs to be invested in such evaluations and in developing an appropriate methodology.

Key words:

Activating labour market policy; macro-economic effects; literature; survey

2. Study objectives

The active labour market policy (ALMP) aims to help more unemployed find a job again. In terms of measuring the effectiveness of an ALMP measure, over the years rather extensive experiences have been reported worldwide. The result is an extensive collection of study designs and methodologies that are adapted to various circumstances (see e.g., Blundell & Costa Dias, 2008; Imbens & Wooldridge, 2008). Most of these approaches, however, are aimed at measuring effectiveness from the micro-perspective. This is, of course, important information in order to decide whether a measure is meaningful. Imagine for example that a measure has no added value for the participant. In that case it is unlikely that the measure will be considered positive when examined at a more global level (e.g., for all participants combined).

The reverse, however, is not at all the case; not every measure which leads to a positive result for the individual participant is desirable from a societal point of view; nor does it have to be considered positive, or introduced on a general scale. There are at least three relevant remarks to be made in this frame.

(1) Firstly, in terms of advocating a generalised introduction (e.g., "every unemployed person should be obliged to follow training") it is important to realize that the effect of participation in a measure is not necessarily identical for everyone. It seems plausible to assume that measures involving voluntary participation will mainly incite people who (think that they) have the most to gain from participation to participate.

(2) A second element which influences the social desirability of a measure in spite of the beneficial effects at individual level is related to the measure's cost. If one can achieve a fully identical positive effect with a different measure, which, however, costs less for each participant, then it is obvious that the other measure is more cost-effective than the first measure, in which case, ceteris paribus, the second approach should be preferred to the first, from a societal point of view.

(3) A third and final reason why one only measures part of the macro-effectiveness of the measure based on micro findings is related to the fact that the usual effectiveness measurements only look at the effects of a measure on the participants, while overlooking the effects on non-participants. In a micro-evaluation of effectiveness we chose to base ourselves on the so-called SUTVA assumption ("Stable unit treatment value assumption"). This assumption among others means that the effect of the measure on an individual is not dependent on another individual's decision to participate. This simplifies the analysis considerably, but it comes at a cost. Social interactions and general equilibrium effects are excluded as a result.

This assumption is rather unrealistic. It assumes among others that the program's effects are the same, irrespective of whether it is a small or very big program. Because every measure involves a certain cost there is a clear indirect effect on non-participants through taxes that are levied to pay for this cost. These higher taxes may then influence the behaviour of non-participants. This is potentially negligible for an individual measure but this is no longer the case at macro-economic level. Thus, the cost of the activating labour market policy as a whole may potentially give rise to a drop in employment because higher taxes on labour lead to a reduction in the labour supply.

If we consider all these factors a wider perspective can certainly be justified and we should thus look at what can be found in literature on the macroeconomic effects of activation policy. In what follows we will mainly look at the effect of activating labour market policy on 'the rest of society'. The above questions about external validity and cost effectiveness are of course equally important, but these deserve to be dealt with separately.

3. Methods and data

We used a literature review to check the extent to which the macro-economic effects of activating labour market policy, which were predicted in theory, are also apparent in practice. Besides Richard Layard and Lars Calmfors in particular, contributed to the theoretical foundations developed in the 1990s for a legitimate active labour market policy. Calmfors et al. (2002) distinguishes six effects of active labour market policy which are briefly elaborated upon below.

(1) Effects on the matching process

The various activation activities organised by the public employment agency, such as mediation between supply and demand and counselling to jobseekers, are aimed at achieving greater efficiency in the matching process, i.e., arriving at a greater number of matches for a given number of vacancies and jobseekers.

(2) Effects on the mutual competition for available jobs

Active labour market policy measures, moreover, can also lead to the participants becoming more attractive for the labour market so that the competition for available jobs increases.

(3) Effects on the productivity of jobseekers

Various forms of ALMP, i.e., training as well as work experience programs, can increase the productivity of participants.

(4) Effects on the distribution of labour across sectors

Labour can be shifted from stagnating sectors to expanding sectors by means of training and other measures.

(5) Direct crowding out effects (crowding out)

A potentially adverse effect of an ALMP could be that it leads to the crowding out of regular employment. The risk of this happening is probably the greatest for employment subsidy measures. This can happen if the workers hired based on subsidies are substitutes (and not complements) for current employees.

(6) Adjustment effects, with implications for wage formation

Calmfors finally also mentions a number of effects that may help reduce the welfare difference between employed individuals and unemployed individuals as a result of participation in an ALMP.

Table 1 gives a synthesis of the various effects of ALMP as listed by Calmfors et al. (2002) as well as the direction of the expected effect. The only clear conclusion which can be drawn based on this table is that determining the direction of the effect of ALMP on wages and on employment is an empirical matter; in theory it can go either way.

Table 1 The effects of an ALMP

	Wages, employment aspect (wage-pressure)	Employment, wage aspect	Net effect on regular employment
Matching efficiency	- (?)	+ (?)	+ (?)
Competition	- (?)	0	+ (?)
Direct crowding out	0	-	-
Adjustment effect	+ (?)	0	- (?)
Productivity of participants	(+)	+	+/(0)
Allocation across sectors	-	0	(?)

Source: Calmfors et al., 2002, p. 16

4. Findings

4.1 Measurement and estimation problems

A macro-approach of the effects of ALMP will for example concentrate on whether a country that uses ALMP more frequently achieves better results in terms of employment than a country that uses it less frequently. As a result a measure which indicates the intensity of ALMP is required. In practice the expenditure and/or the number of participants are used to examine the intensity of the policy, but there are some problems associated with this approach.

The OECD (1993) for example refers to aspects of an active policy that do not cost a thing as such, e.g., the adaptation of a regulation. Moreover, a country with a more cost-effective ALMP, compared to a country with a less cost-effective ALMP, *ceteris paribus* may probably have to spend less to achieve the same employment effect. One may thus (wrongly) deduce that the effect of ALMP on employment is negative, when measures based on expenditure.

The so-called endogeneity is even more problematic. If one wants to determine whether a more intense ALMP also leads to lower unemployment in practice this is often impossible because of the fact that when unemployment rises one tends to rely on ALMP more frequently and vice versa.

4.2 Empirical results in literature

Calmfors et al. (2002) provide an overview of various macro-economic studies that were available at the time regarding the situation in Sweden. Based on this overview, they conclude that the overall picture regarding the macroeconomic impact of ALMP in Sweden is rather disappointing. For starters, there is little evidence to be found for the fact that ALMP would lead to a more efficient matching process; this is due first and foremost to the lack of empirical data. A number of studies relating to geographical mobility, a sub-aspect of job matching, suggest that this would decrease as a result of ALMP (among others because of locking in effects, which certainly occur in subsidised employment). Based on survey results and on econometric studies they then establishes significant crowding out effects in those job creation programs that are closest to ordinary regular employment. No crowding out was established in educational programs. The effect of the activation programs on wage formation is unclear; some studies suggest that there is an upward pressure, while others suggest that there is no such thing. Then there are reduced-form estimates (reduced-form estimates indicate the final overall net effect on e.g., employment, i.e., the sum of all individual effects discussed in section 3). Based on various studies is the suggestion that ALMP (or at least subsidised employment) is at the expense of regular employment, although it also manages to reduce open unemployment. The most positive effect of ALMP finally relates to labour market participation, which seems to have increased due to large programs.

These were the results for Sweden. It is worth bearing in mind that the Swedish situation, especially in terms of the use of ALMP cannot be compared without conditions to the Belgian or Flemish situation. Calmfors concludes his study saying that the scale of ALMP in Sweden in the period prior to the study was too great. To be more effective ALMP should be reduced. More emphasis should be placed in particular on keeping long-term unemployment in general as low as possible and on reducing the emphasis on youth programs.

This raises the question whether new studies have since been published, which arrive at other insights as regards the situation in other countries. Kluve et al. (2007) give an overview of a number of recent macro-economic studies relating to ALMP. Below is a brief summary of this overview. A study regarding Spain (Davia et al., 2001) concluded that training programs among others give rise to a significant drop of unemployment rates. By contrast training programs do not contribute to increasing employments. A study regarding the Netherlands (Jongen et al., 2003) looks at the macro-economic impact of, among others, subsidised employment in the private sector, and training in the public sector. The training programs increase participants' employment opportunities but also lead to crowding out and thus to a lower output. Subsidies in the private sector only have a limited employment effect; they do however increase output and are thus more effective than the training programs in terms of their balance. In Albrecht et al. (2005), the Swedish "Knowledge Lift" program is evaluated. This program focuses on the competences of unskilled workers and the unemployed. They conclude that there are positive effects for the participants, as well as a shift in the composition of the two competence groups (i.e., low-skilled and not low-skilled) in terms of the type of job. Increasing the competences of low-skilled so they become medium-skilled workers increases the number of vacancies and the wage level of the medium-skilled; the remaining low-skilled workers, however, face a drop in wages and encounter more difficulties when trying to find a job. The global general equilibrium effects are finally still 1.5 to 2 points higher than the (positive) effects at the individual level. According to Johansson (2001), the Swedish labour market programs have clearly had a positive effect on labour market participation (an effect which has already been repeatedly mentioned in Calmfors's overview for Sweden). These positive effects are only temporary, however. The author does state, however, that labour market programs may potentially play a role to compensate for cyclical shocks; they can prevent individuals from dropping out of the labour market during a cyclical downturn. Hujer and Zeiss (2003, 2006) studied training measures and direct job creation in West Germany. They concluded that the job creation programs had a negative and significant impact, which heavily limited participants' jobseeking efforts. The

created jobs failed to increase a jobseeker's chances of finding a regular job. No effects were established for training programs. During the period studied the demand for labour was falling; the authors suggest that programs aimed at the job supply are less appropriate in periods of falling issues. In Hujer et al. (2006) the authors also examined job creation and professional training, but this time from the perspective that there possibly was a difference between West and East Germany. For West Germany, they concluded that job creation programs only have a short-term positive effect, but that they are incapable of reducing the number of jobseekers in the longer term. Professional training, by contrast, does have a positive effect on the labour market situation, in the short and long term. The results regarding East Germany were less precise. Job creation programs do not seem to have an effect on the unemployment rate either. The situation was not clear for training programs. Fertig et al. (2006) also examined ALMP in Germany. Training programs for low-skilled unemployed individuals have a positive effect on the net outflow from unemployment. They also concluded that there were positive effects for wage subsidies; here too public employment programs (in East Germany) have a clear negative impact on the net outflow from unemployment.

In a Finnish study (Kangasharju & Venetoklis 2003), the effect of wage subsidies on employment in the companies is examined. There is a positive impact on employment, but the effect is not sufficiently large to offset the substitution effect. Furthermore, subsidies are mainly a substitute for private expenditure by companies. There is no evidence of a crowding out effect; employment in subsidised firms is not at the expense of non-subsidised firms in the same sector and geographical region. Van der Linden (2005) examines the effect of mentoring programs on Belgian unemployed. He believes that an increased inflow in these programs can have a positive direct impact on employment, but he also established an indirect negative effect because of shifts in terms of wages and because of a change in the searching behaviour of non-participants. Boone & Van Ours (2004) examined the impact of training, assistance in finding a job through the public employment agency and of subsidised jobs for the OECD 20. They established positive effects on labour market training and on the activities of the public employment agency; the effects in terms of reducing unemployment rates based on labour market training were the greatest. The subsidised jobs, by contrast, do not have a positive effect on unemployment rates. Boone et al. (2007) explores how an optimal unemployment insurance can be combined with follow-up and sanctioning mechanisms. They conclude that the introduction of monitoring and sanctions lead to a welfare improvement.

This ends the review of empirical studies on the macro-economic effects of ALMP. Compared with the literature on microeconomic efficiency, where dozens of assessments are available, the harvest in terms of macro-evaluations is clearly meagre. This bias may be related to the fact that the macro-perspective is naturally more abstract than the more tangible micro-perspective, which examines the direct effect of a concrete measure on the labour market situation of concrete and identifiable participants. The more abstract character potentially means that macro studies are seemingly deemed less useful by policy-makers so that fewer funds will be earmarked for this.

If one tries to deduce a number of main conclusions from the above overview the first conclusion is that this is not such a simple effort and that there are (apparent) contradictory results. It should be noted however that there are several elements which complicate the comparability of the studies:

- general concepts such as "a training program" or "a job creation program" can cover very different realities, with differences in design, duration and intensity, differences in the conditions, etc. So not everything is always comparable;
- there can also be significant differences between the labour markets of different countries (other institutions, unemployment rate levels, etc.), and of course the macro effects of ALMP interact between ALMP and the global labour market. The state of the economy, which means that the effects of the same program in the same country can also vary over time, may also potentially play a role here (or within one and the same country with very different regions);
- it is also worth noting that despite the limited number of evaluations found about macro effects very different methodologies were used: results based on VAR models, equilibrium search models, or simply based on a survey, etc. At the same time we also noted that there are many target variables in this literature: while one study measures the effect on unemployment rates, another looks at the impact on employment or at the search behaviour of jobseekers or at the number of vacancies, at wage formation and welfare, at labour market participation, etc. And naturally these target variables also involve short-term and long-term effects. The many objectives also reflect the complexity and multidimensional nature of the macro-effects (as was also demonstrated by Calmfors's theoretical list in the previous section), but it certainly does not facilitate comparisons.

Taking into account these observations, the following preliminary conclusions can be drawn from the overview of the empirical material:

- there are some indications that training programs may have a positive effect on employment, although there are also studies that state that this potentially positive effect is offset by crowding out effects;
- a fairly systematically negative effect was established for direct job creation programs. Given that the same systematic negative effect was established for these measures in the micro-economic studies, this result may be gradually considered as fairly solid;

- the results relating to subsidies for private employment are mixed; positive employment effects have been found, but there are also significant substitution effects. Possibly the effect strongly depends on the design and the practical details of the measures;
- mixed results have been found in (a very limited number of) studies regarding job search assistance and other counselling facilities for jobseekers, as well as regards the follow-up of search efforts, associated with sanctions.

These conclusions should be examined with the necessary caution – except for the conclusions relating to direct job creation - in view of the limited number of studies, which do not always arrive at the same conclusion. More systematic research is definitely recommended.

5. Conclusions and policy implications

Many micro-economic evaluations have been conducted in recent years. The situation in terms of macro-economic evaluations is somewhat different, as is evidenced in this review. The number of available macro studies is rather limited, they tend to use very different methodologies, and the search results are often contradictory.

But this can not be a reason for shelving macro-economic effects as unimportant. On the contrary even, these macro-economic effects (and a fortiori, the absence or very limited dimension of these effects as suggested by contemporary empirical literature) are the ultimate test for assessing whether it makes sense to continue a given policy. In view of the social justification of the huge budgets that are going towards activating policy, it is safe to say that more money needs to be invested in such evaluations and in developing an appropriate methodology.

Full reference of study report(s) and or paper(s) and other key publications of the study summarised here

Bollens, J., & Heylen, V. (2010). *De macro-economische effecten van het activerend Arbeidsmarktbeleid. Een literatuurstudie. WSE Report 2010.*

Albrecht, J., van den Berg, G., & Vroman, S. (2005). *The Knowledge Lift: The Swedish Adult Education Program That Aimed to Eliminate Low Worker Skill Levels*. IZA Discussion Paper No.1503.

Blundell, R., & Costa Dias, M. (2008). *Alternative Approaches to Evaluation in Empirical Micro-economics*. IZA Discussion Paper No.3800.

Boone, J., & Van Ours, J. (2004). *Effective Active Labour Market Policies*. IZA Discussion Paper No.1335.

Boone, J., Fredriksson, P., Holmlund, B., & Van Ours, J.C. (2007). Optimal unemployment insurance with monitoring and sanctions. *Economic Journal*, 117(518), pp. 399-421.

Calmfors, L., Forslund, A., & Hemstroem, M. (2002). *Does Active Labour Market Policy Work? Lessons from the Swedish Experiences*. CESifo GmbH.

Calmfors, L. (1994). Active labour market policy and unemployment, a framework for the analysis of crucial design features. *OECD Economic Studies*, 22, pp. 7-47.

Davia, M, García-Serrano, C., Hernanz, V., Malo, M. A., & Toharia Cortés, L. (2001). Do Active Labour Market Policies Matter in Spain?. In J. de Koning, & H. Mosley (Eds.), *Labour market policy and unemployment: impact and process evaluations in selected European countries*.

Fertig, M., Schmidt, C., & Schneider, H. (2006). Active Labour Market Policy in Germany - Is There a Successful Policy Strategy?. *Regional Science and Urban Economic*, 36(3), pp. 399-430.

Hujer, R., & Zeiss, C. (2006). *Macro-economic Effects of Short-Term Training Measures on the Matching Process in Western Germany*. IZA Discussion Paper No.2489.

Hujer, R., & Zeiss, C. (2003). *Macro-economic impacts of ALMP on the matching process in West Germany*. IZA Discussion Paper No.915.

Hujer, R., et al. (2006). Macro-econometric Evaluation of Active Labour Market Policies in Germany - A Dynamic Panel Approach Using Regional Data. In F. E. Carloeo, & S. Destefanis. (Eds.), *The European Labour Market - Regional Dimensions*. Physica Verlag, pp. 287-310.

Imbens, G., & Wooldridge, J. M. (2008). *Recent Developments in the Econometrics of Program Evaluation*. IZA Discussion Paper No.3640.

Johansson, K. (2001). Do labour market programs affect labour force participation?. *Swedish economic policy review*, 8(2), pp. 215-34.

Jongen, E., van Gameren, E., & Graafland, J. (2003). Exploring the Macro-economic Impact of Subsidised Employment. *De Economist*, 151(1), pp. 81-118.

Kangasharju, A. & Venetoklis, T. (2003). *Do wage-subsidies increase employment on firms?*. VATT Discussion Paper 304.

Kluve, J. (2007). *Active Labour Market Policies in Europe: Performance and Perspectives*.

Layard, R., Nickell, S., & Jackman, R. (1991). *Unemployment. Macro-economic Performance and the Labour Market*. Oxford: Oxford University Press.

OECD (1993). *Employment Outlook*. Paris: OECD.

Van der Linden, Bruno. "Equilibrium evaluation of Active Labour Market Programmes Enhancing Matching effectiveness." IZA Discussion Paper No.1526 (2005).