Do Public Works Programmes Work?

A systematic review of the evidence in Africa and the MENA region
Map of countries with public works programmes and evaluations

- Public works programme with robust evaluation
- Public works programme without robust evaluation
- No public works programmes
- Upper middle or high income countries (excluded from review)
The trend for conducting rigorous impact evaluations of development interventions has prompted many researchers to start looking more closely at public works programmes (PWPs). This policy brief summarises the main lessons that can be drawn from these studies for Africa and the Middle East and North Africa (MENA) region. It is based on a comprehensive systematic review (Beierl and Grimm 2018), which was commissioned by the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH on behalf of the German Federal Ministry for Economic Cooperation and Development (BMZ). The systematic review is an attempt to reveal factors and design features that are likely to increase the probability of interventions being successful. First and foremost, the review underlines how little we know about the effectiveness of PWPs and especially about the impact of the assets that are created through these programmes. Yet, as long as strong evidence on the effectiveness of PWPs remains absent, there is little reason to favour them over simple cash transfer programmes.
The rationale of public works

Public works programmes, often also known as cash-for-work programmes, include a wide range of interventions which share the common objective of income stabilisation through the provision of temporary paid work and asset creation, but which differ in terms of their prioritisation, exact programme design, and mode of implementation. In practical terms, they all entail the payment of a wage (in cash or in kind) by the state, or by an agent acting on its behalf, in return for the provision of labour (McCord 2012). In a nutshell, PwPs are expected to yield positive impacts through three main channels: first, through the wage that is paid to those working on a public works site and that may have a more or less effective insurance function; second, through the productive assets created, which are intended to benefit the wider community or a more specific group, depending on the type of asset in question; and third, through the skills learned by participants that improve their employability or their capabilities to boost income from self-employment.

Four types of public works programme

Four types of PWP can be distinguished. The first two types to mention are programmes with a short-term focus (Type 1) and programmes with a medium- to long-term focus (Type 2). The key difference between these two is the duration, continuity and predictability of the employment offered to individual beneficiaries. The remaining two types result when the employment offered is accompanied with complementary measures, such as a fertilizer subsidy programme or training, in which case the programmes are classified as Type 1 Plus or Type 2 Plus respectively.

The evidence summarised in this policy brief is based on a detailed analysis of 28 rigorous impact evaluations covering activities in seven different countries. However, most of these studies assess public works in Ethiopia, with only six covering other African countries (Côte d’Ivoire, Ghana, Malawi, Sierra Leone and Rwanda) and just one analysing a MENA-region country (Yemen). As the overview below shows, with the exception of the studies on Ethiopia’s Productive Safety Net Programme (PSNP), all the reviewed studies assess Type 1 (Plus) programmes.
<table>
<thead>
<tr>
<th>Author(s)</th>
<th>Country</th>
<th>Programme acronym</th>
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<td>Bertrand et al. (2017)</td>
<td>Côte d’Ivoire</td>
<td>PEJEDEC-THIMO</td>
<td>1 (Plus)</td>
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<tr>
<td>Gilligan &amp; Hoddinott (2007)</td>
<td>Ethiopia</td>
<td>EGS (Employment Generation Schemes)</td>
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<td>Bezu &amp; Holden (2008)</td>
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<td>FFW</td>
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<td>Ethiopia</td>
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<td>Gebrehiwot &amp; Castilla (2016)</td>
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<td>Gilligan et al. (2009a)</td>
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<td>Osei-Akoto et al. (2014)</td>
<td>Ghana</td>
<td>GSOP-LIPW (Ghana Social Opportunity Project - Labour Intensive Public Works Programme)</td>
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<td>Beegle et al. (2017)</td>
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<td>MASAF III (Malawi Social Action Fund Public Works Programme - Phase 3)</td>
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<td>Hartwig (2013)</td>
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<td>Rossa &amp; Sabarwal (2016)</td>
<td>Sierra Leone</td>
<td>YESP/CW (Youth Employment Social Support Project/Cash for Work)</td>
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<tr>
<td>Christian et al. (2015)</td>
<td>Yemen</td>
<td>LIWP (Labour Intensive Work Programme)</td>
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Source: Beierl & Grimm, 2018
What have these programmes achieved?

When it comes to the impacts PWPs have on income and consumption, the striking finding is that only a handful of studies find positive impacts, while the majority detect no or no robust impacts. Half of the studies that do find positive effects assess the short-term effects of Type 1 PWPs (Côte d’Ivoire, Ethiopia and Sierra Leone). They therefore mainly capture the direct income-effect of the wages received rather than the post-programme impacts. Interestingly, the two studies that do also cover longer-term effects (Type 2) are from Ethiopia and involve situations where payments for work were not solely made in the form of cash but instead were made in the form of food only or a mixture of cash and food. In the few cases where beneficiaries experienced an increase in income from self-employment – all of which are set in a semi-urban context – no increase in the share of households engaged in self-employment or in hours worked in self-employment could be found. The increase in self-employment income is therefore due to an increase in the profitability of existing activities (i.e. growth at the intensive but not extensive margin).

Consistently, none of the evaluations provides robust empirical evidence that a PWP of any type generates sustainable extra employment over and above the public works employment, neither in the medium nor in the long term. There is also no indication that there are crowding-out effects – i.e. that offering public works employment replaces other economic activities of beneficiary households.

Of the 25 studies that investigate impacts on food consumption and food security, 19 cover Ethiopia. Of these, all but one assess the PSNP and its variants. The overall picture is positive for Ethiopia’s PSNP (Type 2 [Plus]), whereas it is inconclusive for the Type 1 PWPs run in other countries (Ghana, Malawi, Rwanda and Sierra Leone). However, in the case of Ethiopia it has not been investigated whether the benefits gained by participating households extend beyond the latter’s time on the programme.

Almost all the evidence on the topic of nutrition comes from Ethiopia’s PSNP. While the Ethiopian studies mostly focus on anthropometric outcomes, the two other studies (from Malawi and Yemen) addressing this topic only investigate dietary diversity outcomes. Overall, the findings from Ethiopia on anthropometric outcomes are inconclusive, irrespective of whether one looks at acute undernutrition (measured through WHZ and wasting), chronic undernutrition or both. An evaluation of an Ethiopian Type 1 PWP found no strong indications of reductions in acute or chronic undernutrition. So far, there is also no robust evidence for improvements in education.

The Type 2 Plus variant in Ethiopia seems to outperform the other variants with respect to asset accumulation, especially of livestock. However, no robust evidence has yet been produced that sheds light on the question of whether asset accumulation persists beyond the point after which households no longer benefit from the programme. Regarding other design features, the Type 2 variant that pays wages in the form of food performed better in terms of asset accumulation than the mixed payment modality which, in turn, performed better than the cash-only variant. Ultimately, too few studies are available to draw any significant conclusions, especially beyond the case of Ethiopia.
Figure 1: Evidence patterns for all outcome areas at a glance

Studies with no significant effects
Studies with significant positive effects
Studies with inconclusive or significant negative effects
Regarding agricultural technology adoption, the PSNP’s regular Type 2 Plus variant on the whole performs well and outperforms the regular Type 2 variant (especially with respect to fertiliser use and the adoption of stone terracing and fencing). However, this does not in all cases translate into tangible increases in agricultural production. Agricultural technology adoption has been rarely investigated in the context of Type 1 programmes.

In short, the findings both overall and in most outcome areas are quite heterogeneous. This implies that the assumed benefits of PWPs can by no means be taken for granted, even with respect to the limited objective of enabling consumption smoothing. In fact, for all the outcome areas investigated in the systematic review that are expected to be positively influenced by PWPs, there are in each case some studies that support this expectation and some that do not. However, since for each outcome area, we found at least some programmes that meet their objectives, we conclude not that PWPs are ineffective per se, but rather that they can be effective under certain conditions. These conditions include in particular the PWP’s specific design and implementation features.

Another striking feature of the literature reviewed is that it contains almost no evidence on impacts stemming from the assets created through the public works and from the skills inculcated through training or on-the-job practice. Almost all the evaluations limit their analysis to the wage paid or the total net effect without disentangling from this what the direct wage-effect is and what is due to the two other channels of assets and skills.

What are the lessons learned from cash-for-work programmes in countries neighbouring Syria?

In response to the situation in Syria, BMZ launched the Partnership for Prospects initiative that provides refugees and local people from host communities with cash-for-work activities that offer readily available opportunities for income generation.

These cash-for-work measures include (i) local services (simple tasks like collecting waste), (ii) labour-intensive infrastructure projects (building homes, schools and roads), (iii) the financing of wages (additional teachers and classroom assistants as well as health personnel), and (iv) in the long run, the rebuilding and repair of municipal infrastructure (buildings and roads) in liberated areas.

So far, no rigorous evaluation has been undertaken to assess how effective these programmes have been in achieving their objectives. However, information drawn from project monitoring activities suggests that, by mid 2017, more than 110,000 jobs had been offered under the initiative. If the families of those holding these jobs are included, then both directly and indirectly the initiatives will have reached around 300,000 people. The monitoring also suggests that a large proportion of these jobs also served to alleviate the stress on public infrastructure in the regions that are hosting many of the refugees. At a later stage, impact evaluations will have to be conducted that compare the measures and their benefits against a hypothetical situation in which the measures were not implemented. It will also be necessary to investigate the cost-effectiveness of these measures in comparison to alternative safety nets.
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Why do some programmes work and others not?

Regarding implementation, it should be noted that, compared to regular cash transfers, PWP are much more demanding administration-wise, which introduces a number of additional potential pipeline breaks. While some of the studies analysed in the systematic review contain information on whether and where implementation fell short, they offer limited rigorous evidence of how this affected impacts.

In addition, differences in the transfer value (i.e. wage rate times number of workdays) may also partly explain differences in the observed outcomes. The key lesson that can be drawn from the literature regarding the transfer value is that it is often too low, not paid regularly and not adjusted in line with inflation. That said, implementers do, of course, need to keep an eye on market wage rates in order to prevent crowding-out effects. For this reason, extending the employment duration (i.e. shifting from Type 1 towards Type 2) may be a more sustainable option to increase the transfer value for beneficiaries.

Which PWP model is appropriate in what context?

If recommendations on programme design were to be formulated based on the most positive available evidence for each PWP type, they might be as follows (note that more rigorous testing is needed to confirm these):

- Programmes offering short-term employment at low wages (Type 1) only seem suitable in contexts of acute poverty and to achieve a few basic objectives, such as enabling short-term consumption smoothing.

- In contexts where chronic poverty and underemployment are widespread and persistent throughout the year, having PWP that pay adequate wages over an extended period (Type 2) may enable beneficiaries to (a) accumulate enough savings and assets to build some resilience against minor shocks and (b) accumulate assets and make productive investments that are at least sufficient to marginally boost post-PWP income. However, such PWP are unlikely to reduce poverty on any significant scale and are not a complete substitute for responses to severe (especially covariate) shocks.

In order to reach the poorest and enable them to draw tangible benefits from employment that improve their livelihoods, the targeting mechanism needs to be more sophisticated than a system that relies solely on self-targeting based on low wages.
Conclusion

As the rigorous evidence that is available largely fails to cover the role played by the created assets and skills in achieving the observed outcomes, for the time being the case for PWPs vis-à-vis alternative social protection instruments such as cash transfers mainly rests on assumed benefits and theoretical deliberations. Furthermore, it has been insufficiently investigated whether combined effects realised through the three potential channels – wages, skills and assets – persist beyond the programme duration. More research and thorough evaluations are needed to find out whether public works programmes can work and what conditions and design features are likely to enable them to realise their full potential. This review is a starting point for this endeavour. Looking ahead, the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH, on behalf of the German Federal Ministry for Economic Cooperation and Development (BMZ), and the University of Passau are planning a collaborative research project on PWP experiences and experiments in Malawi, the aim of which is to close many of the remaining knowledge gaps.

References

Studies included in systematic review


Other references


On behalf of the

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