

# The impact of vocational training interventions on youth labor market outcomes: A meta-analysis.

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## Abstract

We use meta-analysis methods to analyze the impact of vocational training interventions on youth labor market outcomes. Our sample covers 1651 effect sizes from 97 experimental and quasi-experimental impact evaluations conducted between 1990 and 2019. We employ random-effects robust-variance estimation (RVE) to account for interdependence across effect sizes estimates within interventions. Results from univariate models indicate an overall small, positive and statistically significant impact of training interventions (Hedges'  $g=0.116$ ,  $SE=0.01$ ). We found slightly larger effects on earnings than on employment outcomes and in lower-middle income countries (LMICs) than in high income countries (HICs). We identify six key findings from multivariate estimations. First, we observe impacts to be considerably larger when estimated on unconditional labor market outcomes. Second, we observe smaller returns for male participants. Third, we estimate that training programs designed in collaboration with the private sector or NGOs outperform interventions designed solely by the public sector. Fourth, interventions taking place only in classrooms provide lower impacts than workplace-based and combined training. Fifth, in HICs we observe medium (400-800 hours) and long (>800 hours) training interventions to provide higher returns, while in LMICs short (<400 hours) programs perform better. This suggests the importance of signaling and screening mechanisms - beside human capital accumulation - in LMICs. Sixth, the impact of training in HICs seems to be consistent also in the long term (>2 years after program end), while in LMICs it declines already in the medium term (1 year after program end).

**Keywords:** Youth employment, Vocational skills, Training programs, Impact evaluations, Meta-analysis

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