

A small open economy with a large automotive sector and growing robot exposure: A case study of Slovakia

Matěj Bělín*

Abstract

This paper provides worker-level estimates of the impact of robotic technologies on labour-market outcomes in Slovakia between 2004 and 2022. Using an instrumental-variables approach, we identify positive effects of robot adoption on wages consistent with earlier findings. In terms of employment, we found very small and statistically insignificant effects of robots, which supports results from Czech and Dutch firms. The Slovak estimates point to increased productivity among robot-adopters, which, in turn, creates new employment opportunities rather than displacing human labour.

*Social Policy Institute, Ministry of Labour, Social Affairs and Family of the Slovak Republic