

Editors' Overview

We are pleased to feature in the 41st issue the *International Productivity Monitor* a symposium on the relationship between productivity and pay, an important topic the journal has addressed on many previous occasions. The contributions in this symposium provide up-to-date estimates on this relationship for the United States, the United Kingdom and Canada. In addition, they offer new and original interpretations of what is driving the gap between productivity and pay, and the different ways it has manifested itself across those three economies.

The first article of the symposium by **Jacob Greenspon, Anna Stansbury** and **Lawrence H. Summers** provides a comparative perspective between Canada and the United States. The authors make a distinction between two sources of the gap between productivity and pay: *divergence* which measures the degree to which productivity has grown faster than pay, and *delinkage* which refers to the degree to which incremental increases in the rate of productivity growth translate into incremental increases in the rate of growth of pay. The authors find that while *divergence* has occurred in both countries, there has been little *delinkage* as periods of faster productivity growth also saw an increase in pay. This implies that pro-productivity policies tend to raise middle class incomes.

The second article by **Andreas Teichgräber** and **John Van Reenen** finds much less of a decoupling between productivity and median wages in the United Kingdom than other studies have found for the United States. The divergence they do find is largely explained by rising wage inequality and to a lesser extent by a rise in non-wage compensation costs. The authors also address the relatively large role of lower increases in compen-

sation of self-employed workers for their activities because of the relatively large share of “solo self-employed” and a large fall in hours worked by the self-employed.

The third article by **Lawrence Mishel** and **Josh Bivens** provides complementary arguments to the observation in the first article that factors which are independent to productivity growth have been driving productivity and typical pay in the United States further apart. Excessive unemployment, eroded collective bargaining, and corporate-driven globalization explain more than half of the divergence according to the authors, where a diminished overtime salary threshold, employee misclassification, employer-imposed noncompete agreements, and corporate fissuring-subcontracting and major-buyer dominance also explain a fair component.

The final article in the symposium by **Andrew Sharpe** and **James Ashwell** shows that the gap between productivity and real median wage growth in Canada has fallen quite considerably since 2000. They argue that the bargaining power of workers fell dramatically in the last quarter of the 20th century due to high unemployment, falling unionization rates and a rising import share, but that since 2000

trends in these factors have reversed or stabilized since.

Together the four articles in this symposium provide good and bad news for the majority of wage earners in the three countries under consideration. On the positive side, productivity remains a key driver of earnings. However, on the negative side, the link between productivity and pay is often affected by other factors, not directly related to pay, but due to institutions, labour market imperfections and political preferences regarding income policies, taxation, etc. Restoring the link could also be an important incentive for reverse causality, namely that higher wages could provide an incentive to productivity.

For decades the Penn World Table (PWT) has been a widely used data resource on comparative measures of prices and income levels. In the most recent versions of PWT, starting with 8.0, measures of output and productivity have also been introduced, and the last version 10.0 now includes such time series for 183 economies from 1950 to 2019. Surprisingly, in the latest version, several less developed countries have a total factor productivity (TFP) level well above that of the United States. The article by **Robert Inklaar** and **Pieter Woltjer** discuss the case of Egypt, which in 2017 had a TFP level 123 per cent that of the United States. They trace this anomalous outcome to the underlying measurement and modelling issues on comparative inputs. The authors argue that the development accounting frame-

work in PWT is a useful guide to distinguishing outliers from regular patterns in the data.

The dispersion of productivity within industries has been a key topic for productivity researchers, as the issue is pervasive across countries, industries and time. The article by **Cindy Cunningham, Sabrina Wulff Pabilonia, Jay Stewart, Lucia Foster, Cheryl Grim, John Haltiwanger** and **Zoltan Wolf** uses new dispersion measures on productivity in US manufacturing industries, describing how periods of innovation are initially associated with a surge in business start-ups, followed by increased experimentation that leads to rising dispersion potentially with declining aggregate productivity growth, and then a shakeout process that results in higher productivity growth and declining productivity dispersion.

In the Spring 2021 issue of the *International Productivity Monitor*, we published a review article by Bert Balk of the volume *Measurement of Productivity and Efficiency: Theory and Practice* by **Robin Sickles** and **Valentin Zelenyuk**. In a response to this review article, the authors explain how the material they cover in the first seven chapters of their book builds on and expands in important ways Balk's own book, *Industrial Price, Quantity, and Productivity Indices: The Micro-Economic Theory and Applications on Productivity*, which was published more than twenty years ago.