

Opinion | 25 April 2019

# Slavo Radosevic: A more proper innovation mix for CEE countries

The future growth of Central and Eastern European economies is hugely dependent on technological advances and exporting, therefore improving their positions in global value chains is highly essential, writes Slavo Radosevic from UCL, in IZA World of Labor



Kids playing with a robot prototype in the Copernicus Science Centre in Warsaw

# CEE future growth dependant on technology

The future growth of Central and Eastern European economies is hugely dependent on technological advance and exporting, therefore improving their positions in global value chains is highly essential. For this reason, current policies mainly focus on Research and Development (R&D), yet often neglect the sources of productivity growth, such as quality and management skills or engineering. That's according to Slavo Radosevic, Professor of Industry and Innovation Studies at University College London. His full article in IZA World of Labor is found <a href="https://example.com/here-

Professor Radosevic askes: What is the optimal mix of policies to promote modernisation and structural changes in the region? Is it enough to copy developed countries' innovation strategy to catch up with them?

The concept of innovation is traditionally that domestic research produces innovation that leads to

Opinion | 25 April 2019

economic growth. However, this is not always true for middle-income countries such as CEE economies, as they are not mainly research-driven. Rather their key factor of growth is production capability, according to Radosevic (2017). He notes that in these countries innovation is most often located in "downstream" activities (e.g. management and quality skills and engineering) that aims better productivity at a certain stage of technology.

# Key factors in improving productivity and modernisation

As the Bloomberg 2019 Innovation Index denotes, developed countries have higher scores, because they spend more on R&D and have higher added-value, while CEE economies' scores still fall below that. Is it due to some natural regional differences that cannot be bridged or rather a policy mistake? The economic structure across Europe is quite different, although policy mixes are really homogenous. According to the technology upgrading perspective (Radosevic, 2017), countries at different innovation levels require different policy mixes reflecting their specific technology challenges.

To better understand the nature of innovation and economic growth, it is worth paying attention to the main drivers that could induce them. Innovation activities consist of three main groups: production, technology, and R&D development. Compared to more developed (Western European) economies, CEE countries have a comparative advantage (yet still absolute disadvantage) in productivity capability as opposed to technological capability. Also, econometric research shows that the number of patterns (as a measure of technological capability) has little effect on economic growth, thus is not a key driver of innovation. On the contrary, the number of ISO licences (as a measure of management knowledge) is significant and the primary driver of innovation. In accordance, to catch up with developed countries, CEE countries have to specialise in importing and adapting new technology and knowledge as well as coupling them with their domestic knowledge-generating activities (local R&D). This process is usually not automatic and needs appropriate policy support.

The integration of imported technologies and domestic knowledge remains a key factor in improving productivity

Consequently, the integration of imported technologies (e.g. machines) and domestic knowledge (e.g. management and engineering) remains a key factor in improving productivity and promote modernisation in the CEE region. Also, more targeted policies could help reach higher Bloomberg Innovation Index rates. "Thus policy focus needs to shift from the singular emphasis on R&D towards non-R&D fields (e.g. productivity capability). Most importantly, greater attention should be paid to helping innovative enterprises and promoting technological cooperation between foreign and local firms". All things considered, this article provides an insight into the specific nature of innovation and drivers of growth in the CEE region It also suggests a considerable shift in policy focus regarding innovation activity mix. According to this analysis, CEE policies should put a greater emphasis on interactions between imported technologies and domestic productivity capability in order to keep up sustainable economic growth and catch up with more developed countries.

Read the full report **here** 

#### **Author**

#### Amrita Naik Nimbalkar

Junior Economist, Global Macro amrita.naik.nimbalkar@ing.com

#### **Mateusz Sutowicz**

Senior Economist, Poland mateusz.sutowicz@ing.pl

#### Alissa Lefebre

Economist <u>alissa.lefebre@ing.com</u>

# Deepali Bhargava

Regional Head of Research, Asia-Pacific <u>Deepali.Bhargava@ing.com</u>

#### **Ruben Dewitte**

Economist +32495364780 ruben.dewitte@ing.com

#### Kinga Havasi

Economic research trainee kinga.havasi@ing.com

# Marten van Garderen

Consumer Economist, Netherlands marten.van.garderen@ing.com

#### **David Havrlant**

Chief Economist, Czech Republic 420 770 321 486 david.havrlant@ing.com

# **Sander Burgers**

Senior Economist, Dutch Housing sander.burgers@ing.com

# Lynn Song

Chief Economist, Greater China <a href="mailto:lynn.song@asia.ing.com">lynn.song@asia.ing.com</a>

#### **Michiel Tukker**

Senior European Rates Strategist michiel.tukker@ing.com

#### Michal Rubaszek

Senior Economist, Poland michal.rubaszek@ing.pl

#### This is a test author

#### Stefan Posea

Economist, Romania <a href="mailto:tiberiu-stefan.posea@ing.com">tiberiu-stefan.posea@ing.com</a>

#### **Marine Leleux**

Sector Strategist, Financials marine.leleux2@ing.com

#### **Jesse Norcross**

Senior Sector Strategist, Real Estate jesse.norcross@ing.com

#### Teise Stellema

Research Assistant, Energy Transition teise.stellema@ing.com

# **Diederik Stadig**

Sector Economist, TMT & Healthcare <a href="mailto:diederik.stadig@ing.com">diederik.stadig@ing.com</a>

# Diogo Gouveia

Sector Economist diogo.duarte.vieira.de.gouveia@ing.com

# **Marine Leleux**

Sector Strategist, Financials marine.leleux2@ing.com

# Ewa Manthey

Commodities Strategist <a href="mailto:ewa.manthey@ing.com">ewa.manthey@ing.com</a>

# **ING Analysts**

#### James Wilson

EM Sovereign Strategist James.wilson@ing.com

# **Sophie Smith**

Digital Editor

# sophie.smith@ing.com

# Frantisek Taborsky

EMEA FX & FI Strategist <a href="mailto:frantisek.taborsky@ing.com">frantisek.taborsky@ing.com</a>

#### **Adam Antoniak**

Senior Economist, Poland adam.antoniak@ing.pl

# Min Joo Kang

Senior Economist, South Korea and Japan min.joo.kang@asia.ing.com

#### Coco Zhang

ESG Research coco.zhang@ing.com

# Jan Frederik Slijkerman

Senior Sector Strategist, TMT jan.frederik.slijkerman@ing.com

# Katinka Jongkind

Senior Economist, Services and Leisure <u>Katinka.Jongkind@ing.com</u>

#### Marina Le Blanc

Sector Strategist, Financials Marina.Le.Blanc@ing.com

# Samuel Abettan

Junior Economist samuel.abettan@ing.com

#### Franziska Biehl

Senior Economist, Germany <u>Franziska.Marie.Biehl@ing.de</u>

# Rebecca Byrne

Senior Editor and Supervisory Analyst <a href="mailto:rebecca.byrne@ing.com">rebecca.byrne@ing.com</a>

# Mirjam Bani

Sector Economist, Commercial Real Estate & Public Sector (Netherlands) <a href="mirjam.bani@ing.com">mirjam.bani@ing.com</a>

# Timothy Rahill

Credit Strategist

# timothy.rahill@ing.com

#### Leszek Kasek

Senior Economist, Poland leszek.kasek@ing.pl

# Oleksiy Soroka, CFA

Senior High Yield Credit Strategist oleksiy.soroka@ing.com

#### **Antoine Bouvet**

Head of European Rates Strategy antoine.bouvet@ing.com

# Jeroen van den Broek

Global Head of Sector Research jeroen.van.den.broek@ing.com

#### **Edse Dantuma**

Senior Sector Economist, Industry and Healthcare <a href="mailto:edse.dantuma@ing.com">edse.dantuma@ing.com</a>

#### Francesco Pesole

FX Strategist <a href="mailto:francesco.pesole@ing.com">francesco.pesole@ing.com</a>

#### Rico Luman

Senior Sector Economist, Transport and Logistics Rico.Luman@ing.com

# Jurjen Witteveen

Sector Economist jurjen.witteveen@ing.com

# **Dmitry Dolgin**

Chief Economist, CIS <a href="mailto:dmitry.dolgin@ing.de">dmitry.dolgin@ing.de</a>

# Nicholas Mapa

Senior Economist, Philippines nicholas.antonio.mapa@asia.ing.com

# **Egor Fedorov**

Senior Credit Analyst <a href="mailto:egor.fedorov@ing.com">egor.fedorov@ing.com</a>

#### Sebastian Franke

Consumer Economist

# sebastian.franke@ing.de

# Gerben Hieminga

Senior Sector Economist, Energy gerben.hieminga@ing.com

# Nadège Tillier

Head of Corporates Sector Strategy <a href="mailto:nadege.tillier@ing.com">nadege.tillier@ing.com</a>

# Charlotte de Montpellier

Senior Economist, France and Switzerland <a href="mailto:charlotte.de.montpellier@ing.com">charlotte.de.montpellier@ing.com</a>

#### Laura Straeter

Behavioural Scientist +31(0)611172684 laura.Straeter@ing.com

#### Valentin Tataru

Chief Economist, Romania valentin.tataru@ing.com

#### James Smith

Developed Markets Economist, UK <u>james.smith@ing.com</u>

# Suvi Platerink Kosonen

Senior Sector Strategist, Financials <a href="mailto:suvi.platerink-kosonen@ing.com">suvi.platerink-kosonen@ing.com</a>

# Thijs Geijer

Senior Sector Economist, Food & Agri thijs.geijer@ing.com

#### Maurice van Sante

Senior Economist Construction & Team Lead Sectors <u>maurice.van.sante@ing.com</u>

#### Marcel Klok

Senior Economist, Netherlands marcel.klok@ing.com

# Piotr Poplawski

Senior Economist, Poland piotr.poplawski@ing.pl

#### Paolo Pizzoli

Senior Economist, Italy, Greece paolo.pizzoli@ing.com

#### Marieke Blom

Chief Economist and Global Head of Research marieke.blom@ing.com

#### Raoul Leering

Senior Macro Economist raoul.leering@ing.com

#### Maarten Leen

Head of Global IFRS9 ME Scenarios maarten.leen@ing.com

#### Maureen Schuller

Head of Financials Sector Strategy <u>Maureen.Schuller@ing.com</u>

#### Warren Patterson

Head of Commodities Strategy Warren.Patterson@asia.ing.com

#### Rafal Benecki

Chief Economist, Poland rafal.benecki@ing.pl

# Philippe Ledent

Senior Economist, Belgium, Luxembourg <a href="mailto:philippe.ledent@ing.com">philippe.ledent@ing.com</a>

#### Peter Virovacz

Senior Economist, Hungary <a href="mailto:peter.virovacz@ing.com">peter.virovacz@ing.com</a>

# Inga Fechner

Senior Economist, Germany, Global Trade <a href="inga.fechner@ing.de">inga.fechner@ing.de</a>

# **Dimitry Fleming**

Senior Data Analyst, Netherlands <u>Dimitry.Fleming@ing.com</u>

# Ciprian Dascalu

Chief Economist, Romania +40 31 406 8990 ciprian.dascalu@ing.com

#### **Muhammet Mercan**

Chief Economist, Turkey <a href="mailto:muhammet.mercan@ingbank.com.tr">muhammet.mercan@ingbank.com.tr</a>

#### Iris Pang

Chief Economist, Greater China iris.pang@asia.ing.com

# Sophie Freeman

Writer, Group Research +44 20 7767 6209 Sophie.Freeman@uk.ing.com

# Padhraic Garvey, CFA

Regional Head of Research, Americas padhraic.garvey@ing.com

# James Knightley

Chief International Economist, US <u>james.knightley@ing.com</u>

#### **Tim Condon**

Asia Chief Economist +65 6232-6020

#### Martin van Vliet

Senior Interest Rate Strategist +31 20 563 8801 martin.van.vliet@ing.com

# Karol Pogorzelski

Senior Economist, Poland <u>Karol.Pogorzelski@ing.pl</u>

#### Carsten Brzeski

Global Head of Macro <u>carsten.brzeski@ing.de</u>

#### Viraj Patel

Foreign Exchange Strategist +44 20 7767 6405 viraj.patel@ing.com

# Owen Thomas

Global Head of Editorial Content +44 (0) 207 767 5331 owen.thomas@ing.com

# Bert Colijn

Chief Economist, Netherlands bert.colijn@ing.com

# Peter Vanden Houte

Chief Economist, Belgium, Luxembourg, Eurozone <a href="mailto:peter.vandenhoute@ing.com">peter.vandenhoute@ing.com</a>

# Benjamin Schroeder

Senior Rates Strategist <a href="mailto:benjamin.schroder@ing.com">benjamin.schroder@ing.com</a>

# **Chris Turner**

Global Head of Markets and Regional Head of Research for UK & CEE <a href="mailto:chris.turner@ing.com">chris.turner@ing.com</a>

# Gustavo Rangel

Chief Economist, LATAM +1 646 424 6464 gustavo.rangel@ing.com

# Carlo Cocuzzo

Economist, Digital Finance +44 20 7767 5306 <u>carlo.cocuzzo@ing.com</u>

Opinion | 25 April 2019