THE MIDDLE-INCOME PLATEAU: TRAP OR SPRINGBOARD?

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ABSTRACT/RESUMÉ

The mixed growth performance of emerging market economies has revived angst about a “middle-income trap”. However, a forensic review of statistical evidence shows that middle-income countries “escape” to higher income levels more often than both poorer and richer countries. At the same time, growth slowdowns are also more frequent in this group. Recent econometric research confirms that the impact of economic policies on GDP growth is greater at middle than at lower and higher income levels. Middle-income countries harvest higher returns from structural reforms, but also meet special political economy obstacles in implementing them. The resulting policy divergences imply differences in performance, reflecting notably the uneven expansion of their high-productivity entrepreneurial firms. The paper highlights the channels through which performance improves when obstacles to policy innovations are overcome and reforms are implemented.

Keywords: Economic growth, middle-income countries, productivity convergence, institutions, rule of law, financial deepening, human capital, entrepreneurship.

JEL: B15, D02, E02, L26, O10, O17, P48

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Le plateau du revenu intermédiaire: piège ou tremplin?

Les performances de croissance inégales des économies de marché émergentes ont relancé les préoccupations concernant un éventuel « piège à revenu moyen ». En revanche, un examen approfondi des données statistiques montre que les pays à revenu intermédiaire « s’échappent » plus souvent vers des niveaux de revenu plus élevés que les pays plus pauvres et plus riches. Simultanément, les ralentissements de la croissance sont aussi plus fréquents dans ce groupe. La recherche économétrique récente confirme que l’impact des politiques économiques sur la croissance est plus élevé aux niveaux de revenu moyen qu’aux niveaux de revenu plus bas et plus élevés. Les pays à revenu intermédiaire tirent des bénéfices plus grands des réformes structurelles, mais rencontrent aussi des obstacles d’économie politique spécifiques dans leur mise en œuvre. Ces divergences de politiques entraînent des différences de performance, reflétant notamment des taux de croissance inégaux des firmes entrepreneuriales à haute productivité. Cette note discute les canaux par lesquels la performance s’améliore quand les obstacles aux réformes sont surmontés et des réformes sont mises en œuvre.

Mots-clés: croissance économique, pays à revenu intermédiaire, convergence de la productivité, institutions, primauté du droit, approfondissement financier, capital humain, esprit d'entreprise.

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THE MIDDLE-INCOME PLATEAU: TRAP OR SPRINGBOARD?

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"Whether I am a tomb or treasure
The choice is yours alone
Visitor, do not enter without desire"²

The pediment of a Paris museum reminds passers-by that they could get much or little from entering, according to the fervour they will place in their visit. The countries reaching the middle-income stage are in a similar position: evidence suggests that much more than at lower and higher income levels, their trajectory will depend on the inspired adjustment of their policies and institutions to their new condition. As the global economy reverts - too slowly- to a stronger growth path, middle-income countries need to better seize their opportunities to improve their living standards, but also for global growth to hold up.

Recent economic research based on more accurate performance data and more complete policy indicators, both inside and outside the OECD, help better understand the determinants of long-term growth, the impact of structural reforms, and the engines of productivity diffusion from frontier to follower firms in economies at different income levels (Barro, 2015; Andrews et al., 2016; Égert, 2017; Guillemette, 2017; Melguizo et al., 2017). It sheds new light on middle-income economies’ special conditions, and offers several new insights.

Available data defies any notion of a “trap” which would slow down middle-income economies. In fact, middle-income countries, identified according to their GDP per capita level or their distance to the US benchmark,³ “escape” to higher income levels in higher proportions than both lower and higher income countries (Han and Wei, 2017). On the other hand, growth slowdowns are also more frequent among these economies (Aiyar et al., 2013) and speeds of transition differ (Felipe et al., 2017). The “almond” shape of middle-income countries is defined as those at 10-50% of the US GDP per capita level at purchasing power parities. The World Bank also distinguished “lower-middle income countries” as those with a 2016 Gross National Income (GNI) per capita level between US $1000-4000 according to their World Atlas method of currency conversions, and the “upper-middle-income” ones as those with a GNI per capita between US $4000-12,250. The former include, among others, Egypt, Morocco, Cambodia, India and Indonesia, and the latter Argentina, Brazil, Malaysia, Mexico and Turkey.

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¹ Senior Economist and Head of the Austria-Turkey Desk in the Economics Department, OECD. This note summarises a presentation by the author at a Turkish Central Bank School of Central Banking seminar in Izmir on 22-23 May 2017. The author thanks participants to this seminar, in particular Hakan Kara, Gülbin Şahinbeyoğlu and Gökkan Yılmaz from the Central Bank of Turkey; as well as Kurmaş Akdoğan, Sebastian Barnes, Boris Cournède, Balázs Égert, Yvan Guillemette, Vincent Koen and Volker Ziemann from the Economics Department, OECD; Mats Isaksson and Serdar Çelik from the Directorate for Financial and Enterprise Affairs, OECD; Federico Bonaglia, Juan De Laiglesia, Angel Melguizo and Michael Stemmer from the Development Centre, OECD who contributed very valuable insights at different stages. My gratitude to Catherine Mann, Erdem Başçı, Henry Ergas and Vincent Koen for their support to this inquiry. Many thanks to Béatrice Guerard for statistical support and Sisse Nielsen for editorial assistance.

² Paul Valéry’s verses on the pediment of the Palais de Chaillot.

³ The most common definition of middle-income countries is those at 10-50% of the US GDP per capita level at purchasing power parities. The World Bank also distinguished “lower-middle income countries” as those with a 2016 Gross National Income (GNI) per capita level between US $1000-4000 according to their World Atlas method of currency conversions, and the “upper-middle-income” ones as those with a GNI per capita between US $4000-12,250. The former include, among others, Egypt, Morocco, Cambodia, India and Indonesia, and the latter Argentina, Brazil, Malaysia, Mexico and Turkey.
Figure 1 captures this distinct dispersion of performance at middle-income levels (the special case of resource-rich economies having achieved rapid income gains between 1995 and 2014 notwithstanding).

An important econometric study of the impact of economic policies on GDP growth confirms that good policies have greater effects at middle-income levels than at lower and higher income levels (Prati et al., 2013). Another study found that growth gains from wide-reaching structural reform packages materialise earlier but are more limited in advanced economies, while they show more slowly but are bigger in emerging countries (Mazzarro and Terzi, 2017). The latest quantification exercise carried out at the OECD also concludes that standard structural reforms generate stronger benefits in emerging economies (Box 1).

**Figure 1. Performance varies more at middle-income levels**

GDP per capita, thousand USD PPP

Source: Penn World Tables.

**Box 1. The estimated impact of reforms on productivity is stronger in emerging economies**

Econometric analysis shows that the impact of reforms on productivity and employment depends on GDP per capita levels (Égert, 2017):

Restrictive product market regulations (PMR) appear more harmful at GDP per capita levels lower than those of advanced countries: their negative impact on productivity (MFP) is three times larger in countries with per capita income below US $ 8000 (PPP).

In particular, negative effects from barriers to entry, barriers to trade and investment and state control are amplified at lower GDP per capita levels.

An opposite pattern is found for employment: negative policy effects are higher in more advanced countries. More specifically, negative PMR effects on employment are larger for countries with per capita income above US $ 6000.

A similar pattern is visible concerning the impact of labour regulations. The Cambridge employment protection legislation (EPL) indicator has a negative sign in employment impact estimations when per capita income levels
exceed US $ 6000, and the Fraser Institute’s labour market regulation indicator has a negative sign at per capita incomes exceeding US $ 12000.

A possible reason for the reduced impact of labour and other regulations on employment in emerging economies may be that strict labour market regulations often lead to informality, instead of lower employment, reflecting less strict enforcement under a weaker rule of law.

In net terms however, non-linear effects on productivity dominate non-linear effects on employment. Therefore, the damage done by restrictive regulations on per capita incomes is bigger in middle-income countries than in advanced countries. Symmetrically, improving the functioning of product, labour and international trade and investment markets is estimated to generate higher benefits in middle-income countries, helping explain the almond shape of Figure 1.


Long-term growth regressions give the same verdict. These regressions are practically all conducted in a “conditional convergence” framework, which posits that lower-income countries naturally catch up to higher-income ones, but at varying rates shaped by their structural and institutional characteristics (Barro, 2015; Guillemette, 2017). Studies effected in the OECD Development Centre showed that whereas transition from low- to middle-income levels are based on resource shifts from primary to secondary and tertiary sectors, transitions from middle- to high-income levels entail productivity gains within existing sectors, requiring more sophisticated resources and policy frameworks (OECD, 2014a, OECD, 2014b). In this stream of work, Melguizo et al. (2017) have investigated the impact of a large set of factors which seem to differentiate the performance of middle- and high-income economies. All streams of quantitative research highlight four areas which condition the pace of convergence of middle-income countries, which have ample room for progress in all of them.

First, macroeconomic stability and openness is crucial. Openness contributes to stability by insuring against local shocks. Both are enhanced by trade and investment liberalisation, flexible exchange rates, sustainable public finances, low inflation and strict banking sector supervision. Business confidence and investment incentives then improve, financing costs decline and capital formation accelerates. The exchange rate staying on a sustainable path helps with competitiveness and supports balanced, and therefore externally sustainable, growth of domestic and international demand (Prasad et al., 2007). Effective prudential regulation helps reduce excessive capital inflows, exchange rate volatility and risks of sudden stops (Aiyar et al., 2013). Curtailing boom-and-busts minimises short- and long-term output losses (Cerra and Saxena, 2008). Middle-income countries vary enormously in their capacity to deliver these elements of stability and openness (Habib et al., 2014; Gosh et al., 2017).

Second, education is the prime engine of growth through the twin channels of workforce employability and productivity (Barro, 2013). Middle-income countries generate special opportunities in this area, thanks, on the one hand, to increased fiscal resources for public education and, on the other hand, enhanced private incentives for private educational investment. Recent econometric work on education reveals that, more than average school attainment and total schooling years, it is the quality of education which matters for growth, especially in developing countries. An intriguing finding is the particularly strong impact of the share of students with very high academic skills, which – somewhat counterintuitively- has a stronger effect in developing than in advanced countries. This may reflect the importance of high skills in implementing advanced country technologies in the less supportive environments of developing countries (Dahlman, 2007; Hanushek, 2013).

Econometric tests are still constrained by international and intertemporal data availability. Comparable policy and performance indicators are improving, but many estimations still draw on rough proxies.
Third, strong law and rule enforcement ("rule-of-law") is also a central growth driver in middle-income countries, which is better identified in the latest vintages of growth estimations (Aiyar et al., 2013; Guillemette et al., 2017; Ëgert et al., 2017). Developing countries typically have ample room for progress in this area (Figure 2, Panel A). Estimated gains from measurable units (standard deviations) of progress, independently from the large room available for advancement, are stronger in these countries (Panel B). Despite this strong evidence, improvements with respect to the rule of law have been slow, for political economy reasons. As a result, progressive middle-income countries gain a distinct edge. A correlation is also found between rule-of-law and democratic institutions (Assiotis and Sylwester, 2015), while democratic institutions are found to exert a positive impact on the implementation of economic reforms (Giuliano et al., 2013). Together, rule-of-law and democratic institutions foster more robust and predictable public governance.

Figure 2. The rule of law matters

A. Large international differences in the rule of law
2016 index, from -2.5 (weak) to 2.5 (strong) governance performance

B. Rule-of-law has stronger impact on productivity at middle-income levels
(coefficient estimates in multi-factor productivity regressions)


Financial development is the fourth main ingredient of growth (King and Levine, 1993; Beck, 2012). Efficient financial intermediaries direct savings to more productive uses and enable firms and households to borrow for high-return investments. They help shift the composition of capital formation towards higher productivity and long-term investments (Aghion et al., 2011). Early research on finance-growth relations in economies with low, intermediate and high degrees of financial development established that gains for growth are strongest in intermediate countries (Rioja and Valev, 2004). Recent OECD research disentangled a specific additional channel which matters in middle-income countries: while bank loans are the main source of funding in early stages of development, and contribute positively to growth albeit at a
declining rate, once the debt stock approaches 100% of GDP, other financing sources such as stock markets, private equity and venture capital become more important for growth – whereas any further expansion of credits contribute negatively (Cournède and Denk, 2015). New risk-sharing financing sources support young and small firms more than large and established ones (Cull and Xu, 2011). By diversifying their financial sector, middle-income countries can thus free up new sources of growth. This also improves their ability to absorb foreign savings in non-debt creating forms, making growth accelerations more externally sustainable (Laski et al., 2001; Caldera Sánchez et al., 2015).

Research in areas where time series of internationally comparable data are missing provides important additional insights on the special conditions of middle-income countries. Acemoglu and Robinson (2014) have dissected the transition from “extractive” to “inclusive” market institutions, while North et al. (2007) have addressed the changeover from “limited access” to “open access” markets. Both approaches show a special link between social inclusion and economic growth when countries reach the middle-income stage. Acemoglu and Robinson emphasise the role, at that stage, of the participation of all social groups to the economic process on a level-playing ground, and North et al. the importance of open and level-playing competition between firms of all types and origins. These findings complement econometric results in that they uncover the transmission channels of policies enhancing macroeconomic stability, education, rule-of-law and financial development via social inclusion. Supply and demand synergies become broader based, supporting growth.

Divergences in economic and social conditions at middle-income levels tell only part of the story, however. At present, more than half of the cross-country variation in GDP per capita trends remains unexplained in the best multivariate models (Barro, 2015; Guillemette et al., 2017). Growth may pick up when circumstances identified by standard indicators are not supportive, and expected take-offs may fail despite favourable conditions (Haussmann et al., 2004; Levy and Rodrik, 2017). Economic growth is an eminently country-specific, historical process (Chandler, 1993; Landes, 2003; Koen et al., 2013). Among several contingent factors, the least well understood is the emergence and vigour of entrepreneurs.5 They play a unique role in development (Leibenstein, 1969; Naude, 2013). Some typical conditions of middle-income countries for entrepreneurial activity must be prominently taken into account.

A large share of entrepreneurial firms in middle-income economies operate semi-formally (Pagés, 2009, OECD, 2009). They circumvent part of the tax, social security, employment and other regulations because their productivity generally does not match that of the large corporations to which these regulations are better adapted (OECD, 2014c). In turn, informality and semi-formality slows down the convergence of these firms with the productivity frontier. Even if internationally comparable data is scarce, the productivity gaps between frontier and follower firms in middle-income economies appear larger than in the advanced countries (OECD, 2016). The shift of resources from lower to higher productivity firms is also slower, as Andrews and Cingano (2014) documented in the case of Southern Europe.

Reforms to reduce informality and semi-formality are however difficult under the political economy circumstances of middle-income countries (Doner and Schneider, 2016). Three noticeable factors are at play:

i. Labour market reforms which would help all firms operate in compliance with the law are generally not supported by the players in the high-productivity formal sector. Labour unions tend to defend the regulatory status quo as a social acquis, and many managers tend to see it as a welcome entry barrier against lower-productivity competitors.

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5 Entrepreneurship is considered by certain economists as a rational (endogenous) response to market conditions. However, such disregard for its exogenous impact does not withstand scrutiny (Leibenstein, 1969; Reeg, 2013). Since Schumpeter, deeper discussions of entrepreneurial activity have pointed to its “scientifically unfathomable” character. Modern economists have offered additional insights on the macroeconomic implications of entrepreneurship through innovative concepts such as “confidence multiplication” (Akerlof and Shiller, 2009) and “mass flourishing” (Phelps, 2013).
ii. Policymakers, including at subnational levels, generally refrain from foregoing their discretionary enforcement power of formal rules, as this provides them with a degree of control over the business sector.

iii. Transition to formality entails risks, however. If regulations are not adequately reformed before fuller enforcement, and if they remain unfriendly to young and small firms, better enforcement may hinder entrepreneurial momentum and job creation.

If an economically sustainable and politically viable transition path can be devised towards formality, major growth gains can be anticipated in middle-income economies:

i. If all entrepreneurs, in small and large firms alike, become less dependent on policymakers’ forbearance, their level of confidence and their capacity to invest for the long term increases. They can become more transparent financially, therefore gaining fuller access to capital markets. Being freed from under-the-cover practices, they can loosen family control and hire professional management. It is crucial for tax rules not to undermine this formalisation process. The resulting managerial upgrading promises to deliver considerable productivity gains (Figure 3).

ii. Formalisation improves social inclusion via higher wages, social security coverage and improved working and safety conditions for all workers. Households’ borrowing, consumption and investment capacity increases (OECD, 2014c).

**Figure 3. Managerial modernisation delivers large productivity gains**

![Figure 3: Managerial modernisation delivers large productivity gains](image)

**Note:** The overall management score is an average of responses to 18 survey questions from the World Management Survey, that are designed to reveal the extent to which firms: i) monitor what goes on inside the firm and use this information for continuous improvement ii) set targets and track outcomes; and iii) effectively utilise incentive structures (e.g. promote and reward employees based on performance) (Bloom and Van Reenen, 2010). The estimates in the right panel are calculated from the difference in management score between each country and the United States and the estimated coefficient on the management score term in a firm level regression of sales on management scores, capital and employment. The sample is based on medium-sized firms, ranging from 50 to 10 000 employees.

iii. The productivity gap between advanced and laggard firms shrinks. If this gap can be reduced in middle-income countries to the size of the gap found in advanced countries (even though the latter is still too wide), and if resources can be transferred from laggard to advanced firms at the pace witnessed in advanced countries (even if this pace is still too slow), productivity gains would be considerable (Andrews et al., 2016).

iv. Rule enforcement involves discretionary decision-making in specific circumstances (for example in the allocation of R&D grants, in the authorisation of potentially anti-competitive mergers, in the disclosure of sensitive information in corporate governance). Trusted enforcers are then needed (OECD, 2018). Societies based on a high degree of trust have such enforcers, while in lower-trust societies discretionary enforcement involves favouritism and lacks credibility. The “generalised trust” of anonymous agents in credible third-party enforcers characterises advanced market economies. Entrepreneurship can then unfold on a level-playing and inclusive ground (Algan and Cahuc, 2017). In contrast, empirical research shows that closed insider networks, or networks based on special government contacts, may enhance trust among their members but tend to reduce generalised trust (Raiser et al., 2008). Transition to open networks with credible third-parties is a major step forward in the institutional maturation of market economies (Grabher and Stark, 1997).

These special features of the middle-income stage evoke the take-off phase discussed in earlier development theory. When, in the early 1960s, W. Rostow, J.K. Galbraith and colleagues started to advise the international financial institutions and the new Kennedy administration to support take-off friendly policies in the developing world, they suggested a shift of attention from individual infrastructure projects to more systemic changes in the incentive and capability structure of economies and in their supporting institutions. They stressed the emergence of “new types of enterprising men willing to mobilise savings and taking risks in pursuit of profit” and the emergence of a “new political, social and institutional framework which exploits the impulses to expansion in the modern sector” (Rostow, 1960). They stressed the role of financial development in increasing saving and investment and emphasised the contribution of the international trade, capital and knowledge flows to take-off dynamics. Their approach was rudimentary and dealt with the more rustic economies of their time, but captured the key insight that when economies reach a development threshold, suitable institutional and policy innovations can trigger a take-off. After more than half a century of additional policy experience and much progress with the econometric analysis of growth, their insights are vindicated: reaching the middle-income plateau brings a growth acceleration closer but, for this to happen, demanding macroeconomic, education, rule-of-law and financial reforms are needed to further empower and equip their entrepreneurial forces.
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