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THE DETERMINANTS OF THE INCIDENCE OF EMPLOYER-PROVIDED TRAINING IN THE WESTERN BALKANS

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Abstract

If the standards of living in the Western Balkans are to converge on those in the EU then the current productivity gap needs eliminating. A significant portion of that gap would ideally be eliminated through the expansion of employer-provided training. However, survey data indicate that since 2016 training incidence has been rising in only two of the six countries of the Western Balkans. The main contribution of this paper is to investigate this disappointing performance. A model of the determinants of the incidence of employer-provided training is developed based on theory and investigations in other countries. It is found that in the Western Balkans firms with foreign owners, those who export and those who report that their employees are eager to access training are more likely to provide training, whilst micro and small firms are less likely to provide training. Sentiments regarding the firm's and economy's current performance and their prospects are also significant determinants. The policy implications of these findings are addressed in the concluding section.

Keywords: *Employer-provided training, Western Balkans.*

JEL Classification: *J24, D22, E24, N34.*

1. Introduction

Employer-provided training provides a vehicle for raising labour productivity and in the context of the Western Balkans (Albania, Bosnia and Herzegovina, Kosovo, Montenegro, Northern Macedonia and Serbia) it provides a potential means for closing the productivity gap with the EU Member States. Little is known about the actual level of employer-provided training in these countries and the determinants of its incidence. To address this limitation, in this paper data from the annual Balkan Barometer Business Opinion Survey published by the Regional Cooperation Council (RCC) is used to provide insights into the provision of employer-provided training in these six Western Balkan Countries (hereafter WB6). Data from 2016 to 2023 is analysed and trends in the incidence of training are identified and compared across the WB6. A review of

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theory and empirical studies is then used to develop and test a model of the determinants of whether a firm in this region provide training. A novel element of this investigation is that a measure of the sentiments of businesses regarding their present and future assessment of the performance of their economy's and their own business is included in the model. Given the availability of longitudinal data on training incidence in this region, a secondary objective of this study is to analyse whether the advent of the COVID pandemic had any impact on firm behaviour. To investigate this objective empirical analysis is undertaken using pooled data from year 2020 and 2023.

The paper is organised as follows. The next section briefly reviews the economic analysis of training decisions and notes the limitations of the dominant human capital approach. This is followed by a review of the literature which seeks to explain the persisting large differences in the incidence of employer-provided training across countries. The fourth section introduces the data from RCC's Balkan Barometer Business Opinion Survey and explains the chosen empirical methodology. This is followed by a section which identifies the main findings of the empirical analysis. The concluding section identifies the main contribution to knowledge of the analysis and examines their implications for the future economic development of the WB6.

2. The economics of training

As the nature of work changes, firm-provided training becomes a more critical determinant of economic performance (Dostie 2020). As the speed of technological change increases, employer-provided training is likely to play an increasingly important role in raising labour productivity in the WB6. The COVID pandemic crisis is also likely to have created opportunities for firms to invest in the skills their employees need to adapt to remote working (Martins 2021). Black et al. (2023) estimate that in developed economies firm-provided training accounts for a larger share of an economy's human capital stock than does formal schooling. They argue that in total, society spends more time and resources on training than on formal schooling. However, these authors note that the literature on the economics of education vastly exceeds that on the economic analysis of firm-provided training. This imbalance they largely attribute to the quality of the data available, more specifically the large measurement errors associated with both workers' and employers' levels of reported training, and the problems in agreeing appropriate definitions of what constitutes employer-provided training.

The economic analysis of training has long been dominated by Mincer (1962) and Becker's (1964) human capital approach. Firms and workers in competitive and frictionless markets have an incentive to invest in training where the marginal benefits exceed the marginal costs of undertaking training. This approach makes a key distinction between general and specific training. The former develops skills which are transferable between employers and the latter develops skills which raise a worker's productivity only with a specific employer. Only the latter training will be financed by employers since the wage premium earned by those with completed general training creates an incentive for workers to fund such training voluntarily. The Becker-Mincer approach views poaching benignly, since employers only fund specific training costs, and such training does not raise a workers' productivity outside of their current employment. However, Picchio and van Ours (2011) and Brunello and Wruuck (2020) argue that in the presence of monopsony a poaching externality leads to under-investment in training.

In practice it has been difficult to make a clear distinction between these two categories of training and firms frequently seem to contribute to the costs of what appears to be general training (Brunello and Wruuck 2020). Acemoglu and Pischke (1999) identify reasons why firms may fund even general training. They explain how the presence of search, informational asymmetries, efficiency wages, minimum wages, trade unions and complementarities between general and specific training may give rise to employers funding general training. Black et al. (2023) bemoan the failure of economists to develop models which systematically address these weaknesses of the Mincer and Becker approaches. They argue that more attention needs to be placed on firm behaviour in imperfectly competitive labour markets, the impact of growing worker multi-dimensional skills and the interactions between search, hiring and training in the labour market.

3. Explaining cross-country differences in the incidence of training

Data from the OECD (2023a) suggest that around 40 per cent of workers participate in some form of firm-sponsored, employer-provided training in a year. Even if the simplest measure of the extent of firm training is taken, the incidence, different sources provide very different estimates of its prevalence. Within Europe the European Community Household Panel

(ECHP) and the Continuing Vocational Training Survey (CVTS) report very large national differences in the incidence of firm-provided training. Whilst the incidence of employer-provided training has been rising since 2005, there are only weak signs of convergence across countries (Brunello and Wruuck 2020). In Latvia, Lithuania and Romania firms report less than 10 per cent of their employees received training in the previous twelve months, with that ratio rising above 50 per cent in the Nordic countries and the UK.

Bassanini et al. (2007) investigated the causes of these large differences in training incidence in Europe. They hypothesised that countries with a high proportion of highly-educated workers and with high rates of investment in research and development would have a higher incidence of employer-provided training. Brunello and Wruuck (2020) point out that Eastern Europe has a smaller share of firms that provide no training than Southern Europe, even though they had similar average educational attainments and similar investments in research and development. This they speculate may be because Eastern European countries have lower levels of employment protection, lower average tenure and have been growing faster in recent years. Brunello and Wruuck also provide evidence that financially constrained firms in Europe invest significantly less in training. Pouliakas and Wruuck (2022) investigate the impact of COVID-19 on employer-provided training in Europe. They note that the European Investment Bank Investment Survey (EIBIS) indicates that the percentage of European firms investing in training had reached 67.5% of respondents by 2018/19, only to fall back to 54% in 2020/21. Until the emergence of COVID-19, all waves of the EIBIS had found that a shortage of appropriate skilled labour had been the most common impediment to investment cited by firms. However, in 2019/20 uncertainty about the future became temporarily the most cited impediment. Overall, Pouliakas and Wruuck found the impact of the pandemic on employer-provided training to have been uneven across firms and European countries, hence threatening the weak convergence process.

Researchers largely agree on the key determinants of employer-provided training. Large firms provide more training than small ones, which is commonly explained by the greater informational or credit constraints faced by the latter (Dostie 2020). For smaller firms learning-by-doing, usually not categorized as training, may be a close substitute for on-the-job training. Businesses in the WB6 who are partly or wholly foreign-owned are expected to be less credit constrained, and are more likely to introduce new working practices and new technologies requiring the re-training of workers (Carstensen and Toubal 2004). Whilst those businesses who export are more likely to have to provide training to reflect differing requirements regarding their products' quality, marketing and packaging. Firms based in urban areas providing less training than those in rural areas, reflecting the latter generally facing more problems in recruiting skilled workers. There are strong industry effects. The amount of firm-provided training also reflects on how well the schooling system prepares students for future employment. The observed large returns to experience and smaller returns to tenure suggests that general training dominates specific training (Black et al. 2023). Workers on flexible contracts and those without contracts are less likely to receive training (ILO 2016). Worker characteristics also influence the provision of training with a strong negative worker age effect. More educated workers and those in more skilled employment are more likely to receive employer-provided training (Dostie 2020). Surveys of empirical studies by Dostie (2020) and Martins (2022) indicate typically large benefits to firms providing training in the form of higher productivity and increased innovation.

Nazarov and Akhmedjonov (2012) using data from the 2002 and 2005 waves of the Business Environment and Enterprise Performance Survey (BEEPS) found that firms in Eastern Europe who provided training were more likely to innovate. Gashi and Adnett (2012) using the same data found that around half of firms in the Western Balkans had provided some training opportunities in the previous twelve months, with the incidence generally increasing over time. They also found that firms in the Western Balkans who innovated were more likely to provide training.

The above reviews of theory and empirical research inform the construction of the model developed below of the determinants of firm-based training in the Western Balkans. However, as is common in this field of study, data availability severely limits what analysis is feasible. The following investigation is limited to an analysis of training incidence, since no data is available on training intensity.

4. Data and methodology

To examine the determinants of training incidence, data is extracted from the RCCs Balkan Barometer Business Opinion Survey for the years 2020 and 2023, which are then pooled for regression analysis. The Survey has been carried out in the WB6 since 2015, collecting information on business perceptions and attitudes across a wide array of social, economic and environmental factors. However, differences in

the specific question asked and in the classification of responses limit analysis to data from the 2020 and 2023 surveys. Since the 2020 Survey was carried out before the arrival of the COVID-19 pandemic in the WB6 countries it is possible to analyse the impact of the pandemic on training incidence.

Table 1 provides an outline of the share of sampled businesses that funded or arranged any training and development for staff in the previous twelve months, including any informal on-the-job training, in all Business Opinion Surveys from 2016-2023. Training incidence appears to be very volatile in the WB6, this variability may in part reflect some changes across surveys of the wording of question asked businesses about their provision of training. The survey data shows very large year-on-year changes in and between the six countries. Comparing across countries, only Albania and Kosovo had increasing training incidence over this period.

Concentrating on the impact of the COVID 19 pandemic, the data indicates that in 2023 nearly 35% of businesses in the WB6 reported to have provided training, marking an increase by seven percentage points compared to pre-COVID 19 in 2020, but a fifteen percentage points fall from the peak incidence recorded in 2017. The largest shift since 2020 is noted in Kosovo with an increase from 22.5 to 54.4% and Albania with an increase from 17 to 41%, and the smallest increase is noted among businesses in Serbia (six percentage points).

The pooled sample size is 2,042 businesses. Probit regression commonly used when modelling binary outcomes and for predicting the probability of an event, is adopted to analyse the pooled dataset. The Probit model is estimated, to investigate the probability (Pr) of businesses funding or arranging training for their employees:

$$\Pr(Y = 1|X_i) = \Phi(\beta_i X_i)$$

where the dependent variable, Y, is equal to one 1 for companies that have funded or arranged any training and development for employees in the previous twelve months, including any informal on-the-job training and 0 for those that have not funded or arranged training and development for their employees; Φ is the Cumulative Distribution Function of the standard normal distribution and βi are the parameters of the explanatory variables X_i that will be estimated by maximum likelihood.

The above review of theory and previous empirical analyses suggests that the explanatory variables should be divided into three main groups: characteristics of businesses, labour supply related factors and firms' assessment of the current and future economic and business situation. In addition, year and country dummies are included.

Table 1. Training incidence- share of Western Balkan businesses that funded or arranged any training and development for staff in the previous twelve months: 2016 to 2023

	2016	2017	2018	2019	2020	2021	2022	2023
Albania	37.5	33.1	36.3	37.5	17.0	26.8	38.3	41.0
Sample size	117	124	160	221	163	200	162	162
Bosnia and Herzegovina	64.5	70.0	57.1	37.9	50.0	30.2	33.6	43.0
Sample size	162	172	228	208	218	200	217	216
Kosovo	27.7	31.0	23.5	22.7	22.5	21.7	70.2	54.4
Sample size	200	69	90	208	86	200	85	206
Montenegro	34.8	45.0	48.3	35.2	36.5	43.1	24.0	19.2
Sample size	39	42	59	227	61	200	59	59
North Macedonia	39.7	31.0	24.3	25.4	22.0	18.5	16.2	21.1
Sample size	91	109	147	205	137	200	136	135
Serbia	37.5	38.0	34.0	36.4	21.4	19.5	22.3	27.5
Sample size	410	394	516	202	550	200	544	544
All	40.4	50.0	37.5	32.6	28.3	26.5	29.3	34.6
Sample size	1,019	910	1,200	1,271	1,215	1,200	1,203	1,322

Source: RCC, Balkan Barometer Business Opinion Survey 2016 to 2023. Authors' calculations

Business characteristics

Two dummies are included to control for the impact of size of the businesses, the dummies for micro and for small businesses. To assess whether experience influences the training incidence a variable measuring the age of businesses is included. A binary variable is included to differentiate between manufacturing and other economic activities (equal to one for companies operating in the manufacturing sector and zero otherwise). Companies whose largest owner was foreign are allocated one in the ownership variable and zero otherwise. A variable is set to one if a business has exported goods or services in the last 12 months and zero if it did not export.

Labour supply related factors

In the surveys businesses were asked about whether the skills taught in the educational system currently meet the needs of the company, from which question a dummy variable is created set to 1 if a business responded that skills taught in the educational system did not meet the needs of the company and zero if it met their needs. A binary variable is included equal to 1 if a business indicated that skills and education of available workers is a major or a moderate obstacle for the operation and growth of their business and zero if it is a minor or not an obstacle. In the 2023 Survey, companies were asked if the brain drain is an obstacle for the operation and growth of their business, from which question a dummy is one if the company stated that the brain drain is a major or a moderate obstacle and zero if it is a minor or not an obstacle. In 2020 this question did not mention the brain drain specifically, rather it asked businesses if the migration crisis is an obstacle to the operation and growth of their business: a dichotomous variable equalling 1 if companies responded that migrations crisis is a major or a moderate obstacle and zero if migration crisis is a minor or not an obstacle. The training literature now recognises that the risk of poaching may deter employer-provided training, accordingly the analysis includes a dummy set to 1 for companies that responded that their workers are often poached or sometimes and zero if rarely or never. Employees' readiness to a acquire additional qualifications to get promoted are expected to influence employers' training provision, which is assessed through a dummy variable equalling one for businesses that responded that their employees are ready to acquire additional qualifications and zero otherwise.

Business perceptions

The Balkan Barometer Business Opinion dataset includes three Business Sentiment Indices. These aim to capture business sentiments and optimism regarding the present sand future situation. The indices are expressed on a scale of 0 to 100. The Balkan Barometer Business Opinion Index - present situation index is constructed from the following questions: how has your business situation developed over the past 12 months (deteriorated, remained unchanged or improved); how has demand for your company's products/services changed over the past 12 months (deteriorated, remained unchanged or improved); how has the general economic situation in your place of living changed over the past 12 (deteriorated, remained unchanged or improved). The Balkan Barometer Business Opinion Index is derived from the following two questions: 1) How do you expect the demand for your company's products/services to change over the next 12 months (will it decline, remain mostly unchanged or increase); and 2) how do you expect the general economic situation in your place of living to develop over the next 12 months (will it mostly deteriorate, remain unchanged or improve).

The indices are created from the weighted responses to these questions, with each first answer (satisfied, improved or increase) scoring 100 points, the second (neither satisfied or dissatisfied or remain the same) 50 points and the final answer scoring zero. After the answers were the recoded, the average value is calculated for the whole WB region, as well as for each country separately. The index takes a value between 0 and 100, with higher values indicating an improvement. In the specification below, the overall business sentiment (BBSI) is used being constructed from the average of the present and expected indices.

To examine any impact of the COVID pandemic on firm behaviour a year dummy for 2023 is added. To control for country differences, dummies are included for Albania, Bosnia and Herzegovina, Kosovo, Montenegro and North Macedonia. Given its generally stronger economic situation Serbia is used as the benchmark category.

Table 2 present descriptive statistics. Given that a subsidiary aim of this study is to examine changes pre and post the COVID-19 pandemic, descriptive statistics are provided separately for the 2020 and 2023 surveys and also for the pooled data. In both years micro and small enterprises account for about 80% of the total surveyed businesses. The average age of the enterprises surveyed was 16 years old. Manufacturing accounted for 15% of the businesses surveyed in 2023

Table 2. Descriptive statistics: 2020 and 2023 pooled data

Explanatory variables	2020	2023	Pooled 2020 and 2023
Business characteristics			
Micro: DV=1 if the business has less than 10 employees (*omitted category: medium and large companies*)	39%	35%	37%
Small, DV=1 if the business has between 10-49 employees (*omitted category: medium and large companies*)	42%	47%	44%
Age, number of years in operation since establishment of the business	16.4	16.0	16.3
Manufacturing, DV =1 if company operates in the manufacturing sector (*omitted category: non-manufacturing sectors)*	16%	15%	15%
Foreign investors, DV=1 if foreign owner is the largest one (*omitted category: domestic owner the largest investor*)	6%	3%	5%
Company exports, DV=1 if company exported in last 12 months (*omitted category: company did not export in last 12 months)*	27%	32%	30%
Labour supply factors			
Skills taught in the educational system do not meet the needs of my company, DV=1 if a business responded yes (*omitted category: skills taught in the educational system does not meet the needs of the company*)	22%	34%	28%
Skills and education of available workers obstacle to business operation and growth DV=1 if business responded yes (*omitted category: Skills and education of available workers is not an obstacle to business operation and growth*)	38%	56%	47%
Brain drain/migration crisis is an obstacle to the business operation and growth, DV=1 if yes (*omitted category: brain drain/migration crisis not an obstacle to business operation and growth)*	26%	66%	46%
Workers poached often or sometimes, DV=1 if a business responded yes otherwise (*omitted category: workers rarely or never poached)*	28%	37%	33%
Employees are ready to acquire additional qualifications in order to get promoted, DV=1 for businesses that responded yes (*omitted category: employees not ready to acquire additional qualifications in order to get promoted*)	56%	53%	54%
Business perceptions			
Balkan Barometer Business Sentiment Index	66	58	61.9

Source: RCC, Balkan Barometer Business Opinion Survey 2020, 2023. Authors' calculations.

and 16% in 2020. A smaller share of businesses with foreign investors as the largest owners was evident in 2023 (3% compared to 6% in 2020). In 2023, 32% of business reported to have exported goods or services in last 12 months compared to 27% in the 2020 survey.

With regards to labour supply factors, data indicate a more concerning picture in 2023: in that year a third of surveyed businesses noted that the skills taught in the educational system did meet the needs of their company (up from just over a quarter in 2020) and over half of the businesses considered that skills and education of available workers was a major or moderate obstacle to the operation and growth of their business. In 2023 two-thirds of businesses stated that the brain drain was a major or moderate obstacle, a very large increase compared to the responses to the 2020 question on the impact of the migration crisis. The survey responses suggest that poaching was also more prevalent in 2023. A similar share of companies in these two surveys indicated that workers were ready to acquire additional qualifications to get promoted. The BBSI was slightly higher in 2020 than in 2023.

5. Empirical findings

While the Probit model has the benefit of imposing a 0-1 boundary for probability, the estimated coefficients alone do not measure the (magnitude of) marginal effect. The marginal probability effects are the partial effects of each explanatory variable on the probability that the observed dependent variable $Yi = 1$.

Business characteristics

As revealed in Table 3, micro and small businesses are significantly less likely to have funded or arranged any training and development for staff in the organisation, including any informal on-the-job training, by 17 and 13 percentage points respectively. The age of the business does not have a statistically significant impact on training incidence. There is also no statistically significant difference in training and development of employees between manufacturing and non-manufacturing businesses. Compared to businesses with a domestic owner as the largest owner, those with foreign investors as the largest owners were more likely to fund or arrange any training and development of their employees. In comparison to businesses that did not export in the previous 12 months, those that had exported were more likely to fund or arrange any training and development of their employees.

These results were robust to various changes in the specification of the model. A dichotomous variable indicating whether the business was affected by credit constraints was added to the preferred model,

Table 3. Determinants of training provision, Probit marginal effects, 2020 and 2023 pooled data

Explanatory variables	MFX	Z-score	p-value
Business characteristics			
Micro enterprise (DV)	-0.17***	-5.66	0.000
Small enterprise (DV)	-0.13***	-4.26	0.000
Age	0.00	-0.77	0.443
Manufacturing sector (DV)	-0.04	-1.15	0.250
Foreign investors (DV)	0.12**	2.16	0.031
Company exports (DV)	0.12***	4.41	0.000
Labour supply factors			
Skills taught in the educational system do not meet the needs of a company (DV)	0.03	1.01	0.314
Skills and education of available workers obstacle to businesses (DV)	0.12***	4.95	0.000
Brain drain is an obstacle to the business (DV)	-0.01	-0.25	0.803
Workers poached often or sometimes (DV)	0.00	0.10	0.917
Employees are ready to acquire additional qualifications to get promoted (DV)	0.31***	15.79	0.000
Business perceptions			
Balkan Business Sentiment Index	0.001***	2.94	0.003
Year dummy			
Year 2023=1	0.06**	2.57	0.010
Country dummies			
Albania	0.08	1.76	0.079
Bosnia and Herzegovina	0.28***	6.23	0.000
Kosovo	0.18***	3.85	0.000
Montenegro	0.06	1.41	0.158
North Macedonia	0.08*	1.80	0.071
Number of observations			2,042
McFadden's R2			0.19

Notes: *p < 0.1, **p < 0.05, ***p < 0.01; z-statistics; for dummy variables (DV), dy/dx is for the discrete change of DV from 0 to 1. Source: Authors' calculations.

but the variable was not statistically significant and the results outlined above were unaffected.

Labour supply factors

Results show no statistically significant difference in training provision between businesses that agree or do not agree with the statement that skills taught in the educational system do not meet the needs of their company,. Respondents that indicated that the skills and education of available workers was an obstacle to their operation and growth of their business were 12 percentage points more likely to fund or arrange employee training. Results suggest that training provision is not influenced by businesses' perception on whether the brain drain is an obstacle to business operation and performance. Similarly, the risk of their workers being poached was not found to impact on training incidence. Businesses with workers who are ready to acquire additional qualifications to get promoted are 31 percentage points more likely to fund or arrange employee training, than those whose employees were less enthusiastic.

Business perceptions

As expected, businesses that perceive the present and future situation as more favourable were more likely to fund or arrange training and advancement for their employees: ceteris paribus, on average, for every additional point increase in the Business Sentiment Index the probability of a business arranging or funding training increases by 0.1 percentage point. The results reveal that in 2023 the share of businesses that funded or arranged training for their employees increased significantly by 6 percentage points. This finding suggests an increase in training provision after the onset of the COVID pandemic.

With regards to country differences in training incidence, the regression results show that compared to Serbia, Kosovo, Bosnia and Herzegovina and North Macedonia were more likely to fund or arrange training.

6. Conclusions

Increased investment in human capital is crucial if the WB6 countries are to close the productivity gap with the EU countries. If competitiveness is to improve in the face of the rapidly changing technologies and tastes then the workforce's skills need to be continually updated. This requires that the education and training systems support a flexible and productive workforce.

Schwab and Zahidi (2020) point to the inability of the education system alone to equip workers for the rapidly changing labour markets. They report that across developed and developing economies, significant gaps have emerged between the current capabilities and skills of the workforce and those required by employers. They argue that education systems are increasingly outdated. The adequacy of local secondary education systems to meet the needs of employment was rated at just 59 points (out of 100) by business executives in advanced economies and 42 points (out of 100) by those executives in emerging and developing economies while the adequacy of tertiary education to meet the needs of employment was rated at 68 points (out of 100) in advanced economies and 55 points (out of 100) in emerging and developing economies. A 2021 OECD report highlights that while education systems have been thought of traditionally as independent entities, now they should be viewed as part of a larger eco-system to which they contribute and by which they are influenced. Given that participation in formal education is no longer sufficient, the role of employers to support the upskilling and reskilling of their workforce is becoming of central importance.

According to the 2023 Balkan Barometer Opinion Business Survey over a third of businesses in the Western Balkan countries consider that skills taught in the educational system do not meet the needs of their company, a proportion that has increased by a half since 2020. Lack of a skilled and educated workforce are considered as obstacle to their business operation and growth by more than half of surveyed businesses, once again this proportion has increased by almost a half since 2020. Results from the 2022 OECD Programme for International Student Assessment (PISA) examining 15 years old students' knowledge in mathematics, reading and science, and what they can do with that knowledge (OECD 2023b), places Western Balkan countries significantly below the OECD averages in reading, mathematics and science, with no significant improvements compared to the 2018 results. This suggests that the education systems in the WB6 are not showing signs of noticeable improvements and thus the role of employer-provided training is of crucial importance for workforce development. Hence the concern that between 2016 and 2023 amongst the WB6, only Albania and Kosovo showed an increase in training incidence.

Data from the 2020 and 2023 Balkan Barometer Business Opinion Surveys show that overall training incidence in the WB6 increased from 28% to 35% of businesses reporting that they had funded or arranged training and development for their staff .. The

regression analysis indicates that icro and small enterprises are less likely to provide training compared to medium and large sized ones A greater probability to train is found among companies that exported in the previous 12 months, those with foreign owner as the largest one, those that consider that skills and education of available workers an obstacle to their growth, and among businesses whose workers are ready to acquire additional qualifications to get promoted. Businesses that had more optimistic perceptions of present and future situation in the economy were significantly more likely to arrange or fund training. This latter finding opens the possibility of generating a virtuous circle in the Western Balkans. That is, the promotion of economic development generates increased optimism about the future business situation and leads to additional investment in training by firms and a gradual closing of the productivity gap with the EU.

Comparing pre and post COVID-19 data it can be noted that the prevalence of training incidence increased after the arrival of COVID-19. It is tempting to suggest that the COVID pandemic crisis may have created opportunities for firms to invest in the skills their employees needed to adapt to remote working. However, a more detailed examination reveals that training incidence fell in Bosnia and Herzegovina, Montenegro and North Macedonia after the emergence of the pandemic. Moreover, the overall rise in training incidence in the WB6 between 2020 and 2023 is almost wholly due to an abnormally low training incidence in Albania in 2020 and a sharp rise in Kosovo's incidence after 2021.

The rationale for government intervention to stimulate employer-provided training is generally based on the presence of capital market constraints and externalities (Brunello and Wruuck 2020). The former rests upon the proposition that financing constraints prevent firms from funding profitable training opportunities. Whilst under-investment may also result from the failure of training firms to internalise the benefits which other future employers of the trained workers receive. Moreover, under-investment may result from the inability of training firms to capture all the benefits of that training, given the ability of trained workers to re-negotiate or quit once training has been completed, the hold-up problem (Leuven 2003). Black et al.'s (2023) survey of the consequences of government interventions to stimulate firm training suggests most policy initiatives generate large deadweight effects as firms reclassify informal training to receive subsidies.

Recognising the relevance of the employer provided training, a recent OECD report (2021) emphasises that governments can support companies to provide training in ways that can lead to increases in productivity, wages, and overall levels of well-being. The resulting increased provision of training is likely lead to greater and faster innovation. Moreover, if training is targeted on those skills likely to become more important in the future and on those workers whose skills are likely to be displaced in the labour market, then labour market efficiency and equity improve. One proposal that could be considered in the Western Balkan economies is the provision of financial incentives to support enterprises, such as voucher schemes. Martins (2021) has shown that well-designed and targeted voucher/grant programmes can be an effective way of stimulating employer-based training without producing large deadweight effects. However, a common current weakness amongst the WB6 is the absence of rigorous empirical evaluations of implemented policies. This weakness needs to be addressed before governments in the Western Balkans significantly expand support for employer-provided training.

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