

## Data Analysis and Indicator Development: Integration through Education

Adults with higher proficiency in literacy, numeracy and problem solving in technology-rich environments tend to have better outcomes in the labour market than their less-proficient peers. They have greater chances of being employed and, if employed, of earning higher wages. Across the countries that participated in the Survey of Adult Skills (PIAAC), an adult who scores one standard deviation higher than another on the literacy scale (around 48 score points) is 0.8 percentage point more likely to be employed than unemployed, on average, after accounting for other factors, including educational attainment. And an increase of one standard deviation in literacy proficiency is associated with a 6% increase in wages, on average across the 33 participating countries and economies.

Proficiency in information-processing skills is also positively associated with many aspects of individual well-being, most notably health, beliefs about one's impact on the political process, trust in others, and participation in volunteer or associative activities.

The ***Strength through Diversity*** project will develop a report based on data from the OECD Survey of Adult Skills on the outcomes of foreign-born adults in collaboration with the International Migration Division in the OECD Directorate for Employment, Labour and Social Affairs and the PIAAC team in the Directorate for Education and Skills. This analytical report will be integrated in the PIAAC Thematic Reports series.

The report will present evidence on the literacy, numeracy and problem solving skills of foreign-born individuals in PIAAC participating countries and whether migrants' skills are comparable to those of native-born individuals. The report will examine factors that determine skills proficiency among migrants in particular as well as factors that are common determinants of skill proficiency among both migrants and native populations.

A specific focus will be devoted to examining highly-skilled and low-performance adults in order to identify commonalities and differences in the relative strengths and weaknesses of foreign-born populations. A focus on low proficiency adults is crucial for adult education and training policies because ensuring that immigrants are proficient in literacy and numeracy and the use of technology is important to enhance their productivity and employability. At the same time, the report will detail differences across countries in the make-up and outcomes of highly skilled and highly qualified migrants. Another focus of analyses will be young migrants and those who were born in the country where the PIAAC assessment took place but who have at least one foreign-born parent. Analyses will examine transitions from school to work and subsequent labour market outcomes for these two groups of youth in comparison with young persons with no migration background.

Previous analyses of PIAAC reveal that immigrants have lower levels of literacy proficiency and on average less favourable labour market outcomes than native-born individuals, even when they are highly educated. Furthermore, poor language skills are one of the major hurdles for the social and economic integration of immigrants. The study will have a particular

focus on the importance language proficiency plays in shaping the outcomes of foreign-born individuals and will attempt to identify if the language penalty is particularly severe for those

immigrants whose mother tongue belongs to a different linguistic family than the language spoken in their destination country. PIAAC data will be matched with data on language dissimilarity to examine the contribution language proximity has in explaining differences in literacy, numeracy, employment and wage levels across different groups of immigrants and, in particular, of immigrants who arrived in their host country after the age of 12.

Participation in adult education and training is one of the ways in which immigrants may ensure that they gain the set of skills that are valued in their host country, that they become proficient in the host country language and obtain recognition for the set of skills that they possess. Yet, although immigrants have many incentives to participate in adult education, training and non-formal learning opportunities, they also face a set of constraints to participation. The report will examine opportunities and barriers to participation in adult education and training and if some factors are uniquely associated with immigrants' propensity to take part in adult education and training.

The report will develop new evidence on migrants' performance in the destination labour market, and its underlying determinants. Most studies examining the labour market outcomes of migrants rely on educational attainment as the metric through which human capital is measured. The report will examine if gaps in wages, occupational placement, and horizontal skill mismatch exist between migrants and non-migrants after controlling for differences in literacy and numeracy skills.

A key component of the ***Strength through Diversity*** project is its focus on the measurement of broader aspects of individuals' wellbeing. The report will pursue this line of inquiry by making full use of the social outcomes module in PIAAC to examine non-labour market outcomes of migrants and to which extent these differ from the outcomes of the native-born population. Analyses will focus on self-reported health, external political efficacy, interpersonal trust and volunteering. Previous analyses of PIAAC data have shown that literacy and numeracy skills are positively associated with many aspects of individual well-being, like health, active participation in the political process, levels of interpersonal trust, and involvement in volunteer or associative activities. Analyses will therefore examine if the association between skills and non-labour market outcomes differs among migrants and natives, and how this connection is intertwined with education, age, gender and other individual characteristics.

## Outcomes and Timeline

The report will be released in late 2017 and findings will be integrated in the final synthesis report of the ***Strength through Diversity*** project.

Contact the team to know more about the planned release date as well as launch events and activities.

### Contacts:

**Francesca Borgonovi**, Senior Policy Analyst ([Francesca.Borgonovi@OECD.org](mailto:Francesca.Borgonovi@OECD.org))

**William Thorn**, Senior Policy Analyst ([William.Thorn@OECD.org](mailto:William.Thorn@OECD.org))

**Theodora Xenogiani**, Senior Policy Analyst ([Theodora.Xenogiani@OECD.org](mailto:Theodora.Xenogiani@OECD.org))