



MEASURING INDIVIDUAL AND AGGREGATE MISMATCH

Using the survey of adult skills and the OECD skills for jobs database

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Types of mismatch and relevant data sources @ OECD



- Mismatch on the job
- Adequacy of employee's skills and qualifications to the content of his/her job;
- Types:
 - Qualifications mismatch: over/under
 - Skills mismatch: over/under
 - Field-of-study mismatch
- Data sources: [Survey of Adult Skills \(PIAAC\)](#)
- Consequences: for individuals and for firms



- Mismatch in the labour market
- Adequacy of workforce qualifications and skills to demand in the labour market;
- Types:
 - Shortages
 - Surpluses
- Data sources: www.OECDSkillsforJobsdatabase.org
- Consequences: for firms and for countries

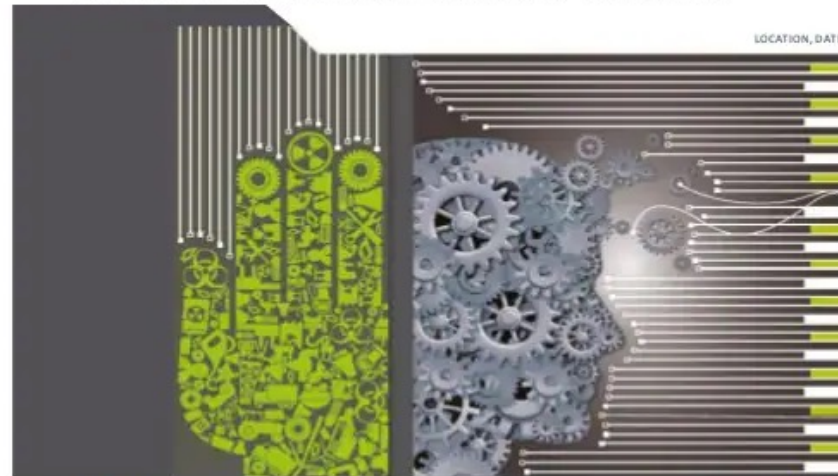


MISMATCH on the job: WHAT DOES PIAAC TELLS US?



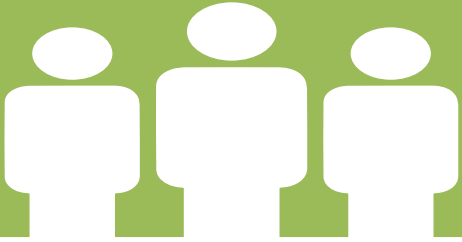
Skills matter

ADDITIONAL RESULTS FROM THE SURVEY OF ADULT SKILLS





Survey of Adult Skills in brief



245 thousand adults in 39 countries/economies

Sample size from a minimum of approximately 4 500 to a maximum of nearly 27 300.

Took an assessment in literacy, numeracy and problem solving in technology-rich environments



The survey collected background information of adults for about 40 minutes



The survey collects a range of transversal skills such as collaborating with others and organising one's time, required of individuals in their work.

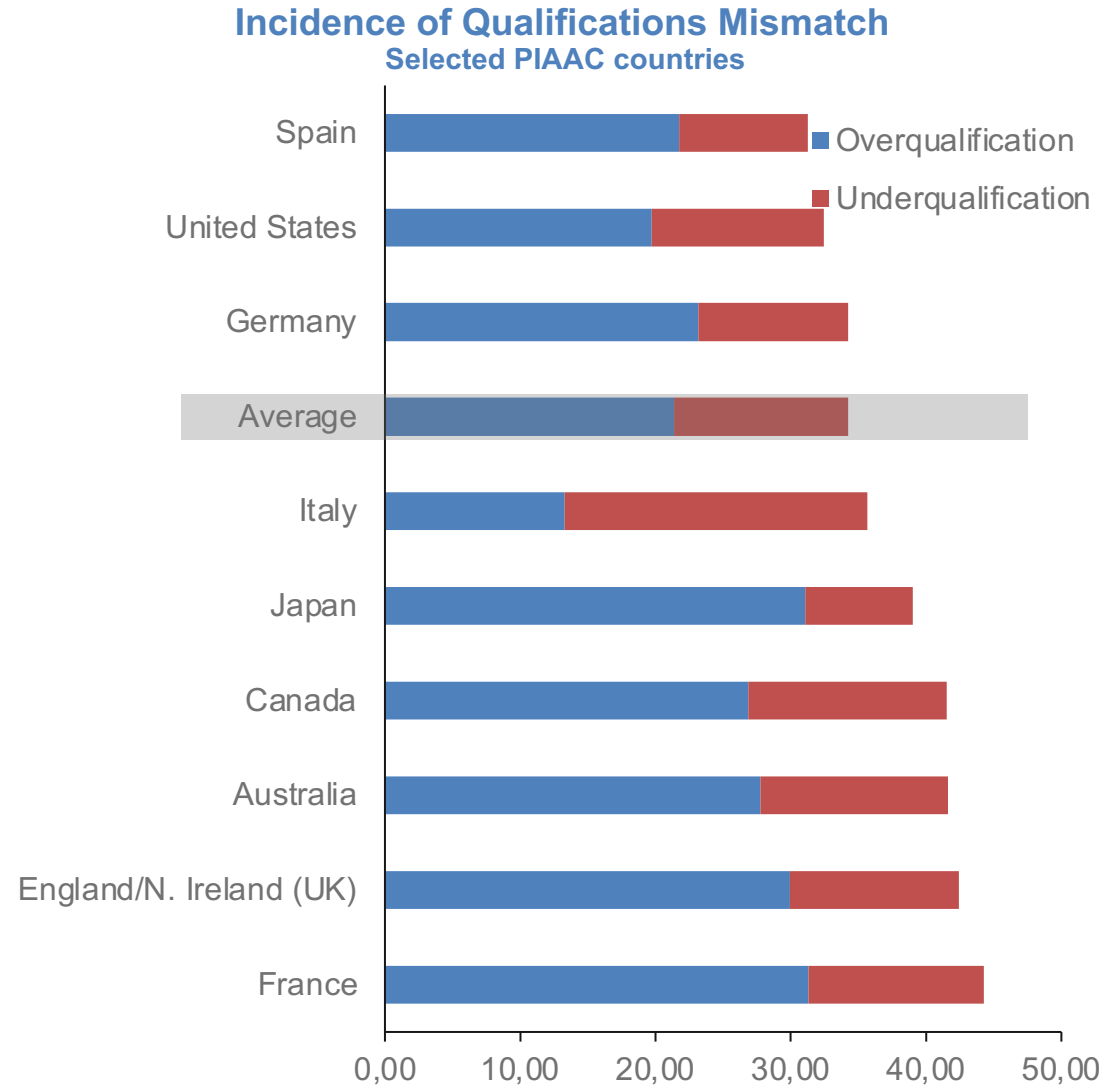




Over 1/3 workers are mismatched by qualification

The worker has higher (lower) qualifications than those needed to get the job

- On average:
 - 21% over-qualified
 - 13% under-qualified



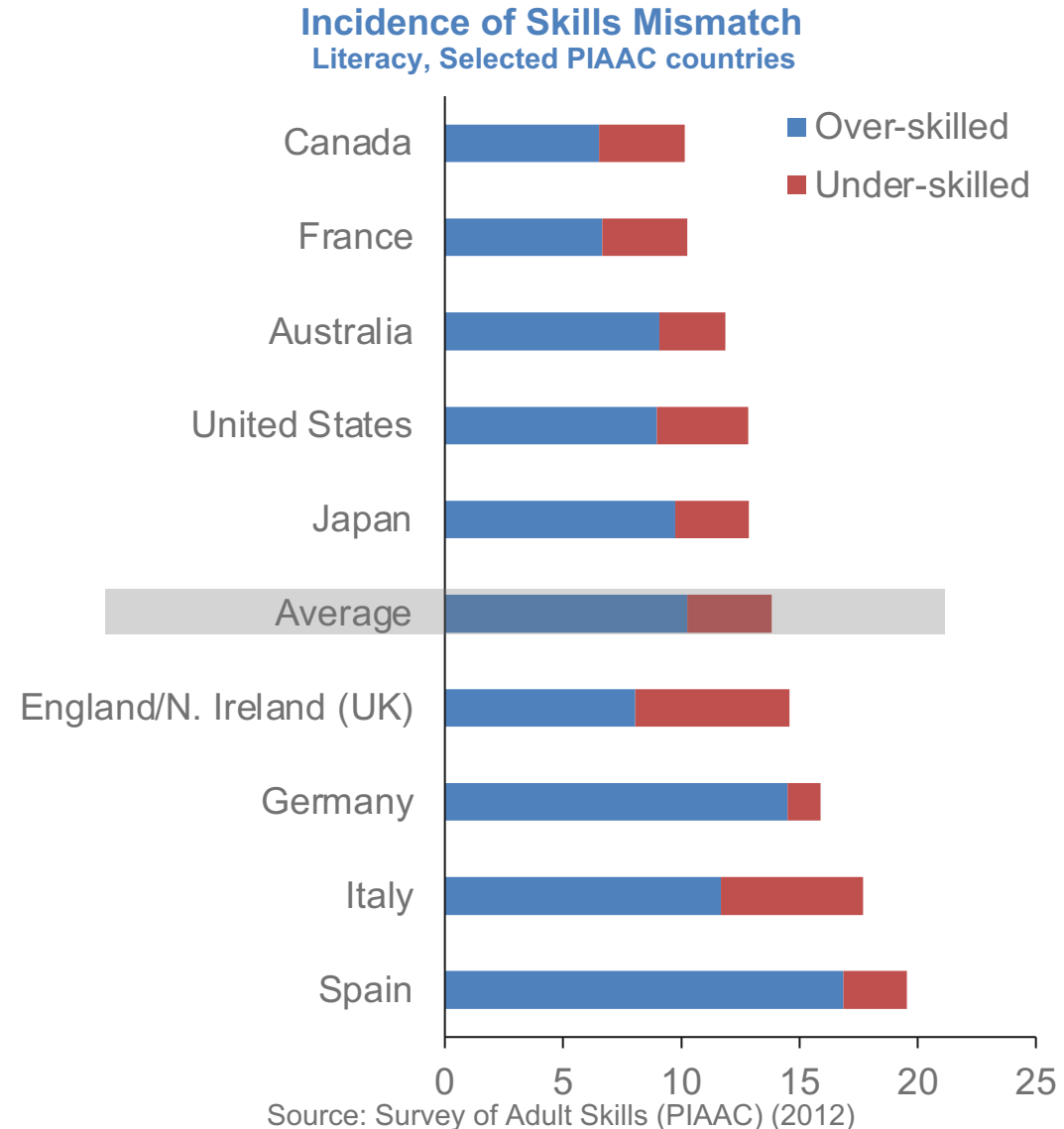
Source: Survey of Adult Skills (PIAAC) (2012)



Around 1/7 workers are mismatched by literacy levels

The worker has a higher (lower) skill level than those of workers who are well-matched

- On average:
 - 10% over-skilled
 - 4% under-skilled

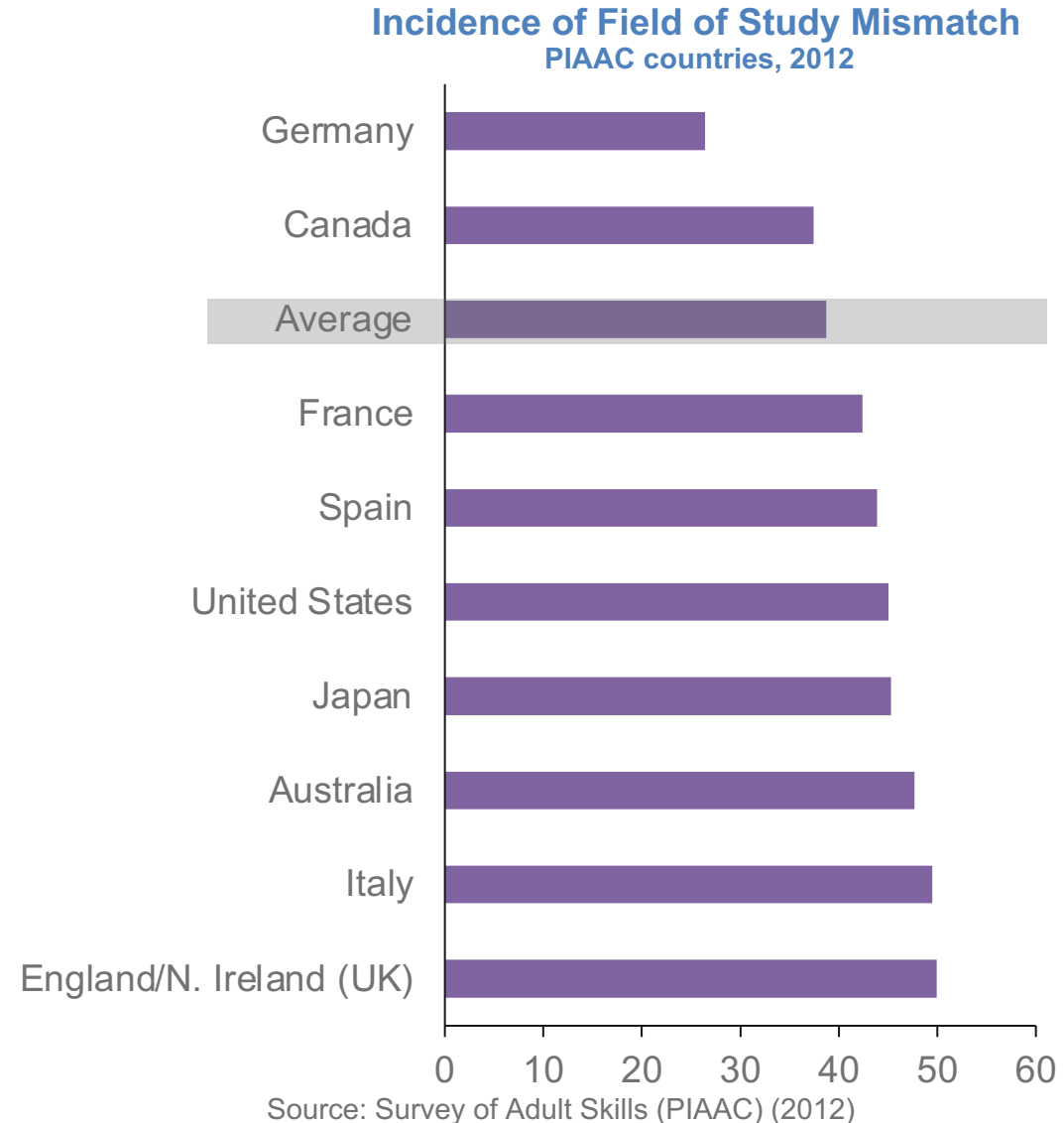




Around 4/10 workers are mismatched by field of study

The worker's highest qualification is in a field that is not related to the job

- On average:
 - 39% mismatch
 - 40% of them also qualification mismatched



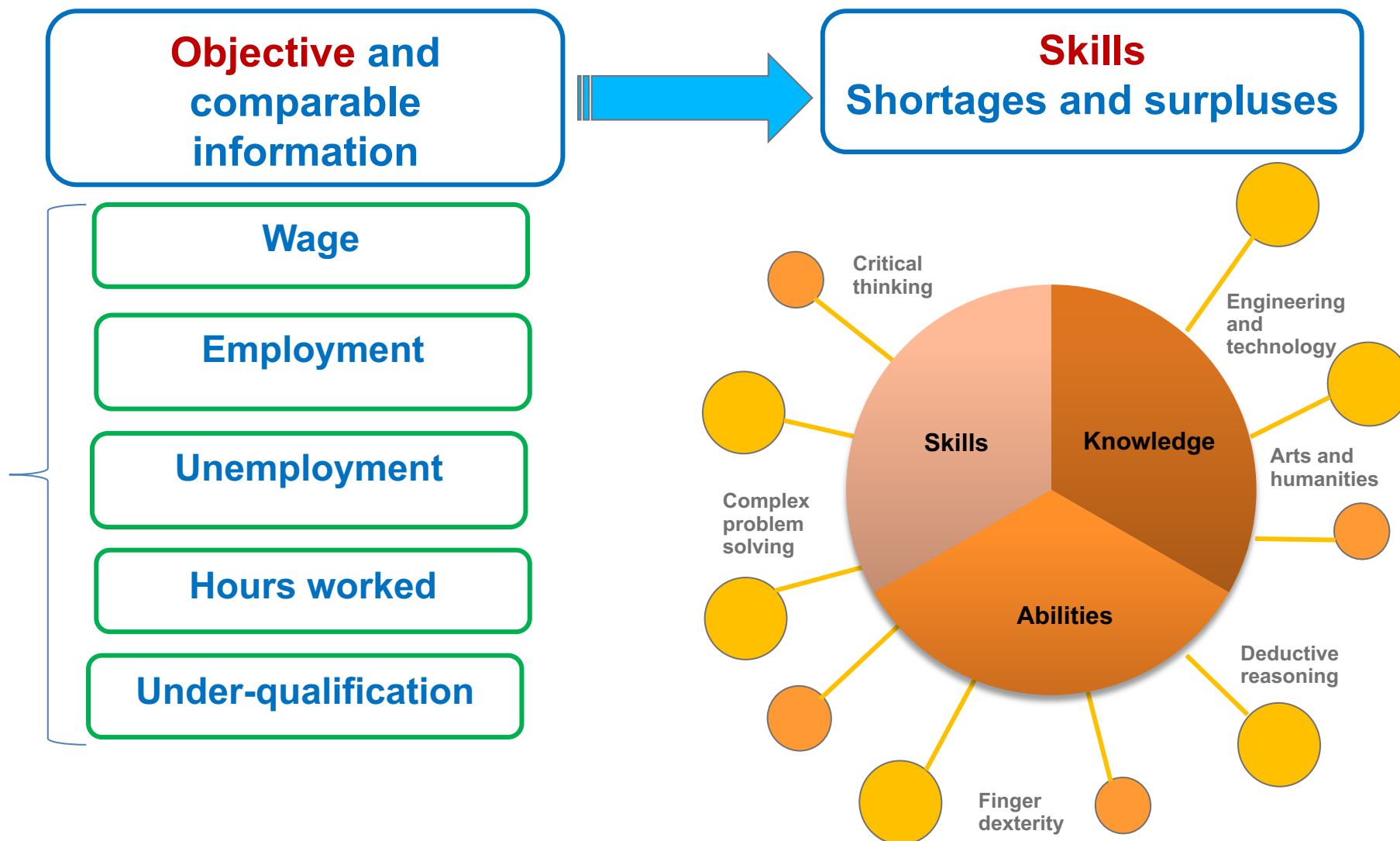


Aggregate MISMATCH: INSIGHTS FROM THE OECDSkillsforJobsdatabase.org





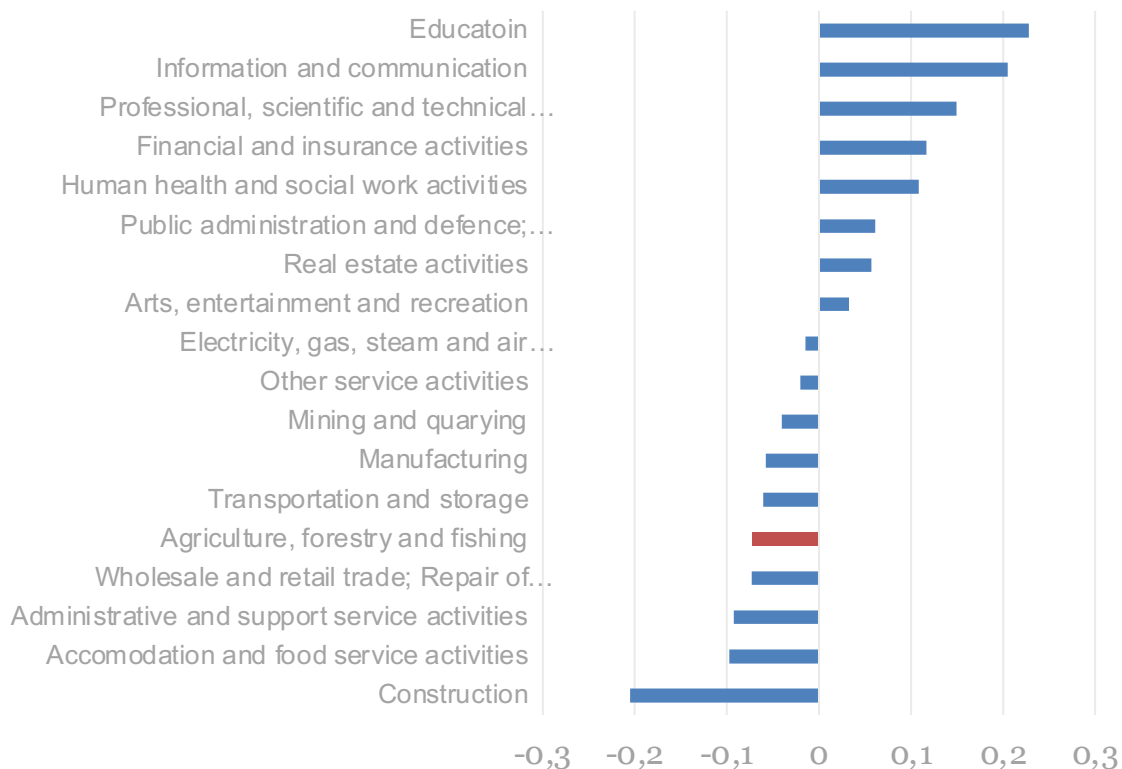
How we measure existing shortages and the changes ahead: the Skills for Jobs database



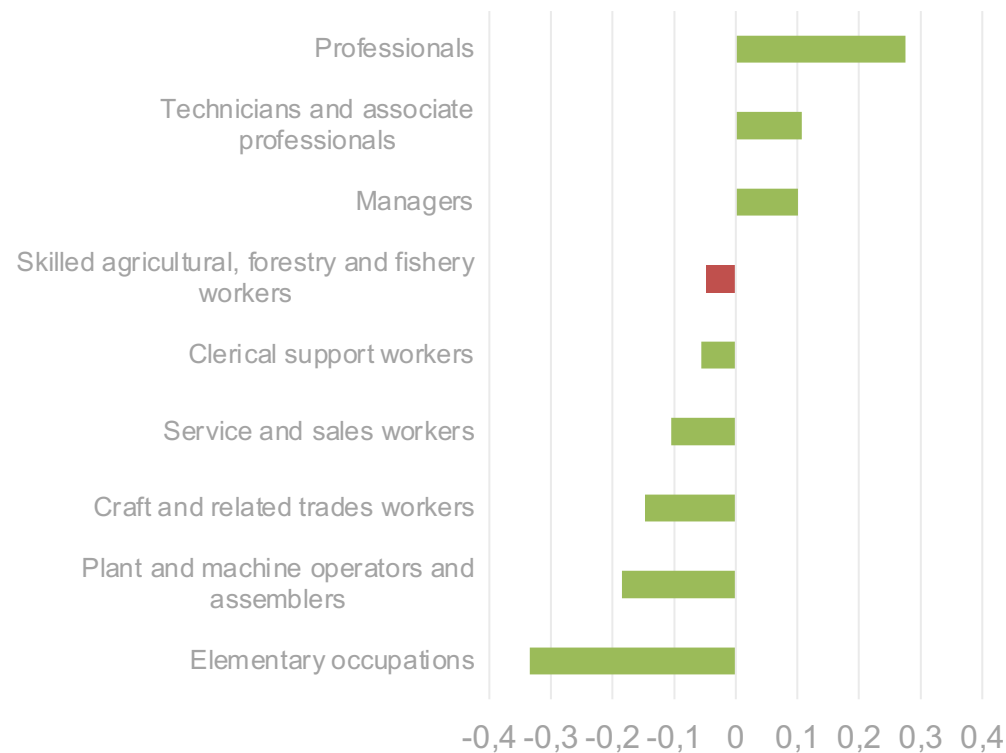


Shortages and surpluses vary across sectors and occupations

Shortages and surpluses by sector of activity

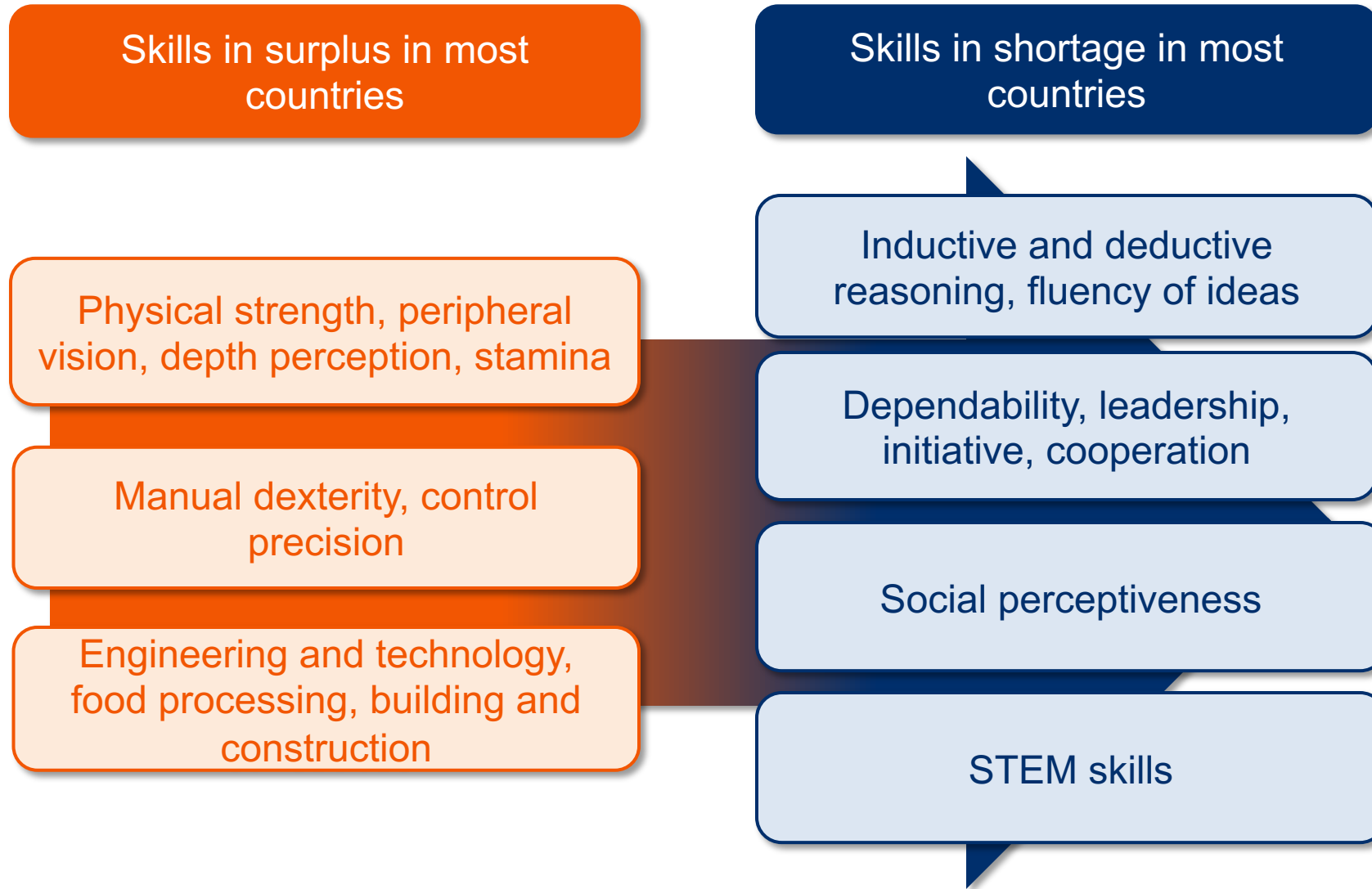


Shortages and surpluses by occupation





Behind the aggregate figures, we can express imbalances in terms of skills, knowledge and abilities





The cost of inaction is high

For individuals



Lower wages

Lower job satisfaction

**Risk of jobs loss and
skills obsolescence**

For employers



Lower productivity



**Vacancies remain
unfilled for too long**



**Delays in technology
adoption**



**Higher turnover and re-
training costs**

For countries



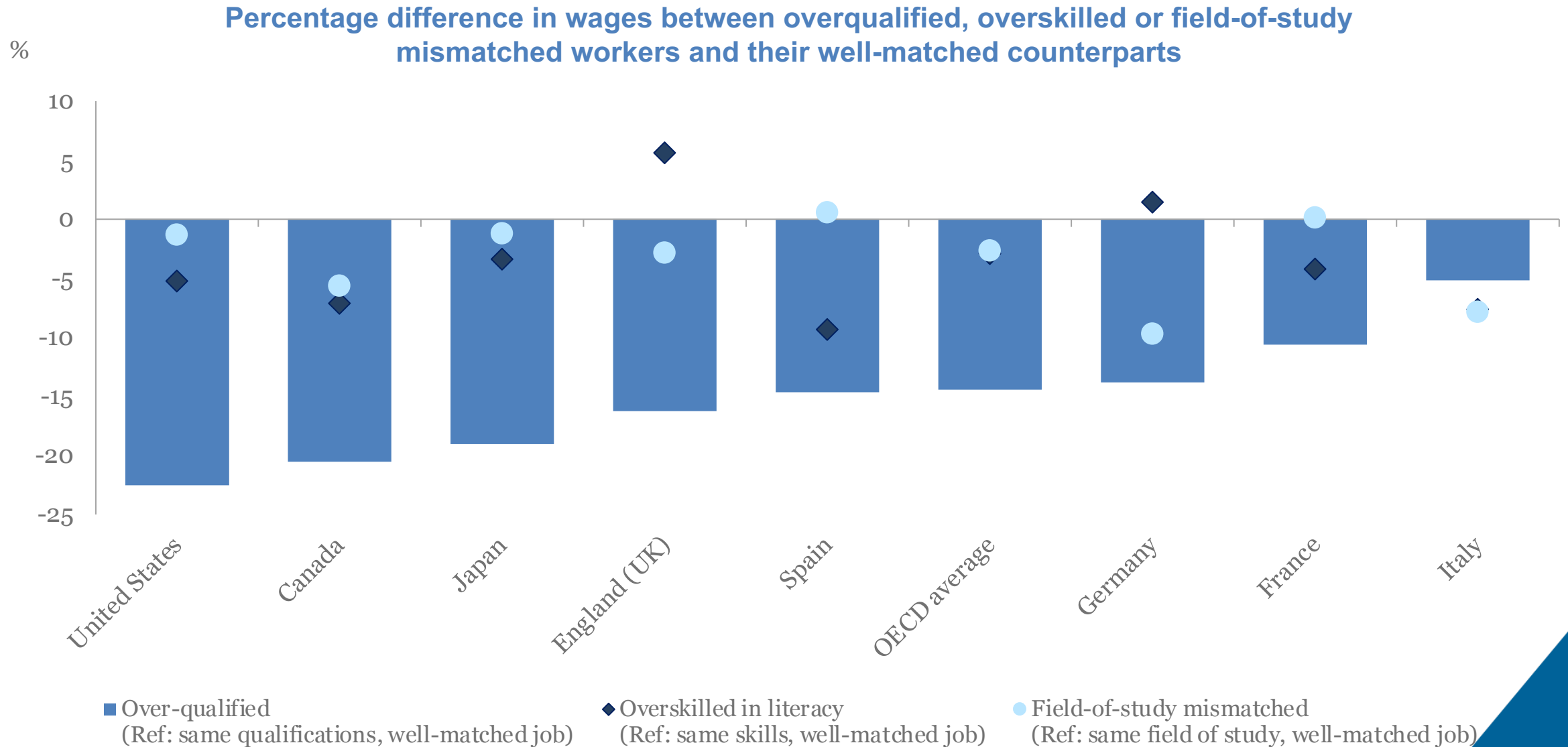
Less competitiveness

**Lower aggregate
productivity**

**Sunk costs in the skill
system**

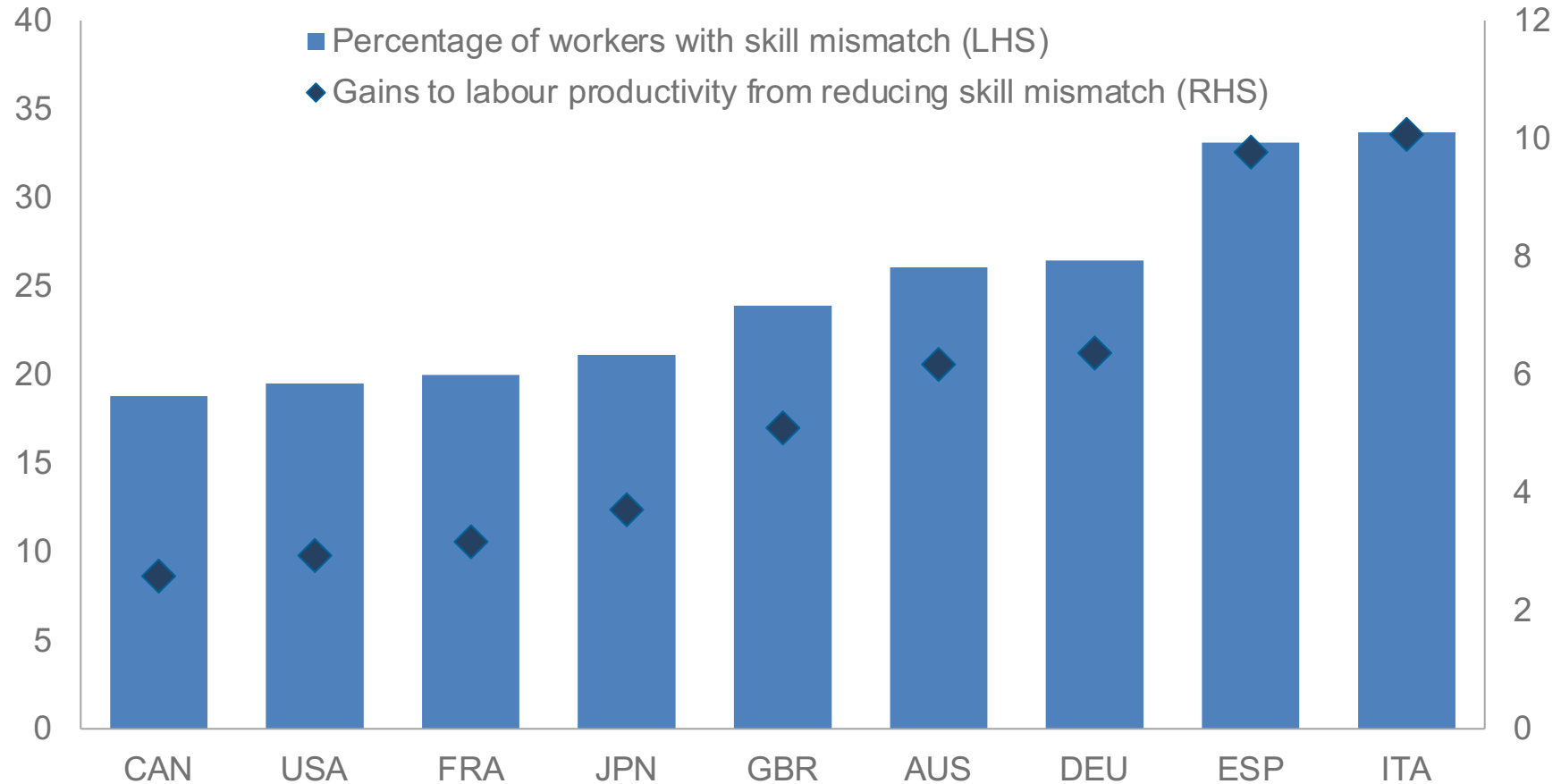


Qualification, literacy and field-of-study mismatch affect wages



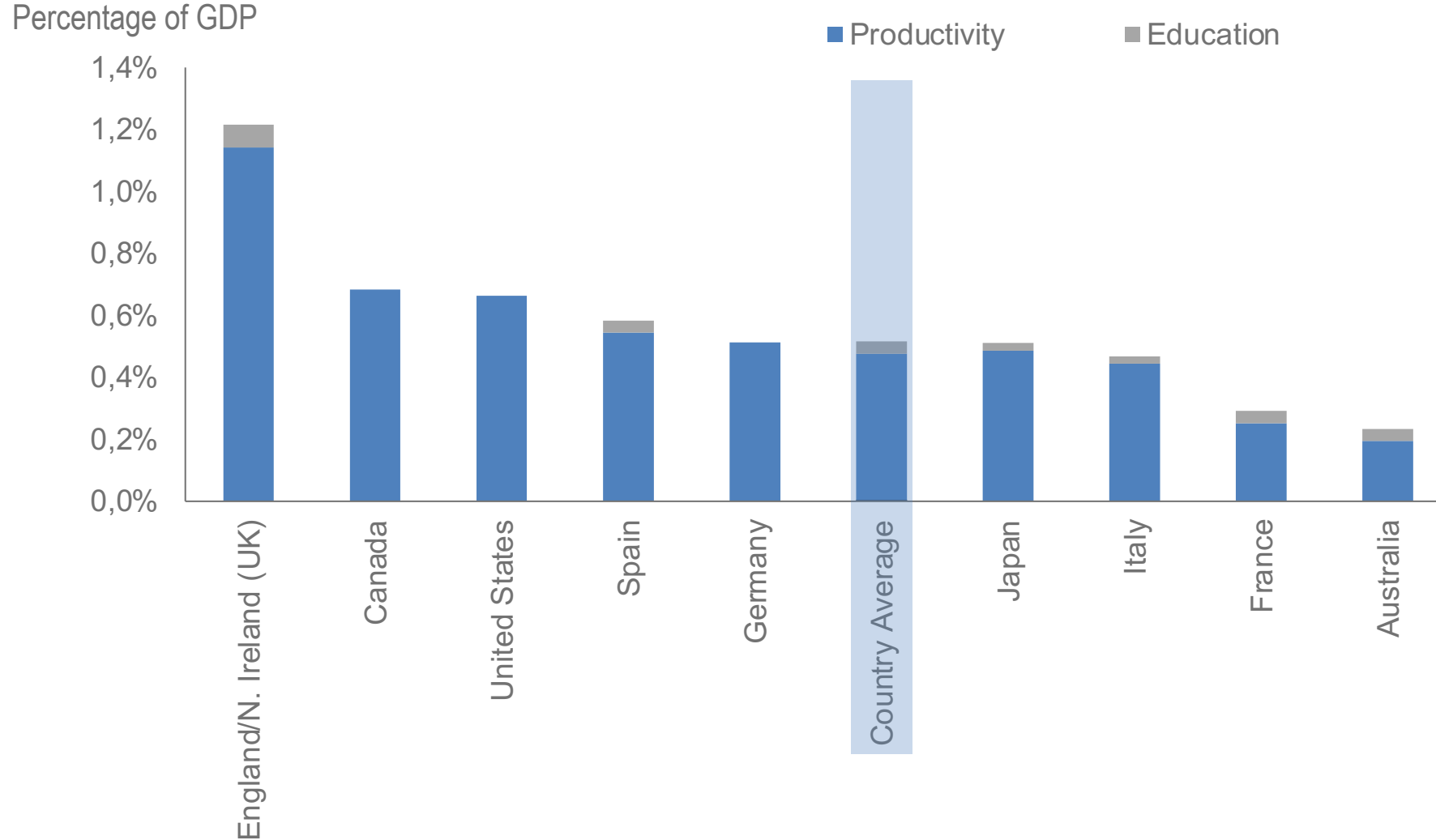


Literacy mismatch and productivity





The cost of field-of-study mismatch can amount to more than 1% of GDP





What do we know about the causes of mismatch?

Labour market dynamics predict over-qualification

- Workers fired or dismissed in the context of business closures are more likely to be over-qualified at re-employment than workers who quit
 - Effect stronger if job separation occurs at times of rising unemployment
- The longer the time spent out of work between two jobs, the higher the risk of over-qualification, suggesting skills obsolescence

What causes field-of-study mismatch?

- Saturation: there are too many graduates from this field and fewer jobs in the corresponding sector
 - Roughly: Number of graduates from the field

Graduates from more saturated fields are more likely to be mismatched (*and* overqualified)
- Skill transferability: skills from the field are transferrable / valued in other sectors
 - Roughly: Number of skills well-matched in that sector
Number of FoS mismatched in that sector

Graduates from fields with more transferability are more likely to be mismatched and well qualified



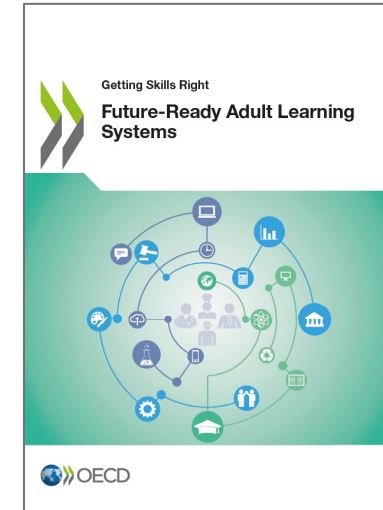
Policy-relevant messages

- Promote linkage between education provision and labour market needs
 - Skills assessment and anticipation systems linked to the definition of vacancies
 - Career guidance for youth and adults can help steer investments in education and training towards skills in need
- Promote skill transferability so that FoS mismatch does not bring about over-qualification
 - Competency-based occupational frameworks
 - Flexible re-skilling programmes
 - Strong foundation skills in all education and training pathways
- Encourage firms to train and foster learning culture:
 - Increase internal flexibility to adapt job tasks to the skills of new hires;
 - Promote a better allocation of workers to tasks; and
 - Provide incentives for workers to deploy their skills at work more fully



Thank you

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Website: <http://www.oecd.org/employment/skills-and-work.htm>



www.oecdskillsforjobsdatabase.org

