### Educational and qualification needs in the field of building renovation

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### Background of the story

**Renovation of the building stock** is one of Poland's biggest infrastructure challenges by **2050**. Buildings should be modernized in a manner consistent with the transition to a climate-neutral economy.

Potential benefits:

- to achieve **final energy savings** in residential buildings of up to 147 TWh (about 75% of their current level of final energy demand)
- obtaining a reduction in CO<sub>2</sub> emissions of more than 37 million tons per year (about 10% of Poland's total annual greenhouse gas emissions)
- achieve a **reduction in dust emissions** of about 89,000 tons per year (about a quarter of Poland's total dust emissions)



### Background of the story

Meanwhile, the number of **865,000** people working in the construction industry in **2010** has almost **halved by 2020**. At the same time, there has been a decline in the supply of industry-educated personnel to the sector due to the low interest of young people in construction careers.

According to market representatives, **too little emphasis** is placed in **technical/vocational schools** on the development of practical skills, resulting in insufficient preparation of graduates to perform professional tasks on the construction site. **The resulting deficits are not fully offset by hiring foreign workers.** 



# Survey of educational and qualification needs in the field of building renovation

A survey based on a sample of **504 respondents** was conducted in May-August **2023**.



Respondents rated on a 5point Likert scale:

**5**. Definitely YES

**4**. YES

3. Difficult to say

**2**. NO

- 1. Definitely NO
- **0**. No opinion

Employers Employees Education Associations Authorities Other



## The degree to which the education system takes into account knowledge and skills in the highlighted areas



Mean Technical/vocational schools Higher education Lifelong learning

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### Key skill areas

Installation and operation of heat pumps.

Mounting and operation of photovoltaic installation.

Digitizing the investment and construction process.

Installing biomass boilers and stoves.

Performing thermal modernization of buildings made of large slabs.

Performing thermal insulation from the inside of the building.

Performing thermographic analysis of a building.

Installation and exploitation of a solar collector.

Use of energy-efficient materials and technologies for the revitalization of historic buildings.



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### Selected comments from respondents

"The courses and trainings are biased. They present the benefits we can potentially get, and say nothing about the risks present and those in the future like disposal and recycling problems"

"Courses and training are soaked in the influence of large companies focused on sales and profits. This has little to do with knowledge, adherence to energy efficiency and ecology in construction"

"High school and university graduates often had no practice on construction sites during the education process. He is not familiar with basic construction machinery, equipment and processes"



### Joint Workshop on workforce shortages and upskilling for the clean energy transition

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