# Expansion of higher education, 'graduate unemployment' and the market value of a degree

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It is often argued that the expansion of higher education, which has doubled the annual flows of college and university graduates onto the Hungarian labour market, is inevitably conducive to high unemployment among high-skilled youth, and/or a dramatic fall in their returns from higher education. The paper looks at the evolution of the employment, unemployment, and relative wages of graduates from higher education, using data from the Labour Force Survey (1995–2003) and the Wage Survey (1992–2004). The analysis relates to age cohorts across and within occupations, and discusses the possible effects on older and less skilled workers. Young people's returns on higher education increased substantially in 1992–2000, and fell thereafter, especially in the business sector. Workers with a secondary-school background lost jobs and experienced falling relative wages in occupations subject to huge inflows of university graduates. However, the employment ratios were rising and unemployment falling, among university graduates and among less educated workers 'ousted' by them. The results suggest that after a decade of skill upgrading and excess demand for highly skilled youth, the markets are now moving along more or less stable demand curves.

### Analysing the impacts of technological development and trade on the skill premium in Hungary

Hajnalka Tarjáni

The difference between the wages of skilled and unskilled labour has substantially increased in Hungary since the beginning of the economic transition. Evidence of an increasing skill premium in developed countries since the late 1960s has come from a number of studies. The two main explanations offered in international literature for the increasing difference between skilled and unskilled wages are technological development and increasing trade. This study aims to examine how these two factors have affected the evolution of the skill premium in Hungary over the past two decades.

#### Solving non-linear, stochastic differential equations with Uhlig algorithms

Áron Horváth

Stochastic, dynamic models are frequently used in modern economic analyses. In macroeconomic models resting on microeconomic bases, for instance, the conditions for solving general equilibrium models can be described using a non-linear, stochastic system of

differential equations. This prescription-like article shows that the simpler systems – thanks to advances in computer technology – can be solved and analysed with graduate-level knowledge of economics. The algorithm in Blanchard and Kahn's 1980 study presents, as a solution to a matrix-equation system, the recursive form of such models. This the German economist Harald Uhlig transformed in 1999 for the purpose of computerization, so that he is often cited by users. There are two important restrictive criteria for applying the method: that the models should exist in their permanent state, and that they should be susceptible to linear approach. Two examples illustrate how the means necessary for solution do not exceed the level of fairly complex multiplicator analyses. With the model of real business cycles (RBC), the steps are given in detail. This is followed by a brief introduction to a sticky-price model representing a short-term application.

### Casual-labour market on Moszka tér – narrowing immutability between 1995 and 2004

Endre Sik

A casual-labour market is an open-air market in casual, unskilled work for day-labourers. The casual-labour market in Budapest's Moszkva tér, despite major differences, resembles in many ways those in other big cities (Tokyo, New York and Los Angeles), for instance in the dominance of heavy manual, mainly casual construction work, the illegality, and the dominance of men in poor social conditions. Altogether 84 'nonparticipant' observations were made in two observation periods, 1995 and 2004. These were representative in terms of day, season and time of day. Immutability in the supply and demand on the Moszkva tér casual-labour market can be shown in the decisive elements of the casual-labour market as an institution: the structure of labour supply (young, commuting or migrant young men of low education accounted for the bulk of the employed throughout) and the transaction mechanism (public, tolerant police control, group bargains). Change can be seen in the frequency of the transactions: the market shrank, but the supply (the number of employees) fell less than the demand (the number of offers), so that chance of obtaining work declined and pay fell. So the casual-labour market offers to the labour-market participants most heavily discriminated against the kind of black-market work opportunities that are ever more poorly paid and uncertain and do not lead to regular employment.

## Will there be annuities from voluntary pension funds? A comment on János Stahl's article

Miklós Arató

It is not long before most of the members of voluntary pension funds will have to receive annuities from them. Stahl raises some problems in this respect and sets to provide mathematical models that argue for new legislation in this field. This paper seeks to explain some problems not mentioned by Stahl, but important in practice. Furthermore, it is shown that the voluntary pension funds are highly likely to go bankrupt under the existing regulations, so that the government has to pay the annuities.