BME STUDENT CENTER

Budapest University
of Technology and Economics

2009

employment opportunities of fresh graduates

MŰEGYETEM 1782

Survey among 2007 graduates of the BME
and follow-up of 2005 graduates

Budapest University of Technology and Economics (BUTE)

Employment opportunities of Fresh Graduates

A survey among 2007 bute graduates and
A follow-up study of 2005 bute graduates

Prepared by:
Imre Szabó

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Our survey was carried out on full-time students with Hungarian citizenship receiving a degree at the Budapest University of Technology and Economics (BUTE) in 2007. The present follow-up examination forms part of the university's quality assurance system, in the frame of which we perform regular surveys among freshmen, graduated students and companies employing graduates.

The responses reflect the labour market experiences until 28 February, 2009 of young engineers, mathematicians, engineering physicists, engineering managers and economists graduated in 2007. We have performed our follow-up examination for the ninth time, thus we have expanding timelines available, which provide opportunity for comparison with earlier researches of a similar topic and for highlighting observed trends.

As last three year ago, we have carried out an extended survey, since we have questioned the graduates of 2005 who had already been surveyed two years ago. Truly, our investigation is not tied to individuals, but our statements concerning the given year may still be of interest. In certain tables, we refer to the data acquired from a second, 2009 survey of 2005 graduates as 2005S.

Abbreviation	Faculty	Graduated engineers
ÉPK	Faculty of Architecture	architect (MSc)
ÉMK	Faculty of Civil Engineering	civil engineer (MSc)
GTK	Faculty of Economic and Social Sciences	MSc in engineering management MA in management
GPK	Faculty of Mechanical Engineering	energy engineer (MSc), energetics engineer (BSc) mechanical engineer (MSc), mechanical engineer (BSc), industrial design engineer (MSc)
KSK	Faculty of Transportation Engineering	mechanical engineer (MSc), transportation engineer (MSc)
TTK	Faculty of Natural Sciences	mathematics (MSc), MSc in engineering physics
VBK	Faculty of Chemical Technology and Biotechnology	bioengineer (MSc), environmental engineer (MSc), chemical engineer (MSc)
VIK	Faculty of Electrical Engineering and Informatics	Master in computer science and engineering, electrical and computer engineer (MSc), biomedical engineer (MSc)

Table 1: Abbreviations of the faculties of the university

In cases where an answer category did not exist in one of the years, we apply dark background for the given cell in the table. When we received no answer in the given category, the cell got "-" mark and if the ratio of the received answers assumed the value of zero following rounding, it is indicated with "0".

The amounts spent on accommodation and when calculating revenues and income we used the exchange rate of HUF 251.3/€, if it is an income from 2008, and we used the exchange rate of HUF 298.5/€, if it is an income from February 2009, and we used the exchange rate of HUF 304.3/€, if it is an income from March 2009 [1].

1. FIGURES, REPRESENTATIVITY

We used the statistics of the higher education of the Ministry of Education and Culture[2] to help determine the weight of the BUTE amongst the graduated students in 2007. According to this, 1540 people got a bachelor or master degree on the full-time courses at BUTE, from which the number of bachelor degrees is 54.

[1] Source: www.mnb.hu/engine.aspx?page=mnbhu_arfolyamok
[2] Source: http://db.okm.gov.hu/statisztika/fs08_fm

At the time writing this survey, student graduated at BUTE from 19 departments, at which academic fields the number of the graduated nationwide at 2007 was 7512 (master degree: 3563, bachelor degree: 3949). So examining these departments the weight of graduated in the master programs from BUTE was 41.7%, while amongst the bachelor programs was 1.4%

We have reached 1889 out of the 1912 students graduated in 2007, and the number of respondents was 381, which constitutes an answer ratio of 20.1 %. We have reached 1781 out of 1827 students graduated in 2005, with the number of respondents being 330, which means an answer ratio of 18.5%. The composition of the sample in both cases was adjusted to the composition of the population according to faculty and sex with the so-called weighting procedure applied in statistics. The weighting procedure ensures that our research can be regarded as representative concerning the sex of the respondents and the faculty of graduation as variables.

	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Number of graduates [persons]	204	208	299	175	132	30	199	665	1912
Interfaculty proportion of graduates [%]	10.7	10.9	15.6	9.1	6.9	1.6	10.4	34.8	100
Number of delivered questionnaires [persons]	204	207	298	172	131	30	192	655	1889
Number of respondents [persons]	44	31	53	34	30	8	31	150	381
Interfaculty proportion of respondents [%]	11.6	8.1	13.9	8.9	7.9	2.1	8.1	39.4	100
Proportion of respondents compared to delivered questionnaires [%]	21.6	15.0	17.8	19.8	22.9	26.7	16.1	22.9	20.1

Table 2: Headcount data of full-time students of Hungarian citizenship graduated from basic training at BUTE in 2007, by faculty

	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Number of graduates [persons]	161	239	332	115	145	34	187	614	1827
Interfaculty proportion of graduates [%]	8.8	13.1	18.2	6.3	7.9	1.9	10.2	33.6	100
Number of delivered questionnaires in 2007 [persons]	102	222	292	106	134	32	174	556	1618
Number of respondents in 2007 [persons]	17	35	49	24	26	10	37	119	317
Proportion of respondents compared to delivered questionnaires in 2007 [%]	16.7	15.8	16.8	22.6	19.4	31.3	21.3	21.4	19.6
Number of delivered questionnaires in 2009 [persons]	154	229	325	113	143	33	180	604	1781
Number of respondents in 2009 [persons]	20	32	58	20	29	5	45	121	330
Proportion of respondents compared to delivered questionnaires in 2009 [%]	13.0	14.0	17.8	17.7	20.3	15.2	25	20.0	18.5

Table 3: Headcount data of full-time students of Hungarian citizenship graduated in basic training at BUTE in 2005, by faculty

2. DOMICILE

Analysing separately the division of the graduates of 2007 and their parents according to domicile, it can be stated that migration to the capital remains considerable. While in the case of parents, the proportion of Budapest dwellers is 31.2%, in the case of graduates the same proportion is 67.0%. While 20.1% of students with roots in the capital left the city, 60.7% of non-Budapest dwellers moved to the capital or stayed here after finishing the studies. The proportion of those living in Budapest among the graduates of 2005 changed minimum in the last two years.

Domicile of graduates	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Budapest	25.0	31.7	33.5	37.4	25.8	12.5	42.2	28.9	31.2
City of county rank	13.7	26.0	19.7	14.6	37.1	37.5	28.7	24.4	23.3
Other city	45.6	31.7	28.1	27.5	27.3	25.0	15.6	37.1	32.1
Village	15.7	10.6	18.7	15.2	9.8	12.5	9.9	9.0	12.2
Abroad	–	–	–	5.3	–	12.5	3.6	0.6	1.2

Table 4: Division of 2006 graduates according to own domicile, by faculty and total [%]

3. ACCOMMODATION

The 35.8% of 2007 graduates indicated that they live in their own property, which is in accordance with the values of the previous years. Most graduates live in an own property in Budapest. In contrast to the last years the proportion of those living in an own property in the country is same according to own domicile (33.3%-34.4%).

	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Lives in an own property*	41.8	33.7	27.4	59.3	22.3	50.0	25.5	37.6	35.8
	Year of graduation								
	1999.	2000.	2001.	2002.	2003.	2004.	2005.	2006.	2007.
	42	38	35	35	36	42	34	34	40.0

** Before 2006: "Has own flat".*

Table 5: Proportion of property owners, by faculty and total [%]

The majority of those living not in their own flat lives with their parents (the 23.4% of the total number of respondents, the 36.4% of those living not in their own flat). Renting was indicated by the 35.6% of all respondents, while a few live in a flat or in an accommodation ensured by a company, live in dormitory, some with their present partners, perhaps relatives, friends or in the flat of their parents (but not together with them). Compared to the data from last year the proportion of those living in rented flats is increased (35.6% compared to the proportion of the 25.2% of last year).

Overall, the 78.1% of the respondents reported on accommodation related costs. Those reporting on exact monthly costs spent an average of 223 € in an average month (in March 2009), which includes the rental and overhead costs. It is still true, that graduates living in rented flats reported on somewhat higher costs than the others did.

Accommodation related costs	Lives in own flat	Lives with parents	Lives in rented flat	Lives under other title	Total
Max. 65 €	8.6	7.7	2.3	26.7	7.1
66-130 €	24.0	8.7	25.3	43.3	21.9
131-195 €	25.0	14.8	25.3	11.1	22.0
above 196 €	31.1	3.9	40.3	4.4	26.7
Indicated no cost	11.3	64.9	6.8	14.5	22.3
Average value* (€)	214	166	262	105	223
Deviation* (€)	146	159	187	544	167

** Average value was calculated among those who indicated some sort of accommodation related costs*

Table 6: Size of monthly accommodation related costs according to means of accommodation [%, €]

Questioning 2005 graduates two years ago, we found that one third of them had their own flat, while by this year 54.3% reported living in an own flat. It is in every sense a noteworthy improvement and indicates that the property issue has been solved 3.5-4 years after graduation considering the most of the former students.

Overall, the 85.3% of the respondents indicated some sort of accommodation related costs, which is a higher proportion compared to the figures of 2007 graduates. Those having reported on exact monthly costs (asking about the month of March 2009 in the questionnaire) spent an average of 245 € on accommodation, that is on rent and overhead costs together.

4. FINANCING STUDIES

Among the sources of financing living during tertiary level studies, family support clearly leads as the most widespread form, since their families had supported 95.2% of graduates. The role of state support is also substantial; the 69.1% of former students had received such subsidy during their studies, while 58.6% mentioned income from work.

Compared to the last year the proportion of those utilising the Student Loan during their studies grew in a small extent, 34.7% of 2007 graduates indicated that among financing sources. Since the year examined now could utilise at the second time this financing form during the whole training period, in the future we forecast an even less strong proportion of the Student Loan in financing studies.

Family support takes the leading role not just in being the most widespread form in sources for financing studies, following the previous tendencies the weight of this decreased to the lowest level so far. The proportion of state support also increased in a small extent, and that of income from work also increased to the highest level so far. The strengthening of Student Loan is the most striking, since compared to its starting position with 1% it has been on the increase gradually year to year reaching the present 9.% proportion, which means that not only the proportion of those using credit, but also the role of the loan in financing studies has grown.

Form of financing	Date of graduation							
	2000.	2001.	2002.	2003.	2004.	2005.	2006.	2007.
Family support	65	66	67	66.4	63.9	62.9	65.2	59.2
State support	20	19	19	17.3	17.3	14.7	15.6	16.0
Income from work	14	13	11	11.9	11.6	14.0	10.0	14.3
Student Loan			1	3.4	5.5	6.9	7.6	9.1
Other	1	2	2	1.0	1.7	1.5	1.7	1.4

Table 7: Division of coverage of costs emerging during studies, total [%]

5. USABILITY OF UNIVERSITY STUDIES

Evaluation one and a half to two years after graduation cannot obviously be complete; however, it can still provide feedback for education and training. Similarly to earlier years, the answers refer to the statements on knowledge acquired during university studies as "*essential*" (17.3%) or "*well usable*" (32.2%), though the 42.3% of graduates only considers it "partly usable". If we consider the fact that one part of the knowledge at certain majors goes out-of-date this latter statement is understandable.

Compared to earlier years change in the answers cannot really be detected, the proportion of those who consider their knowledge gained at the university as "*hardly usable*" or "*not usable*" is still on

the minimum. There is no real difference about knowledge usability occurring in the answers given by those employed in the public, market or civil sectors.

Usability of studies	Average of previous years					FACULTIES								
	2002.	2003.	2004.	2005.	2006.	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Essential	17	16	19	16	17.8	24.9	17.4	29.9	2.9	6.1	50.0	14.6	15.1	17.3
Well usable	37	34	32	38	35.2	31.7	43.0	34.7	9.3	26.0	12.5	38.5	34.0	32.2
Partly usable	35	40	36	39	37.8	41.0	35.7	29.9	67.6	53.4	25.0	40.6	42.4	42.3
Hardly usable	5	5	5	3	6.3	2.4	3.9	3.4	17.3	11.4	–	6.3	5.2	6.1
Not usable	1	0	1	0	1.3	–	–	–	–	–	–	–	–	–
Does not know. has not yet worked in the field	5	5	7	4	1.6	–	–	2.1	2.9	3.1	12.5	–	3.3	2.1

Table 8: Usability of university studies in graduates' work, by faculty and total [%]

Mathematicians and engineering physicists gave the best evaluation again this year, where weak ("*hardly usable*" or "*not usable*") evaluations never occurred. Subsequent evaluation of Faculty of Economic and Social Sciences and Faculty of Transportation Engineering graduates remains unfavourable.

Same last two year we asked the respondents to give their opinion on the strength and weaknesses of education in connection with eight statements (all could have been assessed on a 1-5 scale), then they were asked to write the strengths and weaknesses of BUTE training with their own words. The data gained from the questionnaires of 2007 graduates have reinforced the results of earlier years, since the majority of graduates have agreed with the statements on professional attitude and strong theoretical basis, and only few formed a different view. The opinion of respondents on knowledge usable in practice was more diverse, however, compared to earlier years less consider professional knowledge inadequate or obsolete. Theory and practice does not seem successfully related, since one third of the respondents agreed on the point that "*professional training opportunities were low*".

Reception of statements on a five-point scale*	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Training provided well usable knowledge in practice.	3.05	3.06	3.30	2.76	2.98	3.50	3.31	3.04	3.09
Training ensured professional attitude and way of thinking.	4.09	3.93	4.18	3.85	3.97	4.88	4.14	4.16	4.10
Training provided strong theoretical basis.	4.30	3.74	3.94	3.25	4.13	4.86	3.69	4.26	4.01
The knowledge taught at the university was inadequate or obsolete.	2.46	3.27	2.78	2.62	2.84	1.63	2.45	2.67	2.70
During the training, the instruction of professional knowledge was insufficient.	2.89	2.86	2.46	2.63	2.52	1.71	2.45	2.48	2.57
During the training, information spread exceeding the boundaries of strictly interpreted professional materials was weak or little.	3.07	3.28	2.73	2.51	2.96	3.00	2.83	3.07	2.95
Professional training opportunities were low.	3.80	3.51	3.71	4.32	3.86	2.25	3.75	3.64	3.72
Language learning opportunities were on a low level or they were proved not to be sufficient.	2.95	3.13	2.43	2.16	2.70	1.75	2.26	2.24	2.47

** Average values, where 1=never true, 5=true in every sense.*

Table 9: The assessment of university training, by faculty [average values]

6. STRENGTHS, SHORTCOMINGS AND WEAKNESSES OF TRAINING

The 70.0% of the respondents mentioned at least one from the strengths of the training, 32.0% at least two, while 9.3% registered three or more elements. Adding up the answer-elements we find that the element used in earlier years as "*strong theoretical basis*" was marked as strength by the third of the respondents (47.0%), while "*professional (engineer) attitude and way of thinking*" was

found in the 29.3% among the answers. 12.9% of the respondents referred to the talented, experienced and excellent teachers, and nearly same amount praised the professional subjects and the training itself (10.3%). In contrast earlier years more respondents (12.3%) mentioned "*planning, laboratory, software laboratory practices*" as strength.

Answers strongly connected to this highlighted the fact that the professional material is "*up-to-date, modern*", (3.0%), it provides "*versatile, variable, horizontal knowledge*" (16.0%), and "*the opportunity for high-standard language training*" is given (1.2%). Considering all these answers, it can be stated that the greatest strength of BUTE training according to graduates is partly coming from the professional (engineer) attitude and from the high-level, modern, versatile professional and extensive knowledge provided by the training.

The 69.8% of the graduated students indicated some sort of "*insufficiency, weakness in connection with the training*". The majority (49.8%) emphasized the "*deficiency of professional training opportunities in practice*"; the second most frequent answer criticized "*obsolete knowledge or inadequate technologies being taught*" (16.5%). More than one tenth of answers indicated that the training is "*not practice oriented enough*" (12.3%) or the "*methods of lecturing and examinations is inefficient*", called the attention to the "*superfluous subjects*" as part of training (11.1%) or "*dominance of theoretical subjects*" (10,7%).A rare answer suggested the "*absence of exact professional subjects or knowledge*" in the training (7.8%).

7. MORAL AND FINANCIAL RECOGNITION OF THE PROFESSION

Compared to the values of last year we have received same results both in the matter of moral and financial recognition. This year nearly three-fourth with respondents regarding that their profession – concerning its moral prestige – is the most recognised, or belongs to the well-recognised professions. This year also, the graduates of the Faculty of Civil Engineering and Faculty of Natural Sciences considered their profession suiting this criterion, while the graduates of the Faculty of Economic and Social Sciences considered it the least so.

Level of recognition	Previous years' average			FACULTIES								
	2004.	2005.	2006.	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Recognised to the greatest extent	9	12	11.2	11.3	14.5	20.5	3.5	9.9	39.1	11.0	16.6	14.4
Well recognised	56	62	64.6	75.0	54.6	60.1	41.9	53.0	60.9	53.4	63.7	59.5
Moderately recognised	30	20	19.1	9.3	25.1	14.1	45.9	24.2	–	18.3	17.7	19.9
Badly recognised	4	5	4.7	4.4	5.8	4.0	5.8	12.9	–	13.6	2.0	5.3
Recognised to the least extent	1	1	0.4	–	–	1.3	2.9	–	–	3.7	–	0.9

Table 10: Graduates' opinion on the moral recognition of their profession, by faculty and total [%]

The total proportion of those giving a positive report on the financial recognition of their profession is 54.0%, which indicates a bit smaller value compared to the 56.0% among the 2006 graduates, however, it indicates a much smaller value than the proportion of those evaluating moral recognition as positive. We saw a positive deviation of these two variables in the Faculty of Electrical Engineering and Informatics, where the former students are satisfied in respect of both aspects. Graduates of the Faculty of Economic and Social Sciences assessed their profession going together with somewhat more favourable financial appreciation than the average, but they felt it more often that the financial recognition was not accompanied by moral recognition. Architects gave account on the different values in an opposite way: although they sensed the moral prestige of their profession as good, most of them gave an average evaluation concerning financial recognition.

Level of recognition	Previous years' average			FACULTIES								
	2003.	2004.	2005.	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Recognised to the greatest extent	5	8	5.4	2.4	–	5.4	5.8	3.3	–	–	18.2	8.2
Well recognised	43	43	50.6	43.0	11.5	44.1	51.7	34.7	60.9	27.2	64.1	45.8
Moderately recognised	47	36	35.4	45.4	35.6	39.0	39.0	48.8	39.1	51.1	17.1	33.6
Badly recognised	13	12	7.5	6.8	33.7	11.5	3.5	6.6	–	21.7	0.6	9.5
Recognised to the least extent	1	1	1.1	2.4	19.2	–	–	6.6	–	–	–	2.9

Table 11: Graduates' opinion on the financial recognition of their profession, by faculty and total [%]

Working in the public sector feels their profession less appreciated, particularly regarding financial recognition, the bigger half of the public sector adjudges financial recognition of their profession at the most moderately recognised.

8. FURTHER TRAINING

The 61.9% of 2007 graduates participated or still participate in some sort of further training. The repeatedly high proportion of those utilising further training opportunities year by year is remarkable, and it ensures that the majority of graduates will, not only in the distant future but practically in the period of starting their job, demand a supplementation or extension of their existing knowledge or their employer regarded that a necessity. In addition, the 89.4% of the respondents did claim a need for further training at the time of the questionnaire having been answered.

The demands were not primarily influenced by the fact whether the given respondent had already taken part in any sort of extensive training. It even seems to be true that those not participating in such a training, prove a lower inclination to do so in the future, since among them 84.2% indicated their demand, however the 92.0% of those who had already taken part in some sort of extensive training and 93.5% of those who are now being involved in such trainings emphasized their present and future demand. The 77.9% of 2005 graduates reported on taking part in or having taken part in some kind of further training since they gained their degrees. In spite of the high number of realized extensive training opportunities, the 89.9% of the respondents still consider their further training as a necessity.

The greatest motivation for post-graduate studies among the 2007 graduates was the realization of their career objectives (55.4%), and the update of their knowledge (33.1%). Further training was more frequent among those who, considering their scope of activities, gained employment or doing business in the field of economic, financial, commercial, broker or consultant.

The 7.1% of those having taken part in extensive trainings indicated that their further training opportunities since their graduation were free for them, and for the rest of the respondents it was also true that their trainings were covered rather by their companies. Taking the cost of all trainings as 100% so far, the privately covered cost was 21.3% on average, while the corporate-covered cost was estimated to be 69.0% and other cost takers were indicated to be around 9.7%.

The most of these participating in postgraduate courses were taking part in courses in line with their studies (78.0% of the respondents), but the language trainings also represents a big proportion (40.9% of the respondents). Beside these a big part of the postgraduate studies were some sort of economic or managerial trainings (26.2% of the respondents), which shows the importance of these type of trainings that 10% of every department taken part in these kind of trainings

Like in the past years figures the biggest rate between the forms of the realized and the current postgraduate studies are the training courses (51.6% of respondents) and the company courses (46.7% of respondents). Between the realized postgraduate studies the weight of the training courses are much more high than the current studies, together with this rate, between the current studies the trainings which are tend to a new diploma is higher. All of this is probably in connection with the training's period: those who finished the university will not certainly rejoin the higher education, after a couple of years and some work experience they may feel the need for this.

9. LABOUR MARKET STATUS, PLACEMENT

The proportion of those employed (employed in labour relation or by subcontract or entrepreneurs) among 2007 graduates was 92.1%, the proportion of students (PhD and full-time students) was 5.5%, the proportion of those unemployed being 1.6%, and the proportion of those otherwise inactive was 0.8%. The proportion of the part-time employment added up in the university takes up only 1.3%, and this proportion is half to the last year's rate (2.5%). The proportion of the employed is 92.1%, which is the highest rate so far. The proportion of the unemployed is 1.6%, architects, mechanical engineer, electrical engineer and engineering managers marked themselves as unemployed. For informative purposes, we must state that the national unemployment rate of university graduates in the 4th quarter of 2008 was 2.1% and in the 1st quarter of 2009 it was 1.6%.[3]

The generally known phenomena that is characterised by searching for a place at the initial phase of a career, the temporary postponing of entering into the labour market and the development of more stable labour market positions later can also be seen in the case of 2005 graduates. The proportion of those employed has increased by 5.0%. The growth of the employment rate comes with the redistribution of the forms of employment, and the decrease of the rate of the students (full-time course and PhD). The 9.4% of women were on maternity leave at the time of the questionnaire being taken.

10. CHANNELS SUPPORTING PLACEMENT

About one fourth of the respondents (only those had to answer questions relating placement and a work place concerning whom the question was interpretable) found a job with the help of relatives and/or friends, so that remained the most successful jobseeking channel, and the role of this channel in finding employment decreased compared to the previous year (29.1%). The proportion of the utilisation of contacts as such was characteristic in the Faculty of Civil Engineering and the Faculty of Chemical Technology and Biotechnology .

Those of online job seeking sites have outweighed both the number of advertisements published in the press and its weight in placement by, however the rate of the online job seeking sites increased compared to the previous year. The role of these sites in the placement of BUTE graduates has become six times greater in the last six years, while the success rate of the printed media has decreased to the seventh of the value measured among the graduates of 2000. Amongst those who came from the countryside the rate of those whom got jobs via newspaper advertisements are higher compared to those living in the capital (same as the previous years). We gladly noticed that the discrepancy between the use of the online job seeking sites by those living in the capital or in the countryside disappeared. The reason is presumably the significant development of the domestic internet penetration. What we stated in the past three years is still valid: women use online job agencies significantly more often, and men prefer making use of job fairs.

[3] Source: http://portal.ksh.hu/portal/page?_pageid=37,601417&_dad=portal&_schema=PORTAL

Channels supporting placement	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
With the help of friends, family	34.6	25.0	20.2	27.4	22.0	25	28.4	19.1	23.7
With the help of university contacts	20.8	32.7	19.1	–	29.9	50	7.1	18.9	18.9
With the help of online job sites and agencies	6.9	31.7	18.8	22.0	11.8	25	20.7	17.8	18.6
With the help of job fairs	9.4	–	14.7	–	13.4	–	9.5	24.9	13.7
Via newspaper adverts	2.5	–	2.2	8.3	6.3	–	2.9	3.8	3.5
Based on educational contracts	2.5	–	5.9	3.0	–	–	–	0.7	1.7
With the help of personnel consultants	–	–	2.2	5.9	–	–	–	2.1	1.6
With the help of career centres at universities	–	–	2.2	5.4	–	–	–	–	0.9
With the help of the Labour Centre	2.5	–	2.2	–	3.2	–	–	–	0.9
Other ways	20.8	10.6	12.5	28.0	13.4	–	31.4	12.7	16.5

Table 12: Methods of placement, by faculty [%]

11. TIME OF PLACEMENT

The average time of finding first jobs is the lowest value since 2002. The 64.1% of the respondents have managed to find employment during their studies, furthermore the proportion of those who found placement within a month was 73.8%, which is 8% higher than the figure of a year before. Men need on an average 5 weeks, women need 6 weeks to find a job. Looking at the past six years retrospectively, the time needed for finding placement has decreased only in the case of the graduates from the Faculty of Electrical Engineering and Informatics, and the graduates from the Faculty of Chemical Technology and Biotechnology and the Faculty of Natural Sciences required a considerably longer than average period of time to get employed.

Before finding the first workplace only the 55.1% of graduates had participated in some kinds of selection procedure (e.g.: interview, AC), and more than two third of them did it with 1-2 companies.

Year of graduation	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
	All students*								
2002.	1.4	1.6	3.2	2.7	2.0	9.0	2.0	3.1	2.4
2003.	1.7	1.3	2.1	3.0	2.6	5.9	2.2	2.1	2.1
2004.	0.9	0.8	1.6	1.8	1.9	1.4	3.7	1.5	1.6
2005.	1.0	1.1	1.6	1.7	1.3	2.8	4.0	1.4	1.6
2006.	0.8	1.1	2.1	2.2	1.7	–	3.8	1.3	1.7
2007.	1.2	0.8	1.3	1.1	2.1	1.5	2.5	1.0	1.3
	Those not finding placement during university								
2002.	3.1	3.9	5.2	3.5	4.1	18.0	3.3	5.5	4.5
2003.	3.5	3.5	3.3	6.7	3.8	15.0	3.2	4.7	4.0
2004.	2.1	2.2	3.8	3.7	3.1	3.5	5.7	3.3	3.5
2005.	5.0	2.6	3.0	5.7	2.9	5.1	5.0	4.5	3.9
2006.	1.9	3.2	4.0	4.5	3.3	–	5.9	3.7	3.8
2007.	3.1	2.0	3.2	3.2	4.1	4.5	4.2	3.6	3.4

** We have taken the time needed for employment into consideration as 0 month in the case of those students who have found placement during their university years.*

Table 13: Average time of finding the first job, by faculty [months]

12. SOURCES OF HELP EXPECTED FOR PLACEMENT

The 93.4% of graduates found it a necessity that the university provides help concerning job seeking and placement. Those who graduated at the Faculty of Electrical Engineering and

Informatics require the least help. The 67.7% of graduates stated that they did not gain help from the university. Those who were helped with placement mentioned the organization of BUTE Job Fair the most frequently, and then came the frequency of reports on a recommendation of some department or teacher. The respondents expected different kinds of help. It is observable that the importance of job interview preparation (including job interview and AC simulations) has been on the increase continuously.

Form of help	Year of graduation					
	2002.	2003.	2004.	2005.	2006.	2007.
Job exchange and placement	25.2	22.0	17.9	18.9	19.7	19.4
Corporate presentations, factory visits	18.5	19.9	21.2	18.4	18.8	17.7
Job interview preparations	10.1	12.6	12.8	13.0	12.0	13.6
Mock interviews, simulated ACs	7.8	9.8	9.8	10.5	11.1	11.4
Publications helping job seeking	10.9	9.4	8.8	13.7	13.7	10.9
Personality development trainings	8.7	9.9	9.9	9.1	8.3	8.8
Individual career planning	11.9	7.7	9.9	7.2	7.5	8.0
Writing motivational letters	4.8	6.6	7.6	7.1	7.3	7.8
Others	2.1	2.1	2.1	2.1	1.6	2.4

Table 14: Help expected from the institution, according to year of graduation [%]

13. CHANGING JOBS, SECOND JOBS

Less than 60% of those with a job worked at their first workplace at the time of the survey which value is the lowest value so far. In line with this, we can note that the rate of those who work at their second workplace is the highest. The frequent change of jobs mostly characterised the fresh architects, the fresh graduates at the Faculty of Mechanical Engineering and the fresh graduates at the Faculty of Electrical Engineering and Informatics.

Which workplace	Year of graduation												
	1998.	1999.	2000.	2001.	2002.	2003.	2004.	2005.	2006.	2007.	2003S	2004S	2005S
1st	78	68	69	69	63	63	64	61	64.6	57.6	50	44.8	37.4
2nd	18	25	27	23	30	29	25	28	27.3	31.6	38	35.7	28.3
3rd or more	4	7	4	8	7	8	11	11	8.1	10.8	13	19.5	23.3

Table 15: Number of jobs, by year of graduation [%]

Examining the period of four years it can be stated that only less than 40% of the 2005 graduates worked in their first job. Changing jobs during the past two years was most characteristic of the graduates of the Faculty of Chemical Technology and Biotechnology, the Faculty of Faculty of Electrical Engineering and Informatics and the Faculty of Architecture.

The 8.9% of 2007 graduates has a second job. The outstanding high value (15.9%) is measured for years among architects can be reasoned by the supposed fact that architects usually work for more planning offices, which statement is also strengthened by the highest proportion of entrepreneurs at the same faculty.

Those having a second job	Year of graduation											
	1999.	2000.	2001.	2002.	2003.	2004.	2005.	2006.	2007.	2003S	2004S	2005S
	21	18	19	16	16	9	13	13.2	8.9	18	13.3	18.9

Table 16: Number of those with a second job, by year of graduation [%]

14. PROFESSIONAL ASPECT OF JOB, JOB DESCRIPTION

The growing proportion of graduates finding placement in their own profession indicates the improvement of labour market position of fresh engineers. Analysing data from the past ten years, it can be stated that so far we have measured the second highest proportion of finding job in an own profession among the 2007 graduates. One and a half years after graduation the 80.9% of graduates worked in their own profession and among the 2005 graduates the ratio of working in own profession has decreased by 1% to 80%.

Women still seem more likely to undertake jobs' differing from their profession since it is still twice in proportion among them who take employment out of their profession. Same the last years the highest proportion of finding placement within the profession was found among architects and civil engineers. Those working in their own profession regarded the skills acquired during their studies much more usable than those not, or only partly working in their profession like in the previous years.

Most graduates remained employed in designer, researcher and developer positions, which were followed by the positions of implementer, manufacturer and operator.

Job description	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Designer, researcher, developer	39.5	77.1	69.2	–	50.4	50	40.6	65.4	54.8
Implementer, manufacturer, operator	37.0	–	12.4	3.1	6.3	–	10.6	12.5	12.3
Economic, financial	4.5	–	2.2	52.2	–	25	4.1	1.7	6.8
Consultant	–	–	2.2	18.9	–	–	14.7	9.3	6.7
Administrative	2.5	–	3.7	9.4	13.4	–	4.1	–	3.1
Commercial, broker	2.5	3.0	1.5	6.3	3.1	25	–	0.7	2.1
Other	14.0	19.9	8.8	10.1	26.8	–	25.9	10.4	14.2

Table 17: Job description of 2006 graduates, by faculty [%]

15. MANAGEMENT POSITION, OPPORTUNITIES FOR PROMOTION, SATISFACTION

The social phenomenon, according to which women fulfil management positions in a lower proportion, is continuously true among our 2007 graduates. While the 9.3% of men were managers, only 7.4% women were. The inequality between sexes is felt stronger examining the data of 2005 graduates at two dates. The 1.7% difference measured two years ago (13.2% of men, 11.5% of women were managers then) became five times higher (23.4% of men, 15.0% of women being managers).

The proportion of those working in managerial positions has increased since the last data collection in all faculties except the Faculty of Chemical Technology and Biotechnology and the Faculty of Economic and Social Sciences. The number of subordinates is 9 on an average. Furthermore, while in 2006, the graduates of 2005 had 13 subordinates in general; in 2008, the number of subordinates has grown to 14 on an average. The respondents working in the country were promoted quicker. The 8.0% of respondents employed in the capital, in contrast with the 12.4% of those employed in the country had some sort of managerial positions.

Works in managerial position	Year of graduation												
	1998.	1999.	2000.	2001.	2002.	2003.	2004.	2005.	2006.	2007.	2003S	2004S	2005S
	11	16	11	12	13	12	14	13	10.8	8.8	21	22.4	21.7

Table 18: Graduates with a managerial position, by year of graduation [%]

The 53.5% of 2007 graduates – according to their own report – will have some sort of professional or managerial promotion opportunities. The question was first asked six years ago, since then the proportion of hopeful graduates in respect of their promotion reached the second highest ratio. Among the graduates of 2005, the proportion of those hoping professional or managerial promotion has increased by 2% in the last two years.

Opportunities for promotion	Year of graduation								
	2002.	2003.	2004.	2005.	2006.	2007.	2003S	2004S	2005S
	44.7	47.3	51.6	53.0	55.2	53.5	56.2	60.3	54.8

Table 19: Graduates' opportunities for promotion, by year of graduation [%]

In the cases of both examined years, nearly 20% of all respondents were seeking new jobs, which have a significant deviation between faculties. In both groups, the proportion of new job seekers in the Faculty of Electrical Engineering and Informatics was the lowest.

Seeking new job	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
2005.	13.7	23.9	28.4	28.3	26.9	25.0	17.8	16.1	21.4
2006.	26.8	17.5	18.2	17.7	23.3	33.3	18.5	20.7	20.2
2007.	29.4	30.0	22.6	33.7	16.0	13.0	20.3	19.0	23.1
2003S	19.8	14.2	31.5	–	20.2	19.2	21.1	21.7	21.4
2004S	15.0	10.4	30.7	13.2	15.4	38.2	38.4	18.0	21.5
2005S	16.8	21.7	27.1	14.2	23.1	50.0	34.0	19.1	22.6

Table 20: Proportion of those graduates seeking new jobs in the four weeks before data collection, by faculty[%]

16. SIZE, COMPANY TYPE, OWNERSHIP STRUCTURE

The one third of the graduates work for enterprises employing over 500 employees, however, the number of those finding placement at micro- and small sized enterprises is still considerable. Graduates of the Faculty of Transportation Engineering, the Faculty of Chemical Technology and Biotechnology and the Faculty of Economic and Social Sciences found placement at companies with the largest headcount. Architects continued to find employment at smaller companies. While we can meet women rather at smaller companies (companies with 0-20 employees employ the 36.9% of women), men are more often found in companies with more than 500 employees (the 36.8% of men).

The vast majority of graduates (91.9%) are employed in the market sector, and only the 7.1% of respondents had their workplace at some sort of public organization. In the public sector, the graduates of the Faculty of Chemical Technology and Biotechnology and the Faculty of Transportation Engineering found their placement.

Operational Sector	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Market sector	92.6	96.9	97.8	90.6	83.5	50	80.5	93.8	91.9
Public sector	4.8	3.1	2.2	9.4	16.5	50	15.4	5.5	7.1
Civil sector	2.6	–	–	–	–	–	4.1	0.7	1.0

Table 21: The operational sector of companies employing graduates, by faculty [%]

It can be stated about the ownership structure of the companies employing graduates, that most often among employees we can find enterprises with foreign private majority. The private (family) owned enterprises prefer architects.

Ownership structure	In proportion of respondents
Hungarian private majority	22.0
Foreign private majority	47.5
State (local government)	10.0
Own / family property	18.0
Other	2.5

Table 22: Ownership structure of companies employing graduates [%]

Examining the headquarters of the companies employing graduates, the proportion of those who are living in the capital is the lowest rate so far, but in this way also more than two third of the headquarters of the companies is in Budapest.

Company headquarters	FACULTIES								
	ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Budapest	61.1	75.1	40.3	81.8	73.2	50	75.1	79.2	69.9
City of county rank	7.4	–	16.4	3.1	3.2	–	9.5	3.9	6.2
City	22.1	11.0	29.8	7.5	10.2	25	12.4	4.4	12.7
Village*	4.7	–	4.5	3.8	–	–	3.0	1.5	2.4
Abroad	4.7	13.9	9.0	3.8	13.4	25	–	11.0	8.8

** The number of respondents is below 10!*

Table 23: Headquarters of companies employing 2007 graduates, by faculty [%]

Concerning the headquarters of the companies, it is more capital-centred at the graduates of the Faculty of Economic and Social Sciences and the Faculty of Electrical Engineering and Informatics.

17. MOBILITY

First, we raised the question of commuting time between domicile and workplace to the graduates of 2001. Between 2001 and 2005, the time spent on commuting has increased by 20 minutes (to 71 minutes) on a daily basis, this value stagnated since 2005. Employees of Budapest-based companies commuted 76 minutes, while those employed at country-based companies less, 68 minutes. The commuting time of the graduates of 2005 has not changed typically in the last two years; it has remained nearly 1 hour on average.

The willingness of mobility, upon examining the past 6 year graduates has still increased a little. Whereas the 55% of 2002 graduates would move should their job require it, it has increased to 64.6% among 2007 graduates. Regarding mobility there is a sizeable difference between women (61.3%) and men (65.6%). The willingness of mobility is lower among who are working in the pubic sectors, and among architects. Among those who would move should their company or job require it we have recorded higher average salary figures both concerning 2008 and February 2009.

18. LANGUAGE SKILLS

The number of intermediate and advanced language examinations per person at the time of survey was 1.48, which are equal the data collected in last year. The 47.6% of the respondents speak two and 5.3% speak three languages. The vast majority of graduates had certified language skills in English: while five years ago the 62.5% of the respondents spoke this language, now among the 2007 graduates this number has increased to 84.0%, the degree holders speaking English at an intermediate or advanced level. Furthermore, the 48.1% had level of language skills in German. Considering the various levels of language examinations, the proportion of intermediate

examinations was 80.3%, and that of advanced examinations was 19.7%. The language skills of graduates, concerning use, help translation in 29.0%, conversation in 39.2% and negotiation in 31.8%.

Without language skills, the participation in foreign exchange programmes is impossible. The 22.1% of former students indicated that they had gained some sort of experience abroad during their university years.

19. INCOME CONDITIONS

During the examination of income data we only analysed information related to those employed in labour relation, via subcontract and those being entrepreneurs. Those without or with only partial income would have distorted our statements. In the questionnaire, we inquired about the gross income of 2008, the gross average income of February 2009, and other financial or natural allowances of 2009. The average of other allowances featured in the tables is the averages of data where the respondents declared other allowances and the value was not zero. For publishing income and salary data, we used the methodological definition of the Central Statistics Office (CSO).[4]

		FACULTIES								
		ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Income of February 2009	Average	966	744	1075	1193	1141	851	860	1479	1156
	Deviation	429	419	657	580	597	793	272	929	738
1 month gross average salary in 2008	Average	1034	797	1253	1194	1323	1077	928	1668	1307
	Deviation	370	384	793	490	780	968	229	1060	848
1 month other allowances in 2008	Average	147	120	166	224	168	49	120	235	183
	Deviation	118	126	228	398	241	26	104	283	250
1 month average income in 2008*	Average	1177	837	1348	1467	1369	775	1038	1941	1471
	Deviation	340	373	661	650	520	452	246	1241	927

** Considering only those who answered about their other allowances*

Table 24: Income conditions of 2007 graduates, by faculty [€]

		FACULTIES								
		ÉMK	ÉPK	GPK	GTK	KSK	TTK	VBK	VIK	Total
Income of February 2009	Average	724	1065	1404	1533	1232	1692	1172	1691	1384
	Deviation	312	735	883	1368	723	361	661	840	876
1 month gross average salary in 2008	Average	981	1294	1667	1470	1454	2244	1291	2013	1630
	Deviation	483	755	910	457	909	593	612	1020	920
1 month other allowances in 2008	Average	180	133	162	177	211	179	146	170	167
	Deviation	176	115	131	137	202	29	163	126	142
1 month average income in 2008*	Average	1239	1337	1708	1652	1574	2666	1440	2209	1797
	Deviation	437	859	819	442	630	468	639	1057	920
1 month average income in 2006*	Average	1329	n.d**	1111	1239	1182	1422	928	1540	1261
	Deviation	1068	n.d**	500	432	310	650	253	707	641

** Considering only those who answered about their other allowances*
*** In the case of average salary we have counted those 11 respondents' answers who also have other allowances. They are the respondents with lower salaries thus the resultant average income is not given due to significant distortions.*

Table 25: Income conditions of 2005 graduates, by faculty [€]

The income of 2005 graduates has increased by 22.6% in two years. Among 2005 graduates, the former students of the Faculty of Architecture, Faculty of Chemical Technology and Biotechnology

[4] Source: http://portal.ksh.hu/pls/ksh/docs/hun/modsz/modsztoc.html

and the Faculty of Mechanical Engineering produced the most intensive income increase: within two years, the average income (nominal) had increased by 58%, 52% and 51% accordingly.

The calculated monthly gross average income of those with an intellectual occupation employed full time – using CSO terminology – was 1094 €[5] in 2008. Compared to the average national situation, therefore, our average graduates were still in an advantageous situation that is a BUTE degree entails an above average income, even at the beginning of a career. Unfortunately, however, we must say that upon analysing faculty data, our last statement is not true in connection with the Faculty of Architecture, the Faculty of Natural Sciences and the Faculty of Chemical Technology and Biotechnology, which is in these cases, the average faculty data does not reach the national average of those with intellectual occupation.

Comparing the average income of men and women from 2007 graduates, they state that a woman earned the 63.5%, on an average, of her male colleague's monthly average income in 2008, and earned the 71.8% in February 2009. Last year and the year before that proportion was 75% and 68% accordingly. Compared to the 2007 survey data the difference between the average yearly income of men and women graduated in 2005 has decreased (76.3%), women earned only the 68% of the income of men. Certainly, average values are meant in this case, which are only of informative nature due to the differing proportions of the two sexes in professions and faculties.

The 40.3% of 2007 graduates were no longer in their first jobs at the time of survey. In the change of jobs the more favourable income can also take a role. The 2009 February income of those at their second jobs is higher with 224 € compared to those working at their first jobs, and those working at their third jobs is even higher with 54 € than the ones at their second jobs. Moreover, those working at least at their fourth jobs can reach on average a further 345 € growth in their incomes only by changing their job.

According to the expectations proven in earlier years, those working in managerial positions have higher incomes than the ones not in such positions, but a little more. The difference between managers and subordinates regarding the 2008 average income of 2007 graduates is 466 €, but the difference in the income of February 2009 is 328 €. In 2005 graduates, the subordinates are earning more than the managers are in both cases.

We can also see phenomena observed in earlier years to be repeated. The motivation of those undertaking a second job was supposedly to reach a more favourable income. Comparing the average income (in 2008 of the 2007 graduates with second jobs (1137 €) with the ones not taking a second job (1362 €), we can state that graduates are encouraged to undertake second jobs due to the incomes probably lower than the average. However, even by undertaking a second job they could not manage to reach the same income level than the level of graduates not taking second jobs succeeded to gain only by working in their first and main job. This latter statement is true for the graduates of 2005 as well.

Among those whose income conditions were examined, language skills are used by the 77.5% of the respondents. It can be stated that they were able to realize a 78% higher (495 € more) average income in February 2009 than those not using their language skills in their work.

[5] Source: http://portal.ksh.hu/pls/ksh/docs/hun/xftp/idoszaki/fmf/fmf20712.pdf

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