# YOUTH LABOUR MARKET OUTCOMES IN ESTONIA: WHAT KIND OF JOBS DO RECENT SCHOOL LEAVERS HOLD?

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**Abstract.** The transition from education to working life plays a crucial role in the lives of young people. This paper concentrates on the effect of personal characteristics and historical time on the socio-economic status and class membership of school leavers' first job. Empirical results based on Estonian Labour Force Survey show a significant effect of ascribed characteristics, social background and educational level. The impact of aforementioned characteristics is also found to vary depending on the time of labour market entry.

## **1. Introduction**

Transition from education to working life is a significant event from the viewpoint of both the individual and society. Entering the labour market is conceived as a rite of passage decisive of a person's entire labour market career. Transition can also be seen as a complex social phenomenon, which can be the origin of several social problems.

High incidence of unemployment among young people and the inability of many school leavers to find suitable employment point to the necessity of studying the labour market transition in post-socialist Estonia. Although the issue of the entry process in the Estonian context has to a certain extent already been addressed by some authors (such as Berde et al. 1999), the recently available new data-set makes it possible to explore this subject matter from a new perspective. The aim of this paper is to analyse the entry process in post-socialist Estonia, to asses the impact of various micro-level characteristics on the success of labour market integration and to describe its developments at the backdrop of the changing social context. Additionally, the results are compared with the outcomes of similar studies from other European countries. The empirical part of the study is based on the Estonian Labour Force Survey 2002 ad-hoc module on school-to-work transition.

The rest of the paper proceeds as follows. In the first section an overview of the basic theoretical approaches to labour market transition and the summary of most relevant empirical results are given, also the context of the transition is analysed and hypotheses are formed. The description of the data-set and research methods follows. The results of the empirical analysis are presented in the third part, followed by the final section, which sums up the results and draws the conclusions.

## 2. Theoretical background

#### 2.1. The nature of labour market transition

The sociological concept of school-to-work transition is of recent origin (Ryan 2001:34). For earlier generations integration to working life was characterised as swift and uneventful, while for today's youth labour market entry is marked with growing complexity and diversity. For many school leavers it is a period of remarkable uncertainty and change, which can affect their entire labour market career (Shavit et al. 1990:53). While the conceptualisation of school-to-work transition as a period starting with leaving the educational system and ending with obtaining employment is, due to its relatively unambiguous nature, a commonplace in many studies concentrating on labour market entry (e.g. Sanders and Becker 1994), it is by no means theoretically unproblematic. Some young people begin their labour market careers before officially leaving the educational system, whereas others return to full-time education after a shorter or longer spell of full-time employment. Even when the departure from the educational system is permanent, it is not always followed by smooth integration to working life. Young people are characterised by a greater propensity to change jobs and are found in temporal and part-time employment more than the rest of the employed population. School-to-work transition can thus be called a process of labour market accommodation, without sharp beginning and end markers (Wolbers 2001:2).

The success of labour market integration is most commonly measured by the school leavers' propensity to avoid unemployment and mismatching jobs, but also by the duration and the relative social ranking of the first job. Factors affecting the results of labour market transition can be divided into a period effect (time-varying aspects of the social and economic environment), institutional factors (nation-specific aspects of educational system and labour market settings) and individual characteristics. The latter can further be subdivided to ascribed characteristics (e.g. gender and ethnicity) and achievement effects (e.g. educational level).

## 2.2. International variations in the labour market integration process

The process of school-to-work transition varies considerably across countries, with the greatest differences emerging in the extent of youth unemployment, the nature of the first jobs and the early career mobility. The main causes for these variations are to be found in the arrangement and functioning of the educational system, labour market and other institutions.

Most present-day researches tackling the issue of international differences in the labour market integration of young people trace their theoretical foundations back to Allmendinger's (1989) influential study, where she proposed the typology of educational systems based on two dimensions - standardisation and stratification of the educational arrangement. The first refers to the existence of countrywide regulations of the content of education, teacher training, and universal financing and assessment principles. Stratification, on the other hand, concerns the inner differentiation of education, i.e. the existence and proportions of distinct educational tracks (academically and vocationally orientated) (Allmendinger 1989:233). In stratified systems where a large proportion of secondary students enrol in vocational education, young people enter the labour market with relevant occupational skills, which allow access to a limited number of labour market positions corresponding to the level and field of education. As a result, a distinct youth labour market will not develop and school leavers will compete with other workers on equal grounds (Gangl 2001:475). The labour market entry process is therefore smooth, characterised by low incidence of youth unemployment and the relatively high status of first jobs (Gangl 2001:480, 482). However, in unstratified systems where at the secondary level general education dominates, young people enter the labour market without specific occupational skills, which makes their position unfavourable compared to the rest of the workers who have acquired such skills during their years on the labour market. In most cases the school leavers without tertiary education have access to only unqualified jobs, whereas labour market participants with a longer working experience compete for more qualified positions. As a result, a separate youth labour market with remarkably higher unemployment risks will emerge (Gangl 2001:475).

The institutional arrangement of the national labour market also matters. One of the most influential classifications of labour markets is the one developed by Marsden (1986) where he distinguishes between occupational and internal labour markets. In the first arrangement young people are able to find employment matching their level and field of education upon the labour market entry. In the latter case school leavers enter the labour market via low-level entry positions and advance to better jobs after acquiring firm-specific skills during the working process (Marsden 1986). Occupational labour markets are usually found in countries where the educational system is stratified and has strong linkages to the labour market; internal labour markets, on the other hand, are more common in nations with unstratified educational system.

## 2.3. Estonian educational system

The educational system of the Soviet Union was highly centralised and stateregulated, resulting in a universal educational arrangement throughout the country. In the 1980s children started their studies by enrolling in compulsory basic education, which was comprised of grades 1-8(9) and was general in nature. The differentiation that was absent in basic education appeared at the upper secondary level, with students having the choice between the general, secondary specialised and vocational track. Vocational education prepared the students for professions belonging mainly to the skilled workers category (e.g. electricians, tailors and so forth), whereas secondary specialised education was aimed at offering the students more complex skills (e.g. some medical and technical professions). After completing the secondary level education, graduates from all three tracks had the opportunity to continue their studies in universities, vocational or secondary specialised schools.

The restoration of Estonian independence in 1991 also meant regaining control over the educational institutions. While various changes followed, for example in the curriculum, financing principles and so on, the institutional structure of the educational system remained at first almost intact. Yet some gradual developments, which would eventually lead to the substantial alternations in the arrangement of secondary education, were already on the way. Starting from the early 1990s several schools redesigned their secondary specialised programmes to diploma level higher education courses. This trend continued until 1999, when the secondary specialised education was officially abolished and the remaining programmes became part of higher professional or vocational education. As a result the secondary specialised education acquired during the first half of the decade is qualitatively different from the same educational level in the late 1990s. The programmes, which were converted to the tertiary level, were usually of higher quality and catered for professions demanding more complex skills. As the remaining courses prepared students for less skilled occupations, the general value of secondary specialised education declined.

The present-day Estonian educational system is characterised by a high level of standardisation and medium degree of stratification. While the high standardisation of the Soviet era was slightly reduced in the early 1990s, the second half of the decade witnessed an increase of standardisation, most notably in the form of state exams at the basic and secondary education, which in the latter case also serve as entrance exams to the institutions of tertiary education. At the secondary level students have the opportunity to choose between the general and vocational track, until 1999 they could also opt for secondary specialised education. The first offers demanding academic curricula necessary for continuing education on tertiary level, whereas vocational track caters for a wide range of distinct qualifications and is aimed more at preparing young people for working life and less for future study. The distinction between the secondary level tracks is clear, with especially the vocational school students having very few options for reconsidering their choice. Vocational education has on the secondary level been traditionally regarded as inferior to the general route. Its low reputation has led a growing share of basic school leavers to opt for a general route (in the late 1990s the ratio of secondary students pursuing academic and vocational education was approximately 3:1), and left the vocational track for those who are unable to gain access to academic secondary schools, thus further degrading its prestige. The importance of the secondary specialised education, as a distinct educational route available for basic school leavers, decreased continuously throughout the 1990s, further increasing the share of students in the general track and thus reducing the stratification of the system at the secondary level. Although the vocational specificity and exclusiveness of Estonian vocational education is similar to such highly stratified systems as those found in Germany and Austria, loose linkages between vocational education and labour market are reminiscent of unstratified arrangements. The extent to which social partners including employers are involved in vocational schooling varies substantially between fields, being high in such areas as hotel catering but relatively low in most others. As a result the skills of vocational school leavers are often not compatible with the employers' requirements and expectations.

Based on the institutional organisation of the Estonian educational system it is plausible to expect the school-to-work transition process to be similar to West-European countries with moderately stratified educational arrangements, that is France, Spain, UK and others. To what extent this assumption is supported by the findings of this study, will be discussed in the final section.

#### 2.4. Context of school-to-work transition in Estonia and hypothesis

The period under observation (years 1992–2002) involves considerable alternations in the context of school-to-work transitions in Estonia. The early 1990s were characterised by the development of a new institutional environment and fundamental changes in most fields of life alongside with uncertainty of norms and values of the novel capitalist system. The second half of the decade, on the other hand, can be seen as adaptation to the profound social changes of earlier years. Lauristin and Vihalemm (1997:79) discern three major phases in the transition of Estonian society from state-socialism to market-capitalism – first the political breakthrough lasting from 1987 to 1991, followed by the era of radical reforms, which in 1995 was replaced by the years of stabilisation. In the present study the part of this classification pertaining to the 1990s is used, and the periods of radical change (1992–1994) and growing stabilisation (1995–2002) are differentiated.

The transition from planned economy to the market system was accompanied by cardinal changes in the relations between educational system and labour market. In the communist countries all school leavers, except for graduates from basic and general secondary education, were allocated to jobs with an obligation to hold them for some time. By controlling the educational distribution and subsequent occupational placement of young people, the government was able to shape the demand and supply of labour, and by doing so served both ideological and economic ends (Solga and Konietzka 1999:31). Although the placement system of Soviet times did not involve all educational levels and its strictness was mitigated by some unofficial mechanisms, it still served to decrease the variation of labour market outcomes of the graduates from the same educational level and restricted the availability of mismatching jobs (Vöörmann et al. 2001:100). It is probable that the abolition of the placement system in the late 1980s increased the variation of the school leavers' first jobs considerably. On the one hand, the protection mechanism of the placement system that until then had prevented young people from taking up employment

below their level of education was no longer effective. On the other hand, the restrictions of finding employment not matching the field of educational qualifications were considerably smaller than in preceding years.

It is likely that the relation between educational credentials and labour market outcomes was further weakened by the inherent rigidity of the educational system, which made it increasingly difficult for educational institutions to offer their students skills and knowledge, which would adequately respond to the changing needs of the labour market. The potential quality of person-job match could no longer be assessed solely relying on the educational qualifications of a would-be employee. Also, the knowledge and skills acquired during the previous social system were often regarded as an obstacle rather than an advantage in the early 1990s, which helped to create a situation where the lack of experience and young age were regarded as resources in their own right (Terk and Tallo 1998:14). Swift economic changes fostered boldness and created the illusion of the devaluation of the value of educational credentials (Berde et al. 1999:209). It is probable that the stabilisation of society and also the growth in the share of labour market positions requiring official credentials decreased the variation in labour market outcomes and increased the value of educational certifications as signs of skills and capabilities of their holder. In the early 1990s young people were able to acquire favourable labour market positions due to the departure of older workers, the mechanism that was no longer effective in the second half of the decade (Terk and Tallo 1998:16).

*Hypothesis 1.* Young people entering the labour market in 1992-1994 were able to acquire jobs with higher status and class membership compared to their peers starting their careers during the second half of the decade.

The 1990s witnessed not only the change in the meaning of education as such but also the alternation in the proportions of young people pursuing different types of education. Compared to the early 1990s the share of youth preferring academically orientated secondary education has increased, and the number of those opting for vocational tracks has diminished (Education 2002:22). The number of secondary school leavers deciding to continue their studies on the tertiary level increased remarkably during the late 1990s (Education 2002:23). Expansion of higher education can result in the devaluation of education in general, decreasing occupational returns to all levels of education (Saar and Kazjulja 2001:58). Summarising the discussion above, the following hypotheses are formed:

*Hypothesis 2.1.* Higher levels of education are associated with more favourable labour market outcomes in terms of occupational status and class membership of the first job.

*Hypothesis 2.2.* The effect of the level of education on school leavers' first job varies, depending on the period of labour market entry.

Like most other labour market incidences, the results of school-to-work transition are usually found to vary by gender. In status attainment models the higher occupational status of (young) females is a common finding. This result has less to do with greater success that women enjoy on labour market entry and more to do with the theoretical construction of the socio-economic index and occupational segregation by gender. Women are more likely than men to start their labour market careers in service-related occupations, which receive higher status scores than the skilled workers' positions where males dominate (Müller et al. 1998:170–171).

The well-documented gender inequality on the Estonian labour market manifests itself mainly in aspects not covered in this study. Despite receiving lower wages than their male counterparts (Hourly Wages 2002:33), women are more often than men found working as professionals and less frequently employed in low-skilled jobs (Labour Force 2002:75–76). As the focus of this study is on the status and class membership of first job, smaller labour market opportunities of women are unlikely to be found.

*Hypothesis 3.* The status and class membership of first jobs held by women is higher than that of men.

Estonia has a large non-native population consisting mainly of Slavonic people who immigrated during the past fifty years. Migration was highly encouraged by official authorities that regarded it as the means of alleviating the lack of work force brought about by the extensive industrial development. As a result, the Estonian labour market of the Soviet era was characterised by the ethnic segregation of fields of economic activity, with a remarkably higher share of Non-Estonians employed in manufacturing as compared to indigenous population (Helemäe et al. 2000:164). During the economic restructuring, the employment decrease was steeper in branches where relatively more Non-Estonians were employed (Pavelson 2000:22). The unfavourable situation of young Non-Estonians on the Estonian labour market is reproduced by their greater propensity to acquire vocational education compared to their indigenous peers (Pavelson 1999:71). The employment rate of Non-Estonians is higher than that of Estonians, yet at the same time they face a greater risk of unemployment (Labour Force 2002:152-153, 104). Young Non-Estonians are also more likely to experience joblessness at the beginning of their careers (Berde et al. 1999:211). Compared to Estonians, a smaller share of Non-Estonians is employed in managerial and professional positions, whereas they are over-represented among crafts and related trades workers, plant and machine operators, and elementary occupations (Labour Force 2002:78). Concerning the effect of ethnicity on school-to-work transition, it is hypothesised that:

*Hypothesis 4.* The status and class membership of first jobs held by Estonians is higher than that of Non-Estonians.

The aspiration of the educational policy of the Soviet Union was to assure equal representation of all social classes on all levels of education in order to diminish social inequality. Still, in the absence of other means of social reproduction the educational system continued to operate as the main channel through which parents could convey their social position on to their children (for a more detailed discussion see Helemäe et al. 2000). The effect of social origin has received little attention in post-socialist Estonia. The lower importance of social background at the times of structural alternations and swift social change (Helemäe et al. 2000:199) allows to expect a weaker role of parental education and occupation in determining the

success of labour market integration of young people leaving the educational system in the early 1990s. The growing significance of social origin in the second half of the decade is reflected in the greater risk of young people from least educated families to experience unemployment as compared to their peers with more advantageous backgrounds (Vöörmann et al. 2001:89). This allows the formulation of the following hypothesis:

*Hypothesis 5.1.* School leavers with more favourable social background (i.e. those with a more educated father) fare better in terms of occupational status and class membership of the first job.

*Hypothesis 5.2.* The significance of the father's level of education on school leavers' first job is greater in the second half of the 1990s.

Although it can be argued that a longer job search period enables young people to examine more potential work opportunities and as a consequence find better matching employment, the results of empirical studies offer proof of a reversed mechanism. For example Gangl (2002:20) shows that the length of the job search period is negatively related to the occupational status of the first job. It could be that longer search periods serve to lower the aspirations of young people who are now willing to accept jobs that they would have declined previously. It is also possible that the failure to find a job quickly is a sign of the school leavers' low level of resources valued on the labour market.

In recent years, the increasing complexity of the labour market entry process also manifests itself in a growing number of working students (Wolbers 2001:23). Having working and learning as parallel activities allows young people to acquire both – education and labour market experience. It has been shown that simultaneous working and learning decreases the odds of unemployment in later career (Mansuy and Schröder 2001:18).

As no studies concerning the role of job search period and previous work experience in Estonian context have been carried out, the following hypothesis is formulated solely on the basis of studies conducted in other countries.

*Hypothesis 6.* Parallel learning and working as well as the absence of a waiting period increases the odds of acquiring a first job with higher occupational status and class membership.

## 3. Variables, data and methodology

#### 3.1. Data

Empirical analyses draw on data from the Estonian Labour Force Survey (ELFS) 2002 ad-hoc module on school-to-work transitions. ELFS, which is carried out by the Statistical Office of Estonia, is a representative study of labour market conditions and behaviour of the entire working-age population. In addition to standard labour market information, respondents aged 15–35 were asked to provide data on all cases of school graduation and quitting school that took place in 1992 or later and on the first episode of subsequent steady employment.

To avoid ambiguity in the effect of educational level only the cases with job spells starting after or within 12 months prior to graduation were used in the eventual analysis. As the focus of this paper is on the first jobs, all respondents who had been employed prior their studies were removed from the analysis. In the cases of multiple school leaving occasions, only the first one was taken into consideration. Also, the cases with missing or contradicting data were eliminated.

ELFS defines the first permanent job as an employment occurrence lasting at least six months for minimum 20 hours per week, thus leaving short job spells, temporal and part-time employment known to be characteristic of recent school leavers' out of consideration.

## 3.2. Dependent variables

Theories aiming to explain social stratification fall into two broad categories. Some theorists see society as comprising of a limited number of mutually exclusive groupings, whereas others describe the social system as a continuum where no definite formations can be discerned (Graaf and Ultee 1998:337). The proponents of the first approach favour the use of various class schemas (most notably the ones developed by Wright and Goldthorpe), while those advocating the second orientation employ a wide variety of prestige and status scales. In the present study both approaches, which are seen to be mutually complementing in this particular situation, are used to measure the position of young people in the system of social stratification. The school leavers' first jobs are characterised by their position in Goldthorpe's class schema<sup>1</sup> and by status score according to the index of international socio-economic status (ISEI). Both measures are widely employed in the studies on school-to-work transition.

ISEI is a commonly used ranking of occupations in the research of social stratification, belonging to a larger family of socio-economic indexes. Socio-economic indexes do not rank professions according to their desirability like prestige scales. Instead they use earnings and educational level associated with any particular job to determine the relative ranking of the occupation vis-à-vis the other occupations (Bergman and Joye 2002:27). The author of this study is unaware of any previous applications of ISEI in the Estonian context, which gives this paper an additional aim of testing its usability in the case of Estonian labour market. Occupations classified according to the 4-digit ISCO-88(COM)<sup>2</sup> codes are transformed into ISEI status scores using methodological tools developed by Ganzeboom and Treiman (1996).

Goldthorpe's theory of social classes is one of the most celebrated but also the most contested conceptualisations of the system of social stratification in the late 20<sup>th</sup> century. Classes as seen by Goldthorpe are formed on the labour market and are based on employment relations in modern industrialised societies. On the most

<sup>&</sup>lt;sup>1</sup> Also known as EGP class schema.

<sup>&</sup>lt;sup>2</sup> ISCO-88(COM) – European Union version of International Standard Classification of Occupations.

general level, proprietors with employees, proprietors without employees and employees are distinguished (for a full version of EGP class schema see Erikson and Goldthorpe 2001[1992]:367). Because of its few theoretical implications, Goldthorpe's class schema, which in most detailed level consists of 11 classes, can be reduced to a smaller number of categories according to the researchers' needs and data at hand. In the present study higher white-collar workers (classes I and II of EGP class schema (the service class), i.e. managers and professionals), lower white-collar workers (classes IIIa and IIIb, i.e. routine non-manual workers in service, administration and elsewhere), skilled workers (classes V and VI) and unskilled workers (classes VIIa and VIIb i.e. also including low-skilled agricultural workers) are distinguished. The use of propertied classes is not possible due to data restrictions. ISCO-88 codes are transformed into EGP classes using Ganzeboom's and Treiman's (1996) methodology.

## *3.3. Independent variables*<sup>3</sup>

A few remarks on independent variables are also necessary. First, a respondent's father's educational level is used as a proxy for social origin. Missing values in this variable were substituted with the mother's level of education. This kind of replacement is unlikely to affect the results greatly, as the correlation between both parents' education is quite strong and positive<sup>4</sup>. The levels of education of the respondents and their fathers are entered into the equation as dummy variables. Basic (compulsory) education or less, vocational, secondary specialised, general secondary and higher education are distinguished. As the dataset does not allow for the stringent distinction between the periods of job search and inactivity, the concept of a waiting period is employed instead.

## 3.4. Methods

The analysis starts by presenting some descriptive statistics. Next OLS and binary logistic regression analysis are used to assess the effect of independent variables on socio-economic status and class membership of the first job respectively. In addition to general models encompassing all cases, separate OLS regression models for both labour market entry periods (1992–1994 and 1995–2002) are constructed in order to capture possible differences in the effect of independent variables between the periods of labour market entry. Insufficient number of cases prevents the creation of separate models using EGP class membership as their dependent variable. Also in the case of class membership only the odds of starting labour market career in the highest (service class) and lowest (unskilled workers) classes are analysed. Independent variables are entered in blocks to all models created in order to capture the separate effect of the combinations of variables.

<sup>&</sup>lt;sup>3</sup> Distribution of the sample by more relevant independent variables is presented in Table 1, Annex.

<sup>&</sup>lt;sup>4</sup> Spearman's correlation between mother's and father's education measured by ISCED (International Standard Classification of Education) level is 0,558.

Although not being the most sophisticated methodological tools, these particular versions of regression analyses are preferred for their straightforward nature and wide usage in other similar studies.

## 4. Results

#### 4.1. Differences in socio-economic status and class membership of the first job

Table 2 presents information on the socio-economic status of the first jobs. The average status of the first jobs obtained by school leavers is 39 ISEI score points. Median value is not as high, indicating that most young people start their labour market careers at low-status jobs. Comparing the average values of different groups of young people offers some preliminary support to the hypothesis formed above. Females are indeed able to obtain higher status jobs than their male counterparts. With regard to the ethnicity of the school leaver, Estonians fare somewhat better than Non-Estonians. Educational differences in the average socio-economic status of school leavers' first jobs are large, with university graduates achieving twice as much status in their first jobs than their counterparts with compulsory education only. Also as hypothesised, the average status of school leavers entering the labour market in the second half of the decade is indeed somewhat lower than the average status achieved by their counterparts a few years earlier.

		Socio-econom	nic status
	Mean	Median	Standard deviation
Total	39	34	14,3
Gender			
Male	36	32	13,0
Female	43	43	15,0
Ethnicity			
Estonian	40	34	15,5
Non-Estonian	37	33	10,8
School leaver's level of education			
Basic education or less	29	30	6,8
Vocational education	34	32	9,2
General secondary education	40	40	13,1
Secondary specialised education	43	38	14,6
Higher education	57	56	14,4
Time of school leaving			
1992–1994	40	37	14,6
1995-2002	38	33	14,1

Table 2. The socio-economic status of the first job by gender, ethnicity, level of education and time of school leaving

Table 3 presents some descriptive statistics on the class membership of school leavers' first jobs. The highest proportion, almost one third of young people, found

their first steady employment in unskilled workers' positions. The share of school leavers starting their working careers as either higher or lower white-collar workers was in both cases one fifth, while one quarter of young people began their working lives in skilled workers' positions. Females are more likely to start their labour market careers as routine non-manual workers, whereas in the case of males skilled workers' positions dominate. At least at the early stages of their careers women are more often than men found in highest-ranking professional and managerial positions.

	Higher white- collar workers (EGP I+II)	Lower white- collar workers (EGP III)	Skilled workers (EGP V+VI)	Unskilled workers (EGP VII)	Total
Total	20	21	27	32	100
Gender					
Male	15	8	40	37	100
Female	27	36	12	25	100
Ethnicity					
Estonian	26	19	23	32	100
Non-Estonian	7	26	35	32	100
School leaver's level					
of education					
Basic education or less	0	8	35	57	100
Vocational education	4	19	41	36	100
General secondary education	24	30	16	30	100
Secondary specialised education	27	35	21	17	100
Higher education	75	14	5	6	100
Time of school					
leaving					
1992–1994	23	22	27	28	100
1995-2002	19	20	27	34	100

 Table 3. The class membership of the first job by gender, ethnicity, level of education and time of school leaving, percentages

Ethnic differences are also remarkable. While every fourth Estonian school leaver is able to obtain the first job belonging to EGP classes I or II, only one tenth of Non-Estonian youth is able to do the same. Non-Estonian young people are more often than the indigenous youth found working in lower white-collar occupations. It is possible that highly educated young people of Estonian ethnicity are able to secure higher white-collar jobs, while employment options of the Non-Estonian youth with the same level education are confined to lower white-collar positions.

Chances of starting one's career in different EGP classes varies greatly with the highest level of education completed. School leavers with only compulsory education are almost excluded from both white-collar classes. Although most of them start their working lives at unskilled workers' positions, the share of skilled workers is also relatively large. As could be expected, the greatest share of vocational school leavers is employed in skilled workers' positions. High-school leavers are most likely to begin their careers in either class VII (unskilled workers) or III (routine non-manual workers), the first being dominant among males and the second among females. Despite their lack of specific vocational skills, almost one fourth of secondary school leavers is able to obtain employment in the service class. Graduates from secondary specialised schools are most often found working in lower white-collar workers' positions, while a relatively large proportion is employed as managers or professionals. Among university graduates employment in higher white-collar positions is dominant, three out of four young people belonging to this group find their first jobs in EGP classes II or I. Still, tertiary education is not sufficient to shield young people completely from employment in less advantageous positions.

Distribution of school leavers between different classes varies somewhat depending on the period of labour market entry. The chances of entering the labour market through the highest positions have decreased, and the risk of early career unskilled employment has increased, while the share of those starting their working lives in the intermediate positions has remained almost constant. It is possible that the expansion of higher education has led young people with tertiary education to increasingly accept employment offers outside the service class, thus triggering the downward substitution process, which has resulted in the growth of the share of young people finding their first jobs in EGP class VII.

#### 4.2. Socio-economic status of the first job

The results of OLS regression using socio-economic status as dependent variable are presented in Table 4.

Young women attain, as hypothesised, significantly higher occupational status than their male counterparts. Inclusion of educational level into the equation somewhat decreases the gender effect, indicating that success of young women is partly triggered by their higher (academic) educational achievement. Still, after taking both educational level and the time of labour market entry into account, young men still obtain first jobs that are on average three points lower in status<sup>5</sup>. The relationship between the ethnicity of a school leaver and his/her occupational status is of expected direction. Even when the educational level is held constant, young Non-Estonians are likely to find their first steady employment in the positions with lower socio-economic status than the indigenous youth. Like in the case of gender, the effect of ethnicity is also mediated by the school leavers' educational level, although to a lesser extent.

Although the individualisation hypothesis (developed by Beck (1992)) predicts the lessening of the importance of social origin in the labour market in the late 20<sup>th</sup> and early 21<sup>st</sup> century, a certain relationship between social background and labour

<sup>&</sup>lt;sup>5</sup> Here and henceforth the change in average status scores is obtained from the comparison of unstandardised regression coefficients, not presented here.

		General mod	el
	1	2	3
Gender <sup>a</sup>	0.24***	0.10***	0.10***
Ethnicity <sup>b</sup>	-0.12***	-0.08 **	-0.08 **
Father's level of education <sup>c</sup>			
Vocational education	0.08	0.05	0.06
General secondary education	0.09	0.04	0.04
Secondary specialised education	0.16***	0.08*	0.09*
Higher education	0.22***	0.07	0.07
Level of education <sup>d</sup>			
Basic education or less		-0.33***	-0.33***
Vocational education		-0.28***	-0.28***
General secondary education		-0.08	-0.07
Higher education		0.31***	0.31***
No parallel studying and working <sup>e</sup>		0.05	0.05
Existence of waiting period <sup>f</sup>		0.00	0.01
Time of school leaving (1995–2002) <sup>g</sup>			-0.04
Coefficient of determination <sup>#</sup>	0.10	0.36	0.36

 Table 4. Effect of independent variables on the socio-economic status of the first job, standardised OLS regression coefficients

Observed significance level:  $*0.05 \le p < 0.1$ ;  $**0.01 \le p < 0.05$ ; \*\*\*p < 0.01

Reference categories: <sup>a</sup> male, <sup>b</sup> Estonian, <sup>c</sup> basic education or less, <sup>d</sup> secondary specialised education, <sup>e</sup> existence of parallel studying and working experience, <sup>f</sup> no waiting period, <sup>g</sup> 1992–1994.

<sup>#</sup> Adjusted  $R^2$  is used.

market outcomes is still found to exist. In the first step when only ascribed characteristics and social origin are included in the equation, the effect of the father's secondary specialised and higher education turn out to be significant. The inclusion of the rest of the independent variables renders the impact of higher education insignificant, but does not eliminate the effect of the father's secondary specialised education. This indicates that social origin affects the labour market outcomes of young people largely through their own level of education. Children of more educated parents are more likely to continue their studies until higher levels of education, which guarantee them more favourable initial labour market outcomes. The direct effect of the father's education is still there – regardless of a school leaver's own level of education, having a father with a secondary specialised education means on average a 3-point increase in the occupational status of the first job compared to the youth whose father has the compulsory education only.

The significance of the school leavers' own level of education on initial labour market outcomes is reflected in more than threefold increase in the variance explained by independent variables after the inclusion of the school leavers' education. Leavers with secondary specialised education find jobs with higher socio-economic status than their peers who left school with compulsory or vocational education, but are outperformed by university leavers. As expected, the labour market outcomes are least favourable for young people who left the educational system after obtaining only a compulsory level of education. Although the difference between the outcomes of basic and vocational school leavers is statistically significant<sup>6</sup>, it is not large. Graduates from vocational schools obtain their first jobs with on average only four points higher occupational status than their peers with compulsory education or less. No differences emerge between the labour market outcomes of general secondary and secondary specialised school graduates.

Neither the existence of waiting periods nor previous work experience affects the socio-economic status of the first job greatly. The non-significant effect of the waiting period might indicate that it is not the most fitting proxy for a job search, as it might encompass activities that are differently related to the socio-economic status of the first job.

The inclusion of dummy variable for the labour market entry period in the last step does not increase the model's explanatory power and affects the impact of other variables only marginally. Although the effect of school leaving time is of expected direction, it fails to reach the level of statistical significance. These results contradict the hypothesis posed earlier in which the labour market outcomes were assumed to depend on the time of the labour market entry. It must be taken into account that the quality of the first job is not the only measure of the success of labour market integration. It is likely that youth cohorts entering the labour market in the early 1990s characterised by the low level of unemployment found it easier to obtain employment than their peers looking for their first job a few years later. Similar status scores might conceal lengthier job search periods and a greater proportion of young people failing to find any employment in the second half of the decade.

# 4.3. Time-related differences in the impact of factors affecting the status of the first job

Standardised coefficients of regression models constructed separately for both labour market entry periods presented in Table 5 reveal some disparities between the two youth cohorts. The effects of gender and ethnicity reach the level of statistical significance only in the model pertaining to the second half of the decade. Yet this result should be interpreted with caution, as the variations in standardised regression coefficients are negligible. Differences in the significance level could be caused by a greater sample size in the model pertaining to 1995–2002, rather than any substantial changes in the roles that these variables play in the school-to-work transition.

The effect of social background on the initial labour market careers of young people is also found to vary depending on the school leaving time. While in the early 1990s the effect of a father's education is entirely mediated through the school leavers' own educational achievement, in the second half of the decade the impact of

<sup>&</sup>lt;sup>5</sup> Here and henceforth similar assessments are derived from regression models using different educational levels as referent categories, again not presented in this paper.

	1992–1994		199	5–2002
	1	2	1	2
Gender <sup>a</sup>	0.18**	0.10	0.28***	0.11**
<b>Ethnicity</b> <sup>b</sup>	-0.14**	-0.06	-0.11**	-0.08*
Father's level of education <sup>c</sup>				
Vocational education	-0.03	-0.01	0.18***	0.13*
General secondary education	-0.04	-0.06	0.20**	0.11*
Secondary specialised education	0.11	0.02	0.23***	0.15**
Higher education	0.25***	0.08	0.21***	0.08
Level of education <sup>d</sup>				
Basic education or less		-0.36***		-0.28 * * *
Vocational education		-0.34***		-0.21***
General secondary education		-0.08		-0.04
Higher education		0.19***		0.39***
No parallel studying and working <sup>e</sup>		0.15**		-0.02
Existence of waiting period <sup>f</sup>		0.10		-0.05
Coefficient of determination <sup>#</sup>	0.09	0.36	0.11	0.37

 Table 5. Effect of independent variables on the socio-economic status of the first job by time of school leaving, standardised OLS regression coefficients

Observed significance level:  $*0.05 \le p < 0.1$ ;  $**0.01 \le p < 0.05$ ; \*\*\*p < 0.01

Reference categories: <sup>a</sup> male, <sup>b</sup> Estonian, <sup>c</sup> basic education or less, <sup>d</sup> secondary specialised education, <sup>e</sup> existence of parallel studying and working experience, <sup>f</sup> no waiting period.

<sup>#</sup> Adjusted  $R^2$  is used.

the father's vocational, secondary specialised and secondary education remain significant determinants of children's labour market success. Somewhat surprisingly, the father's higher education fails to reach significant levels, indicating that more favourable labour market outcomes in this group are completely mediated though their own educational achievement. Although individualisation theories predict the diminishing of the importance of ascribed characteristics and social origin, the latest developments in school-to-work transition show quite the contrary to be the case in Estonia. The 1990s have been characterised by the growing importance of social background as determinant of young people's labour market success. This seems to confirm the hypothesis posed earlier according to which in the context of transforming values and radical changes in the whole social system some individual traits (such as entrepreneurial ability and boldness) might have been of greater importance than traditional social characteristics which (re)gained their significance as determinants of social stratification in the late 1990s.

The school leavers' own level of education continues to be the most important factor affecting the labour market entry. Yet changes in the strength of the effect of some educational levels are evident. This is illustrated by Figure 1, where mean returns to all levels of education at both labour market entry periods are presented. The returns to secondary specialised and general secondary education have decreased, whereas the occupational attainment of those opting for vocational education has remained constant. The average occupational status of university graduates has increased slightly. Somewhat surprising is the rise in the returns to the lowest level of education. Decreases in the relative returns to academic secondary and secondary specialised education has led to the increase in difference between the status attained by university graduates on the one hand, and leavers from both levels of secondary education on the other.



Figure 1. Average additional returns in terms of socio-economic status by school leaving time and highest educational level reached

The decrease in the additional returns to both levels of secondary education could be understood in terms of a general societal change. It is probable that in the early 1990s, along with the lesser importance of ascribed characteristics and social origin, the significance of intermediate levels of education also decreased. This trend could have signified increased opportunities for graduates from secondary specialised and general secondary education to start their careers from high status occupations that were out of reach for their peers looking for employment in more stable circumstances. A greater social security of the second half of the decade was accompanied by the increase in the importance of education, which restricted the access of secondary specialised and general secondary leavers to employment positions with higher socio-economic status. The decrease in the returns to the importance of this educational track at the secondary level in the second half of the 1990s. Similar average returns to higher education could in this case be explained by the relative stability of the significance attributed to university diplomas.

Addressing the issue of school-to-work transition in the Dutch context, Ploeg (1994:75) found that the initial status of the least qualified school leavers had remained almost constant for decades. In this light, the growth in returns to compulsory education is certainly unexpected on the Estonian labour market, which in the 1990s has been characterised by the increase in the share of the low-status positions (elementary occupations) (Labour Force 2001 2002:168–169). Yet it should once again be borne in mind that the socio-economic status of the first job characterises only the success of these school leavers who were able to find steady employment. High unemployment rates among young people, which have been prevalent throughout the late 1990s, allow to hypothesise that alongside the basic school leavers who have been able to obtain higher status first jobs than their peers a few years earlier, a considerable number of low-qualified young people exist who have been unable to find any employment.

Turning now the attention back to the regression models, it appears that parallel working and studying experience is positively related to the socio-economic status of the first job in the first half of the decade but fails to achieve significance during the late 1990s. The reasons for this are not entirely clear. It is possible that jobs that were held simultaneously with studies during the early 1990s were in some respect qualitatively different from the student jobs of the second half of the decade.

## 4.4. Class membership of the first job

Due to their vague conceptual nature, the socio-economic status scores are hard to interpret (Gangl 2000:23). Therefore alongside with ISEI, Goldthorpe's class schema is used to measure the relative standing of the school leavers' first jobs. Tables 6 and 7 present results of binary logistic regression analyses using the log odds of belonging to highest and lowest classes as their dependent variables.

Attention is at first paid to the school leavers' propensity to start their employment careers as managers or professionals. The effect of gender, although significant and of expected direction, diminishes considerably after the inclusion of education and the labour market entry period to the equation, indicating its partial operation through educational level. The remaining effect is probably to a certain extent related to the fact that many low-paid female-dominated occupations (most notably teachers) belong to this category. The impact of ethnicity is also significant in all three models. Regardless of their level of education, Non-Estonians have 80% lower odds of finding employment in EGP classes I and II than Estonians<sup>7</sup>. The underrepresentation of young Non-Estonians among the highest-ranking occupations may be partly related to citizenship and language proficiency requirements associated with occupations belonging to this group. As in the case of socio-economic status, the school leavers' social origin is also a considerable determinant of their early labour market outcomes. The father's secondary specialised, general vocational and higher education all increase the odds of being employed as a manager or professional regardless of the school leavers' own level of education.

<sup>&</sup>lt;sup>7</sup> Relevant odds ratios are not presented here.

	Higher white-collar workers (EGP I+II)		
	1	2	3
Gender <sup>a</sup>	0.81***	0.51*	0.48*
Ethnicity <sup>b</sup>	$-1.72^{***}$	-1.93***	-1.99***
Father's level of education <sup>c</sup>			
Vocational education	0.37	0.21	0.29
General secondary education	0.79*	0.81	0.94*
Secondary specialised education	1.15***	1.04**	1.17**
Higher education	1.66***	0.88*	0.96*
Level of education <sup>d</sup>			
Basic education or less <sup>8</sup>			
Vocational education		-1.15**	-1.16**
General secondary education		0.54	0.54
Higher education		2.93***	2.98***
No parallel studying and working <sup>e</sup>		0.16	0.13
Existence of waiting period <sup>f</sup>		0.19	0.26
Time of school leaving (1995-2002) <sup>g</sup>			-0.56*
Coefficient of determination <sup>#</sup>	0.17	0.44	0.45

Table 6. Effect of independent variables on the log odds of belonging to EGP classes I or II
relative to all other classes, logistic regression coefficients

Observed significance level: \*  $0.05 \le p < 0.1$ ; \*\*  $0.01 \le p < 0.05$ ; \*\*\* p < 0.01

Reference categories: <sup>a</sup> male, <sup>b</sup> Estonian, <sup>c</sup> basic education or less, <sup>d</sup> secondary specialised education, <sup>e</sup> existence of parallel studying and working experience, <sup>f</sup> no waiting period, <sup>g</sup> 1992–1994.

<sup>#</sup> Nagelkerke R<sup>2</sup> is used.

More than a twofold increase in the explanatory power after including the level of education indicates the significance of educational achievement in determining class membership of the school leavers' first jobs. As expected, vocational school leavers face considerably smaller chances of being employed as managers and professionals than their counterparts graduating from secondary specialised schools. The odds of belonging to EGP classes I and II do not differ significantly between secondary specialised and general secondary school leavers. The effect of higher education is large and positive, indicating that managerial and professional positions are mostly reserved for university graduates. Parallel work and studying and waiting periods prior to finding employment both fail to reach levels of significance.

The effect of the time of labour market entry on the other hand is significant and of expected direction, demonstrating that young people who left the educational system during the first half of the decade faced indeed greater chances of starting their careers from the highest ranking occupations than their peers entering the labour market in more stable parts of the decade. The labour market of the early 1990s offered young people opportunities that were no longer present a few years later. At least to a certain extent, youthfulness acted as a resource of its own,

<sup>&</sup>lt;sup>8</sup> No school leaver in the sample with basic education or less had a first job belonging to EGP classes I or II.

independent of the young person's educational level. It is also likely that the first half of the decade, characterised by a greater social and institutional uncertainty, opened up greater opportunities for success based on personal characteristics, such as initiative.

Turning finally to the class of unskilled workers (table 7), it is evident that all independent variables affect the odds of belonging to the EGP class VII less than in the case of all other dependent variables discussed so far. Although the share of females among unskilled workers is smaller than that of males, it can almost completely be explained by the different educational achievement of men and women. The effect of ethnicity is insignificant regardless of the combination of other independent variables included in the equation. Similar odds of Estonians and Non-Estonians to start their labour market careers from the bottom of the occupational ladder indicate that the lower socio-economic status achieved by Non-Estonian youth is caused by their greater propensity to find employment as skilled workers, a group characterised by a relatively low level of occupational status, and lower likelihood of being found among higher white-collar workers, but not by their over-representation in the least qualified positions. A larger share of skilled workers among the Non-Estonian youth has to do with their greater propensity to pursue vocational education and orientations prevalent among this ethnic group, which traditionally value skilled workers' positions higher than the indigenous youth (Pavelson 1999:23).

Table 7. Effect of independent variables on the log odds of belonging to EGP class VII relative
to all other classes, logistic regression coefficients
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	Non-skilled workers (EGP VII)		EGP VII)
	1	2	3
Gender <sup>a</sup>	-0.59***	-0.22	-0.22
Ethnicity <sup>b</sup>	0.08	0.04	0.05
Father's level of education <sup>c</sup>			
Vocational education	-0.21	-0.16	-0.17
General secondary education	-0.40	-0.26	-0.27
Secondary specialised education	-0.62*	-0.39	-0.41
Higher education	-0.63*	-0.15	-0.16
Level of education <sup>d</sup>			
Basic education or less		1.72***	1.69***
Vocational education		0.91***	0.90**
General secondary education		0.73**	0.72*
Higher education		-1.09*	-1.11*
No parallel studying and working <sup>e</sup>		-0.36	-0.38
Existence of waiting period (1995-2002) <sup>f</sup>		0.00	-0.02
Time of school leaving <sup>g</sup>			0.11
Coefficient of determination #	0.04	0.16	0.16

Observed significance level:  $*0.05 \le p < 0.1$ ;  $**0.01 \le p < 0.05$ ; \*\*\*p < 0.01

Reference categories: <sup>a</sup> male, <sup>b</sup> Estonian, <sup>c</sup> basic education or less, <sup>d</sup> secondary specialised education,

<sup>e</sup> existence of parallel studying and working experience, <sup>f</sup> no waiting period, <sup>g</sup> 1992–1994.

<sup>#</sup> Nagelkerke  $\hat{R}^2$  is used.

The father's level of schooling ceases to be significant after the school leavers' own education is taken into account, showing that the lower propensity of children of fathers with higher and secondary specialised education to start their labour market careers as unskilled workers is completely explainable by their own higher level of education. The effects of the school leavers' educational achievement are not surprising either. Odds are highest for young people with only compulsory education, followed by vocational school leavers and both types of secondary education. The likelihood is smallest though not completely non-existent for university graduates. The effects of being a working student, the existence of a waiting period and the year of school leaving are all found to be insignificant.

#### 5. Discussion

The results of the study are to a great extent in accordance with those obtained in studies carried out in other developed societies. At the very beginning of their careers females achieve better labour market outcomes than their male counterparts in terms of both status and social class of the first job. The situation of Non-Estonians on Estonian labour market is in many respects less favourable than that of the indigenous population, and labour market integration is no exception. Although minority groups are not over-represented in the least qualified positions, they find it hard to obtain employment at the very top of the occupational ladder, i.e. as managers and professionals.

Although Beck (1992) has predicted a growing individualisation of social stratification in Western societies, social origin still continues to be one of the factors influencing the success of labour market integration of young people, both directly and indirectly through the school leavers' own level of education. Not surprisingly, educational level is the greatest single determinant of early labour market success. The chances are smallest for those young people who chose to leave the educational system after completing nine years of compulsory schooling or less. Although vocational school leavers fare better, their labour market outcomes do not compare to their counterparts graduating from both secondary levels of education, demonstrating the unfavourable position of vocational education in Estonia in general. The results of secondary specialised and general secondary school leavers do not differ significantly, showing that working skills that leavers from secondary specialised education have acquired do not guarantee better employment opportunities from those graduating from general track and thus entering the labour market without any vocational qualifications.

The results of the study reveal that the success of labour market entry does not only depend on individual characteristics of school leavers but is also related to the time of school leaving. It appears that those entering the labour market in the context of far-reaching social changes that occurred in the early 1990s, found it somewhat easier to access managerial and professional employment than those leaving the educational system in the second, more stable half of the decade. Young people starting their career right after the collapse of the Soviet system were doing it at the right time, as it were. They were able to turn their youthfulness and lack of experiences into an advantage and benefit from the better employment opportunities caused partly by a considerable number of retiring older workers.

Separate analyses for different labour market entry periods revealed changes in the impact of some factors over the past decade. While in the early 1990s social origin failed to affect the school leavers' labour market outcomes, then in the second half of the decade it had become an important factor influencing the labour market entry process. The relative returns to some levels of education have also gone through a remarkable change. During the 1990s the socio-economic status achieved by the least qualified school leavers has increased while that of both levels of secondary education has diminished. At the same time, the status attainment of university graduates has remained almost constant leading to the increase in the additional returns to higher education as compared to those guaranteed by intermediate levels.

Finally, the results provide some bases for the preliminary comparison of the school-to-work transition process in Estonia with that of other European countries. The specificity of the vocational education in Estonia and its institutional separateness from the academic track might at the first sight resemble the highly stratified arrangements of German-speaking countries. Yet the weak linkage between the educational system and the labour market, and the low proportion of secondary students attending the vocational track make the Estonian educational system more similar to the moderately stratified arrangements found in France, UK, Belgium and Ireland. Also like the aforementioned nations, Estonia lacks the occupational labour market comparable to Germany, Austria and other countries. As a consequence the qualifications obtained in the educational system are often not enough to guarantee a high match already in the first job, resulting in a turbulent and prolonged school-to-work transition process.

Similarly to the West-European countries characterised by internal labour markets and moderately stratified educational systems, the unemployment risks of the recent school leavers in Estonia are high. Although the issue of unemployment was not addressed in this study, the statistics reveal that at most educational levels the unemployment rate of the 15–24 year olds is greater than in the case of the rest of the population, indicating that a large number of recent school leavers encounter difficulties in finding employment. The high unemployment rate can also be regarded as a sign of the low job-person match and resulting in the high labour mobility among young people. Decisions to employ recent school leavers are often based on imperfect information and can thus be of unsatisfactory quality to either of the two parties involved, resulting in a high number of job quits initiated both by the employers and young people themselves. Such a transition can include a shorter or longer period of job search, triggering the increase in the youth unemployment rate.

Previous research has shown that besides lower unemployment risks, school leavers from the secondary level in German-speaking countries are also more able to avoid low-skilled employment at the beginning of their careers. Whereas young people in other European states with less stratified educational systems have a remarkably greater propensity to start their employment careers at the bottom of the occupational ladder. The latter also appears to be the case among Estonian youth, who are much less likely than the rest of the population<sup>9</sup> to be employed as managers and professionals. Despite its specificity, the Estonian vocational education fails to a great extent to act as a safety net, i.e. to increase the employability of its leavers. Young people with vocational education face higher unemployment risks than their peers who have graduated from the general track. Also, despite possessing vocational skills the vocational school leavers are almost equally likely as the graduates from the general secondary track to be employed in the lowest ranking unskilled workers' positions.

This study marks only a tentative step in defining the position of the labour market integration process in Estonia in the broader international settings. Our knowledge would benefit greatly from the future comparative research involving countries with varying institutional arrangements from Western as well as Eastern Europe. This paper concentrated mainly on the role of the educational system in shaping the results of the school-to-work transition. In the future the effect of the properties of labour markets should also be addressed (i.e. the role played by internal and occupational labour markets, the strength of social partners, labour legislation and so on).

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<sup>&</sup>lt;sup>9</sup> In 1997 33% the working age population was employed as higher white-collar workers, while, as reported earlier, the same figure for the young people, who left the educational system in 1990s, was 20% (Source: ELFS, author's calculations).

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## Annex

Variable	Number of cases	Per cent
Gender		
Male	267	54
Female	224	46
Ethnicity		
Estonian	347	71
Non-Estonian	144	29
Time of school leaving		
1992-1994	194	40
1995-2002	297	60
Father's level of education		
Basic education or less	88	18
Vocational education	163	33
General secondary education	91	19
Secondary specialised education	91	19
Higher education	58	11
School leaver's level of education		
Basic education or less	80	16
Vocational education	166	34
General secondary education	101	21
Secondary specialised education	81	16
Higher education	63	13
Total	491	100

 Table 1. Distribution of sample by main independent variables