

# POLAND 2013

## **Global Entrepreneurship Monitor** Poland. Report 2013

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## List of abbreviations

APS – Adult Population Survey

CSO – Central Statistical Office of Poland (pol. *Główny Urząd Statystyczny*)

CATI – Computer Assisted Telephone Interview

EEA – Entrepreneurial Employee Activity

EU – European Union

GEM - Global Entrepreneurship Monitor

GERA – Global Entrepreneurship Research Association

IPO – Initial Public Offering

IUS – Innovation Union Scoreboard

MSP – Small and medium sized companies (including microcompanies)

NES – National Experts Survey

OECD - Organization for Economic Co-operation and Development

PARP – Polish Agency for Enterprise Development (pol. Polska Agencja Rozwoju Przedsiębiorczości)

TEA – Total early-stage Entrepreneurial Activity

VC – Venture Capital

#### Dear Readers,



I have the pleasure to present the third edition of the **Global Entrepreneurship Monitor Report – Poland 2013.** It is based on the results of research carried out under the largest international research project in the area of entrepreneurship, i.e. Global Entrepreneurship Monitor (GEM).

The year 2013 was a special time in the GEM project. It was another year in which the number of countries covered by surveys increased to 70, which translates into the three fourths of the global population and almost 90% of the global GDP. The resulting *GEM 2013 Global Report*, presented in January 2014 in Santiago, marked the 15th anniversary of the GEM project. For Poland, 2013 was the third consecutive year of research within the GEM project conducted by the Polish Agency for Enterprise Development and the University of Economics in Katowice.

**Global Entrepreneurship Monitor Report – Poland 2013** presents the condition of entrepreneurship in Poland compared to the other countries worldwide, including the USA and European countries in particular in 2013. It also presents the changes in entrepreneurial

attitudes of Poles in the last three years. As in the previous editions, this year's Report describes intentions and motivations of Poles to start business activity and its further development. It also shows the determinants of entrepreneurship in such aspects as entrepreneurship policy, access to financing, technology transfer, cultural and social determinants, as well as factors conducive to the development of entrepreneurship of women, high growth enterprises, and young people.

A special topic in this year's Report is *well-being*, i.e. *the quality of life* of entrepreneurs. The assumption made in GEM is that it comprises such factors as the sense of well-being, balance between work and private life, experienced level of stress, and job or income satisfaction. In this Report, we looked at entrepreneurs in Poland in comparison with other countries of the world and other social groups. We also analysed the factors linked to the quality of life of entrepreneurs in Poland, such as age, gender, education, size of household, or the sector of business activity. Moreover, we examined how the ability to decide about one's activities or the sense of importance of the work performed affects the perceived quality of life.

The data and conclusions presented in this Report are valuable, because they allow one to draw a picture of entrepreneurship in Poland and the conditions of its development in comparison to other countries worldwide. Thanks to this knowledge, as in case of other countries participating in the GEM project, it is possible to develop an entrepreneurship policy addressing specific challenges that exist in Poland.

On behalf of the authors of the Report, other persons involved in the implementation of the GEM project in PARP and the University of Economics in Katowice and myself, I would like to thank all the Experts who participated in the National Experts Survey in 2013.

I wholeheartedly invite you to read the Report.

Bożena Lublińska-Kasprzak

President of the Polish Agency for Enterprise Development

# **Executive summary**

Entrepreneurship in Poland in 2013 comprises primarily:

- + persistent high percentage of early-stage enterprises (up to 3.5 years of operation),
- + an increased share of established enterprises (operating for over 3.5 years),
- + a significant increase in the growth aspirations of enterprises, including those run by women,
- + untapped potential of women who on average start business two times less often than men do,
- + a higher level of satisfaction with work and quality of life than employees,
- insufficient proportion of enterprises established due to perceived opportunities on the market,
- fear of failure as the main barrier to the establishment of enterprises
- a decrease in number of adults planning to start up a business in the next three years.

## **Entrepreneurial attitudes**

Currently **one in five adult Poles plans to start up a business in the next three years.** Although this figure is better than the EU average (where only 15.9% of the adult population has such an intention), it is much lower than in 2011 when 27% of adult Poles planned to establish their own business. In addition, fewer people than in 2011 now **perceive an opportunity to establish their own business in the immediate vicinity** (decrease from 33% to **26% of adults**).

Poles highly assess their own capabilities and knowledge to run a business – one in two Poles believes that he/she is well prepared for that purpose (52%), while on average in the EU just over 42% of adults are of the same opinion. At the same time, many Poles do not establish a business for fear of failure – this is currently 56% of adult Poles. From 2011, the percentage of such persons in the population has been very high (in the years 2011–2012 it was one of the highest in the EU, and currently the higher figures are reported only for Italians and Greeks, which is not a lot given that the study covered almost 70 countries in 2013). Moreover, compared to 2011, the percentage of persons who do not start a business for fear of failure has increased slightly from 54% to over 56%.

The presence of the entrepreneurs in the media is noted by 58% of adult Poles (average for the EU is 9% lower). This may be because **almost 67% of Poles perceive owning business as a desirable career choice.** In the EU, this opinion is shared by 56.9% of adults. Unfortunately, as shown by the GEM data for 2011–2013, this is significantly less than three years ago – 72.8%. Poles are now also less often willing than in 2011 to attribute social status to entrepreneurs (59.9% compared to 64.4% in 2011). The figure is also much lower than the EU average of 65.5%.

In Poland, the majority of early-stage enterprises are established out of necessity and not because of perceived opportunities. This distinguishes Poland from other European countries, in particular the EU. As many as 47.4% of enterprises (TEA) in Poland are established out of necessity (it is the highest result among the EU countries surveyed). When it comes to the perception of the opportunity to improve the standard of living, Poland is fourth among the countries with the lowest percentage of "optimistic" enterprises with 32.7% of TEA.

#### Entrepreneurship – status and changes in recent years

**TEA, i.e. total early-stage entrepreneurial activity,** including persons taking action to start a business activity **and entrepreneurs running a business for up to 3.5 years, amounts to 9.3%, i.e. approximately 2.4 million people, in Poland** (it should be noted that TEA includes both registered entrepreneurs and the persons taking action to establish a business). The average for the EU is slightly lower and amounts to 8% (25.3 million in the EU). **Established enterprises** (operating for over 3.5 years) **account for 6.5% of adult population in Poland** (6.4% in the EU), **nascent entrepreneurs** (people at the stage of taking action to establish a business and entrepreneurs operating for up to 3 months) – 5.1% (4.8% in the EU), and **new entrepreneurs** (conducting business activity for 3 to 42 months) – **4.3%** (3.3% in the EU).

As regards the changes in the structure of entrepreneurs in the years 2011–2013, the proportion of established enterprises in the adult population grew from 5% to 6.5% in Poland, while the share of nascent entrepreneurs decreased slightly from 6% to 5.1%. There was also an increase in the percentage of new enterprises – from 3.1% to 4.3%. The share of TEA and of those who discontinued a business has remained at the similar level from 2011 – at 9.3% and 4%, respectively, in 2013. The data demonstrate a qualitative change in the structure of Polish entrepreneurs and the better condition of the economy.

The majority of entrepreneurs running a business for up to 3.5 years in Poland represent the production sector (over 45% of enterprises, approx. 21% more than the EU average). The sector of services, considered to be necessary to ensure

<sup>&</sup>lt;sup>1)</sup> The authors' calculations based on data from the *Labour Force Survey* for 2013, Eurostat. The calculations were made for persons aged 15–64 years.

appropriate economic growth, is less popular among entrepreneurs. This concerns the **services for business** that are provided in Poland by **14.9% of enterprises belonging to TEA** (approximately 12% less than in the EU). The **services for individual customers** are provided in Poland by one in three entrepreneurs (**34.4% of TEA**, approximately 7.6% less than in the EU). In the **extraction sector** in Poland, the percentage of early-stage entrepreneurs is **5.3%**, which is close to the EU average.

Growth aspirations of Polish early-stage entrepreneurs are relatively high – 39% of them declare the creation of at least 5 jobs in the next 5 years (medium-level aspirations), while 27% plan to create 10 jobs and increase employment by at least a half within that period (high aspirations). Those figures place the Polish entrepreneurs at the 3rd place among the EU countries. The higher positions belong to entrepreneurs from Romania and Latvia where growth aspirations of approx. 43% of enterprises are at the medium level and of one in three companies at the high level.

The ambitions of entrepreneurs operating in Poland have increased over the last two years. The increase was particularly marked, compared to the data for 2012, with respect to the percentage of enterprises with high aspirations (by 74%), while the percentage of enterprises with aspirations at the medium level grew by 31%.

GEM data for 2013 shows that one in five entrepreneurs operating in Poland for up to 3.5 years are exclusively focused on the domestic market. Almost 78.9% of early-stage enterprises are exporters, in the sense of having customers abroad, which means that almost four in five owners of Polish enterprises have this type of customers. This figure puts Poland at the 5th place among 23 EU countries covered by the GEM study in 2013.

#### Female entrepreneurship

In the EU countries, women start a business on average two times less often than men do. Poland does not diverge from the average: women who are early-stage entrepreneurs account for 5.1% of adult Poles; while men account for 12.3% according to GEM data for 2013 (figures for the EU amount to 5.6% and 10.4%, respectively).

More than 29% of adult women believe that the conditions to establish their own business activity within the next 6 months are good (less, because only 23% of men is of the same opinion). Polish women can be classified as optimists in this respect, since, compared to other EU countries, Poland is at the 8th place in terms of perceived opportunities on the market. It is worth noting that, from 2011, (since GEM data are available for Poland) an increasing number of women perceives business opportunities, while in 2011, men perceived such opportunities more often than women did. Moreover, the figures for both groups were higher than in subsequent years (35.2% for men and 31% for women in 2011).

One of the restrictions to the business plans of Polish women is a much lower self-assessment of entrepreneurial competences compared to men. 40% of adult women vs. 64% of men believe that they have appropriate competences to start up a business. And although compared to other EU countries Poles (regardless of their gender) perform very well (6th place when it comes to women having the best opinion of their entrepreneurial capabilities and the first place in terms of self-assessment of men in this category), the persistent difference of 24% in favour of men is difficult to explain given the better (within the meaning of soft skills) education of women than men.

The second reason is undoubtedly the **fear of failure**. Almost 60% of women and 54% of men in Poland do not start a business for fear of failure (for comparison in the EU 52.1% of women and 42.4% of men have similar doubts).

However, it should be noted that **in the case of early-stage entrepreneurship the percentage of enterprises established by women is growing**, because the difference between the number of companies run by men compared to those run by women is increasing (TEA for men in the years 2011–2013 has decreased from 13.1% to 12.3%, while for women it increased from 5.1% to 6.1% – the gender gap decreased by 2 percentage points). When it comes to **established enterprises, i.e. those operating over 3.5 years, a dynamic increase has been recorded in the percentage of enterprises run by women** (from 2.9% to 3.8%); however, a much larger growth in this category concerns the enterprises owned by men (from 7.1% to 9.2%) and, therefore, the gender gap has slightly increased (by less than 1 percentage point). These indicators are higher than the EU average (by 4.8% for TEA and 4.9% for established enterprises).

**Motivations to start a business activity vary depending on gender.** Significantly, because almost twice as many men, as compared to women, run a business in European Union countries decide to start up their own business due to perceived opportunities. More men than women become entrepreneurs in these countries out of necessity, i.e. or lack of alternatives for finding employment in the labour market. It is worth noting a quite optimistic fact that in the EU on average **almost three times more women and men start a business to use the opportunity than because they are forced to do so<sup>2)</sup>.** In Europe, the biggest difference in motivations of women and men understood as perceived opportunities occurs in Lithuania, Estonia, and

<sup>&</sup>lt;sup>2)</sup> For example, in the EU countries in the population of enterprises classified as TEA, the share of entrepreneurs who decided to start up their own business due to opportunity vs. necessity amounts to 7.19% vs. 2.43% for men and 3.81% vs. 1.33% for women.

Hungary (approx. 6–8%). When it comes to starting up a business due to the lack of other alternatives in the labour market, the biggest difference between entrepreneurs in terms of gender is recorded in Slovakia and in Germany (approx. 3%).

The GEM results show that men who are early-stage entrepreneurs (operating for up to 3.5 years) generally have higher growth aspirations than women. The creation of any jobs was declared by eight in ten women and almost nine in ten men. In terms of numbers, women declare the creation of circa seven jobs in the next five years, while men plan to create around eighteen new jobs on average. This means that women expect their business to grow 13 times and men 21 times in terms of the level of employment in the next 5 year. Men outperform women also in terms of the most ambitious development plans, understood as the creation of above 19 jobs in the next 5 years. Such plans are presented by fifteen in a hundred men running their own business and nine in a hundred women.

However, women do not achieve lower results than men in all aspects of aspirations. The **comparison of the situation in 2013** with that in the previous year also reveals a significant change when it comes to ambitions of women-entrepreneurs. In comparison with 2012, the percentage of women planning to create more than five jobs in the next five years has increased significantly, i.e. two times. With the figure standing at 43% in 2013, women prove to be more ambitious than men in this regard, since such plans are declared by only 37% of the latter running their own business. More women than men (29% vs. 26%) also declare the employment growth by 50% while creating at least 10 new jobs. Although these figures are very similar, it is worth noting that, **compared to 2012**, the percentage of highly ambitious women entrepreneurs increased 2.5 times (from 11% in 2012), and of men only by around a half.

What is more, the upward trend is also visible in the case of the most ambitious group of female entrepreneurs who declare the creation of at least 20 jobs; the growth rate of the percentage of women with such plans in the years 2012/2013 is clearly higher than that of men (1.9 compared to 1.1).

### Determinants of entrepreneurship development in Poland

As in the previous years, determinants of entrepreneurship development in Poland in 2013 were assessed by 36 experts in the field of entrepreneurship. In their opinion, the conditions to establish and develop enterprises are still unsatisfactory and other than expected. The main reasons for this situation are the shortcomings in forming entrepreneurial attitudes and teaching of entrepreneurship at all levels of education. This is also affected by social and cultural determinants that do not encourage creativity and innovation; therefore, they do not promote entrepreneurship development in Poland.

On the other hand, perceived opportunities for starting up a business, as well as market dynamics, are higher than in the most developed countries (the innovation-driven economies). Despite the relatively low experts' assessments of capabilities/knowledge of Poles on running a business, Poland is ranked above the average compared to innovation-driven economies. Our assets are managerial skills and experience in starting up business activity. Experts also underline that women and men in Poland are equally capable of starting up a new business, but women encounter a barrier in the form of an unsatisfactory social and institutional care system after starting a family.

In the experts' opinion, in Poland, we are also dealing with quite unfavourable conditions for young people who establish a business due to lack of any other alternative. Governmental programmes targeted at young entrepreneurs, as in the innovation-driven economies, are not assessed very positively. When it comes to the quality of life of entrepreneurs, according to experts, although entrepreneurs are perceived as people who are more satisfied with their private and professional life than others are, the complicated and often inadequate legislation/regulations do not allow maintaining the balance between personal and professional life.

## Well-being, i.e. quality of life of entrepreneurs

In Poland, the well-being of entrepreneurs classified as TEA is significantly higher than in the entire population of adults and persons not involved in business activity (0.01, -0.15, -0.18, respectively). In comparison with other EU Member States, this figure is not high. The well-being among new entrepreneurs is lower only in Croatia, Greece, Italy, Slovakia, and Hungary. Moreover, the well-being of entrepreneurs in Poland decreases along with the transition to a group of owners of established enterprises and is only higher than the figure for Croatia, Greece, Latvia, and Hungary.

Poland is one of the nations who are experiencing the highest level of stress at work. The results are far worse than the average for the European Union, and only Germans, Greeks, Hungarians, Portuguese, and Slovenians are more stressed than Poles. On the other hand, Poles are relatively highly satisfied with their work. In Poland, entrepreneurs are significantly more satisfied with their work than employees are. Women who are new entrepreneurs in Poland enjoy a better well-being than men, experience less stress, and more satisfaction with their work.

The GEM survey clearly shows that the sense of autonomy and significance of work are higher among entrepreneurs than employees. Better-educated persons have a better well-being, work-life balance, and income satisfaction, while their level of stress is higher than in others. The quality of life is the highest among entrepreneurs for whom opportunity is only a partial motivation.

## Selected indicators of entrepreneurship in Poland and in the EU (average)

Indicator	Poland	EU (average)*
Entrepreneurial intentions – plans to start up a business within 3 years (% of adults taking no action to start up a business)	17.3%	13.5%
Perceived opportunities (% of adults)	26.1%	28.7%
Perceived capabilities (% of adults)	51.8%	42.3%
Fear of failure (% of adults perceiving a good opportunity to start up a business)	46.7%	39.8%
Entrepreneurship as desirable career choice (% of adults)	66.8%	56.9%
High status of an entrepreneur (% of adults)	59.9%	65.5%
Positive media attention for entrepreneurship (% of adults)	58.5%	49%
TEA (% of adults)	9.3%	8.0%
Established enterprises (% of adults)	6.5%	6.4%
Discontinuation of business (% of adults)	4.0%	2.9%
Necessity-driven entrepreneurship (% of adults)	47.4%	22.7%
Opportunity-driven entrepreneurship (% of adults)	32.7%	47.0%
Plans to create up to 5 jobs (% of adults)	3.9%	4.2%

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 Global Report data.

<sup>\*</sup> Data on 23 EU countries, which were covered by the 2013 study.

# 1. About the GEM study

Global Entrepreneurship Monitor has been dynamically developing since its inception in 1997 and the first research conducted in 1999, when around 10 countries took part in the project. In 2013, the surveys covered 70 countries worldwide. GEM is based on a uniform methodology of data collection (it includes a quantitative survey on a sample of at least 2,000 adult respondents and at least 36 interviews with experts in the field of entrepreneurship). The process of data collection is closely supervised by persons responsible for the quality of data in GEM.

GEM is the largest and most prestigious entrepreneurship-related research project that focuses on early-stage entrepreneurship. This project is purely scientific, which allows it to gain a deep insight into the process of entrepreneurship.

The Global Entrepreneurship Monitor has three main objectives:

- to measure differences in entrepreneurial attitudes, activity and aspirations across economies,
- to uncover factors determining the nature and level of national entrepreneurial activity; and,
- to identify socio-economic policy implications for enhancing entrepreneurship.

#### 1.1. GEM models

GEM research is based on theoretical models of entrepreneurship established on the basis of years of scientific achievements. The two most important theoretical models are the model of economic relationships and the model of individual entrepreneurial process.

## 1.1.1. Interpretation of entrepreneurship in GEM

While entrepreneurship is a multifaceted phenomenon with many different meanings, GEM operationalizes this concept as "any attempt at new business or new venture creation, such as self-employment, a new business organisation, or the expansion of an existing business, by an individual, a team of individuals, or an established business". While entrepreneurship is defined narrowly as new business activity, it takes a broad view of what it recognizes business activity to be. This has its implications in measuring the level of entrepreneurship in GEM that is not limited to registration of new business activity, but it is treated rather in behavioural rather than in institutional terms, and it includes both entrepreneurial activities aimed at the registration of new business entities, and entrepreneurial activities in the existing organisations.

## 1.1.2. Model of entrepreneurship process

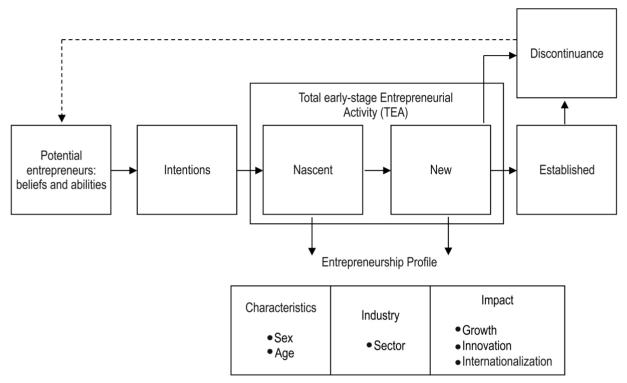
In GEM, it is important to differentiate the business activity according to its phases (Figure 1). What is more, phases before formal registration are also subject to the analysis, and most attention is paid to the phase of early-stage activity. It is one of the significant elements distinguishing GEM from other research projects on entrepreneurship where registration of new entities is studied based on data of national statistical offices, which does not enable good insight into the nature of the new enterprises.

In modelling the process of entrepreneurship, GEM applies three stages of economic project development. Depending on the phase an entrepreneur is in, they may be defined as a nascent entrepreneur, a new entrepreneur, or an established enterprise. In the GEM methodology:

Nascent entrepreneurs are individuals who have not established business activity yet, but they plan to, and those who have already established business activity and are at its early stage – up to 3 months from establishment of business activity. Business activity is considered to be established when wages are paid for the period of three months. Such individuals start to take first steps to establish a business: They obtain financial support, do the business planning, and apply for legal protection of their intellectual property.;

- New entrepreneurs are people who established their business activities between 3 and 42 months before the beginning of
  the research. The period of 3.5 years is considered to be critical in running entrepreneurial activity. After surviving this period,
  one may consider the first stage to be a success, i.e. the company has been established and now it is in transition to the next
  stage management of the existing enterprise.;
- Established enterprises are those who have been operating on the market for the period longer than 42 months (3.5 years).

Figure 1. GEM model of entrepreneurship process



Source: Bosma N., Wennekers S., Amoros J.E., Global Entrepreneurship Monitor 2011 Extended Report: Entrepreneurship and Entrepreneurial Employees across the Globe, London, GERA 2012, p.10.

Apart from the phases, the GEM entrepreneurship process identifies beliefs and abilities preceding the decision regarding setting up business activity, as well as reasons for discontinuance by former entrepreneurs, which is significant due to re-establishing business by some of them. The approach based on research and analysis of people, not enterprises, is featured in to GEM, and it enables better insight into the nature of the entrepreneurship process. It gives twofold results. It enables the analysis of the entrepreneurship process in many dimensions, e.g. the identification of people with similar attitudes and characteristics. On the other hand, it provides the opportunity to discover more differences between the countries, since we obtain information not only about the number of entrepreneurs in a country, but also about differences in their attitudes and characteristics in certain phases of running a business activity.

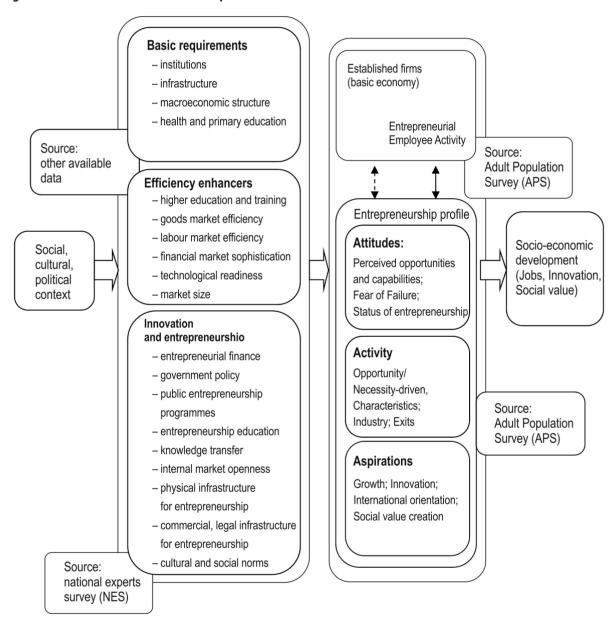
#### 1.1.3. GEM model of economic development

The GEM model of economic development is based on several significant assumptions. First of all, an economy's prosperity is highly dependent on a dynamic entrepreneurship sector. Although this is true across all stages of development, the nature and of this activity can vary in character and impact. Necessity-driven entrepreneurship, particularly in less developed regions or those experiencing declines in employment, can support the economy when there are fewer work options available. More developed economies, on the other hand, generate more entrepreneurial opportunities as a result of their wealth and innovation capacity, yet they also offer more wage employment options to attract those that might otherwise become independent entrepreneurs.

Second, an economy's entrepreneurial capacity is based on individuals with the ability and motivation to start businesses, and this may be strengthened by a positive social perception of entrepreneurship. Finally, high-growth entrepreneurship is a key contributor to new employment in an economy, and national competitiveness depends on innovative and cross-border entrepreneurial ventures.

The GEM model (Figure 2) based on the above socio-economic approach presents how entrepreneurship is affected by national conditions, and it also shows the three major components of entrepreneurship: attitudes, activity, and aspirations. These three components are presented in the form of conglomerate creating innovations, economic growth, and new jobs, while detailed interactions between the components are not subject to analysis. The set of factors related to the national environment initially consisted of nine items; however, it has been expanded over the years with the research. GEM monitors entrepreneurial framework conditions in each country through surveys of experts in the field of entrepreneurship, while the components of entrepreneurship are tracked using the adult population surveys. A comparison of these two approaches enables one to generate data both at the macro level of countries, and at micro level of individual entities.

Figure 2. GEM model of economic development



Source: Bosma N., Wennekers S., Amoros J.E., Global Entrepreneurship Monitor 2011 Extended Report: Entrepreneurship and Entrepreneurial Employees across the Globe, London, GERA 2012, p. 12.

#### 1.1.4. Phases of economic development

A new approach introduced by GEM in 2008, is a division of countries into three groups by phases of economic development: factor-driven, efficiency-driven, and innovation-driven (Figure 3)<sup>1)</sup>. In the **factor-driven economies**, competitiveness is organised

<sup>&</sup>lt;sup>1)</sup> M.E. Porter, J.J. Sachs, J. Mc Arthur, Executive Summary: Competitiveness and Stages of Economic Development, in: The Global Competitiveness Report 2001-2002, M.E. Porter, J.J. Sachs, J.W. Mc Arthur and K. Schwab (ed.), New York, NY, 2002: Oxford University Press.

at the level of factors of production, such as labour and natural resources. Competitiveness is based on price, where productivity is low, so are labour costs. Countries transforming into **efficiency-driven economies**, along with increasing labour costs, must create more efficient methods of production and increase the quality of products and services. Countries transforming into **innovation-driven economies** are able to maintain a high level of wages and a high standard of living only if enterprises are able to compete based on new and specialised products and other innovative solutions<sup>2)</sup>. **In 2013, as in previous years, Poland was included into the efficiency-driven economies.** 

Figure 3. Three phases of economic development



Source: Bosma N., Wennekers S., Amoros J.E., Global Entrepreneurship Monitor 2011 Extended Report: Entrepreneurship and Entrepreneurial Employees across the Globe, London, GERA 2012, p.13.

In each of the three phases of economic development, the role of the country in supporting entrepreneurship and economic growth is different. In the case of factor-driven economies, the state should support the development of institutions, infrastructure, and macroeconomic stability, and provide an efficient health care system and primary education. In efficiency-driven economies, the government focus should be on getting labour and capital markets working more efficiently, attracting foreign direct investments and creating an educational system to educate the workforce to successfully adopt technologies. In innovation-driven economies, the key role of the country is to provide and commercialise knowledge.

## 1.2. Total early-stage Entrepreneurial Activity (TEA)

GEM applies several criteria differentiating entrepreneurial activity. The results of employing these criteria are the indicators used in the project.

**TEA** is a central measure established in the GEM research. It presents the percentage of the working age population involved in establishing business activities or running a new enterprise. In the GEM model of entrepreneurship process, **Total early-stage Entrepreneurial Activity includes nascent entrepreneurs and new entrepreneurs**, but does not include established enterprises. Methodology of calculation of TEA measure is relatively complex and it is based on answers to several questions concerning intentions and actions taken in terms of establishing and running business activity. It has to be stated that TEA does not measure the share of people running business, but the share of people establishing and running business in early stages among the adult population. In this context, it is a forward indicator, since it enables one to forecast the intensity of business activity in the society.

#### 1.3. Research within GEM

Research within the GEM project is conducted in two parts. The first one is a typical quantitative adult population survey (APS) conducted on a sample of the working age population. The second part of the research is a qualitative survey consisting in the collection of national experts' opinions (National Experts Survey – NES).

<sup>&</sup>lt;sup>2)</sup> Countries are categorised in groups according to the classification adopted in the Global Competitiveness Report issued by the World Economic Forum.

#### 1.3.1. APS

The adult population survey is conducted on a sample of at least 2,000 people in every country involved in the project, every year. In general, the survey is conducted with CATI method with consideration of land-based and mobile telephony applied in households. The APS survey measures TEA, and it also provides information about society's aspirations and perceptions of entrepreneurship, growth aspirations of entrepreneurs, their international orientation, as well as financing business activity. Results of this survey are presented in the first part of this report (Chapter 2).

#### 1.3.2. NES

The national experts survey is conducted on a sample of at least 36 experts from various fields directly and indirectly connected to entrepreneurship. This part of the survey is aimed at the identification of framework conditions for entrepreneurship in all countries participating in the GEM project. In every country, a group of experts is selected in accordance with the same criteria. The main criteria are the type of activity (scientist, manager, politician, etc.) and experience in running entrepreneurial activity (entrepreneur, non-entrepreneur). The results of this survey are presented in the second part of this report (Chapter 3).

# 2. Results of the adult population survey (APS)

The quantitative surveys on adult population, conducted as part of GEM, enable one to compare individual countries and groups of countries in three dimensions: Entrepreneurial Attitudes and Perceptions, Entrepreneurial Activity, and Entrepreneurial Aspirations. All of the dimensions are presented in this chapter. Data on 70 countries participating in the GEM survey in 2013 were presented in the *Global Entrepreneurship Monitor*, 2013 Global Report<sup>3)</sup>. In this national report, we present data from other countries, primarily for the purpose of illustration and better interpretation of data for Poland. We focus more on the European Union Member States, while the data on other countries are presented collectively in three categories of economies distinguished in GEM: factor-, efficiency- and innovation-driven. In 2013, Poland took part in the GEM survey for the third time, which to a certain extent allows us to formulate hypotheses regarding trends that are of our interest. If data reveal any correlation or relationship, we try to address it, and in future we would want to further analyse whether this actually takes place over a longer period of time.

# 2.1. Entrepreneurial attitudes and perceptions

In GEM entrepreneurial attitudes are measured using four indicators: entrepreneurial intentions, perceived opportunities, perceived capabilities, and fear of failure. Despite the fact that these indicators refer primarily to individuals, the determinants of specific beliefs of individuals are already of a social, cultural, economic, and historical nature. Therefore, comparisons of individual countries or groups of countries are useful and allow one to identify regularities that help in interpreting the data for individual countries and in predicting changes.

Entrepreneurial intentions are measured as a percentage of the population aged 18–64 who plan to establish a business within the next three years. There is a persistent trend indicating that the intensity of entrepreneurial intentions decreases along with the economic development. Entrepreneurial intentions are most common among persons from factor-driven economies (almost half of respondents in 2012, while in 2013 – 46.5%) and the least common among people from innovation-driven economies (14.4%). With the figure of 21.4%, Poland ranks between efficiency-driven and innovation-driven economies. The participation in the GEM survey for the third time also allows one to identify a potential downward trend in this regard; since, in 2011, 27% of adult Poles planned to establish their own business (i.e. more than one in four persons), in 2012, 24%, while in 2013, the percentage of people willing to set up a business decreased by almost 6 p.p. compared to 2011. An optimistic assumption is that, at such rate, we will quickly achieve the figure corresponding to the average for innovation-driven economies. Coupled with a quite slow but consistent trend indicating the changes in the structure of enterprises in Poland (primarily the decreasing share of microenterprises in favour of small entities),4 it appears that the level of entrepreneurial intentions will decrease with the development of a good alternative in the form of employment in economically strong entities.

<sup>&</sup>lt;sup>3)</sup> Amoros J.E., Bosma N., Global Entrepreneurship Monitor. 2013 Global Report. Fifteen Years of Assessing Entrepreneurship across the Globe, 2014.

<sup>&</sup>lt;sup>4)</sup> Tarnawa A., Zadura-Lichota P. (ed.), *Report on the condition of the sector of small and medium-sized enterprise sector in Poland in 2011–2012*, Polish Agency for Enterprise Development, 2013.

Table 1. Entrepreneurial attitudes in the European countries and in the USA in 2013 (%)

Country	Entrepreneurial intentions	Perceived opportunities	Perceived capabilities	Fear of failure
Factor-driven economies	46.5	60.8	68.9	30.9
Efficiency-driven economies	29.1	42.6	53.3	37.5
Innovation-driven economies	14.4	33.4	40.6	43.2
EU average	15.9	28.7	42.3	47.3
Belgium	9.2	31.5	33.9	50.8
Bosnia and Herzegovina	25.2	23.3	50.5	39.5
Croatia	24.1	17.6	47.2	46.0
Czech Republic	15.3	23.1	42.6	42.9
Estonia	22.9	46.1	40.0	47.8
Finland	9.3	43.8	33.3	41.1
France	13.7	22.9	33.2	45.3
Greece	8.9	13.5	46.0	69.1
Spain	9.4	16.0	48.4	47.7
Netherlands	10.3	32.7	42.4	41.3
Ireland	14.7	28.3	43.1	45.3
Lithuania	25.7	28.7	35.4	49.4
Luxembourg	19.2	45.6	43.3	49.6
Latvia	26.8	34.8	47.9	42.6
Macedonia	30.9	37.2	49.7	41.1
Germany	8.9	31.3	37.7	48.2
Norway	6.2	63.7	34.2	33.3
Poland	21.4	26.1	51.8	56.3
Portugal	16.0	20.2	48.8	48.2
Russia	4.7	18.2	28.2	40.5
Romania	26.8	28.9	45.9	46.0
Slovakia	20.3	16.1	51.0	44.5
Slovenia	14.7	16.1	51.5	42.0
Switzerland	11.3	41.5	44.7	35.5
Sweden	11.0	64.5	38.8	39.7
Turkey	31.6	38.6	52.2	33.2
USA	16.6	47.2	55.7	35.0
Hungary	17.4	18.9	37.5	47.9
UK	7.6	35.5	43.9	39.8
Italy	11.3	17.3	29.1	56.2

Source: the authors' own elaboration based on  ${\it Global Entrepreneurship\ Monitor\ 2013}$  data.

The current indicator of perceived opportunities, which GEM measures as a percentage of people who believe that conditions in their environment are good to start up a business within the next 6 months, is still low in Poland. Like the level of entrepreneurial intentions, this indicator decreases along with the economic development. However, in the case of Poland, it is significantly lower than the average for innovation-driven economies (26% versus 33%) or the average for the group of efficiency-driven economies to which Poland belongs (43%). This indicator must be interpreted with a particular caution. If we take a look at its values in individual European countries, they vary quite significantly. Sweden and Norway are leaders with indicators at the level of factor-driven economies, at ca. 64% each. The percentage of people who perceive business opportunities is very low in Spain, Greece, and Italy, where the society most certainly still feels the effects of the economic crisis. Therefore, a significant increase in this indicator for Poland between 2012 and 2013 should be assessed as a positive development; although, its value is still low (an increase from 20.4% in 2012 to 26.1% in 2013).

Poles highly assess their own capabilities and knowledge necessary to run an enterprise. One in two Poles (52%) believes that he/she is well-prepared to run a business which places Poland close to the average for efficiency-driven economies, but also well above the average for the European Union (42%). As in the case of previous indicators, the belief in one's capabilities decreases

along with the economic development. In factor-driven economies, almost 70% of respondents assess their capabilities positively. Europe is diverse in this respect. Apart from Poland, the indicator exceeds 50% only in Slovakia and Slovenia. The figures for other countries do not present any specific pattern. For example, the indicator is relatively high for the UK (44%) and at the same time very low for Italy (29%), France, or Finland (33% in each). Finally, we can say that the differences in the values of this indicator are visible when the groups of countries are compared. However, at least in the case of European Union Member States, this regularity (the higher the indicator of development, the lower perceived capabilities) is not so obvious.

Fear of failure is another interesting category, which is increasingly often cited and analysed as the category with a significant impact on the level of entrepreneurship. Looking at the three years of surveys, in which Poland participates, we can say that the value of this indicator for our country is very high, while changes in the consecutive years do not exhibit a downward or an upward trend. In 2011, 54% of adult Poles declared their fear of failure, and in 2012 their percentage grew to 59% and decreased again in 2013 to 56%. After Greece (69%), the indicator for Poland is the highest compared to other EU countries, with Italy reaching an almost identical value. Therefore, Poland is among the top three countries in which the fear of failure is reported most often. While the example of Italy and Greece is not surprising given their experience during the last economic crisis, the result for Poland is difficult to interpret, in particular, in the context of such a positive self-assessment of capabilities by Poles. This suggests, however, that most likely there are other factors that may exacerbate these concerns (e.g. legal regulations on bankruptcy or social acceptance of failure).

Particular attention is paid in GEM to the collection of data on cultural variables. The selected four variables include aiming at equalising the standard of living, entrepreneurship as a desirable career choice, high-status successful entrepreneurship, and media attention for entrepreneurship. They affect the social perception of entrepreneurship and, as a result, the level of entrepreneurship in a given country.

The results for Poland show that the media image of entrepreneurs achieves the highest value among those variables. 58% of Poles see the presence of entrepreneurship in media, while the average for the EU is 9% lower. There are not enough other studies that would allow a reliable assessment of the image of an entrepreneur created by the media in Poland. Admittedly, the analysis of this topic becomes increasingly difficult with the growing number of channels of communication with the public, as well as varied forms and content of communication. However, we can say with certainty that many new publications on entrepreneurship, running a business or management appeared on the Polish market in recent years, and this fact alone proves that the media considers this topic to be interesting and important.

Table 2. Entrepreneurial perception in the European countries and in the USA in 2013 (%)

Country	Aiming at equalising the standard of living	Entrepreneurship as desirable career choice	High-status successful entrepreneurship	Media attention for entrepreneurship
Factor-driven economies	57.3	75.3	80.1	69.8
Efficiency-driven economies	63.1	67.9	67.3	62
Innovation-driven economies	61.7	53.5	67.3	55.7
EU average	64.3	56.9	65.5	49.0
Belgium	54.8	54.8	52.2	43.9
Bosnia and Herzegovina	90.98	82.27	71.92	39.2
Croatia	74.2	61.5	43.1	42.9
Czech Republic	NDA	NDA	47.8	NDA
Estonia	56.7	53.2	58.6	40.7
Finland	69.0	44.3	85.5	68.5
France	53.5	55.3	70.0	41.4
Greece	59.0	60.1	65.1	32.4
Spain	73.9	54.3	52.3	45.6
Netherlands	59.8	79.5	66.2	55.2
Ireland	78.5	49.6	81.2	59.9
Lithuania	67.7	68.6	57.2	47.7
Luxembourg	44.4	39.4	70.6	36.3
Latvia	50.7	61.4	59.5	58.6
Macedonia	74.26	69.49	67.89	66.76

#### cont. table 2.

Germany	56.2	49.4	75.2	49.9
Germany	30.2		73.2	49.9
Norway	70.33	49.33	75.48	56.87
Poland	69.6	66.8	59.9	58.5
Portugal	NDA	NDA	NDA	NDA
Russia	54.94	65.73	68.02	48.95
Romania	69.7	73.6	72.6	61.3
Slovakia	71.6	49.2	58.5	51.7
Slovenia	81.8	57.4	68.1	50.5
Switzerland	56.53	40.51	64.96	47.77
Sweden	56.2	52.0	71.5	58.6
Turkey	73.35	64.03	73.95	52.66
USA	NDA	NDA	NDA	NDA
Hungary	67.2	45.7	74.1	28.4
UK	NDA	54.1	79.3	49.6
Italy	72.3	65.6	72.4	48.1

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

The fact that every year Poles less frequently indicate that having their own enterprise as a desirable career choice demonstrates that media coverage is not everything. Poles are also less often willing to attribute a high social status to entrepreneurs. While the downward trend in the perception of owning an enterprise as a desirable career choice may be interpreted as the effect of the economic development, the low social status of entrepreneurs in Poland is disturbing, because it ranks significantly below all categories of countries identified in the GEM and below the EU average. When we consider Poland in comparison with other Visegrád countries, we can assume that this state of affairs may be partially attributed to historical circumstances, which are understood as the suppression and deprecation of private initiative by the state in the era of authoritarian socialism. The indicators of entrepreneurs' social status in the Czech Republic and Slovakia are indeed even lower than in Poland (much lower in the case of the Czech Republic – 47%, and similar for Slovakia – 58.5%, with the indicator for Poland standing at 60%). Hungary, however, stands out with the indicator of 74%. While searching for historical reasons for this state of affairs, such a high value of the indicator may result from a relatively better economic situation of Hungary compared to other countries of the Communist Bloc in the 1960s and 1970s, i.e. after the Hungarian Revolution of 1956. The Hungarian economy at that time was characterised by a certain openness and even elements of a market approach, in particular, in agriculture and tourism.

In the search for reasons behind the low social status of Polish entrepreneurs, some guidance may be found in the social background of owners of enterprises established after 1989. In the mid-1990s, 40% of entrepreneurs were workers several years earlier. They were setting up their enterprises from scratch and did not inherit their fortunes or good social status from their parents, but they were building everything by themselves<sup>5)</sup>. People who previously belonged to the communist nomenclature formed another distinct group of entrepreneurs. This is confirmed by the results of research conducted by Professor Henryk Domański, according to which persons who in 1988 were managers in state-owned enterprises or held high positions in the party and government hierarchy, had a better chance to start up a business than others did<sup>6)</sup>. These examples paint a picture that may explain historical determinants of the low social status of entrepreneurs to a certain extent.

However, more recent studies show that the entrepreneurs in Poland still do not form a social class with a distinctive and characteristic value system. For example, the phenomenon of mergers of fortunes (i.e. marriages between entrepreneurs, which are popular in the West) is virtually non-existed in Poland. A very common model in Poland is the marriage where one spouse runs a business and the other has a full-time job elsewhere. This is a good, safe strategy which assumes that an enterprise is always more risky than having a full-time job, and thus the risk should be distributed not accumulated. However, when we look at this phenomenon from the point of view of socio-economic processes, it can be presumed that this hinders creation and consolidation of "entrepreneurial social class" and slows down the development processes of enterprises, which otherwise would have an easier access to knowledge and financial resources."

<sup>&</sup>lt;sup>5)</sup> Kolarska-Bobińska L., *Polscy przedsiębiorcy wobec integracji. Polska i polscy przedsiębiorcy w oczach mieszkańców "starej UE", in: Raport o stanie sektora małych i średnich przedsiębiorstw w latach 2007–2008*, PARP 2009.

<sup>&</sup>lt;sup>6</sup> Domański H., Na progu konwergencji: stratyfikacja społeczna w krajach Europy Środkowo-Wschodniej, IFiS PAN 1996.

<sup>&</sup>lt;sup>7)</sup> Por. Gardawski J., Sylwetki przedsiębiorców, in: Gardawski J. (ed.), *Rzemieślnicy i biznesmeni. Właściciele małych i średnich przedsiębiorstw prywatnych*, Warsaw 2013.

An interesting variable is "aiming at equalising the standard of living", which reaches the highest values in the group of efficiency-driven economies (66% in 2012 and 63% in 2013) and the lowest in the group of factor-driven economies (59% in 2012 and 57% in 2013). In Poland, its value is high – it reaches 70%. The comparison of this variable with the values of the Gini coefficient for individual European countries does not reveal any intuitive connection between them (low values of the Gini coefficient should be accompanied by high values of the variable concerning aiming at equalising the standard of living. A good example of this phenomenon is Slovenia where the lowest value of the indicator was recorded in 2012 (24%). At the same time, the respondents from Slovenia most often declared that, in their country, an equal standard of living for everyone is preferred (82%). In Sweden, where the second lowest value of the Gini index (25%) is recorded, only 56% of respondents agree with the opinion that Swedes aim at equalising the standard of living. Between 2002 and 2012, a slight but consistent increase in the Gini coefficient has been reported in both countries, which does not explain a relatively low percentage of Swedes who agree that people generally aim at equalising the standard of living. Similar trends have been reported in the indicators for the Netherlands and Luxembourg. In Poland, the Gini coefficient is at the level of the EU average. However, between 2005 and 2013, a consistent and relatively significant decrease in the value of this coefficient has been observed (from 36% in 2005 to less than 31% in 2013). This may have an impact on a rather high percentage of Poles (70%) who confirmed in the most recent GEM survey that in our country people prefer an equal standard of living for all.

The question of the impact of income inequality and its perception by the society on the level and the quality of entrepreneurship would require further analysis to investigate at least the changes that have been taking place in individual countries over the last several years in this regard, but this would go beyond the scope of this publication.

Table 3. Gini coefficient in selected European countries (%)

Country	2012	2013
EU average	30.6	-
Belgium	26.6	-
Croatia	30.5	-
Czech Republic	24.9	24.6
Estonia	32.5	32.9
Finland	25.9	-
France	30.5	-
Greece	34.3	_
Spain	35.0	33.7
Netherlands	25.4	-
Ireland	29.9	_
Lithuania	32.0	_
Luxembourg	28.0	-
Latvia	35.7	35.2
Germany	28.3	_
Norway	28.8	22.7
Poland	30.9	30.7
Portugal	34.5	-
Romania	33.2	-
Slovakia	25.3	24.2
Slovenia	23.7	25.4
Sweden	24.8	-
Hungary	26.9	28
UK	32.8	-
Italy	31.9	32.5

Source: Eurostat.

<sup>8)</sup> The question in the survey is as follows: "People prefer an equal standard of living for all" (possible answer: Yes/No).

<sup>&</sup>lt;sup>9)</sup> The Gini coefficient is a measure of income inequality. It varies between 0 and 1; the higher the value of the coefficient, the greater the inequality. The Gini coefficient can also be expressed as a percentage.

In conclusion, the presented data on entrepreneurial attitudes and perceptions among the adult population of Poles reveal several paradoxes of Polish entrepreneurship. While the rate of perceived opportunities in the market is relatively low, a surprisingly high number of Poles plan to establish a business. Other studies <sup>10)</sup> show that almost half of Poles would like to run their own enterprise, which is surprising, given the low social status of entrepreneurs. Finally, Poles assess their entrepreneurial capabilities relatively high, but their fear of failure in business is also very high.

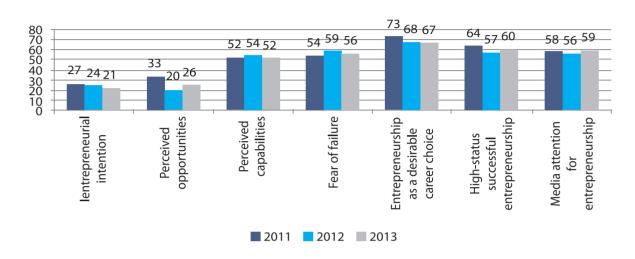


Diagram 1. Entrepreneurial attitudes and perceptions in Poland in the years 2011–2013 (%)

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

The presented most striking findings are interesting, although they certainly may be explained rationally, by means of multifactor analyses covering at least the areas such as: the education system, the legal system regulating the economic sphere, changes in the labour market, as well as social and mental aspects related to the history of the country and the processes of "inheriting" and acquisition of knowledge and experience by entrepreneurs and potential entrepreneurs.

## 2.2. Entrepreneurial Attitudes and Perception among women and men in 2013

Within three years of GEM surveys, in which Poland has participated, quite significant changes in terms of perceived opportunities by women and men have been observed. In the country where perceived opportunities rates are generally rather low, it is interesting that this rate was higher among women in the years 2012–2013. In 2013, such opportunities were perceived by 23% of respondents among men and 29% among women. Moreover, in all other EU countries except for Estonia and Latvia, it is men that perceive business opportunities more often than women do. It is also worth noting that in Poland the difference in favour of women is 6%, while in Estonia it is only 1% and in Latvia it is close to zero.

The rates recorded in 2013 differ quite substantially from those in 2012; however, in that year, opportunities were more often perceived by women (23% among women and 18% among men)<sup>11)</sup>. The data shows that, at least in the case of Poland, the variable for perceived opportunities is changing dynamically. In 2011, men perceived those opportunities more often than women did, and the rates for both groups were higher than in subsequent years (35.2% among men and 31% among women in 2011). If this difference in favour of women persists for another year or two, it will be an interesting case for further analysis.

<sup>&</sup>lt;sup>10)</sup> Cf. Wizerunek przedsiębiorców w Polsce, (study by TNS OBOP for PARP, 2009), Czarnik Sz., Turek K., *Aktywność zawodowa i wykształcenie Polaków*, Polska Agencja Rozwoju Przedsiębiorczości 2014, Czarnik Sz., Turek K., *Wykształcenie, praca, przedsiębiorczość Polaków*, Polska Agencja Rozwoju Przedsiębiorczości 2012, *Entrepreneurship in the UE and the beyond*, Flash Eurobarometer 354, European Commission 2012.

<sup>&</sup>lt;sup>11)</sup> See: Table 4. Entrepreneurial Attitudes and Perception among women and men, p. 17, in: Węcławska D., Zbierowski P., Tarnawa A., Bratnicki M., *Global Entrepreneurship Monitor Poland,* Polish Agency for Enterprise Development, 2013.

Table 4. Entrepreneurial attitudes of women and men in the European countries and in the USA in 2013 (%)

Country	Perceived opportunities – men	Perceived opportunities – women	Perceived capabilities – men	Perceived capabilities – women	Fear of failure – meni	Fear of failure – women
Factor-driven economies	63.2	58.4	72.7	64.6	30.2	31.5
Efficiency-driven economies	44.6	40.6	59.4	47.4	34.1	40.9
Innovation-driven economies	36.5	30.2	48.9	32.4	39.6	46.8
EU average	31.2	26.1	51.1	33.5	42.4	52.1
Belgium	35.4	27.4	44.3	23.2	46.4	55.2
Bosnia and Herzegovina	25.67	20.71	60.03	40.57	36.26	42.81
Croatia	19.8	15.5	56.9	37.8	41.8	50.2
Czech Republic	24.9	21.2	51.6	33.4	38.1	47.8
Estonia	45.5	46.6	46.0	34.3	43.0	52.4
Finland	44.1	43.5	39.1	27.4	33.7	48.7
France	25.7	20.1	40.9	25.6	41.3	49.2
Greece	14.4	12.7	55.0	37.1	67.7	70.4
Spain	18.1	13.9	53.4	43.3	43.7	51.8
Netherlands	37.8	27.3	54.3	30.4	37.1	45.5
Ireland	33.6	23.1	53.5	32.9	41.8	48.9
Lithuania	31.3	26.4	46.7	25.1	40.9	57.2
Luxembourg	49.3	41.2	52.6	33.8	46.6	52.7
Latvia	34.8	34.8	55.0	41.0	36.9	47.9
Macedonia	38.74	35.48	58.73	40.45	39.55	42.58
Germany	33.3	29.2	42.9	32.4	40.8	55.7
Norway	69.88	56.73	46.09	22.36	33.53	32.97
Poland	23.1	29.1	63.6	40.1	53.4	59.3
Portugal	26.1	14.6	57.7	40.2	44.3	51.9
Russia	19	17.42	30.47	26.05	36.35	44.33
Romania	30.8	26.9	56.9	34.8	39.1	52.8
Slovakia	18.0	14.3	61.8	40.3	35.5	53.5
Slovenia	20.1	11.6	58.8	43.8	35.8	48.5
Switzerland	43.7	39.09	56.23	32.9	28.02	43.08
Sweden	66.4	62.2	46.9	30.5	37.0	42.5
Turkey	40.94	36.03	60.23	44.03	31.3	35.14
USA	50	44.31	63.43	48.13	31.94	38.06
Hungary	20.4	17.4	48.9	26.4	42.5	53.1
UK	40.7	30.3	52.0	35.8	37.0	42.7
Italy	23.6	11.0	36.7	21.7	51.5	60.8

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

Women generally asses their knowledge and capabilities worse than do men. Moreover, the positive assessment of perceived capabilities among women decreases with the higher level of economic development (in innovation-driven economies, one in three woman perceives herself capable in this respect, while in efficiency-driven economies, this is true for two in three women). In Poland, two women in five positively assess their capabilities, while the similar opinion in this respect was expressed by three in five men. A similar result was recorded in 2012, except that, in 2013, the difference between men and women was even greater.

In the countries where the level of perceived capabilities among women is particularly low, it is also relatively lower among men. This is true for countries such as Belgium, Hungary, Italy, and Lithuania. Intuitively, it may be believed that a low level of perceived capabilities among women may be related to their low activity on the labour market. This seems true for Hungary and Italy, where the employment rate of women is among the lowest in Europe (Hungary - 53%, Italy - 47% compared to the EU average of

59%<sup>12</sup>. In Belgium, the employment rate of women is lower than the EU average as well, but the difference is not significant (57%). However, this claim is not true for Lithuania where the employment rate of women amounts to 63%. There are also countries where the high employment rate among women is accompanied by their low perceived capabilities, for example, in Sweden, Finland, and Germany. In this case, however, low perceived capabilities of both women and men may stem from a very high level of development of these economies. These three countries are among the leading European economies in terms of innovation, that is, the most competitive areas where it is relatively more difficult to locate a new competitive business.

Low perceived capabilities of women are accompanied by a greater fear of failure in business. In all analysed European countries, women more often express their concerns than do men. The greatest difference in declarations of both genders to the disadvantage of women is observed in Slovenia, Bulgaria, Slovakia, Lithuania, Latvia, and Finland. The highest percentage of women who are afraid of failure is reported in countries such as Greece, Italy, and Poland.

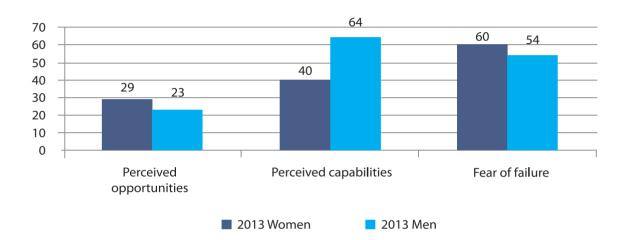


Diagram 2. Entrepreneurial attitudes among women and men in Poland in 2013 (%)

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

## 2.3. Level of entrepreneurship

Another area of research within the framework of the GEM concerns the data collected for individual levels of entrepreneurship, which include four the main stages of an functioning enterprise, i.e. from the commencement of activities aimed at starting up a business activity and the beginnings of the functioning of an enterprise (nascent), through new entrepreneurs (enterprises operating for 3 to 42 months), established entrepreneurs (operating on the market for over 3.5 years), to the discontinuation of business (enterprise closure or resignation from running a business, which remains on the market). The Total early-stage Entrepreneurial Activity (TEA) indicator, also calculated within GEM, comprises nascent and new entrepreneurs. The detailed methodology of this division is described on page 13 of this report, while the values of individual indicators in selected countries and compared to the average for individual categories of economies are presented in Tables 5 and 6.

The indicator of starting up new enterprises (nascent entrepreneurs) is the highest in factor-driven and efficiency-driven economies. In innovation-driven economies, activities aimed at setting up new business are reported half as often. This situation is reflected in the values of the indicator of business discontinuation (total discontinuation). In 2013, in factor-driven economies, one in eight enterprises discontinued its business, while in efficiency-driven economies 4% (i.e. one in 22 enterprises) and in innovation-driven economies – less than 3%.

<sup>12)</sup> Source: Eurostat, data for 2013.

Table 5. Level of entrepreneurship in the European countries and in the USA in 2013 (%)

Country	Nascent entrepreneurs	New entrepreneurs	TEA	Established enterprises
Factor-driven economies	9.4	12	21.1	13.3
Efficiency-driven economies	8.8	6.7	15.1	8
Innovation-driven economies	4.6	3.3	7.9	10.1
EU average	4.8	3.3	8.0	6.4
Belgium	3.1	1.9	4.9	5.9
Bosnia and Herzegovina	5.8	4.6	10.3	4.5
Croatia	6.3	2.0	8.3	3.3
Czech Republic	4.9	2.7	7.3	5.3
Estonia	8.8	4.5	13.1	5.0
Finland	2.8	2.7	5.3	6.7
France	2.7	1.8	4.6	4.1
Greece	3.3	2.3	5.5	12.6
Spain	3.1	2.2	5.2	8.4
Netherlands	4.7	4.8	9.3	8.7
Ireland	5.6	3.8	9.3	7.5
Lithuania	6.1	6.4	12.4	8.3
Luxembourg	6.0	2.8	8.7	2.4
Latvia	8.1	5.3	13.3	8.8
Macedonia	3.4	3.5	6.6	7.3
Germany	3.1	2.0	5.0	5.1
Norway	2.9	3.4	6.3	6.2
Poland	5.1	4.3	9.3	6.5
Portugal	4.2	4.2	8.3	7.7
Russia	3.1	2.8	5.8	3.4
Romania	6.2	4.2	10.1	5.4
Slovakia	6.1	3.6	9.5	5.4
Slovenia	3.6	2.9	6.5	5.7
Switzerland	4.6	3.7	8.2	10.0
Sweden	5.9	2.5	8.3	6.0
Turkey	5.5	4.7	10.0	5.7
USA	9.2	3.7	12.7	7.5
Hungary	6.0	3.8	9.7	7.2
UK	3.6	3.7	7.1	6.6
Italy	2.4	1.1	3.4	3.7

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

In the case of the variable representing discontinuation, two types of information are collected in GEM, namely, the share of entrepreneurs who completely discontinued their business and the share of entrepreneurs who discontinued their business activity remained on the market. In such terms (i.e. among enterprises whose owners discontinue their business activity altogether), in the factor-driven and in the efficiency-driven economies, approximately one in four enterprises remain on the market. The situation is the group of innovation-driven economies differs significantly for the better. In such countries two in three enterprises remain on the market.

Table 6. Level of entrepreneurship in the European countries and in the USA/Discontinuation in 2013 (%)

Country	Discontinuation with enterprise closure (1)	Discontinuation, enterprise remains on the market (2)	Total discontinuation 13)	
Factor-driven economies	9.2	3.2	12.5	
Efficiency-driven economies	3.3	1.3	4.6	
Innovation-driven economies	0.9	1.8	2.7	
EU average	2.0	0.9	2.9	
Belgium	1.0	0.9	1.9	
Bosnia and Herzegovina	3.7	2.5	6.2	
Croatia	2.8	1.7	4.5	
Czech Republic	2.2	1.1	3.4	
Estonia	1.3	0.8	2.1	
Finland	1.3	0.8	2.0	
France	1.3	0.6	1.9	
Greece	4.1	1.0	5.0	
Spain	1.4	0.5	1.9	
Netherlands	1.6	0.5	2.1	
Ireland	1.9	0.6	2.5	
Lithuania	1.8	1.7	3.5	
Luxembourg	2.0	0.8	2.8	
Latvia	1.8	1.7	3.5	
Macedonia	2.5	0.8	3.3	
Germany	1.0	0.5	1.5	
Norway	1.2	0.5	1.6	
Poland	2.6	1.4	4.0	
Portugal	1.7	1.1	2.8	
Russia	1.4	0.2	1.6	
Romania	3.4	0.8	4.3	
Slovakia	3.4	2.1	5.5	
Slovenia	1.9	0.7	2.6	
Switzerland	1.4	1.0	2.3	
Sweden	1.7	0.6	2.4	
Turkey	4.0	2.4	6.4	
USA	3.7	2.5	6.2	
Hungary	2.5	0.5	2.9	
UK	1.4	0.5	1.9	
Italy	1.4	0.5	1.9	

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

Assuming that the risk of enterprise closure is the largest in the first years of an enterprise's operation, it is possible to estimate in which countries the risk is the highest by measuring the relation of the percentage of closed enterprise (column 1 in Table 6) to the TEA indicator. As expected, the highest value of this indicator is the most satisfactory in the group of innovation-driven economies. In the group of factor-driven economies, the share of discontinued businesses in relation to the share of nascent and new entrepreneurs (i.e. TEA) is 44%, in efficiency-driven economies it is 22%, and in innovation-driven economies it is 11%. To give a more illustrative picture, this means that, in the first group of countries, two enterprises in five are shut down every year, in efficiency-driven economies, one in five shut down every year, and in innovation-driven economies – one in ten.

However, it should be remembered that the lower the level of economic development, the more attempts of entrepreneurial activity, which are partly forced due to the lack of adequate offers for employees in the market. The mere fact of increased

<sup>&</sup>lt;sup>13)</sup> Slight differences of ca. 0.1 in the total discontinuation values in relation to its components, i.e. the values from columns 1 and 2 are due to rounding to the first decimal place, if calculations were made to two decimal places.

intensity of attempts to start up a business should be considered positive and desirable for the further development of the economies of individual countries.

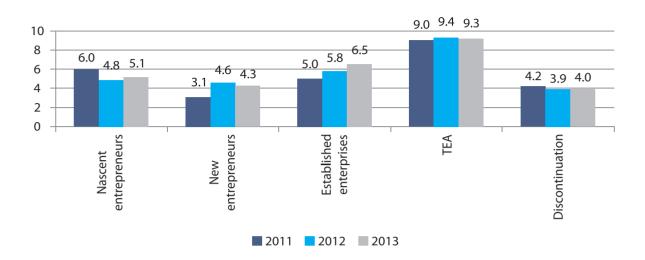


Diagram 3. Level of entrepreneurship in Poland in the years 2011–2013 (%)

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

All indicators illustrating entrepreneurship in its development phase (nascent entrepreneurs, new entrepreneurs, and TEA) achieve the highest values in the group of the least developed countries. Interestingly, even in the case of established enterprises, their share is higher than in innovation-driven and efficiency-driven economies. Poland is between the average for the group of efficiency-driven economies and the average for countries with innovation-driven economies. In the case of the TEA indicator, Poland is definitely closer to innovation-driven economies (9.3% for Poland and 7.9% for innovation-driven economies). Compared to 2012, the rate of established enterprises in Poland has increased from 5.8% to 6.5%, which places Poland close to the EU average and the average for innovation-driven economies, but still below the average for efficiency-driven economies (8%). In the case of business discontinuation, Poland is among the last five European countries with the highest indicators in this regard (Poland – 4%, Bulgaria – 4.3%, Croatia – 4.5%, Greece – 5%, Slovakia – 5.5%).

## 2.4. Entrepreneurship among women and men

The differences between the percentage of women and men starting up business activity are increasing to the disadvantage of women along with the economic development. However, this statement should be considered in general terms, since the differences between individual countries are significant, even within one group of countries. In factor-driven economies, Zambia is an example of the country where the share of women and men in TEA is almost identical (39% for men and 41% for women), although it is twice the average for this group of countries, while in Iran, men's activity corresponds to the average for this group of countries (18%) and women's activity is three times lower (6.5%). In the two remaining groups of countries, there are no such extreme cases and the groups are more numerous, which results in the distribution of the weight of estimation error. However, even among the efficiency-driven economies, there are countries where the entrepreneurship of women almost equals that of men (this happens in particular in the countries of Latin American and Asia), while in other countries, it is two times lower (e.g. in Poland, Lithuania, or Croatia).

Table 7. Level of entrepreneurship among women and men in the European countries and in the USA in 2013 (%)

Country	TEA men	TEA women	Established enterprises – men	Established enterprises – women
Factor-driven economies	22.3	19.8	14.6	12.1
Efficiency-driven economies	17.7	12.6	14.6	12.1
Innovation-driven economies	10	5.4	8.8	3.8
EU average	10.4	5.6	8.8	3.9
Belgium	6.4	3.4	8.3	3.5

#### cont. table 7.

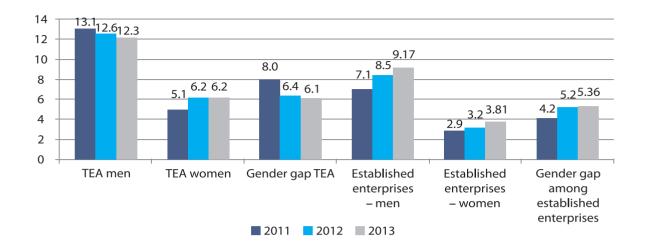
Bosnia and Herzegovina	13.5	7.1	5.7	3.3
Croatia	11.5	5.1	3.8	2.7
Czech Republic	10.5	4.1	7.1	3.4
Estonia	17.0	9.4	7.4	2.8
Finland	6.5	4.0	9.6	3.6
France	6.1	3.1	5.8	2.4
Greece	7.8	3.2	18.4	6.8
Spain	6.2	4.2	10.4	6.4
Netherlands	11.7	6.8	11.8	5.6
Ireland	12.2	6.4	11.4	3.6
Lithuania	17.5	7.8	12.1	4.9
Luxembourg	11.6	5.6	2.8	2.0
Latvia	16.6	10.1	12.2	5.6
Macedonia	9.4	3.8	9.6	5.0
Germany	6.0	3.9	6.1	4.0
Norway	8.9	3.6	9.1	3.2
Poland	12.4	6.2	9.2	3.8
Portugal	10.8	5.8	10.5	5.1
Russia	6.2	5.4	4.6	2.3
Romania	12.4	7.9	6.8	3.9
Slovakia	11.7	7.3	8.1	2.7
Slovenia	8.8	4.0	8.2	3.0
Switzerland	8.3	8.0	12.3	7.6
Sweden	10.2	6.2	8.0	4.0
Turkey	13.5	6.3	8.3	3.0
USA	15.1	10.4	8.5	6.6
Hungary	12.4	7.0	9.6	4.9
UK	8.8	5.5	9.1	4.0
Italy	4.8	2.1	6.1	1.3

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

For the EU countries, on average, women start up a business two times less frequently than men do. Poland does not differ from this average. In case of the three countries, i.e. the Czech Republic, Italy and Greece, the differences to the disadvantage of women are slightly bigger than the EU average – 1.9 (in the Czech Republic there are 2.6 men establishing an enterprise per one woman, in Greece – 2.4, in Italy – 2.3). Countries where women relatively more often establish their own business activity are Germany, Spain (1.5 men per one woman), Latvia and the United Kingdom (1.6 men per one woman). It is worth noting that, in the previous year (2012), Latvia was among the countries with the largest difference between the level of entrepreneurship of women and men for the benefit of the latter (in 2012 there were 2.3 enterprises run by men per one run by woman). In the last year, due to a decrease of men's activity and an increase of women's activity in this country, the situation changed quite significantly, at least in terms of statistics. However, in this case, it is difficult to talk about an emerging trend when comparing such short series of data.

Compared with data from 2012, the gender gap in Poland measured as a difference between TEA/established enterprises of men and women remains stable (6.1% for TEA and 5.4% for established entrepreneurs). The negative differences, in comparison to 2012, are close to the statistical error. However, both indicators are higher than the EU average (by 4.8% for TEA and 4.9% for established enterprises).

Diagram 4. Level of entrepreneurship among women and men in Poland in the years 2011–2013 (%)



Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

## 2.5. Motivations to start a business activity

Why do people start business activity? Research carried out on entrepreneurs operating in Poland shows that most frequently they want to take advantage of favourable circumstances, have no other employment opportunities, want to achieve independence and autonomy in deciding about their own fate, or have an opportunity for professional development and possibility to choose the form of their work, and they need to improve their financial situation<sup>14</sup>).

The recent data, also from the international perspective, are provided by the GEM survey which includes the following <sup>15</sup>: mixed motivations, which is understood as recognising the opportunity to start a business and the lack of job opportunities or as having a job while searching for better opportunities; transient motivations, which is the need and desire to maintain the current standard of living; extreme motivations, which means aiming at using an opportunity linked with aiming at improving the standard of living through income or independence growth; and, necessity-driven entrepreneurship, which is undertaken in the absence of any possibility of finding the desired employment.

Based on the GEM data, since 2011, the extreme motivations have been dominant in Poland; therefore, further analysis will focus on themes such as the use of opportunity and necessity-driven entrepreneurship. The persons following the first type of motivation are adults who explicitly declare that their motivation to start a business is the wish to use perceived opportunity, understood as gaining independence or a personal income growth, contrary to the motivation consisting in maintaining the current level of income. The second category includes adults who declare that they start up a business, because they do not see an alternative in the form of finding employment on the labour market.

Table 8 presents the percentage of people included into total early-stage entrepreneurial activity (TEA) who start up a business due to specific motivations. As you can see, most of the enterprises in Poland are established out of necessity and not because of perceived development opportunities. These results distinguish Poland from other European countries, especially the EU. As many as 47.4% of early-stage enterprises (TEA) are established out of necessity (the 1st place in the EU, Poland is followed by Slovakia with 40.2%; the EU average is lower by almost a half and slightly exceeds 24%). This result is also more than twice as high as the average for innovation-driven economies, where slightly over 18% of enterprises are established out of necessity, and half-higher than the average for efficiency-driven economies (28.5%).

When it comes to perception of the opportunity related to improvement in the standard of living, with the result of 32.7% of TEA, Poland is fourth among the countries with the lowest percentage of optimistic entrepreneurs. The EU average is higher by 14%, not to mention the average for innovation-driven economies to which, after all, we aspire (53.7%, by 21% higher than in Poland). In the Czech Republic, the rate of opportunity-driven enterprises is 60.3%, in the Netherlands 67% and in Germany 55%. Even in Greece, which is struggling with economic and financial problems, it is higher than in Poland – 35.8%.

The relation of the percentage of opportunity-driven enterprises to the percentage of necessity-driven enterprises is 0.7 in Poland,

<sup>&</sup>lt;sup>14)</sup> Balcerzak-Paradowska B., Bednarski M., Głogosz D., Kusztelak P., Ruzik-Sierdzińska A., Miroslaw J. Women Entrepreneurship in Poland, PARP 2011.

 $<sup>^{15}</sup>$  Until 2010 the GEM model examined this issue in the category of opportunity-driven entrepreneurship and necessity-driven entrepreneurship.

which means that out of 10 entities, whose owners established them because of the lack of an alternative to find employment, only 7 enterprises are established because of perceived opportunities in the market. Unfortunately, this result gives Poland the last but third place (before Bosnia and Herzegovina and Macedonia with the results of approx. 0.37) among 30 European countries involved in GEM survey in 2013 and the USA. Poland is preceded by Croatia with the result of 0.8, and Italy and Romania, where for one necessity-driven entrepreneur there is almost one opportunity-driven entrepreneur who wants to improve his/her standard of living. The leader of the ranking is Norway with the result of 15.2, followed by Luxembourg – with a score of 10, and Switzerland –with a score of almost 9. The EU average is 1.8 and the average for the innovation-driven economies is 2.9, which means that there are almost three opportunity-driven entrepreneurs per one necessity-driven entrepreneur.

Tabela 8. Level of opportunity- and necessity-driven entrepreneurship in the European countries (% TEA)

Country	Opportunity related to improving the standard of living (% TEA)	Necessity (% TEA)		
ctor-driven economies 45.95		30.27		
Efficiency-driven economies	42.26	28.47		
Innovation-driven economies	53.66	18.27		
EU average	46.97	22.71		
Belgium	43.89	28.98		
Bosnia and Herzegovina	22.04	58.95		
Croatia	29.84	37.4		
Czech Republic	60.26	22.72		
Estonia	50.07	14.82		
Finland	65.99	17.93		
France	60.87	15.66		
Greece	35.83	23.46		
Spain	33.18	29.24		
Netherlands	67.12	7.98		
Ireland	43.85	18.02		
Lithuania	55.17	23.3		
Luxembourg	56.59	5.63		
Latvia	52.69	21.21		
Macedonia	22.95	60.98		
Germany	55.7	18.71		
Norway	60.8	4		
Poland	32.7	47.4		
Portugal	50.65	21.45		
Russia	41.99	35.39		
Romania	31.59	31.64		
Slovakia	40.17	40.17		
Slovenia	53.42	24.06		
Switzerland	67.19	7.49		
Sweden	58.43	9.69		
Turkey	53.62	30.24		
USA	57.43	21.24		
Hungary	38.67	28		
UK	45.18	16.13		
Italy	18.38	18.7		

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

Among Polish early-stage opportunity-driven entrepreneurs, the largest group (over 48%) are those who wanted to become independent. The entrepreneurs motivated by the need to increase income also constitute a large group (40%), with only one in 10 entrepreneurs starting their business to maintain income at the current level. As shown on Diagram 5, in Poland, more often than in the EU, enterprises are established due to the opportunity that is the wish to obtain a higher income. In comparison with

the EU, slightly more entrepreneurs in Poland are driven by the need for independence, while the motivation consisting in the wish to take over the family business, which concerns over 7% of EU opportunity-driven enterprises, has not been observed in Poland at all.

32.69 47.3 EU 12.75 7.26 40.73 48.19 Poland 11.08 O 0% 20% 40% 60% 80% 100% Income increase Maintenance of income Independence Other (acquisition of family business)

Diagram 5. Motivations for creation of early-stage (TEA) opportunity-driven enterprises (%)

Source: The authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

Let us take a look at motivations of the youngest entrepreneurs in Poland (nascent entrepreneurs – operating up to 3 months). It turns out that almost the same number of them were necessity-driven and opportunity-driven (2.51% vs. 2.46%). When it comes to a positive motivation, such as perceived business opportunities, Poland ranks rather poorly (last but 7th place compared to the EU) compared with other European or EU countries and the USA, although Germany or Greece obtained a similar result. Estonians and Latvians, as well as Americans, are much more optimistic; and, in their countries, the share of nascent entrepreneurs who start up a business due to perceived opportunities is almost three times higher than in Poland. The situation of the youngest Polish entrepreneurs is particularly unfavourable, if one takes into account the fact that the percentage of those who established a necessity-driven enterprise is the second highest result in Europe and in the USA (after Bosnia and Herzegovina – 3.3%) and one of the four with a value greater than 2% in this ranking (the result of 16 out of 23 European countries is lower than 1% and the EU average is 1.16%).

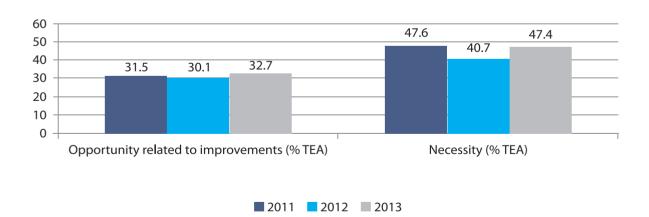


Diagram 6. Level of opportunity- and necessity-driven entrepreneurship in Poland in 2011–2013 (%)

 $Source: The \ authors' own \ elaboration \ based \ on \ Global \ Entrepreneurship \ Monitor \ 2011, 2012 \ and \ 2013 \ data.$ 

The changes that were observed between 2011 and 2013 in terms of the motivation of entrepreneurship in Poland are insignificant (Diagram 6). The percentage of early-stage enterprises which were established after the drop in 2012 (by 7 p.p. every year) because of necessity, returned to the level of 2011. Proportion of entrepreneurial activity undertaken in order to seize the perceived opportunity increased in 2013 compared with 2011 by 1 p.p., and by 2.6 p.p. every year. The motivation structure

remains unfavourable, which is not irrelevant for the development of new enterprises, in particular their plans to increase the level of employment or investments, not to mention innovative investments.

#### 2.6. Motivations of women and men

As can be seen in table below, the motivations to start a business activity vary depending on gender. Significantly, because almost twice as many men as women running a business both in the EU countries, as well as in countries with efficiency-driven economies, decided to establish their own business due to perceived opportunities. In these countries more men than women become entrepreneurs due to the necessity or lack of alternatives for finding employment in the labour market – in the case of the EU, the difference between the sexes is similar to the difference in the case of seizing the opportunity, and when it comes to efficiency-driven economies the difference is very small. It is also worth noting a quite optimistic fact that generally almost three times more men and women become entrepreneurs due to a desire to seize appearing opportunity than due to necessity. For example, in the EU countries in the population of enterprises classified as TEA, the share of entrepreneurs who decided to establish their own business due to motivation in form of opportunity vs. necessity amounts respectively to: 7.19% vs. 2.43% for men and 3.81% vs. 1.33% for women.

In Europe, the biggest difference in motivations of women and men understood as perceived opportunities occurs in Lithuania, Estonia and Hungary (approx. 6 – 8%). When it comes to starting up a business due to the lack of other alternatives in the labour market, the biggest difference between entrepreneurs in terms of gender is recorded in Slovakia and in Germany (approx. 3%).

Table 9. Motivations of women and men in European countries and in the USA (%)

Country	Men – opportunity	Women – opportunity	Men – necessity	Women – necessity
Factor-driven economies	15.60	12.54	6.32	6.92
Efficiency-driven economies	13.02	8.17	4.16	3.97
Innovation-driven economies	7.96	4.41	1.74	0.97
EU average	7.19	3.81	2.43	1.33
Belgium	4.05	1.86	1.78	1.07
Bosnia and Herzegovina	6.14	2.18	7.21	4.94
Croatia	7.25	2.78	3.94	2.26
Czech Republic	8.15	2.9	2.22	1.1
Estonia	13.86	7.04	2.25	1.65
Finland	4.55	3.11	1.39	0.5
France	5	2.33	1	0.43
Greece	6.09	2.19	1.73	0.86
Spain	4.28	2.66	1.69	1.36
Netherlands	10.43	5.66	0.85	0.63
Ireland	9.62	4.99	2.28	1.06
Lithuania	13.44	5.55	3.71	2.15
Luxembourg	9.31	4.02	0.57	0.4
Latvia	12.76	7.83	3.48	2.17
Macedonia	3.38	1.2	5.73	2.32
Germany	4.72	2.88	1.15	0.71
Norway	8.18	3.11	0.5	0
Poland	6.19	2.86	5.65	3.16
Portugal	8.32	4.19	2.27	1.3
Russia	3.92	3.16	2.28	1.82
Romania	8.26	5.32	4.04	2.38
Slovakia	6.08	5.12	5.57	2.08
Slovenia	6.58	2.62	2.06	1.02
Switzerland	7.08	7.14	0.86	0.36
Sweden	8.42	5.16	0.97	0.62
Turkey	9.12	4.18	4.04	1.96

#### cont. table 9.

USA	10.96	7.7	3.55	1.87
Hungary	9.78	3.77	2.43	2.98
UK	7.18	4.26	1.21	1.1
Italy	3.87	1.28	0.75	0.53

Source: the authors' own elaboration based on *Global Entrepreneurship Monitor 2013* data. The data relate to the women and men aged between 18 and 64 years old and to those who belong to the TEA, which means that they run business for less than 3.5 years. Contrary to the previously presented results, the table shows the percentage of adult women or men who are included in TEA and start their business due to specific motivation.

In Poland, as well as in the EU, twice as many men as women become entrepreneurs both because of the desire to seize the opportunity and necessity (6.2% and 2.9%, and 5.7% and 3.2% respectively). In addition, worryingly, more enterprises (by 3.3% for men and 1% for women) are established in Poland out of necessity than in the EU on average. In the case of motivation in the form of the perception of opportunity, the situation is reversed – the share of opportunity-driven enterprises in the population of enterprises operating up to 3.5 years is lower in Poland than the EU average: in the case of men by 3.8% and, in the case of women by 2.6%. In Poland opportunity-driven entrepreneurship involves 2.9% of women and 6.2% of men, and the necessity-driven entrepreneurship involves 3.2% of women and 5.7% of men. This means that, there are still slightly more women than men who decide to start up their own business due to necessity or lack of alternative in the form of finding employment in the labour market. This is reflected in the persistent, although declining from 2011, gender gap in terms of the percentage of the TEA enterprises (operating up to 3.5 years) – 6.1% in 2013, 6.4% in 2012 and 8% in 2011.

## 2.7. Business activity by sector

The GEM model identifies four categories of sectors: extraction, production (processing), business-to-business services and business-to-customer services.

Sectoral structure of early-stage enterprises (TEA) varies depending on the level of economic development in a given country (Table 10). In underdeveloped countries (based on the factors of production) the smallest number of enterprises operating up to 3.5 years operate in the sectors of business-to-business services and extraction (6% and 8% respectively), and most of the enterprises (more than 68%) operate in the business-to-customer services. The sector of industrial production involves slightly over 17% of entrepreneurs. On the other hand, in the efficiency-driven and innovation-driven economies the services prevail, including business-to-business services, which are provided by respectively two and four times more entrepreneurs than in the least developed countries. The production sector is also more numerous – 27% of entrepreneurs operate in this sector in efficiency-driven economies, and –21% in the innovation-driven economies. Similarly to the countries based on factors of production, the least numerous is extraction sector – only 4% of entrepreneurs operate in this sector.

In the European Union, many early-stage entrepreneurs offer business-to-client services (42% of the TEA). Also a lot of entrepreneurs (27.2%) provide business-to-business services. 24% of enterprises are involved in production in EU, and only 6.8% of all entities that belong to TEA are involved in extraction.

Sectoral structure of Polish early-stage enterprises is somewhat different. In Poland the predominant sector is the sector of production, in which operate more than 45% of enterprises (21% more compared with the EU average). Sectors of services, considered to be necessary to ensure appropriate economic growth, are the areas of activity for fewer domestic enterprises than in the EU. This concerns in particular the business-to-business services which are provided in Poland by 14.9% of enterprises belonging to TEA (approximately 12% less than in the EU). Business-to-customer services are provided in Poland by one in three entrepreneurs (34.4% of TEA, approximately 7.6% less than in the EU). In the extraction sector in Poland the percentage of early-stage entrepreneurs amounts to 5.3% – this figure is close to the EU average.

Table 10. Early-stage entrepreneurship (TEA) by individual economy sectors in the European countries and in the USA (%)

Country	Extraction	Production	B2B services	B2C services
Factor-driven economies	8.00	17.11	6.10	68.79
Efficiency-driven economies	8.03	26.99	12.57	52.41
Innovation-driven economies	4.05	20.91	27.98	47.06
EU average	6.80	24.00	27.18	42.02
Belgium	3.49	19.34	28.35	48.83
Bosnia and Herzegovina	24.42	30.79	9.72	35.07

#### cont. table 10.

Croatia	13.27	22.58	22.3	41.86
Czech Republic	2.66	27.78	28.2	41.36
Estonia	6.83	31.83	22.18	39.16
Finland	10.46	24.01	26.09	39.45
France	7.02	17.71	30.1	45.18
Greece	3.35	16.57	27.04	53.03
Spain	3.51	14.95	27.94	53.59
Netherlands	5.3	19.46	32.13	43.11
Ireland	2.38	22.1	20.5	55.03
Lithuania	7.67	33.49	24.21	34.63
Luxembourg	1.7	16.37	38.42	43.51
Latvia	12.13	29.98	23.11	34.78
Macedonia	13.84	41.5	12.04	32.62
Germany	0.05	15.87	30.1	53.97
Norway	8.33	25.83	35.83	30
Poland	5.33	45.32	14.94	34.41
Portugal	10.05	17.53	28.02	44.4
Russia	5.28	32.6	12.07	50.05
Romania	21.17	21.99	17.78	39.06
Slovakia	5.48	33.8	24.46	36.25
Slovenia	3.39	29.66	36.93	30.01
Switzerland	3.23	14.42	30.96	51.39
Sweden	4.85	16.31	40.36	38.48
Turkey	4.04	33.33	20.03	42.6
USA	4.03	16.5	37.19	42.28
Hungary	13.19	26.84	21.53	38.44
UK	0.34	18.51	35.82	45.34
Italy	12.83	30.1	24.55	32.52

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

The European countries with a significant role of extraction include Bosnia (24.4% TEA) and Romania (21.2%). In Germany or the UK less than 0.5% of enterprises are involved in extraction. Poland with a percentage of 5.3% enterprises in the extraction sector is at the 12th place in the EU.16

Services for individual clients are offered on average by one in two companies operating in 11 out of 30 analysed European countries and the United States. The leaders when it comes to the size of this sector are: Ireland (55% TEA), Germany (54%), Spain (53.6%) and Greece (53%). Poland with 34.4% of enterprises in the sector of services for individual clients is at the 21st place in the EU, before Slovenia (30%) and Italy (32.5%). It is, however, at the last place among the EU countries in terms of scale of the sector of services for business (14.9%). The next country, i.e. Romania, has almost 18% of enterprises in this sector. In the following countries, i.e. Ireland and Turkey (non-EU country), one in five entities operating for 3.5 years provides services for business. In Sweden, which is the first on the list, such services are provided by 40.4% of companies.

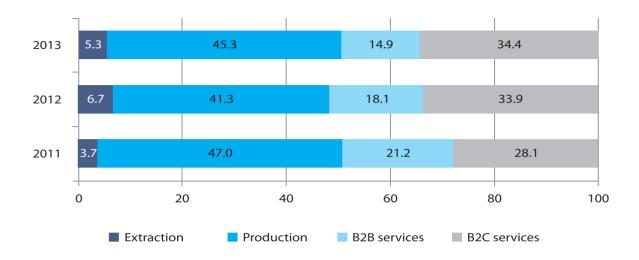
As mentioned above, the dominant sector in Poland is the production (manufacturing) sector with as many as 45.3% of enterprises operating in this area, which gives Poland the first place not only in the EU but also among all European countries and the USA covered by the GEM survey in 2013. In Macedonia, which comes second in the ranking, 41.5% of enterprises operate in the production sector, while in Slovakia, which is next, the figure is 33.8%. It's worth pointing out that Poland and Macedonia are the only European countries where the production sector is dominant when it comes to early-stage entrepreneurship. In such countries as Switzerland, Spain or Germany only approx. 14 – 15% of enterprises are involved in production.

In Poland, in the years 2011–2013, the share of the sector of services for individual customers increased significantly (by 6.3 p.p.) in the sectoral structure of enterprises classified as TEA, while the share of the sector of services for business declined (also by 6.3

<sup>16)</sup> The GEM data for 2013 are available for 23 EU countries.

p.p.). When it comes to production, its share decreased (by 1.7 p.p.) over the three-year period, but the changes went in different directions – in 2012 production recorded a sharp decline (by 5.7 p.p.), while in 2013 its share grew again (by 4 p.p.).

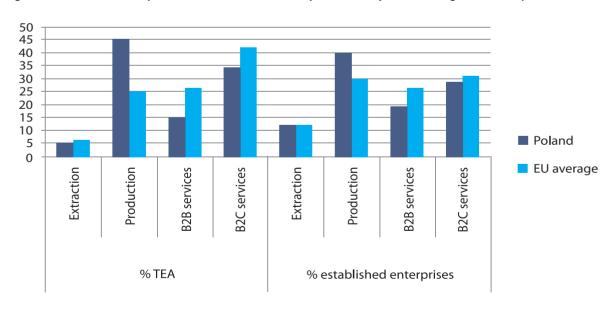
Diagram 7. TEA by sectors, data for Poland (%)



Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

Changes in the sectoral structure of enterprises classified as TEA may be explained by alternating business and structural cycles. In the case of production, the decline in 2012 could be the result of the significant weakening of the economic situation demonstrated, among others, by a marked slowdown in the industrial production growth to 0.5% annually compared to a growth of 7.5% recorded in 2011. The following increase in the share of production could result from an improvement of the condition of industry in 2013 (when the growth of industrial production amounted to 2.1% a year). The decline in the share of services for business may be explained by the economic downturn resulting in the implementation of cost restructuring programmes by enterprises and the resulting reduced demand for services of enterprises from the B2B sector. At the same time, the gradual increase in the share of enterprises from the B2C sector is most probably the effect of the gradual convergence of the share of this sector towards the higher shares recorded on average in the EU, with the relatively more stable situation in terms of consumer demand.

Diagram 8. Structure of enterprises in Poland and in the European Union by sector and age of an enterprise in 2013 (%)



Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

However, it should be noted that the sectoral structure of the Polish enterprises changes with the age of the company. The analysis of established enterprises, i.e. those operating on the market for over 3.5 years (EB) reveals that although production remains the dominant sector among those companies in Poland (39.8%), its share is lower than in the case of younger companies and, at the same time, closer to the EU average (29.9%). The share of service sector is also different – the share of services for business is higher than for TEA (19.3%, while in the EU – 25.5%) and lower, and at the same time closer to the EU average, in the case of services for individual customers (28.6%, while in the EU – 31.2%) It is an interesting result that shows, on the one hand, a rather bold attitude of young entrepreneurs, who often opt for activities related to industrial production which usually requires higher financial outlays. On the other hand, the decline in the percentage of established companies operating in this area points to a probable failure of some entrepreneurs. The increase in the percentage of companies offering services for business, which grows by one third along with the age of enterprises, is most likely the evidence for development of relevant skills and qualifications and for acquisition of the relevant contacts by younger enterprises which allow them to provide those more advanced services as already established companies.

## 2.8. Growth aspirations

GEM allows to assess the growth aspirations of early-stage enterprises, understood as the declared creation of new jobs or an increase in employment, in individual countries. Table 11 presents the data on aspirations of entrepreneurs operating for up to 3.5 years with respect to two variables, expressed by the *percentage of enterprises with medium aspirations* — declared wish to create at least 5 new jobs over the next five years and the *percentage of enterprises with high aspirations* — declared creation of at least 10 new jobs with the employment growth by at least 50% over the next 5 years.

It is evident that in all countries analysed under the GEM project, regardless of their level of economic development, there are more entrepreneurs with medium growth aspirations than those with bolder company development plans based on employment increase. On the other hand, along with the economic development the percentage of entrepreneurs who have high and medium growth aspirations, since in the factor-driven economies, 16.8% of enterprises plan to create at least 5 new jobs in the next 5 years, while 9.4% of entrepreneurs plan to create at least 10 new jobs and increase employment by at least 50%,— while in the innovation-driven economies the figures are over 1/3 higher and amount to 25.6% and 16.7%, respectively.

Tabela 11. Growth aspirations of new enterprises in Europe and the USA (%)

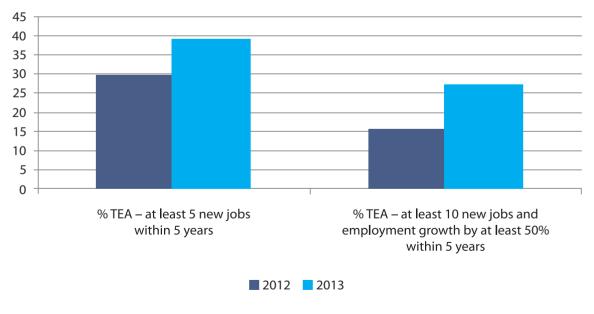
Country	%TEA – at least 5 new jobs within 5 years	%TEA – at least 10 new jobs and employment growth by at least 50% within 5 years
Factor-driven economies	16.82	9.38
Efficiency-driven economies	25.86	16.15
Innovation-driven economies	25.59	16.67
EU average	26.08	17.59
Belgium	21.23	15.82
Bosnia and Herzegovina	35.26	19.98
Croatia	30.66	22.67
Czech Republic	27.96	19.26
Estonia	26.72	15.29
Finland	20.79	12.23
France	21.26	15.88
Greece	8.1	4.83
Spain	14.95	8.61
Netherlands	15.03	8.5
Ireland	34.85	21.92
Lithuania	35.55	23.58
Luxembourg	19.63	11.42
Latvia	42.37	32.19
Macedonia	31.09	19.21
Germany	22.26	16.44

cont. table 11.

Norway	19.2	9.6
Poland	39.05	27.09
Portugal	27.1	16.01
Russia	26.53	18.86
Romania	43.79	33.05
Slovakia	29.4	21.07
Slovenia	35.25	22.73
Switzerland	16	9.19
Sweden	13.99	10.52
Turkey	58.91	44.9
USA	30.37	23.27
Hungary	26.77	18.9
UK	23.61	16.42
Italy	12.19	6.71

The GEM shows that in Poland entrepreneurs belonging to TEA category have rather high growth aspirations – 39% of them declare the creation of at least 5 jobs in the next five years and 27% plan to create 10 jobs and increase employment by at least a half within that time. Those results place the Polish entrepreneurs at the 3rd place among the EU countries. The higher positions belong to entrepreneurs from Romania and Latvia where growth aspirations of approx. 43% of enterprises are at the medium level and of one in three companies at the high level. The countries with the lowest growth potential for enterprises include Greece, Italy, the Netherlands and Spain. The situation is particularly unfavourable in the case of Greece, where only 8% of entrepreneurs plan to create at least 5 jobs in the next five years, and only 4.8% of enterprises have more ambitious plans. The situation is somewhat better in the other three countries, since the percentage of enterprises with growth aspirations at a medium level is considerably higher in those countries than in Greece (between 12% and 15%), and there are more entrepreneurs with high aspirations (between 6.7% and 8.6%). Enterprises in Turkey have the most ambitious growth plans with almost three out of five early-stage companies (58.9%) declare the creation of at least 5 jobs in the next five years, and 45% the creation of at least 10 new jobs with the employment growth of at least 50% within that period.

Diagram 9. Growth aspirations of new enterprises in Poland in the years 2012–2013



Source: the authors' own elaboration on the basis of Global Entrepreneurship Monitor 2012 and 2013 data.

As mentioned in the last year's GEM Report<sup>17</sup>, both growth variables are closely interrelated, although the degree of this relation varies depending from country to country. However, it is worth taking a look at the differences between the percentage of entrepreneurs with growth aspirations at a medium and high level in individual countries. The biggest difference between these two groups of enterprises was found in Bosnia and Herzegovina, where one in three (over 35%) entrepreneurs operating up to 3.5 years declares the creation of at least 5 jobs in the next five years, while one in five declares — at least 10 jobs with the employment growth of at least 50% within that period. In countries such as Greece (although this case should be treated rather like an isolated one due to factors related to the economic situation of this country), Sweden, France, Belgium, Italy and Germany, the difference between the percentage of entrepreneurs who declare the creation of at least 5 and at least 10 jobs is insignificant (3 to 5%). In Poland, the situation is similar to that in Bosnia and Herzegovina and such countries as Turkey, Ireland, Slovenia and Lithuania, where the difference between the percentage of enterprises with growth aspirations at a medium level and those with high growth aspirations fluctuates around 12%. It should be emphasized that compared to 2012 the difference decreased by 2 p.p., primarily due to an increase in the percentage of enterprises with high aspirations (percentage of such enterprises among early-stage enterprises grew between 2012 and 2013 by 74%, while the percentage of companies with aspirations at a medium level increased by 31%).

These figures demonstrate the optimistic outlook of Polish enterprises and give hope for maintaining and strengthening the positive trend, which was recorded both in this Report and in the statistical data presented in the *Report on the condition of the small and medium-sized enterprise sector*<sup>18)</sup>, which point to positive changes in the structure of the entities conducting business activity in Poland. According to the data, the share of small and established (operating for over 3.5 years) enterprises is increasing which reflects the ongoing convergence with the more economically developed countries, where such entities dominate the enterprise structure.

# 2.9. Growth aspirations of women and men

We will now take a look at growth aspirations of entrepreneurs in terms of their gender. The analysis will use several variables available in GEM, i.e. creation of any jobs, declared number of new jobs within 5 years and declared percentage employment growth within 5 years, as well as declared creation of more than 5 jobs in the next 5 years, creation of more than 19 jobs within that period and the creation of more than 10 jobs accompanied by the employment growth of over 50%.

Table 12 shows that men running early-stage enterprises (up to 3.5 years) usually have growth aspirations than women. The creation of any jobs was declared by eight out of ten women and almost nine out of ten men. In terms of numbers, women declare the creation of less than seven jobs in the next five years, while men plan to create on average approx. 18 new jobs. This means that women expect that their enterprise will grow 13 times while men -21 times in the next 5 years in terms of employment. Men are ahead of women also in terms of the most ambitious growth plans, understood as the creation of more than 19 jobs in the next 5 years, with such plans declared by fifteen out of a hundred men and nine out of ten women running their own businesses.

Table 12. Growth aspirations of women and men running a business in Poland in the years 2012–2013 (% TEA)

		Declared num- ber of new jobs within 5 years (average number of persons)	Declared percentage employment growth within 5 years (average, %)	Creation of any jobs (average, %)	More than 5 jobs within 5 years (average, %)	Employment growth by more than 10 persons and more than 50% (average,%)	Growth by more than 19 jobs within 5 years (average, %)
Women	2012	5.5	908%	83.30%	21.20%	11%	4.70%
women	2013	6.7	1323.60%	81%	43%	29%	9%
Mars	2012	8.3	1380%	77.80%	34.10%	17.90%	13.40%
Men	2013	17.5	2110.98%	87%	37%	26%	15%

Source: the authors' own elaboration on the basis of Global Entrepreneurship Monitor 2012 and 2013 data.

<sup>&</sup>lt;sup>17)</sup> Weclawska D., Zbierowski P., Tarnawa A., Bratnicki M., *Raport z badania Global Entrepreneurship Monitor – Polska 2012* [Global Entrepreneurship Monitor Report – Poland 2012], PARP 2013.

<sup>18)</sup> Tarnawa A., Zadura-Lichota P. (ed.), Report on the condition of small and medium-sized enterprise sector in Poland in 2011–2012, PARP 2013.

However, not in all aspects of aspirations do women achieve lower results than men. The comparison of the situation in 2013 with the situation a year before reveals a significant change in ambitions of women-entrepreneurs in terms of aspirations at a medium and high level. Compared to 2012, the percentage of women planning to create more than five jobs within the next 5 years grew considerably (twice). With the figure standing at 43% in 2013, women prove to be more ambitious than men in this regard, since such plans are declared by only 37% of the latter running their own business. More women than men (29% vs. 26%) also declare the employment growth by 50% while creating at least 10 new jobs. And although these figures are very similar, it should be noted that, compared to 2012, the percentage of highly ambitious women entrepreneurs increased by 2.5 (from 11% in 2012) while of men only by around a half.

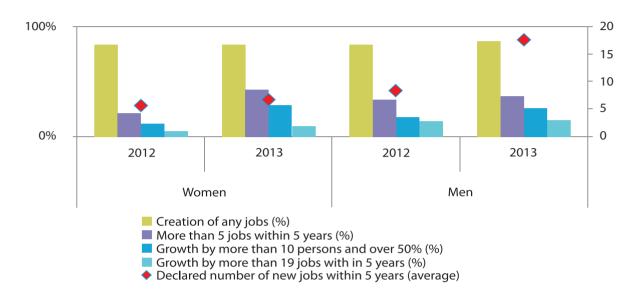


Diagram 10. Growth aspirations of men and women running a business in Poland in the years 2012–2013 (% TEA)

Source: the authors' own elaboration on the basis of *Global Entrepreneurship Monitor 2012* and *2013* data. Due to the much higher value s of the variable – declared percentage employment growth within 5 years – in comparison with other variables, the variable was not included in the diagram.

In terms of growth aspirations of men and women, it is evident that although men generally have higher ambitions related to growth of their business than women, the aspirations of women are clearly on the rise. According to the most recent available data from 2013, more than twice more women have medium and high growth aspirations concerning their business than in 2012; they also surpass men in this respect. What is more, the upward trend is also reported in the case of the most ambitious group of women entrepreneurs who declare the creation of at least 20 jobs – the growth of the percentage of women with such plans in the years 2013/2012 is markedly higher than that of men (1.9 compared to 1.1).

Why women running their own business have a more daring view of the future? The reasons most certainly include the increasingly intensive changes of lifestyles or cultural norm concerning the professional and social role of women. Already in 2011, the results of experimental research commissioned by PARP under the research project on women entrepreneurship showed that there were no significant differences between women and men in the attitude to risk taking. The women covered by the study (in this case young women graduating from university) proved to be no less prone to risk than men with regard to running a business and earning, which are subject to significant volatility<sup>19</sup>. The results of GEM for the years 2012–2013 confirm the increase of both the percentage of new businesses set up by women and the increase in the group of established enterprises (operating for longer than 3.5 years). The above data on growth aspirations allow to hope for a change of this situation and a greater presence of women among the larger entities.

#### 2.10. Internationalisation

GEM also allows to assess the degree of internationalisation of enterprises in Poland in comparison with other countries. Four variables measuring the percentage of customers from outside of the country in question per early-stage entrepreneurs (TEA) will be used. For the purposes of this analysis, they were called as follows:

<sup>&</sup>lt;sup>19)</sup> Balcerzak-Paradowska B., Bednarski M., Głogosz D., Kusztelak P., Ruzik-Sierdzińska A., Mirosław J. *Przedsiębiorczość kobiet w Polsce* [Entrepreneurship of women in Poland], PARP 2011.

- non-exporters, i.e. new entrepreneurs that do not have customers outside their home country,
- exporters:
  - start-up exporters, i.e. new entrepreneurs that have from 1% to 25% of customers outside their home country,
  - growing exporters, i.e. new entrepreneurs that have from 25% to 75% of customers outside their home country,
  - advanced exporters, i.e. new entrepreneurs that have from 75% to 100% of customers outside their home country.

According to the data in the following table, one in five entrepreneurs running a business in Poland for more than 3.5 years focuses exclusively on the domestic market. Almost 78.9% of early-stage enterprises are involved in exports, which means that almost four out of five owners of Polish enterprises have customers abroad. This result puts Poland at the 5th place among the 23 EU countries covered by GEM in 2013. The leader of the ranking is Luxembourg (88.2% of exporting enterprises), followed by Slovakia (87.1%) The Czech Republic (80.3%) performs slightly better than Poland. The countries where the vast majority of entrepreneurs focus exclusively on domestic customers include Russia (8.6% of exporters), Spain (27.2%) and the United Kingdom (37.9%)

The data for Poland differ from the averages for individual groups of countries diversified in terms of internationalisation structure of enterprises. In factor-driven economies, 68% of enterprises on average focus solely on the domestic market. The tendency to expansion to other countries increases along with the level of development. In efficiency-driven economies, one in two entrepreneurs on average (54.5%) has no customers outside the country, and in innovation-driven economies and the EU two out of five on average. In innovation-driven economies and the EU, respectively, eight-nine out of a hundred entrepreneurs on average are the most advanced exporters, in efficiency-driven economies there are five such entrepreneurs per hundred and in the least developed countries – only three per hundred. Almost two out of five entrepreneurs in the EU and the innovation-driven economies have up to 25% of customers abroad, while in the efficiency-driven economies, to which Poland belongs, such entrepreneurs account for almost one third of all. When it comes to growing exporters (25–75% of customers from outside the country), there are thirteen-eleven such exporters per hundred enterprises in the innovation-driven economies and the EU, similarly to efficiency-driven economies (nine per hundred companies), while in the least developed countries their number is almost twice lower (5.6%).

Table 13. Internationalisation of entrepreneurs in Poland (% TEA)

Country	Non-exporters  – no customers outside home country (% TEA)	Start-up exporters – up to 25% of customers outside home country (% TEA)	Growing exporters  – from 25% to 75%  of customers  outside home  country (% TEA)	Advanced exporters – from 75% to 100% of customers outside home country (% TEA)
Factor-driven economies	68.06	22.79	5.62	3.53
Efficiency-driven economies	54.46	30.85	9.17	5.52
Innovation-driven economies	40.56	40.59	11.06	7.79
EU average	39.10	38.58	13.38	8.95
Belgium	27.58	44	17.08	11.34
Bosnia and Herzegovina	42.57	36.57	12.7	8.16
Croatia	16.09	42.91	21.05	19.94
Czech Republic	19.65	64.1	11.22	5.03
Estonia	31.41	42.55	15.24	10.8
Finland	59.03	29.98	6.99	4
France	44.99	36.42	12.5	6.09
Greece	44.32	42.59	6.07	7.02
Spain	72.79	17.94	4.44	4.84
Netherlands	46.54	39.12	8.9	5.44
Ireland	40.77	33.71	12.33	13.19
Lithuania	30.85	43.17	17.1	8.89
Luxembourg	11.75	54.29	19.32	14.64
Latvia	32.41	34.18	22.73	10.69
Macedonia	34.57	36.54	20.26	8.63
Germany	45.9	37.97	11.11	5.02

#### cont. table 13.

Norway	60.33	23.14	7.44	9.09
Poland	21.04	55.38	14.05	9.53
Portugal	27.11	43.16	17.73	12
Russia	91.34	3.01	1.05	4.6
Romania	29.64	38.56	20.51	11.29
Slovakia	12.92	65.94	15.18	5.96
Slovenia	26.22	47.51	10.75	15.52
Switzerland	19.34	52.88	20.37	7.41
Sweden	42.9	34.95	12.57	9.59
Turkey	50.29	35.74	9.58	4.38
USA	15.16	73.57	7.51	3.77
Hungary	36.83	40.97	16.32	5.89
UK	62.13	21.1	9.09	7.68
Italy	55.63	27.25	10.39	6.73

Source: the authors own elaboration on the basis of Global Entrepreneurship Monitor 2013 data.

When the results for Poland are compared with the EU average, the pro-foreign attitude of young Polish entrepreneurs becomes evident. In Poland there are almost 50% less entrepreneurs focusing solely on the domestic market than in the EU. As regards exporters, according to GEM data for 2013, there are 55% start-up exporters in Poland (17% more than in the EU) and slightly more growing exporters (14% compared to 13.4%) and advanced exporters (9.5% compared to 8.9% in the EU).

It is worth noting that this openness to new markets observed in entrepreneurs operating up to 3.5 years changes with age of the company. The percentage of advanced exporters with over 75% of customers abroad falls significantly among established enterprises – there are only three per hundred such enterprises in Poland (6.7% in the EU), i.a. three times less than among young entrepreneurs. The percentage of growing exporters in this group is also half lower than among enterprises belonging to TEA – only 6.8% (9.3% in the EU). As in the case of TEA, one in five of established enterprises (22%) is not an exporter, which is 50% lower than the EU average. It also proves more pro-export attitudes among established companies operating in Poland. The percentage of entrepreneurs operating for more than 3.5 years that have up to 25% of customers abroad is still higher in Poland than on average in the EU (68% compared to 44.4%).

## **2.11. Summary**

## **Entrepreneurial attitudes**

Currently **one in five adult Poles plans to start up a business in the next three years**. Although this figure is better than the EU average (where only 15.9% of the adult population has such an intention), it is much lower than in 2011 when 27% of adult Poles planned to establish their own business. Also, fewer people than in 2011 now **perceive an opportunity to establish their own business in the immediate vicinity** (decrease from 33% to **26% of adults**).

Poles highly assess their own capabilities and knowledge to run a business – one in two Poles believes that he/she is well prepared for that purpose (52%), while on average in the EU just over 42% of adults is of the same opinion. At the same time, many Poles do not establish a business for fear of failure – this is currently 56% of adult Poles. From 2011, the percentage of such persons in the population has been very high (in the years 2011–2012 it was one of the highest in the EU, and currently the higher figures are reported only for Italians and Greeks – which is not a lot given that the study covered almost 70 countries in 2013). Moreover, compared to 2011, the percentage of persons who do not start a business for fear of failure has increased slightly – from 54% to over 56%.

The presence of the entrepreneurs in the media is noted by 58% of adult Poles (average for the EU is 9 % lower). More, because **almost 67% of Poles perceive own business as a desirable career choice**, while in the EU this opinion is shared by 56.9% of adults. Unfortunately, as shown by the GEM data for 2011–2013 this is significantly less than three years ago – 72.8%. Poles are nowadays also less often willing than in 2011 to attribute social status to entrepreneurs (59.9% compared to 64.4% in 2011). The figure is also much lower than the EU average of 65.5%.

In Poland, the majority of early-stage enterprises are established out of necessity and not because of perceived opportunities. This distinguishes Poland from other European countries, in particular the EU. As many as 47.4% of enterprises (TEA) in Poland are established out of necessity (it is the highest result among the EU countries surveyed). When it comes to perception of the opportunity to improve the standard of living, with 32.7% of TEA Poland is fourth among the countries with the lowest percentage of "optimistic" enterprises.

## Entrepreneurship – status and changes in recent years

**TEA, i.e. total early-stage entrepreneurial activity,** including persons taking action to start a business activity **and entrepreneurs running a business for up to 3.5 years, amounts to 9.3%, i.e. approximately 2.4 million people, in Poland** (it should be noted that TEA includes both registered entrepreneurs and the persons taking action to establish a business). The average for the EU is slightly lower and amounts to 8% (25.3 million in the EU20). **Established enterprises** (operating for over 3.5 years) **account for 6.5% of adult population in Poland** (6.4% in the EU), **nascent entrepreneurs** (people at the stage of taking action to establish a business and entrepreneurs operating for up to 3 months) – 5.1% (4.8% in the EU), and **new entrepreneurs** (conducting business activity for 3 to 42 months) – **4.3%** (3.3% in the EU).

As regards the changes in the structure of entrepreneurs in the years 2011–2013, the proportion of established enterprises in the adult population grew from 5% to 6.5% in Poland, while the share of nascent entrepreneurs decreased slightly from 6% to 5.1%. There was also an increase in the percentage of new enterprises – from 3.1% to 4.3%. The share of TEA and of those who discontinued a business has remained at the similar level from 2011 – at 9.3% and 4%, respectively, in 2013. The data demonstrate a qualitative change in the structure of Polish entrepreneurs and better condition of the economy.

The majority of entrepreneurs running a business for up to 3.5 years in Poland represent the production sector (over 45% of enterprises, approx. 21% more than the EU average). The sector of services, considered to be necessary to ensure appropriate economic growth, is less popular among entrepreneurs. This concerns in particular the services for business which are provided in Poland by 14.9% of enterprises belonging to TEA (approximately 12% less than in the EU). The services for individual customers are provided in Poland by one in three entrepreneurs (34.4% of TEA, approximately 7.6% less than in the EU). In the extraction sector in Poland the percentage of early-stage entrepreneurs amounts to 5.3% – this figure is close to the EU average.

Growth aspirations of Polish early-stage entrepreneurs are relatively high – 39% of them declare the creation of at least 5 jobs in the next 5 years (medium-level aspirations), while 27% plan to create 10 jobs and increase employment by at least a half within that period (high aspirations). Those figures place the Polish entrepreneurs at the 3rd place among the EU countries. The higher positions belong to entrepreneurs from Romania and Latvia where growth aspirations of approx. 43% of enterprises are at the medium level and of one in three companies at the high level.

The ambitions of entrepreneurs operating in Poland have increased over the last two years. The increase was particularly marked, compared to the data for 2012, with respect to the percentage of enterprises with high aspirations (by 74%), while the percentage of enterprises with aspirations at the medium level grew by 31%.

GEM data for 2013 show that one in five entrepreneurs operating in Poland for up to 3.5 years focuses exclusively on the domestic market. Almost 78.9% of early-stage enterprises are exporters, in the sense of having customers abroad, which means that almost four in five owners of Polish enterprises have this type of customers. This figure puts Poland at the 5th place among 23 EU countries covered by the GEM study in 2013.

#### Female entrepreneurship

In the EU countries, women start a business on average two times less often than men. Poland does not diverge from the average – women who are early-stage entrepreneurs account for 5.1% of adult Poles, while men for 12.3% according to GEM data for 2013 (figures for the EU amount to 5.6% and 10.4%, respectively).

More than 29% of adult women believe that the conditions to establish own business activity within the next 6 months are good (less, because only 23% of men is of the same opinion). Polish women can be classified as optimists in this respect, since compared to other EU countries Poland is at the 8th place in terms of perceived opportunities on the market. It is worth noting that from 2011 (since GEM data are available for Poland) an increasing number of women perceives business opportunities, while in 2011 men perceived such opportunities more often than women. Moreover, the figures for both groups were higher than in subsequent years (35.2% for men and 31% for women in 2011).

<sup>&</sup>lt;sup>20)</sup> Own calculations on the basis of data from the *Labour Force Survey* for 2013, Eurostat. The calculations were made for persons aged 15–64 years.

One of the reasons restricting the business plans of Polish women is a much lower, compared to men, self-assessment of entrepreneurial competences – 40% of adult women vs. 64% of men believe that they have appropriate competences to start up a business. And although compared to other EU countries Poles (regardless of their sex) perform very well (6th place when it comes to women having the best opinion of their entrepreneurial capabilities and the first place in terms of self-assessment of men in this category), the persistent difference of 24% in favour of men is difficult to explain given the better (within the meaning of soft skills) education of women than men.

The second reason is undoubtedly the **fear of failure** – almost 60% of women and 54% of men in Poland do not start a business for fear of failure (for comparison in the EU 52.1% of women and 42.4% of men have similar doubts).

However, it should be noted that in the case of early-stage entrepreneurship the percentage of enterprises established by women is growing, because the difference between the number of companies run by men compared to those run by women is increasing (TEA for men in the years 2011–2013 has decreased from 13.1% to 12.3%, while for women it increased from 5.1% to 6.1% – the gender gap decreased by 2 percentage points). When it comes to established enterprises, i.e. those operating over 3.5 years, a dynamic increase has been recorded in the percentage of enterprises run by women (from 2.9% to 3.8%), however, a much larger growth in this category concerns the enterprises owned by men (from 7.1% to 9.2%) and, therefore, the gender gap has slightly increased (by less than 1 percentage point). These indicators are higher than the EU average (by 4.8% for TEA and 4.9% for established enterprises).

Motivations to start a business activity vary depending on gender. Significantly, because almost two times, more men than women running a business in the European Union countries decide to start up their own business due to perceived opportunities. More men than women become entrepreneurs in these countries out of necessity, i.e. or lack of alternatives for finding employment in the labour market. It is worth noting a quite optimistic fact that in the EU on average almost three times more women and men start a business to use the opportunity than because they are forced to do so<sup>21)</sup>. In Europe, the biggest difference in motivations of women and men understood as perceived opportunities occurs in Lithuania, Estonia and Hungary (approx. 6–8%). When it comes to starting up a business due to the lack of other alternatives in the labour market, the biggest difference between entrepreneurs in terms of gender is recorded in Slovakia and in Germany (approx. 3%).

The GEM results show that men who are early-stage entrepreneurs (operating for up to 3.5 years) generally have higher growth aspirations than women. The creation of any jobs was declared by eight in ten women and almost nine in ten men. In terms of numbers, women declare the creation of circa seven jobs in the next five years, while men plan to create around eighteen new jobs on average. This means that women expect their business to grow 13 times and men 21 times in terms of the level of employment in the next 5 year. Men outperform women also in terms of the most ambitious development plans, understood as the creation of above 19 jobs in the next 5 years – such plans are presented by fifteen in a hundred men running their own business and nine in a hundred women.

However, not in all aspects of aspirations do women achieve lower results than men. The **comparison of the situation in 2013** with that in the previous year also reveals a significant change when it comes to ambitions of women-entrepreneurs. In comparison with 2012, the percentage of women planning to create more than five jobs in the next five years has increased significantly, i.e. two times. With the figure standing at 43% in 2013, women prove to be more ambitious than men in this regard, since such plans are declared by only 37% of the latter running their own business. More women than men (29% vs. 26%) also declare the employment growth by 50% while creating at least 10 new jobs. And although these figures are very similar, it is worth noting that **compared to 2012 the percentage of highly ambitious women entrepreneurs increased 2.5** times (from 11% in 2012), and of men only by around a half.

What is more, the upward trend is visible also in the case of the most ambitious group of female entrepreneurs who declare the creation of at least 20 jobs – the growth rate of the percentage of women with such plans in the years 2012/2013 is clearly higher than that of men (1.9 compared to 1.1).

<sup>&</sup>lt;sup>21)</sup> For example, in the EU countries in the population of enterprises classified as TEA, the share of entrepreneurs who decided to start up their own business due to opportunity vs. necessity amounts to 7.19% vs. 2.43% for men and 3.81% vs. 1.33% for women.

# 3. Determinants of entrepreneurship developmentresults of national experts survey (NES)

# 3.1. Introduction – about the study and technical remarks

This chapter presents the expert assessment of the determinants for the emergence and development of entrepreneurship in Poland. The assessment was carried out with the use of the qualitative survey (National Experts Survey – NES). Altogether 36 experts from Poland participated in this survey. They represent the following fields: finance, government policies, governmental programmes, education and trainings, R&D. knowledge transfer, commercial and service infrastructure, market openness, physical infrastructure, social and cultural norms.

The survey was carried out using an online questionnaire. The task of each expert was to assess the statements relating to 19 areas<sup>22</sup>). Each area covered 5–9 statements on the subject on which the expert was to give his/her opinion, using the following scale: completely true – 5 points, somewhat true – 4 points, neither true nor false – 3 points, somewhat false – 2 points, completely false – 1 point. Because all statements were positive, i.e. they reported that a given aspect in Poland has a positive impact on entrepreneurship, the more points were attributed to a given area, the better the situation was assessed. Then, average answers of all experts were calculated for given statements<sup>23</sup>. The higher the value of the average, the better assessment of a given aspect. Then, the respective statements were aggregated to areas specified above and averages were calculated for them as well. This analysis of results used both average results for the respective statements and the averages for the respective groups – depending on context and possibility of interesting presentation of the problem.

In addition, results for Poland were compared with average results for innovation-driven economies. Even though Poland is among the group of efficiency-driven economies, it was decided to compare our country with economies to which we would like to belong. Such a comparison has its consequences. It should be borne in mind that entrepreneurship, understood in particular as the number of new entities, in innovation-driven economies is at a lower level than in other groups (efficiency-driven economies or factor-driven economies).

In view of the multitude of areas covered by the NES survey, it was decided to group them into six blocks (Diagram 1) representing the more extensive categories of determinants for the development of entrepreneurship, i.e.:

- I. start-up opportunities: perception of the possibility to set up a business, market openness dynamics and burdens (obstacles to entry and functioning on the market); entrepreneurship education primary and secondary level and the level of higher education institutions and continuing vocational training; skills and knowledge necessary for starting up business activity;
- II. market and entrepreneurship policy: government policy priorities and support for entrepreneurship as well as burdens related to taxes and administrative regulations; government (public) entrepreneurship support programmes; commercial, service as well as physical infrastructure of business environment; access to finance;
- III. innovation: interest in innovation on the part of entrepreneurs and consumers; R&D and technology transfer (including knowledge transfer), intellectual property rights;
- IV. growth potential: supporting women entrepreneurship; supporting high-growth enterprises; youth (14–20 years) and young people's (21–34 years) entrepreneurship;
- V. social and cultural norms: value systems and social norms, social image of the entrepreneur;
- VI. well-being, including the work-life balance.

A detailed description of individual areas of the NES survey has been presented in the Global Entrepreneurship Monitor – Poland 2011 report. Area VI – well-being is discussed in Chapter 4.

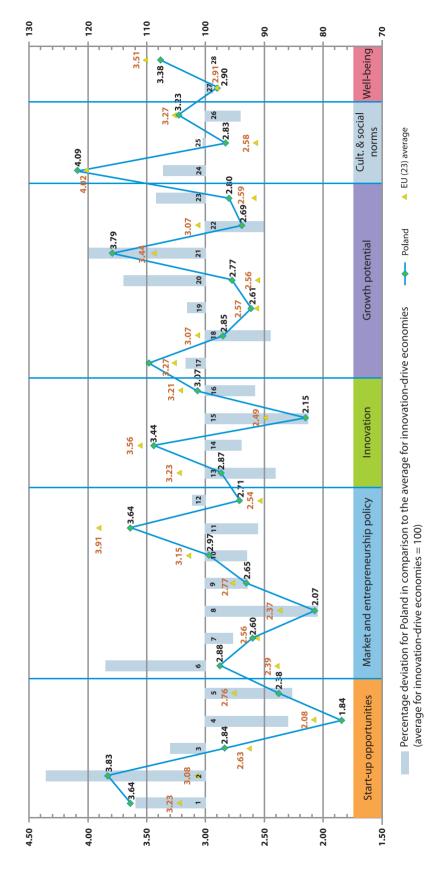
# 3.2. Framework condition for entrepreneurship development – current status

According to the experts involved in the NES survey, in 2012 the conditions for the creation and development of enterprises in Poland were not too favourable.

<sup>&</sup>lt;sup>22)</sup> Access to finance, government policy towards entrepreneurship, public entrepreneurship support programmes, primary and secondary education, higher education and professional training, research, development and technology transfer, business commercial environment, stability of the market situation and legal obstacles to entry into the market, physical infrastructure, value systems and social norms, perception of the possibility to set up a business, skills and knowledge necessary for starting up business activity, social image of the entrepreneur, intellectual property right, supporting entrepreneurship of women, supporting businesses with high growth potential, innovation, satisfaction with life, business relationships, youth (14–20 years) and young people's (21–34 years) entrepreneurship.

<sup>&</sup>lt;sup>23)</sup> Authors of the study are aware of the consequences of applying the average for the Likert scale; however, such solution was recognised the optimum for comparison between so many countries in so many areas at a time.

Diagram 11. Entrepreneurship development conditions: Poland, average for the EU countries (23) vs. innovation-driven economies



Start-up opportunities: 1 - Perception of the possibility to set up a business, 2 - Market openness, dynamics, 3 - Market openness - obstacles to entry and functioning, 4 - Primary and secondary education, 5 - Education - consumers, 15 - Research and development, transfer of knowledge, 16 - Intellectual property rights. Growth potential: 17 - Support for female entrepreneurship, 18 - Support for high-growth enterprises, 19 - Youth regulations, 9 - Government programmes, 10 - Commercial and service infrastructure, 11 - Technical infrastructure, 12 - Access to financing, Innovation: 13 - Interest in innovation - entrepreneurs, 14 - Interest in innovation entrepreneurship - government programmes - enterprise growth opportunities, 20 - Youth entrepreneurship out of necessity, due to lack of alternatives, necessity to financially support the family, 21 - Young people involved in business activity will most likely start working on their own account, will learn how to develop business activity thanks to experience and relationships, 22 – Young people undertake activities related to entrepreneurship, the 24 - Young people believe that living/working opportunities abroad are more attractive, those who became entrepreneurs received help from family, loved ones, relatives. Cultural & social norms; 25 - Social and cultural norms, incubator system and the financial sector supports their actions during the start-up and when running a business; 23 – Young people must cope with more restrictions when starting and conducting economic activity than adults, 26 – Social image of the entrepreneur. Well-being: 27 – Adequacy of laws and regulations allows to maintain work-life balance, 28 – Perception of entrepreneurs as people more satisfied with their personal life and work than and training – vocational schools, colleges and universities, 6 – Skills/knowledge necessary for starting up business. Market and entrepreneurship policy: 7 – Government policy – priorities and support, 8 – Government policy –

#### 3.2.1. Start-up opportunities

What opportunities for starting up a business were offered by the market in 2013? The experts' assessment in this area (3.64) is a little better than their assessment in the previous year (3.46) and slightly above (by 12%) than the average for innovation-driven economies, as well above the average of for the analysed EU(23) countries – 3.23. The experts agreed that there were still a lot of good opportunities in the market for starting up an enterprise (3.81, EU(23) – 3.53). Undoubtedly, the Polish market is one of markets which develop dynamically and thus changes both in terms of goods and services for consumers as well as those for B2B (3.83, EU(23) – 3.08). Compared with the average for innovation-driven economies, the Polish market dynamics was assessed significantly better (by 27%). Market openness and ease of entry into the market were assessed above the average for innovation-driven economies, but significantly below the previous category. Factors taken into account in this respect include the cost of entry into the market, the lack of barriers created unlawfully by the established enterprises, enforcement of the antitrust legislation (the total score in this area stood at 2.84, representing 106% of the rate of innovation-driven economies, the EU(23) – 2.63).

Therefore, taking into account the opportunities still offered by the market and also a certain difficulty of the functioning in it, the assessment of preparation of future entrepreneurs looks disturbing. Teaching of entrepreneurship at primary and secondary schools has been assessed at 1.84 and this is the worst result among all the areas analysed. The result of 1.84 puts Poland at the sixth place from the end among the EU countries surveyed. This area is assessed better in innovation-driven economies – 2.14 and, on average, in the EU(23) countries – 2.08. This means that Polish schools do not encourage creativity, self-sufficiency and personal initiative (the assessment is even lower in this category-1.83); there is also no transfer of knowledge on the functioning of the economy, no proper attention is paid to the issue of entrepreneurship and setting up enterprises. Also, in comparison with the average for the innovation-driven economies, this result is lower by 16%. The assessment of teaching of entrepreneurship at the level of colleges and universities and vocational training was slightly better (2.38), though this result is below the average for the innovation-driven economies by ca. 15%.

Against this background, the result of 2.88 (17% better than the average for the innovation-driven economies) as regards the assessment of knowledge and ability to set up a company looks quite satisfactory, though in reality this is not the case. The experts do not agree with the statements that a lot of people in our country know how to set up and run an enterprise, have experience in this field and know how to take advantage of emerging opportunities.

## 3.2.2. Market and entrepreneurship policy

In this block, we have put together the government policy for entrepreneurship and its instruments as well as services – in the form of access to external financing, commercial and service infrastructure, as well as physical infrastructure. Most of these factors have been assessed below 3. Only physical infrastructure – understood as good access of new and growing enterprises to roads, media, communication, affordable telecommunications services, a short period of time in which it is possible to receive such access – was assessed relatively well (4.21) when it comes to the time of obtaining access to telecommunications services (defined as 1 week). Commercial and service infrastructure, in which they assessed the availability and ability to bear costs of employing subcontractors, suppliers and consultants, easiness of acquiring good professional lawyers and accountants as well as banking services for start-up entrepreneurs received a total assessment of 2.97 – here, the best assessment was given to ease of access to banking services (3.64) and a sufficient number of subcontractors, suppliers and consultants to ensure the development of new and growing enterprises (3.53), although those results are still not good in relative terms.

The experts assessed quite poorly (1.89) the government policy (e.g. the access to the public procurement market) in terms of creating favourable legal conditions for new enterprises. The government policy and instruments targeted at new and growing businesses have improved slightly, but are still unsatisfactory. According to the experts, the government policy is not favourable for new enterprises and they are not a priority for the policy at the central (2.80) and regional (3.00) level. They also did not agree with the statement that the amount of taxes did not constitute a burden for new and growing enterprises and also that regulations concerning taxes and other administrative matters were applied in a predictable and consistent way. They also noticed a difficulty on the part of new and growing enterprises in dealing with administrative regulations and requirements (in this latter aspect, the assessment was the lowest in this block – 1.91). When it comes to government programs, the experts analysed the following issues: the possibility of obtaining support through contact with a single agency (the lowest result in this category – 2.36), the effectiveness of support from science parks and business incubators (3.03), the existence of public programs for enterprises (3.06), competence and effectiveness of the public administration employees (2.63), matching programmes to the individual needs of the entrepreneur (2.47) and the effectiveness of programmes addressed to entrepreneurs (2.61). In most of the analysed entrepreneurship development conditions in this block (apart from access to financing and government policy – priorities and support), we came off worse than the innovation-driven economies (by ca. 4% to 19%). The deviation from

the average for innovation-driven economies was the largest in the case of government policy – regulation (lower score than the average for innovation-driven countries by 20%) and physical infrastructure (lower by 9%). The smallest differences were recorded in the following areas: government programmes, commercial and service infrastructure.

Once again, let us take a look at financing – the category, in which the existence of six forms of financing in Poland was analysed: equity funding (also high risk), debt financing, public financing, financing from private individuals (other than founders) and in the form of initial public offerings (IPOs). In this case, all partial assessments oscillated around 2.8, apart from financing in the form of support from public funds for new and growing companies, which was rated higher (3.11), although this result approximate to "neither true nor false" is not good in relative terms. The access to venture capital funds (2.29) and private funds for new and growing enterprises were rated much lower. The total assessment of access to financing for enterprises amounted to 2.71 and was even slightly higher than the average in this area in innovation-driven economies (2.65).

The above results are not optimistic. In the experts' opinion, the current entrepreneurship policy, as well as administrative regulations and requirements, still do not sufficiently support the development of entrepreneurship (perhaps this assessment is affected by the depletion of budgets within most instruments financed from public funds for entrepreneurs). In turn, access to financing and to commercial services (accounting, legal or others) are among the fundamental conditions supporting the operating activity of the enterprise and thus the necessary conditions for entrepreneurship development. The low assessment in this area indicates a higher risk on the part of entrepreneurs, who must rely on their personal knowledge and resources, which, in the experts' opinion, are not sufficient as well.

#### 3.2.3. Innovation

In the next block – innovation – three main areas were put together: interest in innovation among entrepreneurs and consumers, research and development and transfer of knowledge and intellectual property rights. A cursory look at the diagram (Diagram 1) shows that innovation is particularly important to consumers (3.44). Consumers like to try out new products (3.43), appreciate innovation (3.43), are open to buying products and services from new companies (3.51). However, these results, apart from the area – consumers open to buying products and services offered by companies – are below the average results in innovation-driven or even efficiency-driven economies.

Entrepreneurs show less interest in innovation (the total assessment of 2.87, below the average for innovation-driven countries—by 12%). According to the experts involved in the survey, entrepreneurs are not willing to experiment with new technologies and new ways of activity (2.31), this is the 2nd last result among 69 countries surveyed in 2013, lower than the average for innovation-driven economies by ca. 27%. The result worse (by 15%) than this average concerns the issue of appreciation of innovation by Polish entrepreneurs (3.12). In terms of this criterion, Poland is at the fifth place among European countries. When it comes to the willingness of entrepreneurs to use services of new suppliers, we were assessed at 3.21, i.e. by ca. 6.5% better than the average for innovation-driven economies.

As regards the area of research and development, as well as the transfer of knowledge, the total assessment of this category by the experts is very low (2.15, almost 18% less than the average for innovation-driven economies). Several topics were assessed by the experts in this area, however the low total assessment of this block is attributed mainly to: transfer of new technologies and research from universities and public research centres to new growing companies (1.78 - the worst result among the European countries surveyed, as well as 32% lower than the average for innovation-driven economies) and support for commercialization of the ideas of engineers and scientists by new and growing companies (1.94 – the fourth worst result among European countries, lower by 31% than the average for innovation-driven economies). The low assessment of these areas point to problems in communication between research centres and the business world. Moreover, the already negative image is further deteriorated by low assessment of access of new and growing companies to research and technology (2.03) in comparison with big enterprises. The offer of support programmes (including grants) for the acquisition of new technologies by new and developing companies is assessed slightly better (3.31).

The last area in this block includes the issues related to intellectual property rights, such as a comprehensive and effective legislation, low incidence of sales of illegal software, e.g. CDs, on the black market, persuading the public that the rights of an inventor to his invention should be respected (only in this last aspect the assessment was slightly higher than the other and amounted to 3.62). The total assessment of this thematic block amounted to 3.07 and was ca. 9% lower than the average for the innovation-driven economies.

## 3.2.4. Growth potential

In the NES study, four groups were distinguished: women, high growth firms and young entrepreneurs divided into two age groups: 14–20 and 21–34. The determinants specific for the development of these groups were analysed.

#### Women

The conditions for the development of female entrepreneurship were assessed at 3.35, which was slightly above the average result for the innovation-driven economies. In this block, five issues were analysed in detail. The first issue was whether or not the institutional and social care system is sufficient for women to be able to continue work even after starting a family – the assessment in this category is very low (2.32), also lower than the average for the innovation-driven economies (by 21.4%). Another factor assessed was the attitude of the Polish society towards setting up businesses by women – here the experts had a slightly better opinion, assessing it at 3.69 (i.e. 3% above the average for the innovation-driven economies). Similar assessment (3.29, although higher by more than 8% than the average for the innovation-driven economies) was given to the issue of women being offered incentives to become an entrepreneur. The last two issues relate to equal opportunities for women and men when starting up a business and equality in terms of the ability to set up a firm. Although the assessment of equal opportunities (3.61) was ca. 14% above the average for the innovation-driven economies, the assessment of the latter amounted to 4.53 and exceeded this average by more than 9%. In general it can be concluded that the experts assessed the conditions for the development of female entrepreneurship in Poland as positive.

#### **High growth firms**

The conditions for starting up and developing high growth enterprises were assessed as poor (2.85) below the average for the innovation-driven economies (by 11.3%). The conditions for the development of this group include: existence of support initiatives for this group; awareness of the importance of high-growth firms in public administration; adequately high competence of the persons involved in entrepreneurship support initiatives for supporting high growth companies; and taking into account the potential of the enterprise for rapid growth as a selection criterion when choosing beneficiaries of a support programme and a priority approach to supporting these enterprises under the entrepreneurship policy. The assessments in these categories were average – between 2.76 for prioritising the group of companies in question and 3.11 for the existence of initiatives supporting high growth businesses. For all areas (except the first one – a lot of initiatives can be observed) the ratings were lower than the average for innovation-driven economies – between 2% and 17%.

A rather high rating of the initiatives to promote economic activity with high growth potential, combined with the low assessment of the awareness of the importance of high growth firms among the public administration and the lack of prioritisation of this policy, makes this a neglected area. In a sense this may be due to the lack of awareness of the issue and of the importance of high growth companies for the economy among decision makers, and sometimes due to the incorrect identification of this group of enterprises as innovative companies.

## Entrepreneurship of the young (aged 14-20)

A special subject in the GEM survey in 2012 was entrepreneurship of the young, i.e. people aged 14–34. The subject was further analysed also in the last year (2013). This group is divided into two subgroups: youth (aged 14–20) and young people (aged 21–34). In each of these subgroups, eight statements had been assessed, which then were grouped into six summary assessments – three in each age group.

When it comes to the **youth**, it was analysed if people aged 14–20 enjoy easy access to education, government programmes on entrepreneurship and the opportunities for developing micro-enterprises, and whether most of them engage in entrepreneurship out of necessity.

The first summary category (access to education and engagement in entrepreneurship out of necessity) received an average rating of 2.77, i.e. 14% above the average for innovation-driven economies. This category combines four statements: the first one – good access to primary and secondary education – received a very high rating from the experts (4.0). However, this positive assessment should not give many reasons for satisfaction, considering the previous low assessment of the quality of this kind of education— understood as developing appropriate entrepreneurial attitudes and providing knowledge of the economy. As regards the remaining statements, i.e. that most young people have no other choice but to find a job; that the youth start up business activities out of necessity; and that this attitude arises from the fact that families expect the youth to contribute to the

family budget, the ratings given by the experts were much lower (approx. 3.0). This means that according to experts the situation of young people is not very good.

The second category relates to two statements: – that the youth engaged in some business activity would become self-employed people rather than employees; and that the youth working on their own account (self-employed) learn to develop a business activity through personal experience and relationships. Both these statements jointly were assessed at 3.79, which was nearly 20% above the average for the innovation-driven economies. According to experts, the key skills for developing business can be achieved by one's own experience and relationships - this statement was assessed very highly – 4.03. This obviously is a significant result showing that the creation of instruments allowing to gain business experience is highly likely to translate into higher level of entrepreneurship in Poland.

The third summary category concerning the possible development of micro-business and support to young entrepreneurs under government programmes received a very low rating from the experts, i.e. 2.61, although it was a similar result compared to the average assessment by the experts from innovation-driven economies.

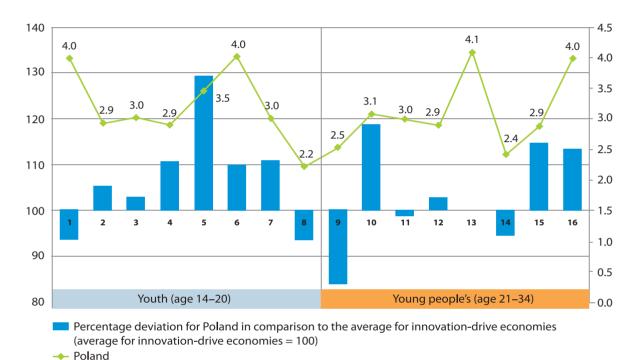


Diagram 12. Young people's entrepreneurship development conditions: Poland vs. innovation-driven economies

Youth entrepreneurship (age 14–20): 1 – Youth has good access to primary and secondary education; 2 – Most youth have no choice other than finding a job; 3 – The youth take business activity out of necessity; 4 – Families expect that the youth will contribute to family budget; 5 – It is more likely that the youth involved in business will become self-employed rather than find employment as an employee, 6 – Youth becoming self-employed learn to grow business mainly through personal experience and relationships, 7 – There are a lot of opportunities to grow "microenterprises" for the youth, 8 – Government programmes effectively train and support young entrepreneurs. Young people's entrepreneurship (age 21–34): 9 – Conflict situations constitute a serious obstacle for young people when starting up and growing a business, 10 – Young people to a large extent take actions related to entrepreneurship and running a business, 11 – Young people must deal with more restrictions when undertaking and running a business than adults, 12 – The system of business incubators provides proper support for young people, 13 – Most young people who became entrepreneurs, when setting up a business received help from family, close relatives or friends; 14 – Financial sector (banks, informal investors, business angels) provides financing for business initiatives of young people; 15 – Young people may use microloans when starting up and running a business; 16 – Young people believe that the opportunities of living/working abroad are more attractive than in the country.

Source: the authors' own elaboration based on the results of the study Global Entrepreneurship Monitor – National Experts Survey 2013.

## Entrepreneurship of young people (aged 21–34)

Assessment of the determinants of entrepreneurship of **young** people, i.e. those aged 21–34, varied highly from one statement to another. However, the opinion of young people on the attractiveness of living/working abroad as well as the support from the family, relatives, friends of young people setting up a business received the highest ratings in this area (respectively 4.0 and 4.1). This means in fact that the conditions of living/working in Poland are considered to be worse than in other countries, which may negatively affect the decisions of young people to start up their own business. On the other hand, factors such as conflict

situations do not constitute a serious obstacle when setting up and growing a firm (2.54), also restrictions affecting young people when starting up a business are not much greater than those experienced by adults (2.97). Therefore, the question is what stands behind the negative assessment and the opinions that life abroad is better. It turns out that the system of business incubators fails to provide appropriate support for young people (2.91) and the financial sector (i.e. banks, investors, business angels) was also assessed very negatively – 2.43, just as the opportunity to use microloans when starting up and running a business (2.88). Interestingly, in the context of these adverse conditions the support from the family, relatives, friends in setting up a business plays a significant role, as already mentioned at the beginning. Certainly, this is to a large extent the effect of values such as family and friends, which are still cherished in Poland, but partially it also results from the absence of sufficient support for young people's entrepreneurship.

Despite numerous low results, the conditions for the development of young people's entrepreneurship in Poland in certain areas are better than those in innovation-driven economies. The assessment of the support provided by centres and institutions is the least favourable, despite the fact that they should show the biggest interest in the creation and development of new companies.

## 3.2.5. Culture and society

The one but last analysed block of the entrepreneurship development determinants concerns the image of the entrepreneur in society, as well as social and cultural norms. The experts agreed that the image of the entrepreneur in society is average (the rating of 3.23, which is slightly lower than the average for the innovation-driven economies). Among the statements included in this category it is worth mentioning the opinion that new business enterprises are the right way to become wealthy (3.61), which is 8% above the average score for innovation-driven economies.

The assessment of the role of cultural and social norms in supporting individual success achieved by own efforts, focusing on self-sufficiency, autonomy and personal initiative, encouraging entrepreneurial risk-taking, encouraging creativity and innovativeness as well as emphasising personal responsibility in managing one's own life – was very poor compared to other areas under analysis (2.83, but still this equals the average for the innovation-driven economies). Individual factors were given a similarly negative assessment – between 2.69 and 2.97. In the case of two out of five statements, the result achieved was above the average for the innovation-driven economies; they focused on cultural and social norms as a factor conducive to taking risks by entrepreneurs and on cultural and social norms highlighting the personal responsibility in managing one's own life. Compared to the innovation-driven economies, cultural and social factors are hardly encouraging creativity and innovation (2.75, i.e. 94.22% of the average for the innovation-driven economies).

#### 3.2.6. Well-being

The last thematic block, which was not previously analysed in the GEM national survey, is well-being. Within this block, in the first area the assessment concerned the adequacy of laws and regulations in the context of the balance between private life and work (2.9) and in the second area – the perception of entrepreneurs as people more satisfied with their private and professional life than other people (3.38). The total assessment of both areas was slightly below the average for innovation-driven economies. The most negatively rated statements, i.e. 10% behind the innovation-driven economies, were the following: general (economic, social, political or cultural) conditions allow people to find a balance between private life and work (2.66); and entrepreneurs are usually more satisfied with their private life than other people (2.9). Both of these statements show that, according to experts, it is difficult for people to find a balance between private and professional life in the prevailing economic and social conditions; moreover, although in the opinion of the experts entrepreneurs in Poland generally are more satisfied with their professional life (3.76, i.e. 105.3% of the average for the innovation-driven economies) than other people, this does not apply to their private lives.

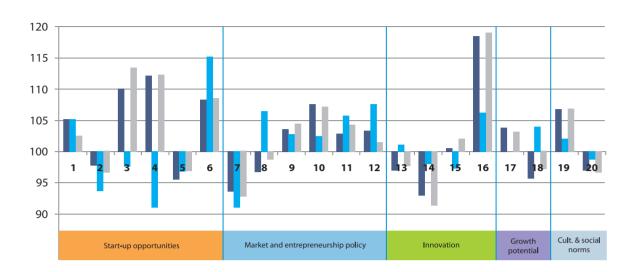
# 3.3. Changes in the framework condition for entrepreneurship growth compared to the previous years

A balance of changes in the assessment of the entrepreneurship determinants carried out in 2013 gives a positive result compared to the previous year, as more categories were assessed better than worse compared to 2012 (12 to 8). When analysing those changes in individual thematic blocks, it is also possible to see that positive ratings prevail in each of the blocks. The situation is slightly worse when we compare ratings for 2013 and 2011 (10 to 10 – the number of ratings showing a decrease equals the number of ratings showing a decrease, decreases in one category seem to be compensated with increases in another). When

comparing the ratings for 2013 and 2011 in individual blocks, the block "start-up opportunities" comes out the worse, while the "government policy and the market" was the top rated block (here the evaluation significantly improved over the two years).

Diagram 13. Entrepreneurship development determinants in Poland (in 2013 and change compared to 2012 and 2011)

– results of the NES study



- change 2013/2012 of the value for Poland
- change 2013/2011 of the value for Poland
- change 2013/2011 of the percentage deviation for Poland in comparison to the average for innovation-driven economies (average for innovation-driven economies = 100)

**Start-up opportunities**: 1 – Perception of the possibility to set up a business, **2** – Market openness – dynamics, **3** – Market openness – obstacles to entry and functioning, **4** – Primary education, **5** – Education and training – vocational schools, colleges and universities, **6** – Skills/knowledge necessary for starting up business. **Market and entrepreneurship policy**: **7** – Government policy – priorities and support, **8** – Government policy – regulations, **9** – Government programmes, **10** – Commercial and service infrastructure, **11** – Physical infrastructure, **12** – Access to financing. **Innovation**: **13** – Interest in innovation – entrepreneurs, **14** – Interest in innovation – customers, **15** – Research and development, transfer of knowledge, **16** – Intellectual property rights. **Growth potential**: **17** – Support for female entrepreneurship, **18** – Support for high growth firms. **Cultural & social norms**: **19** – Social and cultural norms, **20** – Social image of the entrepreneur.

Source: the authors' own elaboration based on the results of the study Global Entrepreneurship Monitor – National Experts Survey 2013.

Now, let us take a look at the individual categories. The biggest positive change in comparison with the result of 2012 regarded the area of innovation – recognition of intellectual property rights (an increase of 18%). Another one (an increase of 12%) – primary and secondary education (it should be emphasised here that although a significant increase in the ratings is observed compared to the previous year the rating is still lower than in 2011). As for the evaluation of the market openness – obstacles to entry and functioning – the situation is similar (an increase of 10%).

The categories worth noting because of the gradual and constant improvement in the assessment by the experts are as follows: skills/knowledge necessary for starting up business (an increase of 8% and 15% compared to 2012 and 2011, respectively), access to financing (an increase of 3.4% and 7.5% compared to 2012 and 2011, respectively), physical infrastructure (an increase of 2.8% and 5.8% compared to 2012 and 2011, respectively). Undoubtedly, these positive changes are the result of the implementation of the basics of entrepreneurship at the level of lower and upper secondary education as well as the implementation of infrastructure projects co-financed by the EU. Increasing access to financing is also a result of loosening the loan policy in relation to enterprises by the banking sector. In the context of the above categories it seems that it is not without significance that the ratings in the category of cultural and social norms increased (by 6.8%).

In the same categories as the above (plus perceived opportunities to set up a business, government programmes, commercial and service infrastructure, research and development, transfer of knowledge, support for female entrepreneurship), improvement in the disparity between Poland and the innovation-driven economies was recorded. The biggest positive change regarded, as in the case of change of the assessment for Poland, intellectual property rights (19%) and market openness – obstacles to entry and functioning (13%). Other changes oscillated around a few percent.

The categories in which there have been the biggest decreases compared to 2012 and 2011, as well as a significant gap between Poland and innovation-driven economies, include in particular: market openness – the dynamics; and government policy – priorities and support.

Compared to the last year, a negative change was also observed in the interest in innovation among both consumers (ca. 7%) and entrepreneurs (ca. 3%). The lower ratings given by the experts in the above two categories may arise from the lower ratings of the government policy – priorities and support (5%), as well as a noticeable decrease in support for high growth firms (4%). Over a period of three years, education in the area of entrepreneurship and preparation for starting up new companies offered at universities was assessed as very poor.

# 3.4. Summary

The image of the entrepreneurship development conditions in Poland, created by the experts, certainly is neither perfect nor desired.

This is basically the result of insufficiently effective education in the area of entrepreneurship at the primary, secondary as well as tertiary level. In addition, apart from this educational gap, social and cultural determinants are not conducive to the development of entrepreneurship in Poland, in particular the low-rated cultural and social norms do not encourage creativity and innovation.

In spite of the lack of appropriate education of the society in this area, the market is driven by its own rules, which results in the perception of the possibility to set up a business in Poland and the market dynamics being higher than in the innovation-oriented countries. Despite the relatively low assessment of the capabilities/knowledge of setting up a company, Poland ranks much higher than the innovative economies. According to experts Poles excel in managerial skills and experience in setting up a business.

Experts also pointed out that women and men in Poland are equally able to start up a new business; when it comes to equal opportunities, the result of the assessment was definitely worse, which, in the case of women, may be due to the fact that social and institutional care system after starting a family is not satisfactory, i.e. far below the standards of innovative economies.

According to the experts, in Poland there exists a kind of "forced" entrepreneurship, in particular among young people, resulting from the need to support the family and the lack of alternatives. As in innovation-driven economies, government programmes providing support for young entrepreneurs are assessed as not very good, which also applies to support initiatives for high growth firms.

For the first time the GEM project examined well-being, which showed that although entrepreneurs are deemed to be more satisfied with their private and professional life than members of other social groups, complex and often inadequate legal provisions/regulations make it impossible to achieve a good work-life balance. In particular, a negative correlation can be observed between the ratings given by the experts for general (economic, social, political, cultural) conditions that allow people to find the balance between private and professional life and the category: young people believe that the opportunities of living/working abroad are more attractive than in the country. It's hard to find a positive explanation of the situation although it is certainly an area that requires special attention.

Definitely, it may be concluded that the image emerging from the experts' evaluation of the conditions is not complete. Particularly, a lot is to be done in the field of primary and secondary education with respect to entrepreneurship, abolition of restrictions on the creation and growth of enterprises arising from regulations or administrative decisions and creation of conditions for the development of commercial and service infrastructure that would support the development of start-ups. It is also important to take actions that will encourage entrepreneurs to engage in innovative activities, also in cooperation with scientific circles. An incentive would also be the development of mechanisms, which would provide better protection of intellectual property rights, although here positive changes as compared to last year can be observed.

# 4. Well-being, i.e. the quality of life of entrepreneurs in the international context

The analysis of the effects of entrepreneurship usually takes into account the effects on micro- and macroeconomic scale. The microeconomic scale focuses primarily on the financial performance of individual entrepreneurs, the growth rate of their companies, the number of their employees, profits and customers. The macroeconomic level focuses on the impact of entrepreneurship on the economy, i.e. on the created jobs, the share of the gross national product generated by small and medium-sized enterprises, as well as start-up survival rates. However, little or almost no attention is paid to the less tangible effects of entrepreneurship which concern the quality of life of entrepreneurs.

To understand the impact of their business on the quality of life of entrepreneurs, first of all it is necessary to analyse what motivates them to set up their own business. The intention to achieve high profits and to accumulate capital is commonly deemed to be the main reason behind starting a business. However, such a perception of the motivation of entrepreneurs is a gross simplification, and, in addition, as shown by the surveys, entrepreneurs' earnings are not high – when taking into account the median instead of the average, it turns out that their profits fall short of expectations (Carter, 2011).

A lot of factors suggest that one of the main reasons for starting up a business is to satisfy the need for autonomy. This has been pointed out by many researchers, also in Poland (e.g. Lemańska-Majdzik, 2013). Some studies indicate that the desire to become independent and make autonomous decisions is even stronger than the desire to improve one's financial situation. Similarly, as for financial motivation, there are some aspects that suggest that entrepreneurs want to gain financial independence rather than maximise their income.

The non-financial reasons for starting a business indicated by entrepreneurs also include the desire to see if they perform well in the new circumstances, the aspiration to be entrepreneurs, the possibility of self-realisation, the desire to achieve a professional success, the desire to raise their self-esteem, the achievement of mental well-being, and even the improvement of interpersonal relationships. The important aspects of the entrepreneurial motivation mentioned also include the need for achievements, domination, power, and social reasons: the desire to help others and to have a positive influence on the lives of other people.

This set of entrepreneurial motives provides another perspective on the results achieved by the entrepreneurs. If they start businesses not only, or even not primarily, in order to maximise their incomes and profits and achieve a rapid growth, then why use exactly these measures of their success. Instead, if the main motivation is the desire for self-realisation, we should probably take it into account and examine whether in fact entrepreneurs achieve this aim and are satisfied with their actions. Therefore, the impact of entrepreneurship on the factors that can broadly be defined as quality of life indicators are increasingly more often taken into account. They include, for example: satisfaction, psychological well-being, and a balance between work and personal life

In 2013 the GEM adult population survey analysed a special theme on broadly understood indicators of the quality of life of entrepreneurs. The main factors examined were: the subjective well-being, the balance between work and private life, some aspects of empowerment (Spreitzer, 1995) and stress. The GEM methodology allows for the results of the research on this special theme to be presented from two perspectives: the international comparison and in relation to Poland, where it is possible to link the variables at the individual level with the quality of life indicators.

# 4.1. International comparison of the quality of life of entrepreneurs

Many studies indicate that the quality of life experienced by entrepreneurs is higher than that of employees. Entrepreneurs enjoy better psychological well-being and even better (both physical and mental) health and lower blood pressure (Stephan and Roesler, 2010). The reason behind this correlation may be that entrepreneurs perform the so-called "active" work, which requires dedication, but also is not tiresome and involves emotional engagement.

Therefore, what is the quality of life of entrepreneurs and non-entrepreneurs in the countries covered by the GEM surveys? (Table 14). The measurements were performed according to the Satisfaction With Life Scale (SWLS) (Pavot and Diener, 2008). As in the case of the NES survey, the results were standardised with respect to the average value and hypothetically range from –1.7 the lowest possible well-being) to 1.7 (the highest possible well-being).

Table 14. Well-being of entrepreneurs and non-entrepreneurs

Country	Adult population well-being	TEA entrepreneurs well-being	Well-being of owners of established enterprises	Well-being of non-entrepreneurs
EU	0.01	0.11	0.14	-0.01
Belgium	0.17	0.17	0.28	0.16
Croatia	-0.3	-0.04	-0.13	-0.33
Czech Republic	-0.02	0.01	0.11	-0.03
Estonia	-0.11	0.2	0.08	-0.17
Finland	0.4	0.4	0.59	0.39
France	-0.02	0.1	0.09	-0.03
Greece	-0.49	-0.29	-0.47	-0.51
Spain	0.09	0.16	0.16	0.08
Netherlands	0.3	0.48	0.43	0.26
Ireland	0.25	0.32	0.44	0.23
Lithuania	-0.07	0.12	0.19	-0.13
Luxembourg	0.37	0.24	0.09	0.39
Latvia	-0.19	0.03	-0.12	-0.23
Germany	0.13	0.07	0.28	0.13
Poland	-0.15	0.01	-0.02	-0.18
Portugal	-0.13	0.12	0.08	-0.17
Romania	-0.1	0.18	0.2	-0.15
Slovakia	-0.2	-0.08	0.04	-0.23
Slovenia	0.09	0.17	0.2	0.08
Sweden	0.25	0.32	0.31	0.24
Hungary	-0.28	-0.18	-0.05	-0.31
UK	0.3	0.12	0.33	0.32
Italy	0.03	0	0.2	0.03
Europe outside the EU	0.03	0.18	0.30	0.00
North Africa and Middle East	-0.22	-0.14	-0.08	-0.24
Sub-Saharan Africa	-0.60	-0.51	-0.39	-0.63
Asia-Pacific and South Asia	-0.10	-0.09	0.07	-0.14
North America	0.36	0.42	0.66	0.33
Latin America	0.28	0.36	0.39	0.25

An important observation, which is evident after even a cursory analysis of the results, is the geographic distribution of well-being. It is similar in different groups of entrepreneurs and non-entrepreneurs. The inhabitants of the countries of North America and Latin America enjoy the highest well-being, while the lowest well-being is experienced by the inhabitants of Sub-Saharan Africa. The average for the other geographic regions is similar to the general average values. This is consistent with the recently very popular rankings of happiness, where the countries of Latin America take top places (e.g. HPI – Happy Planet Index), although, according to other reports, European countries are at the forefront (e.g. World Happiness Report 2013 – Helliwell, Layard and Sachs, 2013). The GEM survey shows that the countries with the highest overall well-being are as follows: Panama (0.72), Switzerland (0.63), Norway (0.62), Chile (0.58) and Ecuador (0.55); while the countries with the lowest overall well-being are: Zambia (-1.25), Botswana (-1.05) and Russia (-0.79). Poland is a country with an average level of general well-being, which is slightly lower than the average for all countries analysed (-0.15).

What is significant is that in most countries the well-being of TEA entrepreneurs exceeds the well-being of the general adult population. This may indicate that the activity in the field of setting up and running a start-up may improve well-being, however this may also work the other way round, meaning that entrepreneurial activity is taken up by people with higher well-being who in general have a more positive and optimistic view of the world. More information is provided by the analysis of changes in well-being between TEA entrepreneurs and the owners of established companies. It turns out that in most countries the latter group demonstrates higher well-being, although there are exceptions to this rule. For example, in the case of Greece, Latvia and Luxembourg the well-being decreases with the transition from a start-up to an established company. Interestingly, such regularity occurs mainly in the EU countries and in several Latin American countries. In turn, the most significant improvement in well-being over the time of running a business was reported in Italy, Germany, Finland and the United Kingdom.

In Poland the well-being of TEA entrepreneurs is significantly higher than that of the general adult population and people who do not engage in entrepreneurial activity (0.01,-0.15,-0.18 respectively). However, this result is not high compared to other EU countries. Lower well-being among new entrepreneurs is observed only in Croatia, Greece, Italy, Slovakia and Hungary. In addition, the well-being of entrepreneurs in Poland decreases with the transition to a group of the owners of established companies and is higher only than the result for Croatia, Greece, Latvia and Hungary.

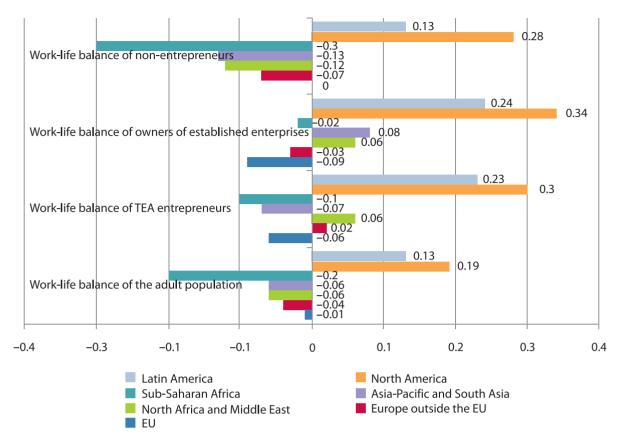
Apart from well-being, the GEM survey also analysed the work-life balance (Table 15, Figure 1). Unfortunately, the results for Poland of this part of the study are not available.

Table 15. Work-life balance of entrepreneurs and non-entrepreneurs

Country	Work-life balance of the adult population	Work-life balan- ce of TEA entrepreneurs	Work-life balance of owners of established enterprises	Work-life balance of non-entrepreneurs
EU	-0.01	-0.06	-0.09	0.00
Belgium	-0.05	-0.47	-0.14	-0.02
Croatia	-0.08	-0.08	-0.29	-0.07
Estonia	0.09	0.09	0.19	0.08
Finland	0.21	0.07	0.08	0.23
France	-0.11	-0.17	-0.17	-0.11
Greece	-0.38	-0.32	-0.55	-0.32
Spain	0.02	-0.13	-0.23	0.1
Netherlands	0.16	0.13	0.15	0.16
Lithuania	-0.06	0.01	-0.05	-0.07
Luxembourg	0.1	0	-0.11	0.12
Latvia	0	0.04	-0.11	0.02
Portugal	-0.02	-0.02	0	-0.02
Romania	0.14	0.19	0.07	0.14
Slovakia	-0.22	-0.26	-0.06	-0.23
Slovenia	-0.01	-0.12	-0.11	0.01
Sweden	-0.03	0.05	-0.22	-0.02
Hungary	-0.39	-0.41	-0.4	-0.39
UK	0.05	-0.03	0.12	0.05
Italy	0.37	0.27	0.1	0.39
Europe outside the EU	-0.04	0.02	-0.03	-0.07
North Africa and Middle East	-0.06	0.06	0.06	-0.12
Sub-Saharan Africa	-0.20	-0.10	-0.02	-0.30
Asia-Pacific and South Asia	-0.06	-0.07	0.08	-0.13
North America	0.19	0.30	0.34	0.28
Latin America	0.13	0.23	0.24	0.13

Source: the authors' own elaboration based on  ${\it Global Entrepreneurship\ Monitor\ 2013}$  data.

Diagram 14. Work-life balance of entrepreneurs and non-entrepreneurs



As in the case of well-being, the best work-life balance is achieved by the inhabitants of North and Latin Americas. Again, the worst balance is observed in Sub-Saharan Africa. Interestingly, in the case of most countries the balance between work and private life of entrepreneurs is slightly better than among non-entrepreneurs. This contradicts the common belief that economic activity requires sacrifice, which negatively affects family life. In addition, the balance in the life of the owners of established companies is, on average, only slightly better than in the case of novice entrepreneurs. A more significant difference could have been expected here, considering some stability of running a business, but such a relationship does not occur.

Among European countries the highest level of balance in life is observed in Italy, although it should be noted that these variables were not measured for Switzerland, which is characterized by the highest well-being. Here it should also be noted that there is a strong correlation between well-being and the balance in life on the national level. Russia is a European country with the lowest work-life balance. Among the non-European countries, India ranks above the regional average, which, together with the results for Italy, shows that the work-life balance is better in countries where there is a strong focus on family life.

In 2013, GEM survey also measured stress experienced by the respondents (Table 16) and their satisfaction with work (Table 17).

Table 16. Stress experienced by entrepreneurs and non-entrepreneurs

Country	Stress experienced by adult population	Stress experienced by TEA entrepreneurs	Stress experienced by the owners of established en- terprises	Stress experienced by non-entrepreneurs
EU	-0.08	-0.05	-0.11	-0.08
Belgium	-0.13	-0.29	0	-0.13
Croatia	-0.12	-0.09	-0.25	-0.11
Czech Republic	-0.1	-0.17	-0.27	-0.08
Estonia	0.32	0.49	0.5	0.27

cont. table 16.

Finland	0.23	0.24	0.01	0.24
France	-0.13	-0.01	-0.18	-0.13
Greece	-0.53	-0.32	-0.53	-0.56
Spain	-0.19	-0.2	-0.25	-0.18
Netherlands	0.08	0.18	0.14	0.06
Ireland	0.02	0.02	0.02	0.02
Lithuania	0.1	0.1	0.03	0.11
Luxembourg	-0.21	-0.07	-0.42	-0.22
Latvia	0.05	0.08	0.13	0.04
Germany	-0.28	-0.37	-0.37	-0.27
Poland	-0.21	-0.12	-0.29	-0.21
Portugal	-0.33	-0.29	-0.34	-0.33
Romania	0.07	0.02	0.09	0.07
Slovakia	-0.19	-0.1	-0.28	-0.19
Slovenia	-0.24	-0.27	-0.23	-0.24
Sweden	-0.02	-0.03	0.02	-0.02
Hungary	-0.29	-0.28	-0.43	-0.27
UK	0	-0.05	-0.02	0.01
Italy	0.2	0.29	0.34	0.18
Europe outside the EU	0.02	0.12	-0.06	0.02
North Africa and Middle East	0.10	0.24	0.07	0.04
Sub-Saharan Africa	-0.14	-0.09	-0.08	-0.19
Asia-Pacific and South Asia	0.16	0.23	0.30	0.11
North America	-0.07	0.03	0.10	-0.09
Latin America	0.16	0.22	0.23	0.12

The international comparison of stress level paints a rather negative picture. The results for European countries (along with Sub-Saharan Africa) are among the worst, and the results for Poland are even slightly worse than the average for the European Union. It follows that the Poles are a nation most affected by stress in the workplace. Within the European Union only Germans, Greeks, Hungarians, Portuguese and Slovenians are more stressed out than Poles. Contrary to the expectations, novice entrepreneurs experience slightly less stress at work than the general population and employees, although it should be noted that the level of stress rises with the transition to the stage of an established company. This may indicate a lack of adaptation to the new mode of work and delegation of responsibilities with the development of the company. However, this is not a universal trend. For example, in Germany entrepreneurs experience more stress than employees, regardless of the stage of business activity.

Table 17. Job satisfaction among entrepreneurs and non-entrepreneurs

Country	Satisfaction among adult population	Satisfaction among TEA entrepreneurs	Satisfaction among owners of established enterprises	Satisfaction among entrepreneurs and non-entrepreneurs
EU	0.08	0.13	0.20	0.06
Belgium	0.15	0.07	0.29	0.15
Croatia	-0.09	-0.06	-0.2	-0.09
Czech Republic	-0.03	0.06	0.21	-0.06
Estonia	0.12	0.26	0.41	0.08
Finland	0.22	0.25	0.49	0.19
France	-0.07	-0.1	0.14	-0.08
Greece	-0.22	-0.22	-0.24	-0.22
Spain	0.14	0.29	0.2	0.11

#### cont. table 17.

Latin America	0.10	0.17	0.30	0.05
North America	0.19	0.18	0.63	0.17
Asia-Pacific and South Asia	-0.20	-0.11	-0.02	-0.26
Sub-Saharan Africa	-0.47	-0.38	-0.20	-0.57
North Africa and Middle East	-0.09	0.01	0.07	-0.16
Europe outside the EU	-0.03	0.09	0.15	-0.06
Italy	0.08	0.05	0.21	0.08
UK	0.26	0.27	0.34	0.25
Hungary	-0.03	0	0.05	-0.04
Sweden	0.13	0.14	0.23	0.12
Slovenia	0.07	0.11	0.1	0.06
Slovakia	-0.09	-0.02	0.13	-0.11
Romania	0.08	0.19	0.27	0.04
Portugal	0.06	0.27	0.19	0.02
Poland	0.13	0.27	0.26	0.09
Germany	0.09	-0.02	0.14	0.09
Latvia	0.19	0.27	0.32	0.15
Luxembourg	0.1	0.04	0.1	0.11
Lithuania	0.02	0.15	0.13	-0.02
Ireland	0.28	0.39	0.43	0.25
Netherlands	0.21	0.3	0.34	0.18

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

Poles are relatively highly satisfied with their job. In Poland entrepreneurs are significantly more satisfied with their job than employees. As regards novice entrepreneurs, their job satisfaction is almost the highest in the European Union (apart from Spain). The only negative aspect is that the satisfaction does not increase with the time of running a business, which can be observed in most countries, especially in Estonia and Finland. In general, European Union citizens are among people who are the most satisfied with their work. Slightly higher results were reported for Latin America and North America, although it should be pointed out that in the case of the latter only two countries were surveyed – Canada and Puerto Rico.

The nature of the Global Entrepreneurship Monitor survey allows for comparison of variables for different groups, in particular broken down by entrepreneurial motivation (Table 18, Table 19) and the sex of the entrepreneur (Table 20, Table 21). All the following analyses apply only to TEA entrepreneurs, i.e. pre-entrepreneurs and new entrepreneurs.

As for the analysis of well-being according to entrepreneurial motivation, it is clearly visible that there is a significant gap between entrepreneurs who start a business to take their chance and those who do so out of necessity. The well-being of the first group is much better, which can be observed in almost all the countries, including Poland. However, there are countries where the gap is particularly large. In the EU, they include: Germany, Hungary, Italy, Luxembourg, France and Sweden. In Poland, the difference is significant, though lower than the average for EU countries.

Table 18. Well-being and work-life balance of (TEA) entrepreneurs who started a business due to opportunity or out of necessity

Country	Well-being – opportunity	Well-being – necessity	Work-life balance – opportunity	Work-life balance – necessity
EU	0.20	-0.20	-0.03	-0.19
Belgium	0.19	0.18	-0.39	-0.45
Croatia	0.13	-0.34	-0.11	-0.06
Czech Republic	0.05	-0.14	b.d.	b.d.
Estonia	0.22	-0.03	0.09	0.05
Finland	0.43	0.22	0.02	0.06
France	0.17	-0.6	-0.2	-0.23

#### cont. table 18.

Greece	-0.24	-0.45	-0.31	-0.33
Spain	0.24	0.02	0.01	-0.53
<u>'</u>				
Netherlands	0.51	0.27	0.14	-0.02
Ireland	0.31	0.37	NDA	NDA
Lithuania	0.16	-0.05	0.03	-0.1
Luxembourg	0.22	-0.5	-0.06	-0.51
Latvia	0.13	-0.33	0.1	-0.2
Germany	0.19	-0.39	NDA	NDA
Poland	0.14	-0.11	NDA	NDA
Portugal	0.21	-0.12	-0.07	0.18
Romania	0.28	-0.05	0.16	0.21
Slovakia	0.14	-0.4	-0.19	-0.4
Slovenia	0.24	-0.08	-0.04	-0.33
Sweden	0.4	-0.32	0.08	0.11
Hungary	0.04	-0.75	-0.27	-0.69
UK	0.23	-0.44	-0.06	0.24
Italy	0.14	-0.62	0.43	-0.63
Europe outside the EU	0.29	-0.08	0.09	-0.03
North Africa and Middle East	-0.07	-0.32	0.14	-0.22
Sub-Saharan Africa	-0.46	-0.58	-0.08	-0.12
Asia-Pacific and South Asia	-0.04	-0.26	-0.07	-0.11
North America	0.49	0.06	0.29	0.35
Latin America	0.41	0.20	0.23	0.26

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

The difference in the well-being of entrepreneurs depending on their reasons to start a business can be explained in two ways. Firstly, entrepreneurs who start a business to seize a perceived opportunity feel better in their role and, therefore, – are more satisfied, which translates into an overall improvement of their well-being. However, an alternative explanation is also possible, namely that entrepreneurs who start a business out of necessity demonstrate worse well-being from the very start, which may be the result of unemployment or the lack of appropriate qualifications. It should be borne in mind that only TEA entrepreneurs were taken into account, and thus the level of well-being is not necessarily a direct result of the activities carried out.

As for the balance between work and private life, the situation is similar as in the case of well-being – the opportunity-driven entrepreneurs achieve a better work-life balance than those who start a business out of necessity. The difference is particularly large in the countries of Southern Europe, such as Italy or Spain. Surprisingly, in some countries of Latin America there is an opposite correlation – necessity-driven entrepreneurs typically achieve a better work-life balance.

Women who are novice entrepreneurs demonstrate better well-being than men. This tendency can be observed in most countries, although there are exceptions – for example, in Greece and the United Kingdom male entrepreneurs have significantly better well-being than women. This is not the case in Poland, where women enjoy a better well-being. There may be several reasons for this situation, and again it should be assumed that well-being may be a result of, a concomitant of or a cause for starting up a business. Due to their culturally established social role, men may feel more pressure at the moment of starting a business; on the other hand, women are more likely to experience higher levels of well-being when starting a business, although it should be borne in mind that the surveys for 2013 indicate that in Poland women are more likely to start a business out of necessity than men.

As for the balance between work and private life, the situation is similar for women and men: in most countries women achieve a better work-life balance, although again with the exception of some Latin American countries, where the balance achieved by men is higher. Unfortunately, the results of this part of the survey are not available for Poland.

Tabela 19. Well-being and work-life balance of women and men (TEA)

Country	Well-being – women	Well-being – men	Work-life balance – women	Work-life balance – men
EU	0.17	0.08	-0.01	-0.09
Belgium	0.26	0.13	-0.35	-0.53
Croatia	0.04	-0.07	-0.08	-0.07
Czech Republic	0.06	-0.01	NDA	NDA
Estonia	0.42	0.08	0.17	0.05
Finland	0.45	0.36	0.13	0.04
France	0.3	0	-0.11	-0.2
Greece	-0.49	-0.22	-0.39	-0.3
Spain	0.2	0.13	-0.03	-0.23
Netherlands	0.36	0.55	0.03	0.19
Ireland	0.35	0.31	NDA	NDA
Lithuania	0.06	0.14	-0.02	0.02
Luxembourg	0.38	0.17	-0.11	0.05
Latvia	0.09	0	-0.01	0.07
Germany	0.22	-0.03	NDA	NDA
Poland	0.12	-0.04	NDA	NDA
Portugal	0.14	0.1	0.17	-0.12
Romania	0.16	0.19	0.12	0.23
Slovakia	0.03	-0.15	-0.04	-0.39
Slovenia	0.17	0.16	-0.17	-0.1
Sweden	0.6	0.16	0.15	-0.02
Hungary	-0.05	-0.26	-0.22	-0.51
UK	-0.02	0.23	-0.05	-0.02
Italy	-0.05	0.02	0.54	0.17
Europe outside the EU	0.22	0.16	0.05	0.02
North Africa and Middle East	-0.04	-0.17	0.21	-0.01
Sub-Saharan Africa	-0.54	-0.47	-0.10	-0.09
Asia-Pacific and South Asia	0.03	-0.17	0.01	-0.12
North America	0.41	0.43	0.33	0.26
Latin America	0.31	0.40	0.24	0.22

When considering the average values in individual groups of countries, stress levels experienced by entrepreneurs do not depend on motivation. Some differences in individual countries can of course be observed. Contrary to expectations, in Poland entrepreneurs who seize an opportunity experience significantly greater stress than those who start a business out of necessity. This is most probably due to higher inner motivation among the first group of entrepreneurs, which makes them feel more stressed out.

Even more surprisingly, in Poland the latter group experience higher satisfaction with work, though the difference is not significant. This is a unique situation, which, apart from Poland, is observed only in three other EU countries: Estonia, Finland and Ireland; in the other countries the reverse relationship takes place. This may be due to the fact that the necessity-driven entrepreneurs who, before starting a business, very often were unemployed or performed duties that did not give them satisfaction, suddenly find themselves in a completely different situation. In this case, running a business activity more out of necessity than it is the case for the other group results in a higher level of subjective satisfaction with work.

Table 20. Stress and job satisfaction of opportunity-driven and necessity-driven entrepreneurs

Country	Stress - opportunity	Stress - necessity	Satisfaction – opportunity	Satisfaction - necessity
EU	-0.06	-0.10	0.17	-0.08
Belgium	-0.17	-0.33	0.07	-0.14
Croatia	-0.11	-0.09	0.01	-0.25
Czech Republic	-0.11	-0.39	0.08	-0.01
Estonia	0.5	0.3	0.22	0.41
Finland	0.24	0.42	0.18	0.5
France	-0.05	0.01	-0.09	-0.35
Germany	-0.35	-0.49	0.09	-0.36
Greece	-0.28	-0.49	-0.15	-0.42
Hungary	-0.27	-0.34	0.13	-0.36
Ireland	0	0.22	0.37	0.5
Italy	0.4	-0.38	0.08	-0.22
Latvia	0.11	-0.05	0.31	0.12
Lithuania	0.12	0.01	0.21	-0.03
Luxembourg	-0.12	-0.31	-0.02	-0.63
Netherlands	0.17	0.19	0.31	0.1
Poland	-0.24	0.02	0.24	0.35
Portugal	-0.43	0.07	0.34	-0.02
Romania	-0.16	0.38	0.2	0.15
Slovakia	-0.08	-0.16	0.22	-0.43
Slovenia	-0.3	-0.32	0.19	-0.17
Spain	-0.2	-0.18	0.35	0.15
Sweden	0.01	0.05	0.22	-0.38
UK	0.04	-0.38	0.35	-0.31
Europe outside the EU	0.15	0.12	0.18	0.02
North Africa and Middle East	0.23	0.32	0.07	-0.27
Asia-Pacific and South Asia	0.24	0.19	-0.07	-0.22
Sub-Saharan Africa	-0.08	-0.12	-0.34	-0.47
North America	-0.02	0.23	0.14	0.35
Latin America	0.22	0.26	0.18	0.16

In Poland, there is a significant gap between the level of stress experienced by women and men who are novice entrepreneurs. Women experience definitely less stress than men. The results in this regard vary from one EU country to another, although nowhere is the gap as significant as it is in Poland. These results become even more clear when compared to the level of well-being among female and male entrepreneurs; since women experience much less stress, they also enjoy higher levels of well-being.

In addition, in Poland female entrepreneurs are more satisfied with their work than male entrepreneurs, although the difference is not significant. Taking into account the average for EU countries, female and male entrepreneurs reach a similar level of satisfaction; while there are countries where women demonstrate higher job satisfaction (Germany, Hungary, Sweden), as well as those where men are more satisfied (Lithuania, Romania, the United Kingdom).

Table 21. Stress and job satisfaction among women and men (TEA)

Country	Stress – women	Stress – men	Satisfaction – women	Satisfaction – men
EU	-0.03	-0.06	0.13	0.13
Belgium	0	-0.41	0.05	0.08
Croatia	-0.06	-0.11	-0.26	0.03
Czech Republic	0.09	-0.25	0.05	0.06
Estonia	0.45	0.51	0.29	0.24
Finland	0.2	0.27	0.19	0.28
France	-0.12	0.05	-0.04	-0.13
Germany	-0.37	-0.37	0.22	-0.15
Greece	-0.41	-0.28	-0.29	-0.2
Hungary	-0.26	-0.3	0.14	-0.08
Ireland	-0.18	0.13	0.43	0.37
Italy	0.31	0.29	0.06	0.05
Latvia	0.04	0.1	0.2	0.31
Lithuania	0	0.14	0.01	0.22
Luxembourg	0.02	-0.11	-0.01	0.07
Netherlands	0.12	0.21	0.24	0.33
Poland	0.32	-0.32	0.32	0.25
Portugal	-0.33	-0.27	0.3	0.25
Romania	-0.06	0.06	0.04	0.29
Slovakia	-0.04	-0.14	0.11	-0.11
Slovenia	-0.4	-0.23	0.04	0.13
Spain	-0.13	-0.24	0.33	0.27
Sweden	0.14	-0.13	0.43	-0.04
UK	-0.12	-0.01	0.13	0.36
Europe outside the EU	0.15	0.11	0.17	0.06
North Africa and Middle East	0.42	0.17	0.11	-0.03
Asia-Pacific and South Asia	0.30	0.20	-0.06	-0.14
Sub-Saharan Africa	-0.08	-0.10	-0.40	-0.36
North America	-0.01	0.03	0.19	0.16
Latin America	0.26	0.21	0.15	0.19

In conclusion, the main differences between Poland and other countries in terms of the quality of life of entrepreneurs are as follows:

- the overall level of well-being in Poland is slightly lower than the average for the EU countries,
- the level of well-being of entrepreneurs in Poland is also slightly lower than the EU average,
- in Poland the well-being of novice entrepreneurs is similar to that of the owners of established enterprises,
- the average stress level in Poland is high, well above the average for EU countries,
- stress levels in slightly lower among novice entrepreneurs than in the general population,
- stress levels increase with the transition to the stage of an established company,
- job satisfaction in Poland exceeds the average for EU countries,
- job satisfaction among entrepreneurs in Poland is higher than in the general population, regardless of the stage of business activity,

- as in other countries, although entrepreneurs who seize an opportunity enjoy better well-being, they also experience higher stress levels and lower job satisfaction,
- women who are novice entrepreneurs in Poland enjoy a better well-being than men, experience less stress and higher job satisfaction.

# 4.2. Factors associated with the quality of life of entrepreneurs in Poland

The advantage of GEM at the individual level is that it allows for the identification of personal factors that are connected with quality of life indicators: well-being, work-life balance, stress levels and job satisfaction. Factors that are deemed to be related to quality of life indicators include: age, education, business training, business experience, income, role in the family (Parasuraman and Simmers, 2001). However, some researchers argue that these factors are irrelevant and that entrepreneurs do not enjoy better psychological well-being than employees (Chay, 1993). In this chapter, the issue is addressed with regard to Poland.

The following analysis examines the relation between quality of life variables and personal factors, such as:

- age (Table 22, Diagram 15),
- gender (Table 23),
- household size (Table 24),
- income (Table 25),
- Education (Table 26),
- sector of activity (Diagram 16, Diagram 17),
- growth aspirations (Diagram 18),
- entrepreneurial motivation (Diagram 19).

The following quality of life variables were considered:

- well-being,
- work-life balance,
- stress levels.
- job satisfaction,
- income satisfaction,

in addition, the analysis also includes two more variables related to work quality and dedication that are part of the so-called empowerment (Spreitzer, 1995), i.e. positive reinforcement:

- the ability to decide about one's activities,
- a sense of the importance of one's work.

The work-life balance analysed below differs from the analysis at the international level; here balance is, in fact, interpreted as the satisfaction of the respondents with how they divide their time between work and private life. The other two questions, i.e. about the balance in terms of satisfying one's needs and the effectiveness of actions, have been excluded from the survey for Poland in both areas because of the difficulty in obtaining answers in these areas.

The variables in the following analyses are expressed in a different way than in the comparative analysis at the international level. In this case they are not standardised, which means that the original values of Likert scale were applied, i.e. the respondents answered questions with values from 1 (strongly disagree) to 5 (strongly agree). The value 3 should be treated as a central value, which obviously does not mean that it is the average value. It should also be noted that the stress variable relates to the lack of stress, i.e. the higher the variable, the lower the stress level. The results were mostly presented separately for three groups: the general population, novice TEA entrepreneurs and owners and managers of established enterprises.

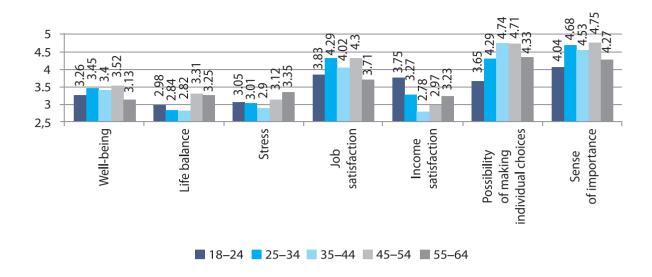
All the following tables again show the results for quality of life indicators for the adult population, novice entrepreneurs and owners of established enterprises. These results confirm earlier observations made through international comparisons. Entrepreneurs enjoy slightly better well-being than the general population, while there is a slight difference between the well-being of novice entrepreneurs and that of the owners of established enterprises. However, novice entrepreneurs achieve the worse work-life balance. The balance improves when they become the owners of established enterprises, although it is still worse than that of the general adult population.

Table 22. The relationship between quality of life and age

Age  Adult population	Well-being	Work-life balance	Stress	Job satisfaction	Income satisfaction	Possibility of making individual choices	A sense of the importance of one's work
Total	3.25	3.28	2.9	3.98	2.90	3.68	4.29
18–24	3.40	3.45	3.04	3.96	3.37	3.49	3.93
25–34	3.37	3.19	2.87	3.94	3.00	3.76	4.29
35–44	3.23	3.26	2.67	3.91	2.71	3.57	4.26
45–54	3.11	3.20	3.01	4.07	2.71	3.64	4.41
55-64	3.17	3.48	3.12	4.05	3.02	3.90	4.43
Novice entrepreneurs							
Total	3.40	2.95	3.02	4.14	3.17	4.38	4.56
18–24	3.26	2.98	3.05	3.83	3.75	3.65	4.04
25–34	3.45	2.84	3.01	4.29	3.27	4.29	4.68
35–44	3.40	2.82	2.90	4.02	2.78	4.74	4.53
45–54	3.52	3.31	3.12	4.30	2.97	4.71	4.75
55–64	3.13	3.25	3.35	3.71	3.23	4.33	4.27
Owners of established enterprise	s						
Total	3.37	3.09	2.79	4.13	2.93	4.28	4.40
18–24	NDA	NDA	NDA	NDA	NDA	NDA	NDA
25–34	3.41	3.26	2.77	3.84	3.05	4.26	4.28
35–44	3.33	2.99	2.50	4.34	2.77	4.28	4.39
45–54	3.51	3.00	2.97	4.09	2.89	4.13	4.33
55-64	3.24	3.20	2.95	4.16	3.01	4.42	4.63

Novice entrepreneurs also experience higher stress levels than the general adult population; interestingly, the lowest stress level is declared by the owners of established enterprises. Both novice and experienced entrepreneurs tend to be more satisfied with their work, while the highest income satisfaction is perceived by the group of novice entrepreneurs and decreases in the group of the owners of established enterprises, which is rather curious as it could have been expected that as the income increases the satisfaction should rise with the growth of the business. The variables on autonomy and a sense of the importance of work are higher for entrepreneurs, which is quite understandable. The perceived autonomy or possibility of making individual choices indicate the extent to which the respondents control their actions, while a sense of the importance of the work indicates how important is work in the life of the respondent.

Diagram 15. The relationship between quality of life and the age of novice entrepreneurs



The analysis of the relations between the quality of life and the age of the respondent brings interesting results. These results are similar for the general population, novice entrepreneurs and owners of established enterprises. The result for the youngest age group was not given, due to the fact that it is represented by only one respondent. The well-being is the highest among novice entrepreneurs aged 45-54. The results for the general population are slightly different, since it is the youngest group that is the most satisfied with life. Such a result among the entrepreneurs may signify that they have already achieved stability and their entrepreneurial activity is the culmination of their careers and it is the activity they had been planning for a long time and that brings them satisfaction. This is confirmed by the results of the analysis of job satisfaction and work and life balance, which are also the highest for this group. The last variable may be due to fewer obligations related to raising children that one has in this age.

It seems that the results concerning the relation between the age of a novice entrepreneur and stress and income satisfaction are interrelated. The highest stress level and the lowest level of income satisfaction is characteristic for entrepreneurs aged 35-44. This is most probably due to the fact that this is the period of life which involves the greatest responsibility for the family, as well as for its financial needs. The results concerning the possibility of making individual choices and a sense of importance are the opposite and are the highest for middle age groups.

#### **Quality of life in relation to gender**

Differences between men and women are in most cases not significant. Well-being of women entrepreneurs is generally higher than that of men, but in the stage of starting up a business (novice entrepreneurs) the situation is reverse. Regardless of the stage of activity, and generally of the fact whether the respondent runs a business, women's life balance is greater than that of men. When it comes to the level of stress, it is much lower among women in the early stage of the activity than among men, and even though it is growing with time, it remains at a lower level among women. In the case of men entrepreneurs, the stress level is almost unrelated to the fact of running a business and of its stage.

Table 23. Relation between the quality of life and gender

Gender	Well-being	Balance	Stress	Job satisfaction	Income satisfaction	Possibility of making individual choices	Sense of importance of the work
Adult population							
Total	3.25	3.28	2.9	3.98	2.90	3.68	4.29
Women	3.30	3.43	2.97	4.02	2.86	3.56	4.32
Men	3.21	3.16	2.85	3.95	2.94	3.77	4.27

#### cont. table 23.

Novice entrepreneurs										
Total	3.40	2.95	3.02	4.14	3.17	4.38	4.56			
Women	3.48	3.02	3.62	4.20	2.96	4.25	4.64			
Men	3.56	2.92	2.75	4.12	3.27	4.44	4.52			
Owners of established enterprises										
Total	3.37	3.09	2.79	4.13	2.93	4.28	4.40			
Women	3.49	3.28	2.95	4.03	2.97	4.21	4.29			
Men	3.32	3.00	2.72	4.18	2.91	4.31	4.46			

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

At the first stages of entrepreneurial activity, women experience higher job satisfaction, but then the difference is reversed. On the other hand, women reach lower income satisfaction at the early stage of the activity. When it comes to a sense of autonomy and of importance, the differences between women and men are not significant, the largest of them concerning a greater sense of self-determination among men at the early stage of entrepreneurial activity.

#### Quality of life in relation to household size and income

The household size and the quality of life are related to some extent. Three trends may be identified for the total population. The first trend concerns well-being, work-life balance and income satisfaction and is manifested by the fact that the values of these variables are the highest in households consisting of three persons. People who are single and those who are members of the household comprising at least five people experience the lowest stress level, while the level of work satisfaction is constant, apart from the largest households, where its value is the highest.

Similar trends may be observed in the case of entrepreneurs. The well-being is the greatest in people from three-person households, the best work-life balance was observed in single people and two-person households, the highest job satisfaction in the largest families, and the highest income satisfaction among single people and three-person households.

Table 24. Relation between the quality of life and household size

Number of people in the household	Well-being	Balance	Stress	Job satisfaction	Income satisfaction	Possibility of making individual choices	Sense of importance of the work
Adult population							
Total	3.25	3.28	2.9	3.98	2.90	3.68	4.29
1	2.90	2.85	3.05	3.94	3.01	3.48	4.33
2	3.28	3.44	2.76	3.91	2.85	3.76	4.12
3	3.35	3.49	2.80	3.97	3.06	3.67	4.33
4	3.26	3.17	2.92	3.92	2.87	3.67	4.24
5 and more	3.23	3.19	3.06	4.13	2.76	3.68	4.40
Novice entrepreneurs							
Total	3.40	2.95	3.02	4.14	3.17	4.38	4.56
1	3.37	2.89	3.30	4.32	3.42	4.23	4.54
2	3.28	3.48	2.63	4.20	3.14	4.02	4.32
3	3.59	3.19	3.09	3.90	3.50	4.58	4.53
4	3.46	2.66	2.81	4.00	3.12	4.50	4.65
5 and more	3.29	2.70	3.25	4.40	2.83	4.38	4.65

cont. table 24.

Owners of established enterprises										
Total	3.37	3.09	2.79	4.13	2.93	4.28	4.40			
1	3.49	3.68	2.08	4.24	3.34	4.30	4.33			
2	3.41	3.18	2.78	4.18	2.82	4.81	4.55			
3	3.62	3.39	2.65	4.21	3.08	3.93	4.49			
4	3.01	2.89	3.25	3.79	2.76	4.04	4.02			
5 and more	3.59	2.78	2.64	4.53	3.03	4.56	4.72			

The analysis of the results in terms of relation between income and quality of life challenges the claim that "money does not bring happiness". Almost all quality of life indicators grow with the increase in income and this is true for all groups – population and entrepreneurs at different stages of development. The only indicator that is inversely correlated is stress. However, this relation tends to be quite natural, since people with higher incomes are obviously exposed to more stress in the workplace.

Table 25. Relation between the quality of life and annual income

Roczny dochód w sumie w rodzinie	Well-being	Balance	Stress	Job satisfaction	Income satisfaction	Possibility of making individual choices	Sense of importance of the work
Adult population							
Total	3.25	3.28	2.9	3.98	2.90	3.68	4.29
0-24.000	2.92	3.03	3.13	3.82	2.47	3.28	4.11
24.001–48.000	3.27	3.31	2.90	3.96	2.79	3.78	4.29
powyżej 48.000	3.59	3.44	2.78	4.07	3.37	3.79	4.34
Novice entrepreneurs							
Total	3.40	2.95	3.02	4.14	3.17	4.38	4.56
0-24.000	3.20	2.93	4.17	4.48	2.60	4.21	4.54
24.001–48.000	3.35	2.80	3.21	4.03	2.89	4.42	4.48
powyżej 48.000	3.50	3.16	2.66	4.00	3.66	4.31	4.54
Owners of established enterpri	ses						
Total	3.37	3.09	2.79	4.13	2.93	4.28	4.40
0-24.000	3.24	2.98	2.72	4.17	2.18	4.34	4.33
24.001–48.000	3.14	3.28	3.08	3.98	3.00	4.12	4.32
powyżej 48.000	3.60	3.28	2.88	4.17	3.37	4.21	4.40

Source: the authors' own elaboration based on  ${\it Global Entrepreneurship\ Monitor\ 2013}$  data.

Similar relations occur in the case of entrepreneurs, though some of them are stronger or take place in a different direction. Life balance among novice entrepreneurs reaches the lowest value for average income. Job satisfaction reaches the highest level in case of novice entrepreneurs with the lowest income. Although this comes as a surprise, it may be explained by low income levels achieved at the first stage of business activity, which may, however, develop dynamically. The difference in terms of perceived stress is significantly higher between the entrepreneurs of different incomes: its level grows heavily with the increase in income. It may signify, that high income in the early stage of the activity is associated with a dynamic growth, which may outgrow entrepreneurs in terms of organisation. In the case of established entrepreneurs, stress is not so strongly dependant on income, but it generally is at a higher level.

#### Quality of life and the level of education

The quality of life in relation to education remains similar as it was the case with income. Better educated people experience higher levels of well-being and work-life balance. They also experience higher stress levels and higher satisfaction with incomes that are higher than for other groups. What is rather surprising is the fact that persons with basic schooling experience the highest level of job satisfaction, whereas the level of autonomy and sense of importance are very similar for persons with basic schooling as well as for people with professional and higher education, and lower for those with secondary education.

These results are, however, different for novice and established entrepreneurs. In the first group, the sense of well-being decreases slightly along with the level of education, and in the second group it reaches the highest level in persons with secondary education. Stress among novice entrepreneurs with higher education reaches the highest level in comparison with all other groups, while satisfaction with entrepreneurial activity decreases with rising levels of education. This may be due to the strong influence of people setting up a business out of necessity (there are more such persons in Poland than those who start up a business because of perceived opportunities) and claiming that such activity is below their skills.

Table 26. Relation between the quality of life and level of education

Level of education	Well-being	Balance	Stress	Job satisfaction	Income satisfaction	Possibility of making individual choices	Sense of importance of the work
Adult population							
Total	3.25	3.28	2.9	3.98	2.90	3.68	4.29
Elementary and vocational	3.16	3.22	3.09	4.10	2.83	3.74	4.30
Secondary	3.27	3.23	2.84	3.83	2.79	3.57	4.19
Higher	3.42	3.45	2.68	3.99	3.18	3.71	4.38
Novice entrepreneurs							
Total	3.40	2.95	3.02	4.14	3.17	4.38	4.56
Elementary and vocational	3.49	2.95	3.03	4.35	2.92	4.67	4.62
Secondary	3.33	2.94	3.23	4.03	3.34	4.11	4.44
Higher	3.39	3.10	2.50	3.95	3.28	4.34	4.64
Owners of established enterprises							
Total	3.37	3.09	2.79	4.13	2.93	4.28	4.40
Elementary and vocational	3.32	2.66	2.97	4.22	2.80	4.47	4.43
Secondary	3.46	3.21	2.63	3.92	3.03	3.97	4.17
Higher	3.34	3.42	2.84	4.37	3.01	4.48	4.63

Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

## Quality of life and the business sector

Entrepreneurs starting up their business activity in the extraction sector stand out in terms of quality of quality-of-life indicators: they achieve the highest level of well-being, the lowest level of work-life balance, stress and income satisfaction, the highest levels of job satisfaction, autonomy and significance of work. Such paradoxical results are most likely caused by a conservative approach to business in this sector.

More interestingly, these results are not confirmed in the case of entrepreneurs running established enterprises: they do experience the lowest stress levels and the highest level of - well-being, but at the same time, they enjoy the best work-life balance, while the other indicators reach very similar levels for all business sectors.

Diagram 16. Relation between the quality of life and the business sector of novice entrepreneurs

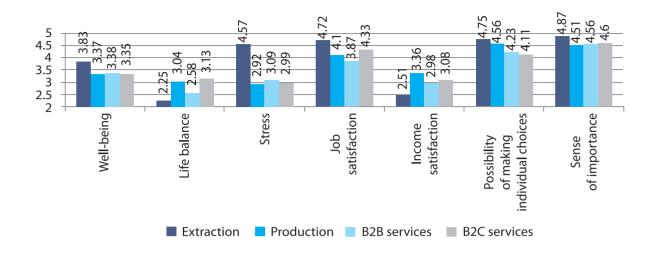
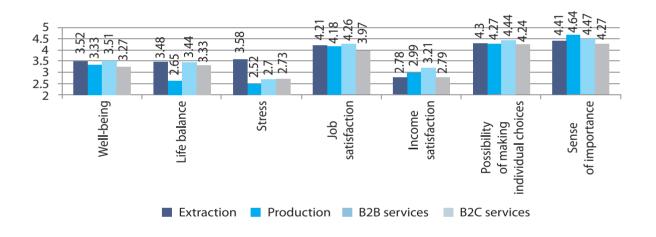


Diagram 17. Relation between the quality of life and the business sector of established entrepreneurs

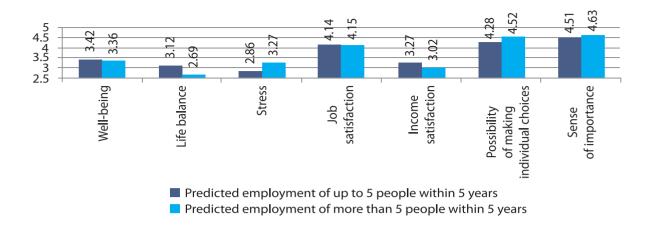


Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

# **Quality of life and growth aspirations**

Quality of life is also somehow linked to the growth aspirations of entrepreneurs. In this analysis, novice entrepreneurs were split into two groups: those who declare that they will employ more than five persons within 5 years and those who do not have such ambitions. The levels of well-being and job satisfaction in both groups generally do not differ. The more ambitious group, however, reached a significantly lower level of work-life balance, but at the same time experiences significantly lower levels of stress. The first result may be due to high ambition levels and the shift of emphasis in life towards business activity, which causes imbalance. More ambitious entrepreneurs are at the same time less satisfied with their incomes and experience a higher level of autonomy and importance. Generally this creates an image of ambitious entrepreneurs who are eager for success but unsatisfied with their current situation.

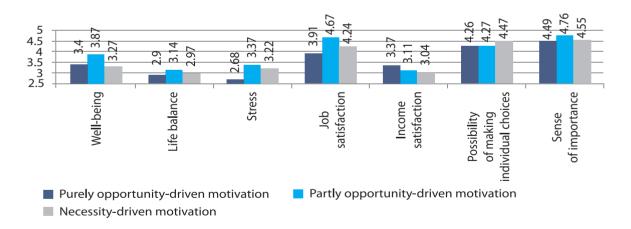
Diagram 18. Relation between the quality of life and growth aspirations of novice entrepreneurs



## **Quality of life and motivations of entrepreneurs**

The earlier international comparison shows the relation between the quality of life and entrepreneurial motivations. However, it would be useful to carry out a more accurate analysis covering the breakdown by the following three types of motivation: pure motivation with the objective of realising an opportunity, motivation partly based on realising an opportunity and necessity-driven entrepreneurship motivation. Differences in the quality of life for these three groups of novice entrepreneurs are quite significant and, paradoxically, the second group reaches the highest values for most indicators – entrepreneurs who starting a business followed partly the desire to realise an opportunity and partly were driven by necessity. They reach the highest levels of well-being, work-life balance, job satisfaction and enjoy a sense of importance of their work; they also experience lowest stress levels in comparison with other groups. The two remaining groups are in the forefront only in respect of two indicators: entrepreneurs who are entirely motivated by business opportunity experience the highest income satisfaction, while persons who are solely necessity-driven enjoy the highest sense of autonomy.

Diagram 19. Relation between the quality of life and motivations of novice entrepreneurs



Source: the authors' own elaboration based on Global Entrepreneurship Monitor 2013 data.

These results contradict the view that entrepreneurship motivated by opportunities has the most value and brings attention to the possible explanation that entrepreneurs, whose motivation is more complex, multidimensional, and, at the same time, complete, experience the highest quality of life. The highest level of autonomy experienced by necessity-driven entrepreneurs may be again due to the contrast between being permanently employed and running a business, to which although they are partly forced, it ensures a sense of independence.

# 4.3. Summary

In conclusion, a dozen or so most significant relations between the quality of life and personal characteristics may be pointed out:

- the well-being of entrepreneurs is higher than in the general population,
- the well-being of novice entrepreneurs is similar to that of the owners of established enterprises,
- life balance of novice entrepreneurs is lower than in the case of general adult population; it increases slightly in case of established entrepreneurs,
- novice entrepreneurs experience higher levels of stress than full-time employees, while established entrepreneurs experience lower stress levels,
- entrepreneurs enjoy higher levels of job satisfaction than full-time employees,
- income satisfaction is the highest among novice entrepreneurs,
- sense of autonomy and importance of the work are higher for entrepreneurs than for full-time employees,
- the highest level of well-being, work-life balance and job satisfaction is achieved by novice entrepreneurs aged 45–54,
- the highest level of stress and the lowest level of income satisfaction is reached by entrepreneurs aged 35–44,
- women-established entrepreneurs enjoy higher levels of well-being than men, but in the case of novice entrepreneurs the situation is reversed,
- women entrepreneurs achieve a higher work-life balance than men,
- stress in case of women is at a much lower level than in case of men in the early stage of conducting a business activity,
- quality of life indicators increase as the income grows, which is not the case with stres that is exacerbated,
- better educated people enjoy higher levels of well-being, work-life balance and income satisfaction, however, they experience higher stress levels than others,
- more ambitious entrepreneurs achieve a lower level of work-life balance and lower stress level,
- entrepreneurs who are only partly driven by the desire to realise an opportunity achieve the highest quality of life.

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