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# The Concept of Creativity in Entrepreneurship

**Local environment has an influence on decision about starting a business and on selection of a place for this purpose. Functioning of a long-term business, in turn, encourages a local economy growth. Business environment is considered one of the most significant elements of development. P.D. Reynold points out that entrepreneurship nowadays is regarded as necessary part of city economical system, which constantly attracts a lot of attention of the society. The density level of entrepreneurial activity indicates a city and business environment compliance with the requirements of entrepreneurs' and investors' objectives (Reynold, 2011).**

In 2015 SEB Bank in Latvia carried out the research into reasons keep residents from setting up their own businesses, and the main conclusion was made that fears and lack of creative ideas deter Latvian population from starting an entrepreneurial activity. Latvian respondents, who could however be interested in entrepreneurial activity but don't start their own business, answering the question about reasons, indicated a lack of creative ideas (59%), a fear of the failure (43%), an overgrown bureaucracy (48%) (SEB, 2015).

Authors of the paper want to find out how creative is youth's thinking in Daugavpils, because in 2016, when authors

did the research if young people are ready for entrepreneurial activity and if they want to start it, young people's readiness for business activity was revealed, but they were afraid of deficiency in knowledge and creativity.

In our century of information and knowledge, the creativity has become burning issue of the day. Creative personalities are valued not only in art, education, science, management, politics, but also in business and in every other field of activity. Ability to find creative solutions, adjusting to persistent changes is substantial in nowadays dynamic developmental growth oriented society. Modern society experiences constant changes connected with competition growth world-wide, economic crises, increased environmental and other problems (Inovatīva un radoša domāšana, 2014)

Social anthropologist Viesturs Celmiņš emphasizes an exceptional significance value of creativity in modern business developmental growth (Radošums kā degviela biznesam, 2017).

## Theoretical aspects of creativity

Psychological literature offers more than 60 different definitions of creativity, but there are universally accepted concepts too.

Conception of creativity in the course of time has been changed and variously termed within different cultures. The

word „creatio”, already used in Latin, was transformed and is operable in different European languages. Later ability to create was associated with a specific natural talent and a concept of genius.

One of the most essential characters of personality is creativity, and today it also becomes significant question in the context of Continuing Education. We should use creative talent to generate ideas, should exercise our imagination and develop innovations even if there are no external stimulus. Sometimes creativity is associated with artistic expressions in dance, pictorial arts, drama, music, which are natural talents most of us have. However, this is limited and narrow view of creativity. Every intellectual activity could be considered creative, as mind itself is versatile and inventive.

Intellect researcher J.P Guilford (1968) has defined four factors of creativity:

- flexibility of thinking, the ability to easily transform an experience, changeover of attitude,
- streaming – originating ideas as free as possible,
- originality, the component based on various, distant associations, precision and perfection.

Innovations are associated mainly with introduction of creative ideas in organizational environment. Therefore, individual and team creativity is the source of innovations in organizations. It is essential to draw a line between creativity and innovation. The first one is used mostly to describe new idea, approach, but the second one is the idea utilization in certain field. It is very important to produce innovations that benefit not only individuals, but also society as a whole.

An innovation is connected with instability and ability to adapt to swiftly changing environment. Creativity often emerges from ideas flow. This, almost au-

tomatic, but focused consciousness mostly appears in solving complex issues, which requires breakthroughs and innovations, in other words finding solutions to problems (Guilford, 1968).

Emotions, attitude, persistent thinking process, inner motivation, problem-solving methods are essential influential factors on creativity.

Creativity is frequently comprehended as a certain way of thinking. M. Boden (2004) separates two different types of creativity: unexpected and impossible.

The first type of creativity involves ideas generated as combinations of ones already exist (Boden calls it combining creativity). The second one is more profound and contains space for discoveries, expansion and transformation, completely new ideas are created in this way (it is the search and transformation creativity) (Boden, 2004).

A. Pudmenzky (2004) has defined creativity as the phenomenon, described by the following characteristics:

- exploration (discovery),
- novation,
- usefulness,
- overview – expansion to the levels, wherefrom new horizons open up.

According to the way new ideas are generated, creativity could be divided in 3 groups:

- connective (new combinations of existing ideas),
- explorative (generation of new ideas via researching into certain concepts),
- substitutive (origination of new ideas replacing different items so new structure can be created) (Pašrealizācija radošā attīstībā, 2015).

Creativity may be understood as the characteristic feature, influenced by competence, creative thinking and motivation.

Creative thinking is a specific procedure, which can be used to solve various problems. No doubt, creativity depends on inner factors: an intellect and personality's characteristics. However, there is still a possibility to find creative solutions to problems using particular methods. Therefore, creativity could be viewed as techniques. (Inovācija un radoša domāšana, 2014).

Factors which encourage creativity:

- Rich and diverse environment that stimulates breakthroughs, experiments and creation.
- Free relationships between children and adults.
- Free will, independence and a freedom of choice.
- Appropriate motivation, emotional and value system formation, proper development of personality characteristics.

It was observed that music written by Mozart, has very positive influence on creativity. Researchers have noticed significance of open environment and freedom in educational process.

Creativity is impacted by examples around. Children, growing up with creative parents, are more creative themselves (Rothenberg, 2004). R. Sternberg pointed out to serve, as an example is the best way to cultivate students creativity, because children learn to be creative not when they are asked for, but following somebody's example (Sternberg, Lubart, 1996).

### Research into creative thinking of young people in Daugavpils

In order to accomplish the objective of the paper – to analyse readiness of young people in Daugavpils to start entrepreneurial activity and to define the level of their creative thinking – case study method was applied, this method has gained decent acceptance and is widely used in social sciences (Yin, 2003). Case study

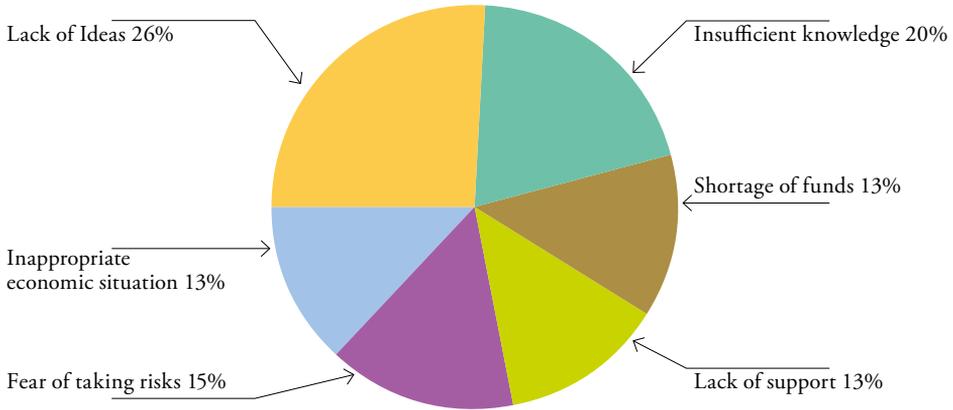
is the complex approach which includes methodology, data processing methods, input data analyses and provides interpretation of results received or description of situation. There is no strict indication about exact amount of samples for certain case study, neither how many cases should be examined within one research in certain subject. The quantity of cases is researcher's responsibility (Yin, 2003), and researcher's limitation is resources availability.

In 2016 authors carried out the research *Daugavpils youth readiness for entrepreneurial activity*, questioned 153 young people from Daugavpils. According to the survey, 73% of respondents want to set up their own business, but they have a fear of insufficient qualifications, and 54% of questioned young people answered, they have lack of ideas, which shows that young people are not particularly creative.

Respondents of the research, conducted by authors in 2016, were asked to answer several questions related to general attitude towards entrepreneurial activity, as well as characteristics and knowledges required to be an entrepreneur and possible obstacles to start business, also young people were informed about the support program for businessmen. According to the information received in 2016: 73% of 153 young people interviewed would like to become business owners.

It turned out that 20% of respondents in their opinion would be ready for an entrepreneurial activity. Nevertheless, setting up a business is a turning-point and there are obstacles, which delay doing it, that is why the question: *What is in your opinion a major obstacle to start an entrepreneurial activity?* was also included in the questionnaire (see Figure 1.).

Among key obstacles, a lack of ideas was mentioned. Insufficient knowledge, a shortage of funds, inappropriate economic situation, and a lack of support play a certain role too. A significant barrier is also

**Figure 1 Obstacle to start an entrepreneurial activity**

Source: Caplinska A., Stasane J. (2016).

that young people do not want to take a risk. They fear that their business will not bring profit but losses, and this way they could get into debts and loans. In authors' opinion, the lack of ideas could be of two kinds. On the one hand, it could be a real shortage of ideas, because many ideas are already exhausted, on the other hand – not all ideas could be successful and profitable exactly in Daugavpils, as well as a great role is played by young peoples' level of creativity.

Mentioned above also brought authors to the idea about the necessity of research into creative thinking of Daugavpils youth. According to the research carried out in 2016, authors came to conclusion that young people in Daugavpils would like to set up their own business, theoretically are ready, and in the nearest time would start entrepreneurial activity. However, every day we see that enterprises belong to young people appear and develop less and less often. As seen from the research results, the main obstacle for young people to start their own business is the lack of ideas. This also indicates possibly low level of young people's creativity, which at the moment, and according to authors opinion, is little-studied and insufficiently thought about.

Answering the question: *Do you think, if creativity is one of business activity preconditions?* most of respondents (93%) replied

that for sure, creativity plays a significant role in running a business, and only 7% indicated that it is not among preconditions of entrepreneurial activity.

E.P. Torrance's test was applied to examine the creativity of young people in Daugavpils. E.P. Torrance is one of the prominent researchers of creativity, who developed tests of creative thinking: Torrance Tests of Creative Thinking (Torrance, 1966, 2007), which have had many modifications over time. These tests were developed based on J.P. Guilford's (Guilford, 1968) concept of creative abilities – divergent thinking. The divergent thinking is the process in which thoughts from one starting point go in different directions, searching for many ideas and choices. In tests of divergent thinking several possible solutions are generated for one problem or question (Torrance, 1966, 2007; Guilford, 1968).

Abbreviated Torrance Test for Adults, ATTA (Goff, Torrance, 2002) based on the classic TRDT (Torrance, 1966) with the purpose to develop less time-consuming method for examination of creative potential. The ATTA includes three from nine TRDT tasks. One of them is the verbal response task, in which participants has to imagine hypothetical situation and list consequences of these hypothetical events. The two other tasks are figural, re-

spondent should finish incomplete drawings, abstract lines or geometrical forms.

The ATTA as well as other TRDT measures four subskills of creativity which, according to Torrance's theory, build a person's creative potential (Goff, Torrance, 2002):

- fluency – the ability to generate many ideas according to the task instruction;
- originality – the ability to create completely new, unique ideas,
- flexibility – the ability to process information in different ways responding to one and the same stimulus,
- elaboration – the ability to embellish an idea with details.

In addition to four basic subskills, the TRDT and the ATTA allow to evaluate creativity indicators, which provide the full description of individual's creative potential. Unlike the subskills, which can be evaluated almost for each answer, creativity indicators may or may not appear in participants responses. The following creativity indicators are evaluated within the ATTA:

- Richness of imagery – answers reflect a vivid, colourful imagination, the responses are intensive and appealed to such senses as touch, smell, sight.
- Emotional expressiveness – emotions are involved in the answers.
- Future orientation – responses provide manifestations of consequences of hypothetical events.
- Humour – answers evoke a smile, seem to be funny, strange.
- Provocative questions – defined questions, which induce to look at the situation from other, different point of view.
- Openness: resistance to premature closure – a conclusion is delayed long enough to wait for a mental jump, which provokes the generation of original ideas.

- Unusual visualization – any visual perspective different from static, straightforward point of view.
- Movement and/or sound – an appearance of movement and/or sound in the answer.
- Abstractness of titles – the ability to add verbal meaning to an object.
- Context (articulativeness of telling story) – in the given answer individual's ideas are placed in the certain context, story, system.
- Combination/synthesis of two or more figures – several sort of unconnected stimuli are united in one image.
- Internal visual perspective – person's attention extends beyond externally visible, he gets into internal mechanism of things and dynamics.
- Fantasy – picturing things and persons impossible in reality.

The worldwide practice has proved – the TRDT parameters of creativity are evaluated by trained specialists, then level of evaluators' consistency is high ( $> 0.90$ ) (Kim, 2006). Nevertheless, E.P. Torrance himself considers that even if evaluators have not been specially trained, following the handbook instructions precisely will allow them to evaluate criteria of creativity with certain level of reliability (Kaufman, Plucker, Baer, 2008). The ATTA handbook mentioned evaluators' consistency for criteria of creativity varies from 0.95 to 0.99 (Goff, Torrance, 2002).

From March till May, 2017 the *Research into creative thinking of young people in Daugavpils* was carried out using Torrance's test. The target group, that is, the general totality of the survey, consisted of young people between the age of 16 and 25 years, the total count of this age group in Daugavpils in 2017 was estimated as 7660 people. Altogether 90 randomly selected young individuals of this age took part in the research (57 females, 33 males). This particular participants' age

**Table 1 The level of young people’s creative thinking in Daugavpils**

Index of Creative Thinking	Level of Creative Thinking
<30	Low level of creative thinking
30-34	Level of creative thinking below the average
35-39	Almost average level of creative thinking
40-60	Average level of creative thinking
61-65	Level of creative thinking a little over the average
66-70	Level of creative thinking above the average
>70	High level of creative thinking

Source: Caplinska A., Stasane J. (2017).

was selected, because according to European Union employment law, young people’s age is defined between 16 and 25. Before performance of the tasks, respondents were given the explanation about the essence and purpose of tests of creative thinking. Results were evaluated in two stages.

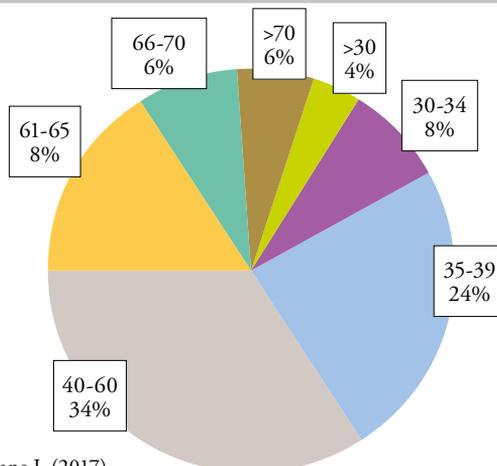
Participants submitted seven answers about themselves and fulfilled two tasks of Torrance’s test evaluated by authors of the research using Torrance’s test handbook.

In order to get more details about respondents, there were put differentiated answer variants in the questionnaire, as well as two tasks of Torrance’s test, where young people had to finish incomplete drawings, to complete the picture and to come up with the title for it.

The answers for the evaluation were obtained using *Abbreviated Torrance Test for Adults, ATTA* (Goff, Torrance, 2002). The tests, applied in the research, were based on principles of classic Torrance’s test of creative thinking (Torrance, 1966, 2007), but adapted for short-term management. Tests consisted of two tasks. In both of them participants had to give figurative answers. The answers were evaluated according to the following criteria: fluency, originality, elaboration, flexibility, resistance to premature closure, unusual visualization, movement and sound, abstractness of titles, context, combination of two or more figures, internal visual perspective and fantasy.

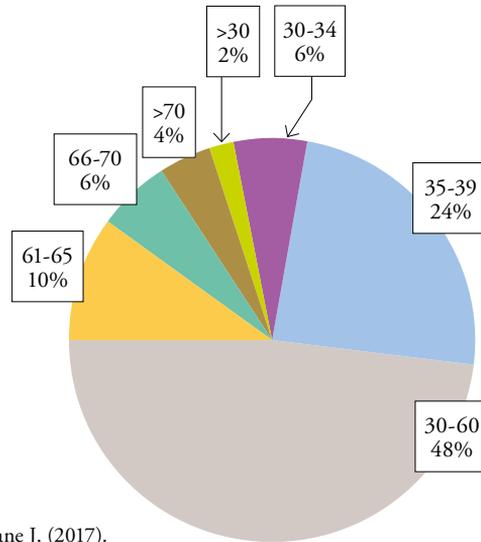
Young people with secondary education make up 21% of the total number of respondents, 47% with the basic educa-

**Figure 2 The level of young people’s creative thinking in Daugavpils**



Source: Caplinska A., Stasane J. (2017).

Figure 3 Young women's level of creative thinking in Daugavpils



Source: Caplinska A., Stasane J. (2017).

tion, 19% with the secondary professional education, and 13% with higher education. Major part of participants submitted the answers currently continue their studies – 77%, but 33% have graduated and in the nearest time want to level up their education.

Answering the question, if respondents work the paid job, most of them (73%) indicated that do not, the rest 27% have paid job.

Besides this, authors found out if there are business owners among participants. It appeared that 6 individuals of 90 have their own business.

Authors of the research analysed and evaluated the test results with the help of the handbook of Torrance's test. Determinative criteria of creativity level are given in the handbook, and are listed in the Table 1 (*Тест креативности Торренса*, 2016). Completed by young people tests, in which took part 90 respondents (63% women and 37% men) were evaluated – see Table 1.

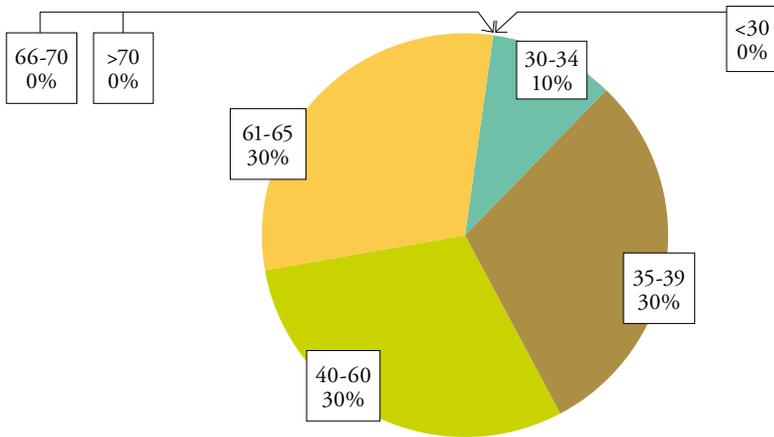
Identifying overall level of young people's creative thinking in Daugavpils, authors analysed all 90 tests, and assigned level coefficients of creative thinking for this age category. The major part of Daugavpils youth is on average level of crea-

tive thinking, within the range from 40 to 60 points, which in percentage terms corresponds to 34% of respondents, 24% – have almost reached average level of creative thinking, 8% – possess level of creative thinking below the average, and 4% have a low level of creative thinking. In their turn, 16% of young people are a little over the average level, 8% – are within the range of the level of creative thinking above the average, and 6% of participants have high level of creative thinking (see Figure 2).

Many people, especially young, limit themselves considering their creative potential cannot be increased. Creative skills and creativity itself, however, can be and have to be developed. It is the same skill as all the other, require from everyone regular trainings and step-by-step development (*Pašrealizācija radošā attīstībā*, 2015). Creative thinking can be trained in the same way as any other skills, such as memory or reading skills.

The authors have analysed the level of creative thinking in more details, describing females' and males' levels of creative thinking. Young women's level of creative thinking in Daugavpils is illustrated by Figure 3. Wherein we can see that most of women in Daugavpils have an aver-

Figure 4 Men's levels of creative thinking in Daugavpils



Source: Caplinska A., Stasane J. (2017).

age level of creative thinking, within the range between 40 and 60 points, which in percentage terms is 48%, 24% – have almost reached average, 6% – are on the level of creative thinking below the average, and only 2% of participated women possess low level of creative thinking. On the other side, 10% of respondents are a little over the average level, 6% of participated females possess the level of creative thinking above the average, and only 4% have high level of creative thinking.

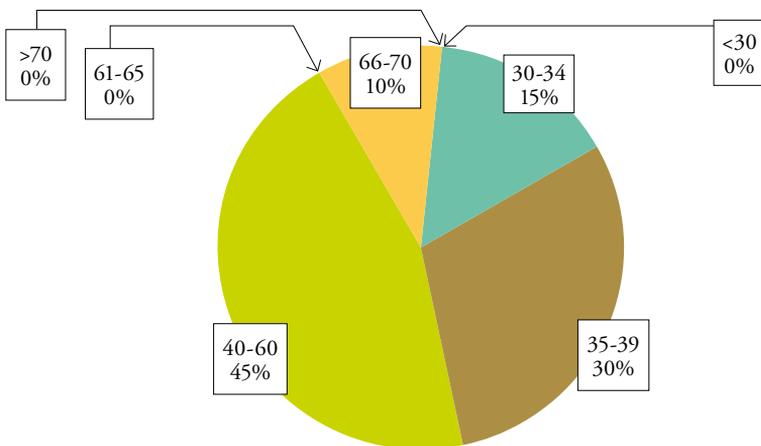
Thirty-three interviewed men from total of ninety respondents showed very interesting and clear distribution of levels of creative thinking. There was no one with high level of creative thinking, neither such individuals who had the level of

creative thinking above the average, nor ones with the low level of creative thinking. Among young men 30% have an average level of creative thinking, 30% – a little below the average, 30% – a little over the average level and only 10% of male respondents obtained low level of creative thinking – Figure 4.

Authors have separately evaluated the levels of creative thinking for certain age groups in order to define the most creative age group of young people.

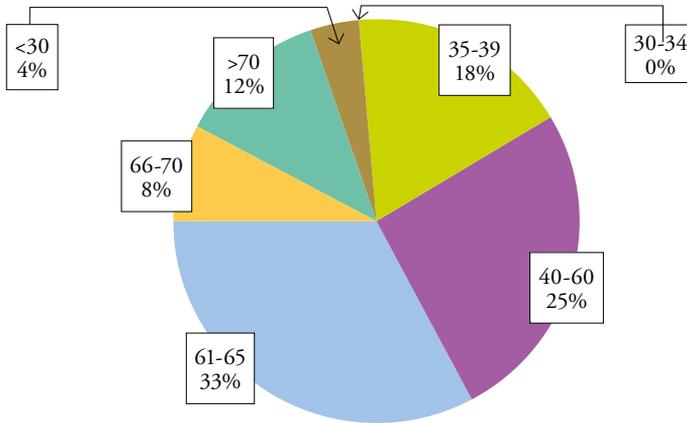
As can be seen from the Figure 5 most of young people within age group 16 to 18 years old have average level of creative thinking: 30% of individuals are a little below the average, but 15% are on the

Figure 5 The level of young people's creative thinking in Daugavpils, age group 16 to 18



Source: Caplinska A., Stasane J. (2017).

**Figure 6 The level of young people's creative thinking in Daugavpils, age 19 to 22**



Source: Caplinska A., Stasane J. (2017).

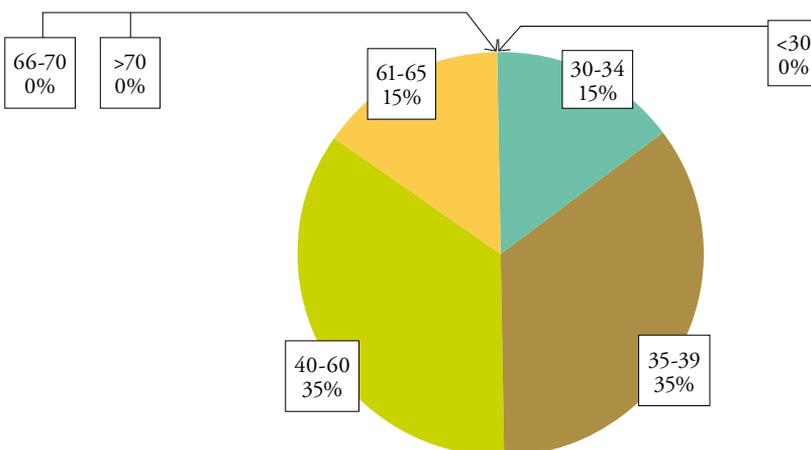
level of creative thinking below the average. In this age group there are no young people, who have low level of creative thinking, neither individuals on a high level, nor ones with the level of creative thinking a little over the average, but 10% of respondents showed the level of creative thinking above the average.

Authors have analysed and evaluated the level of creative thinking within the age group 19 to 22 years old, and based on the outcome can conclude that most of individuals have the level of creative thinking a little over the average: 25% of respondents are within the average, 18% have almost reached the average level, but 4% possess a low level of creative thinking. 12% of young people this age have

high level of creative thinking and 8% are on the level above the average. Authors consider that age group mentioned above has shown very good results of creative thinking – see Figure 6.

Analysis and evaluation of the level of creative thinking within the age group 22 to 25 years old showed that 35% of young people of this age are individuals with the average level of creative thinking, and the same number of respondents are a little below the average line, 15% of participants are a little above the average and 15% have the level of creative thinking below the average. There were no individuals with low, neither with high creativity levels within this range.

**Figure 7 The level of young people's creative thinking in Daugavpils, age group 22 to 25**



Source: Caplinska A., Stasane J. (2017).

## Conclusions

Before now the most effective enterprises produced goods with the best price-performance ratio were the most successful at the market. Nowadays marketing wars are won with the use of creativity. To become distinguished at the market, business has to find new ways to attract the customers. An enterprise has to become creative working together with creative individuals.

Key obstacles keep young people from starting entrepreneurial activity are a lack of ideas, a shortage of funds, insufficient knowledge and fear to take risks.

Generally, young people in Daugavpils have an average level of creative thinking, but there is a large part of young individuals, according to E.P. Torrance's test, have the level of creative thinking below the average, it means training and development of creative thinking is required.

Many people think creativity is not possible to improve or expand, but psychologists conducted many researches came out to the conclusion that creativity can be trained and developed at any age, of course, having the will to do it.

Entrepreneurship based on creativity is economically stable and independent. It has the ability to find efficient solutions for all kinds of non-typical problems, the ability to create where others cannot and even could not think about, and exactly this specific ability brings a profit to creative business.

The creative process is hidden activity with no need for witnesses or evaluations. To bring and develop creativity in business, first of all it's necessary to ensure acquisition of methods and strategies required for creative activity, development of skills for self-control, as well as possibilities of choice and new inventions.

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