

Konrad Piotrowski*
Anna Izabela Brzezińska**

Identity, self-sufficiency and disability in the context of educational and vocational activity

This study focused on relations between identity and sense of self-sufficiency. These relations were analysed in the context of educational and vocational activity. 204 persons without disabilities and 230 persons with different kinds of disability participated in the study. Participants were divided into three groups: (1) 18-24-year-olds – students, (2) 25-30-year-olds – unemployed and (3) 25-30-year-olds – employed. The results revealed that unemployed people have significant problems with identity formation. This group obtained the highest scores on ruminative exploration and the lowest scores on the scales of commitment making and identification with commitment. Self-sufficiency proved to be a moderator of the relations between educational/vocational activity on the one hand and exploration in breadth and exploration in depth on the other hand. In students, level of exploration was high in individuals with a high sense of self-sufficiency whereas in the unemployed strong exploration was observed in the group with low sense of self-sufficiency. The need to conduct studies where participants are recruited from populations which seldom attract researchers' interest, such as the unemployed and people of low social status, is also noted.

Keywords: *commitment making, disability, educational activity, exploration in breadth, exploration in depth, identification with commitment, identity, ruminative exploration, self-sufficiency, vocational activity*

Introduction

Life-span psychology emphasises the significance of punctual (on-time) performance of developmental tasks (Havighurst, 1948; Smith, 2004) which are characteristic of particular stages of life. Quality of performance of developmental tasks which are culturally attributed to childhood and adolescence are treated as indicators of individual readiness to enter adulthood. Early or late motherhood, prolonged spells of post-graduation unemployment or difficulty building close relationships can change the trajectory of the individual's development and delay or accelerate transition to adulthood (Bee, 2004). In the period of emerging adulthood (Arnett, 2000) which starts at about 18/20 years of age and frequently lasts until the end of the third decade of life, one of the most significant tasks which young people face is graduating and starting vocational activity. Fajdukoff, Kokko and Pulkinnen (2007) found that achieved identity status was the more frequent the later the individual completed his/

her education and entered employment. Danielsen, Lorem and Kroger (2000) and Frisèn and Wängquist (2010) also found that the context of development determined by the individual's current educational-occupational status correlates significantly with identity status at the onset of adulthood.

People with disabilities are one social group which experiences particularly profound problems in the area of educational and vocational activity. Research conducted in various countries (Newacheck, 1989; Adamowicz-Hummel & Rozborska, 2003; Wells, Sandefur & Hogan, 2003) has found that such people terminate their education earlier than non-disabled persons and rarely continue to study at an academic level. The rate of unemployment is significantly higher for this group. Duration and type of education as well as the vocational activity taken up in the period of emerging adulthood are crucial not only for social integration (Carnaby, Lewis, Martin, Naylor, & Stewart, 2003) i.e. inclusion of the disabled into the mainstream of adult social life. Both forms of activity are a key factor

* Warsaw School of Social Sciences and Humanities, email: konrad.piotrowski@swps.edu.pl

** Institute of Psychology, Adam Mickiewicz University, Poznań, email: aibrzez@amu.edu.pl

in the development of fundamental properties for adult functioning.

Personal identity, which has been regarded as an essential component of human personality since the times of Erik H. Erikson (1968), is one such property. According to Anna I. Brzezińska (2007), personal identity is related to the formation of the self-structure and is expressed through identification with the image of one's past, present, and future and with one's own goals and action standards. Identity has several components: content components such as personal features to which an individual attaches particular significance, forms of activity which the individual considers to be of paramount importance, relations with others, as well as plans and aspirations (Oleś, 2008).

James Marcia (1966) distinguished two pivotal identity-formative processes: exploration, and commitment. However, further scientific findings have led to the evolution of the concept of identity formation (Grotevant, 1987; Meeus, Iedema & Maassen, 2002). The authors of the recently developed *Dual-Cycle Model of Identity Formation* (Luyckx, Goossens et al., 2006; Luyckx, Schwartz et al., 2008) distinguish five interrelated dimensions which co-exist in the entire course of an individual's life and are involved in the construction of identity status.

These dimensions are: (1) exploration in breadth i.e. the extent to which an individual seeks various alternatives in relation to his/her goals, values, preferences, and beliefs before making appropriate commitments, (2) commitment making i.e. the extent to which the individual makes his/her choices and commitments relative to issues which are important for him/her, (3) exploration in depth i.e. in-depth assessment of the decisions and choices already made in order to determine the degree to which these commitments meet the individual's personal standards, (4) identification with commitment which determines the degree to which the individual identifies with the choices and commitments made, (5) ruminative exploration concerning difficulties experienced while becoming involved in the areas important for development. The model emphasizes two crucial developmental processes. The first one is making commitments basing on exploration of various alternatives while the other concerns accepting the commitments as appropriate as a result of in-depth assessment.

Studies in which students were compared with people who have already completed their education and taken up employment (Luyckx, Schwartz, Goossens, & Pollock, 2008) found that the former group reported higher exploration levels in its three dimensions whereas the latter scored higher on the scale of commitment making. These findings were confirmed in a study conducted in Poland (Brzezińska & Piotrowski, 2009). Young adults who had already completed their education (mean age $M=26.40$, $SD=1.63$) obtained lower scores on exploration in breadth, exploration in depth, and ruminative exploration and higher

scores on commitment making and identification with commitment compared to students (mean age $M=19.98$, $SD=1.56$). Clearly, starting a job after the completion of education is connected with stronger concentration on the area of commitment. The differences in ruminative exploration suggest that entering the labour market is accompanied by less identity confusion and that it can contribute to solving identity crisis. The weak side of the research was the fact that the subjects differed not only in their employment or educational status but also in their age. Thus, it is difficult to give a clear-cut answer to the question whether the differences in particular dimensions of identity are related to the changes occurring naturally with age or whether they are linked to change in the form of activity (continuation of education and/or taking up employment).

What is more, limited ability was also related to identity dimensions. Our research (Brzezińska & Piotrowski, 2011 in press) revealed that between age 24 and 35 commitment making and identification with it intensifies in non-disabled persons. This effect was not observed in the disabled group, however. Simultaneously, between 24 and 26 years of age, differences begin to emerge between people with and without disabilities in terms of taking up vocational activity, having a life partner, and obtaining independence from family of origin, with the disabled performing significantly worse in these aspects. Research has shown that difficulties connected with undertaking developmental tasks are linked primarily to the area of commitment. Other research (Luyckx, Seiffge-Krenke et al., 2008), however, has pointed to the fact that health problems may co-exist with lower exploration in breadth and exploration in depth. Education, job, and disability change the individual's experiences and require various forms of adjustment and may therefore affect the developmental trajectory and diversify pathways into adulthood.

In addition to identity construction, one of the key areas of development in emerging adulthood is achieving independence and autonomy in relation to others (Kroger, 2007). According to adolescents and young adults (Arnett, 2001; Gurba, 2008), assumption of responsibility for one's own actions, making independent decisions, and forming new, more mature relations with parents are of paramount importance as indicators of adulthood. Research indicates (Piotrowski, 2009) that the performance of tasks such as getting started in an occupation, having a partner, and moving out of the family home facilitate the acquisition of sense of self-sufficiency. As a result of difficulties which people with disabilities experience in these areas, their sense of self-sufficiency could be lower than in their non-disabled peers.

Many researchers share the opinion that independence, understood as a combination of self-determination and self-care, is a key competence which can even improve one's state of health (Guess, Benson & Siegel-Causey,

Table 1
Participants.

Groups		N	%
Edu	Students with disabilities	133	30.6
	Students without disabilities	81	18.7
Unemp	Unemployed with disabilities	49	11.3
	Unemployed without disabilities	36	8.3
Emp	Employed with disabilities	48	11.1
	Employed without disabilities	87	20.0
Total		434	100.0

2008). Research in this field (e.g. Wood, Fowler, Uphold & Test, 2005; Wehmeyer & Garner, 2003) suggests that independence and sense of autonomy in individuals with disabilities are only partly determined by specific dysfunctions. Much more important are the context of living and the possibilities it offers. If the social environment (family, friends, neighbours, local community) foster self-determination then its level is higher – a rather obvious conclusion. However, individuals with disabilities have a greater sense of self-determination when they are working, especially on the non-protected, competitive market (Wehmeyer & Bolding, 1999).

Over-protectiveness, and reduced family pressure to develop such competences as ability to make independent decisions, tends to restrict the range of exploration and commitment. This in turn may lead to objectively reduced emotional, social or financial independence but also to feeling “less grown-up” than one’s peers (Galambos, Kolaric, Sears & Maggs, 1999). Disabled individuals are more likely than non-disabled individuals to say at the onset of adulthood that they are being treated as if they were much younger than their chronological age suggests (Galambos, Darrach & Magill-Evans, 2007). The very fact that they are less fit often causes other people to treat them as if they were also less capable, more childish or less competent (Wang & Doversio, 2011).

Being submitted to self-fulfilling prophecies at a time when one’s non-disabled peers are assuming many new social roles at the onset of adulthood may reduce the disabled individual’s capacity for the new experiences which are essential for identity formation (Luyckx, Seiffge-Krenke et al., 2008), including experiences related to risk-taking or bearing the consequences of one’s decisions. When this happens, there is a great risk of identity diffusion and the tendency to develop and consolidate the learned helplessness syndrome (Seligman, 1975). A vicious circle is set in motion and social activity becomes increasingly weaker and more homogeneous. One direct affect of this state of affairs is considerable delay of entry into adulthood compared with non-disabled peers and limited opportunities to experiment with new roles and lifestyles. This has a direct effect on personal identity formation and may lead to identity foreclosure and make it more difficult to adapt to

the changing developmental context.

This way of thinking is also implicit in the so-called social model of disability (Shakespeare, Bickenbach, Pfeiffer & Watson, 2006). According to this model, the main source of the problems which disabled individuals experience is the misfit between social expectations on the one hand and the limited possibilities due to disability on the other hand. Restriction of exploratory activity, excessive control of areas of potential risk, or various forms of discrimination and marginalization and social exclusion are some of the consequences of an excessively generalizing view, additionally laden with the negative connotations of the proximal environment’s perception of limited capacity. In the long run, these factors lead to reciprocal negative perception of oneself and one’s role in the environment and to self-marginalization and self-exclusion (Brzezińska & Zwolińska, 2010).

Self-determination, independent decision-making and personal autonomy in both non-disabled and disabled individuals are submerged in the social context. Considering the objectively reduced organ and body system efficiency of disabled individuals, the proximal environment’s frequent tendency to be overprotective and over-supportive, discrimination by the more distal environment and difficulty assuming adult social roles, we may conclude that disabled individuals are less independent than non-disabled individuals in terms of external indices available to observers. However, little do we know about disabled people’s perception of their own independence in the context of identity formation or about the reciprocal effect of this variable on the relations between environmental factors and identity.

Problem

In the presented study our interests focused on the following question: is having a permanent job or being jobless related to identity dimensions? While differences between students and working people are well documented in the literature, data on the unemployed is lacking. We also intended to investigate differences in identity between the disabled and non-disabled.

Another issue which we analysed was the relation between identity dimensions, educational / vocational context and sense of self-sufficiency. We assumed that a stronger sense of self-sufficiency is related to fewer difficulties with the formation of identity and that this is indicated by low level of ruminative exploration. However, sense of self-sufficiency may play a different role depending on educational / vocational context and health problems. We hypothesized that a strong conviction about one’s self-sufficiency is linked to a high level of exploration during education whereas after its completion, when the person has entered employment, it is related to commitment making and identification with commitment. Both disability and

sense of self-sufficiency moderate the relationship between contextual factors related to education and work, and personal identity.

Participants

The study was conducted on 434 participants, including 230 (53.0%) people with various disabilities (DIS) and 204 (47.0%) people without disabilities (non-DIS). Participants formed three groups: (1) studying (Edu) (aged 18-24 years; $M=20.96$; $SD=1.97$), (2) not studying and not working (Unemp) (aged 25-30 years; $M=26.76$; $SD=1.71$), (3) not studying and working (Emp) (age range 25-30 years; $M=27.07$; $SD=1.70$). The numbers of participants per group are shown in Tab. 1.

All participants from both Edu groups (DIS and non-DIS) continued their education, mainly at an academic level, and none had a job. Conversely, in groups comprising older persons, unemployed (Unemp) and employed (Emp), no-one was studying at the time of research. This was so because we wanted to keep the two forms of activity separate and so we excluded people who were working and studying at the same time. The largest number of people in the group of disabled people had motor disabilities ($n=95$; 48.2%) and vision impairment ($n=44$; 22.3%), the remaining part comprised persons with other disabilities (e.g. hearing disabilities, circulatory system problems, respiratory system problems).

Methods

The Dimensions of Identity Development Scale (DIDS) is a questionnaire developed by researchers from the Catholic University of Leuven in Belgium (Luyckx, Schwartz, Berzonsky et al., 2008) and adapted to Polish conditions by Anna I. Brzezińska and Konrad Piotrowski (Brzezińska & Piotrowski, 2010a). It measures five dimensions of identity functioning in the *Dual-Cycle Model of Identity Formation*: exploration in breadth, exploration in depth, ruminative exploration, commitment making, and identification with commitment. Cronbach alpha coefficients were as follows: 0.75, 0.70, 0.74, 0.88, and 0.83 in the DIS group and 0.75, 0.73, 0.82, 0.87, and 0.81 in non-DIS group. In its original form, all statements are rated using a five-point Likert scale. In the Polish version it was decided that a six-point scale should be used (ranging from 1 - completely disagree to 6 - completely agree) in order to eliminate the central response position (Brzezińska & Brzeziński, 2004).

The Subjective Adulthood Scale (SAS) is a questionnaire developed by Anna I. Brzezińska and Konrad Piotrowski (Brzezińska & Piotrowski, 2010b; Piotrowski, 2009). It measures four dimensions of sense of adulthood: sense of self-sufficiency, readiness to form

intimate relations, marital readiness, and subjective sense of adulthood. Here we are presenting the scores for one scale only, the sense of self-sufficiency scale. It comprises seven statements rated from 1 - completely disagree to 6 - completely agree. The Cronbach alpha coefficient for both groups (DIS and non-DIS) was 0.77.

Results

The first step in the analysis was to distinguish groups with low and high sense of self-sufficiency. The results were divided according to the median and two groups were created: low sense of self-sufficiency (LSS): $M=3.92$; $SD = 0.44$ and high sense of self-sufficiency (HSS): $M = 5.00$; $SD = 0.36$. A three-factor analysis of variance was then conducted with (1) disability (DIS)/control (non-DIS) group membership, (2) type of educational-vocational activity (three levels: Edu vs. Unemp vs. Emp), (3) sense of self-sufficiency (two levels: LSS vs. HSS). Five identity dimensions served as dependent variables.

Exploration in breadth

People with disabilities had lower levels of exploration in breadth : DIS: $M=4.10$; $SD=0.80$ vs. non-DIS: $M=4.27$; $SD=0.81$; $F(1,434)=3.39$; $p<0,05$; $\eta^2=0,01$. A significant difference emerged between students and the unemployed (Fig. 1).

Working people, both with and without disabilities, obtained scores indicating lower exploration in breadth than students and the unemployed: Edu $M=4.30$; $SD=0,76$ vs. Unemp $M=4.23$; $SD=0.74$ vs. Emp $M=3.97$; $SD=0.82$; $F(2,434)=7.51$; $p<0,01$; $\eta^2=0,03$. In addition to these simple effects a significant interactive effect was found between educational-vocational activity and sense of self-sufficiency: $F(2,434)=3.75$; $p<0,05$; $\eta^2=0,02$ (cf. Fig. 2).

Students with a higher sense of self-sufficiency demonstrated higher exploration in breadth: $F(1,434)=4.18$; $p<0,05$; $\eta^2=0,01$]. In the unemployed group the scores were higher for people with lower intensity of this variable: $F(1,434)=3.48$; $p<0,05$; $\eta^2=0,01$. Working people do not display any differences in exploration in breadth depending on sense of self-sufficiency. At the same time, in the group of subjects with a strong sense of self-sufficiency, persons who were studying obtained higher results than the two other two groups whereas in the group with low sense of self-sufficiency only the unemployed differed significantly from the employed.

Commitment making

No interaction effect was found for commitment making. Three simple effects were significant, however. Commitment making was higher in disabled persons: DIS $M=4.01$; $SD=0.99$ vs. non-DIS $M=3.84$; $SD=0.88$;

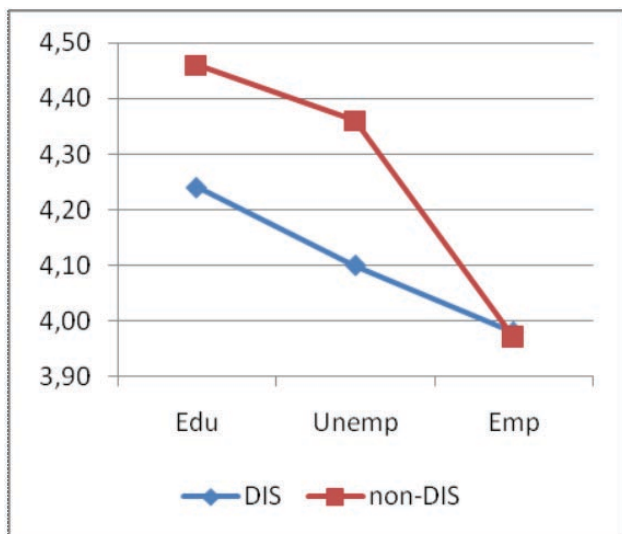


Figure 1. Exploration in breadth: educational-vocational activity and disability.

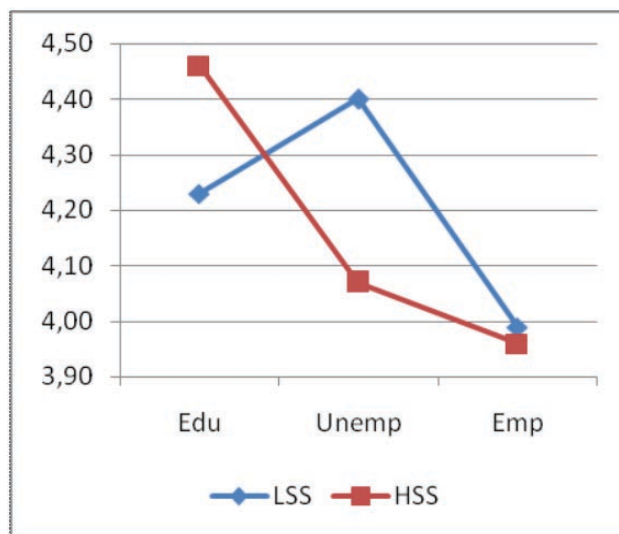


Figure 2. Exploration in breadth: educational-vocational activity and self-sufficiency.

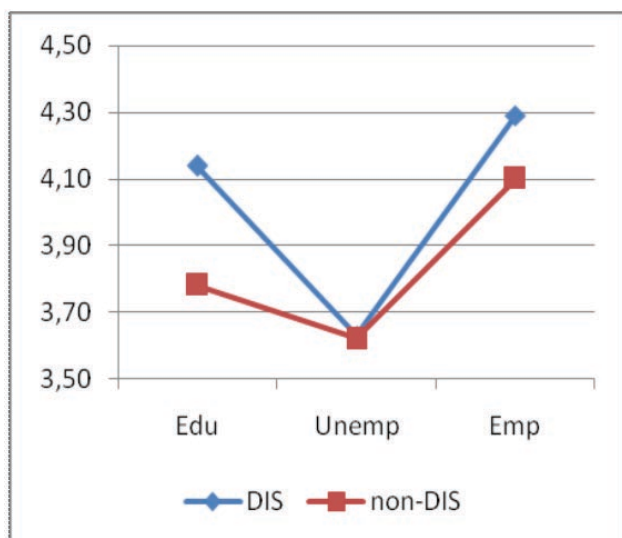


Figure 3. Commitment making: educational-vocational activity and disability.

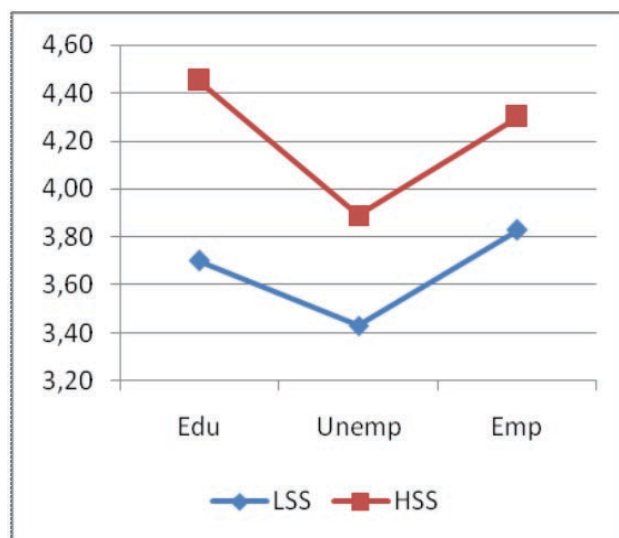


Figure 4. Commitment making: educational-vocational activity and self-sufficiency.

$F(1,434)=2.80$; $p<0,10$; $\eta^2<0,01$ but a near-significant between-group difference was only found for students. This effect is not large and only approaches significance but considering the small size of the group it is worth noting.

Educational-vocational activity was also related to commitment making. In this case it was the unemployed group which differed significantly and obtained the lowest score. Neither students nor working people exhibited any differences: Edu $M=4.04$, $SD=1.01$ vs. Unemp $M=3.66$; $SD=0.86$ vs. Emp $M=4.17$, $SD=0.85$; $F(2,434)=6.31$; $p<0.01$; $\eta^2=0.03$. In the disabled group a significant difference emerged between working people, who scored higher, and the remaining two groups. Among the disabled, students and working people did not differ significantly. Commitment making was significantly higher in the group with a high sense of self-sufficiency: LSS $M=3.66$, $SD=0,92$ vs. HSS: $M=4.29$, $SD=0.88$; $F(1,434)=34.03$; $p<0.001$; $\eta^2=0.08$.

Exploration in depth

The data on exploration in depth follow a similar pattern to the data on exploration in breadth. The simple effect was significant – students explored in depth to a higher degree than working persons whereas the unemployed did not differ significantly from the other two groups: Edu $M=4.07$; $SD=0.82$ vs. Unemp $M=3.93$; $SD=0.72$ vs. Emp $M=3.86$; $SD=0.71$; $F(2,434)=4.03$; $p<0,05$; $\eta^2=0,02$. A significant interaction also emerged between educational-vocational activity and sense of self-sufficiency: $F(2,434)=8.55$; $p<0.001$; $\eta^2=0,04$. Persons with a low sense of self-sufficiency did not differ in their level of in-depth exploration whereas students with a high sense of self-sufficiency exhibited stronger exploration than the remaining groups. Analogously, a high sense of self-sufficiency is linked to a higher level of exploration during the period of education: $F(1,434)=14.07$; $p<0,001$; $\eta^2=0,03$ and lower when unemployed: $F(1,434)=5.83$; $p<0,05$;

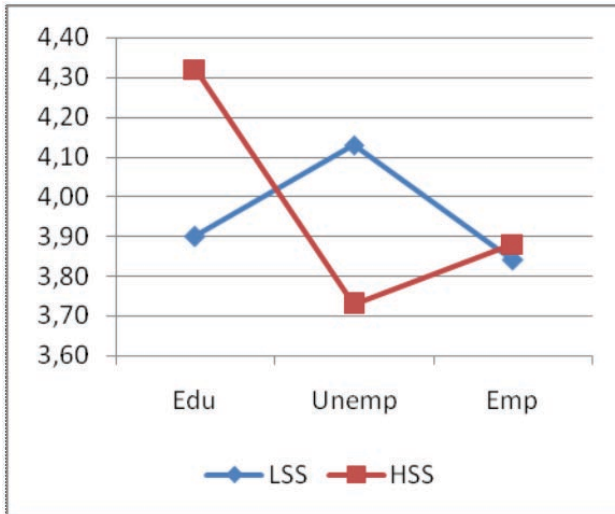


Figure 5. Exploration in depth: educational-vocational activity and self-sufficiency.

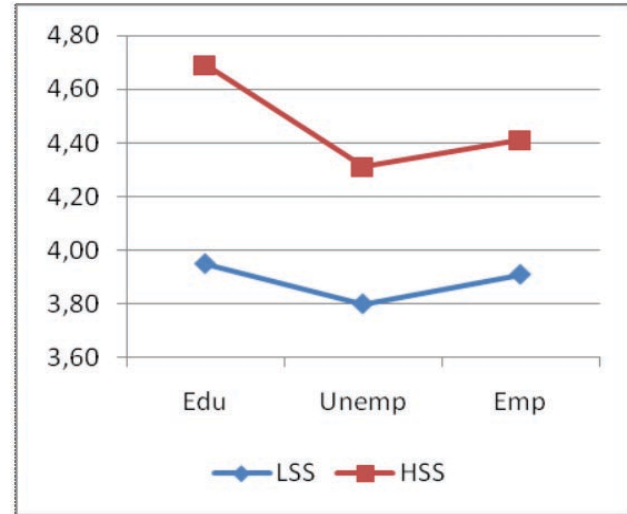


Figure 6. Identification with commitment: educational-vocational activity and self-sufficiency.

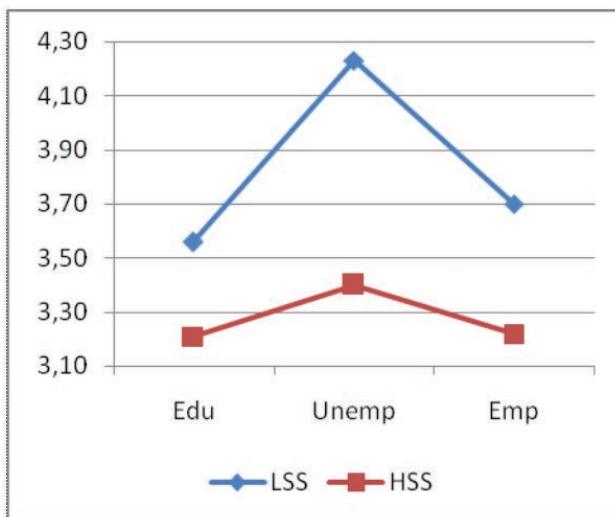


Figure 7. Ruminative exploration: educational-vocational activity and self-sufficiency.

$\eta^2=0,01$. Working people do not differ in exploration depending on the intensity of self-sufficiency.

Identification with commitment

Students scored higher on identification with commitment than the unemployed. Working people did not differ from students or jobless people: Edu $M=4.32$; $SD=0.87$ vs. Unemp $M=4.05$; $SD=0.74$ vs. Emp $M=4.15$; $SD=0.70$; $F(2,434)=4.04$; $p<0.05$; $\eta^2=0.02$. In each group differing in type of educational-vocational activity the level of identification with commitment was higher when the sense of self-sufficiency was strong and it was lower when participants had a weaker sense of self-sufficiency: LSS $M=3.89$, $SD=0.77$ vs. HSS $M=4.47$, $SD=0.73$; $F(1,434)=49.53$; $p<0.001$; $\eta^2=0.11$.

Ruminative exploration

Experiencing problems with identity formation was the highest among unemployed people: Edu $M=3.39$, $SD=0.87$ vs. Unemp $M=3.84$, $SD=0.86$ vs. Emp $M=3.33$, $SD=0.94$; $F(2,434)=7.35$; $p<0.01$; $\eta^2=0.03$. Students and working people did not show any differences in this respect. As before, level of self-sufficiency had a significant effect: LSS $M=3.70$, $SD=0.82$ vs. HSS: $M=3.23$, $SD=0.93$; $F(1,434)=34.26$; $p<0.001$; $\eta^2=0.07$.

It is worth noting that in the group of unemployed people with a strong sense of self-sufficiency ruminative exploration rates do not differ significantly from the other groups. However, when participants are both unemployed and have low self-sufficiency, this kind of exploration is particularly high.

Discussion

Most research on identity at the time of emerging adulthood is conducted on students without disabilities. This is why some researchers (e.g. Schwartz, 2005) have suggested expanding the scope of interest to include other groups such as working people, the unemployed, people of lower educational status, or people from minorities. This was also one of the objectives of our own inquiries.

Existing findings often indicate that the period of academic education is a time of intensive exploration of life opportunities and testing of various alternatives (Arnett, 2000). Only after the completion of education, which often occurs at around the age of 24/25, do young people decide to become more involved in adult social roles by, for instance, entering employment. It is at this moment when a decrease in concentration on exploration can be observed and greater salience is attached to commitment making and identification with it. However, our results force us to ask

whether this is always the case.

Our non-working student participants scored high on in-breadth and in-depth exploration but had relatively low scores on commitment making. However, a significant difference emerged between disabled and non-disabled people. Students with disability explore various alternatives to a lesser extent but, on the other hand, they make stronger commitments than their non-disabled peers. Hence, their education is, to a lesser degree, connected with psychosocial moratorium. Other research has also indicated that people with disabilities (diabetes) display lower exploration in breadth than non-disabled persons (Luyckx, Seiffge-Krenke et al., 2008). This suggests that perhaps type of disability itself is not the issue but lower mobility or the fact that people with disabilities may take fewer possibilities and fields of exploration into consideration when planning their future. This is a problem which should be researched further.

Determining whether differences in the vocational situation of the subjects who have completed their education are linked to the characteristics of their identity proved to be the most significant area of research. Success on the labour market, which is understood as having a job, is connected with strong similarities in this aspect between people with and without disabilities. None of the identity dimensions was characterised by noticeable differences between these vocationally active groups. At the same time, working people show significant differences from studying persons. They devote noticeably less attention to exploration and commitments constitute the dominant area of their identity formation. Lack of differences between disabled and non-disabled people may suggest that vocational activity in emerging adulthood has a positive effect on the development of identity in the disabled. Therefore, it seems particularly important in this context to counteract problems which they face when looking for a job.

People who have trouble finding a job upon completion of their education face the most difficult situation. In their case, commitment making is much lower than in the other groups and they experience the difficulties related to the identity construction most acutely (high ruminative exploration). Among the three studied groups (Edu, Unemp and Emp) it is the unemployed who experience the difficulties related to solving identity crisis most profoundly, whether or not they are disabled. However, the unemployed without disabilities devote more energy to the exploration of various areas. Lower involvement of people with disabilities in this type of activity may lead to prolonged unemployment.

Readiness to change is linked particularly strongly to the dimensions of exploration (Anthis & La Voie, 2006). Reflecting on one's own situation and looking for ways to change may constitute the first step towards improvement of one's circumstances. We have demonstrated elsewhere (Brzezińska, Piotrowski, Garbarek-Sawicka, Karowska,

& Muszyńska, 2010) that identity formation is related to the individuals's financial situation. Persons whose income does not allow them to satisfy their basic needs exhibit high ruminative exploration and low identification with commitment. This is very important because it suggests that it is not the fact of being out of work itself but the consequences of this situation, including the lack of regular income, which are experienced most acutely.

People out of work differ substantially from people in employment and display the level of self-sufficiency which is similar to that of students, although in our study this latter group was a few years younger. The suggestion that the consequences of unemployment are more significant than the mere fact of being unemployed is confirmed by the results indicating that ruminative exploration is particularly strong in the group where self-sufficiency is low. Persons who can still say that they are independent, self-reliant, and self-sufficient despite being out of work do not experience such difficulties with identity formation as the unemployed with a low sense of self-sufficiency.

The role of self-sufficiency differs depending on age and educational-vocational activity. In students, high self-sufficiency is linked to strong exploration (in breadth and in depth) but this relation is reversed in the unemployed – high exploration is accompanied by low sense of self-sufficiency. Perhaps self-assessment on the “self-sufficient – not self-sufficient” dimension motivates the individual to explore. If young adults do not have job and are also unable to achieve the level of autonomy which would, in their opinion, be appropriate, they begin to give up former commitments and try to change their situation by returning to exploration. Still, if a person does not feel discomfort about not having work and considers him/herself to be self-sufficient then the motivation to change is weaker. Drawing upon A. Maslow's (1971) classic hierarchy of needs we might say that in this situation deficiency motivation is dominant. In working adults exploration is not affected by their sense of self-sufficiency.

In-breadth and in-depth exploration are the only dimensions of identity in which case self-sufficiency is a moderator of the relation between educational-vocational activity and identity. With reference to both dimensions of commitment, irrespective of this situation, a high sense of self-sufficiency is connected to higher scores. A reverse situation occurs with ruminative exploration.

Self-sufficiency appears to be an important factor which has to be taken into account when dealing with the development of disabled and non-disabled emerging adults. At present we are faced with noticeable diversification of young people's life paths. Consequently, all general assertions concerning identity development, especially in the period of emerging adulthood, cease to be valid. Thus, subsequent studies should focus on groups other than the ones analysed so far.

References

- Anthis, K. S. & LaVoie, J. (2006). Readiness to change: a longitudinal study of changes in adult identity. *Journal of Research in Personality*, 40, 209-219.
- Adamowicz-Hummel A. & Rozborska, A. (2003). Samodzielność – szansą na zatrudnienie, zatrudnienie – szansą na samodzielność [Self-sufficiency facilitates employment, employment facilitates self-sufficiency]. In: K. D. Rzedzicka & A. Kobylańska (eds.), *Dorosłość, niepełnosprawność, czas współczesny. Na pograniczach pedagogiki specjalnej* [Adulthood, disability, modern times. At the borders of special education] (pp. 497-505). Kraków: Oficyna Wydawnicza Impuls.
- Arnett, J. J. (2000). Emerging adulthood. A theory of development from the late teens through the twenties. *American Psychologist*, 55 (5), 469-480.
- Arnett, J. J. (2001). Conceptions of the transition to adulthood: perspectives from adolescence through midlife. *Journal of Adult Development*, 8 (2), 133-143.
- Bee, H. (2004). *Psychologia rozwoju człowieka* [Lifespan development]. Poznań: Zysk i S-ka Wydawnictwo.
- Brzezińska, A. (2007). *Spoleczna psychologia rozwoju* [A social psychology of development]. Warszawa: Wydawnictwo Naukowe Scholar.
- Brzezińska, A. I. & Brzeziński J. (2004.). Skale szacunkowe w badaniach diagnostycznych [Rating scales in diagnostics]. In: J. Brzeziński (ed.), *Metodologia badań psychologicznych. Wybór tekstów* [Psychological research methodology. A selection of texts]. (pp. 232-306). Warszawa: Wydawnictwo Naukowe PWN.
- Brzezińska, A. I. & Piotrowski, K. (2009). Diagnoza statusów tożsamości w okresie adolescencji, wylaniającej się dorosłości i wczesnej dorosłości za pomocą Skali Wymiarów Rozwoju Tożsamości (DIDS) [Assessment of identity statuses in adolescence, emerging adulthood and early adulthood with the Dimensions of Identity Development Scale (DIDS)]. *Studia Psychologiczne*, 3 (47), 93-109.
- Brzezińska, A. I. & Piotrowski, K. (2010a). Polska adaptacja Skali Wymiarów Rozwoju Tożsamości (DIDS) [The Polish adaptation of the Dimensions of Identity Development Scale (DIDS)]. *Polskie Forum Psychologiczne*, 15 (1), 66-84.
- Brzezińska, A. I. & Piotrowski, K. (2010b). Formowanie się tożsamości a poczucie dorosłości i gotowość do tworzenia bliskich związków [Identity formation, sense of adulthood and readiness to enter intimate relationships]. *Czasopismo Psychologiczne*, 16 (2), 265-274.
- Brzezińska, A. I. & Piotrowski, K. (2011 - in press). Formowanie się tożsamości i poczucie samodzielności a niepełnosprawność w okresie wylaniającej się dorosłości i wczesnej dorosłości [Identity formation, sense of self-sufficiency and disability in emerging adulthood and early adulthood]. *Człowiek - Niepełnosprawność – Społeczeństwo*, 1 (13).
- Brzezińska, A. I., Piotrowski, K., Garberek-Sawicka, E., Karowska, K., & Muszyńska, K. (2010). Wymiary tożsamości a ich podmiotowe i kontekstowe korelaty [Identity dimensions and their subjective and contextual correlates]. *Studia Psychologiczne*, 1 (49), 81-93.
- Brzezińska, A. I., Zwolińska, K. (2010). Marginalizacja osób z ograniczeniami sprawności na skutek zaburzeń psychicznych [Marginalization of people with disabilities connected with mental disorders]. *Polityka Społeczna*, 2, 16-22.
- Carnaby, S., Lewis, P., Martin, D., Naylor, J., & Stewart, D. (2003). Participation in transition review meetings: a case study of young people with learning disabilities leaving a special school. *British Journal of Special Education*, 30 (4), 187-193.
- Danielsen, L. M., Lore, A. E., Kroger, J. (2000). The impact of social context on the identity-formation process of Norwegian late adolescents. *Youth & Society*, 31 (3), 332 - 362.
- Erikson, E. H. (1968). *Identity, youth and crisis*. New York: Norton.
- Fadjukoff, P., Kokko, K., Pulkkinen, L. (2007). Implications of timing of entering adulthood for identity achievement. *Journal of Adolescent Research*, 22 (5), 504 - 530.
- Frisén, A., Wängqvist, M. (2010). Emerging adults in Sweden: identity formation in the light of love, work, and family. *Journal of Adolescent Research*, XX (X), 1 - 22.
- Galambos, N. L., Darrach, J., & Magill-Evans, J. (2007). Subjective age in the transition to adulthood for persons with and without motor disabilities. *Journal of Youth and Adolescence*, 36, 825 - 834.
- Galambos, N. L., Kolaric, G. C., Sears, H. A., & Maggs, J. L. (1999). Adolescents' subjective age: an indicator of perceived maturity. *Journal of Research on Adolescence*, 9, 309 -337.
- Grotevant, H. D. (1987). Toward a process model of identity formation. *Journal of Adolescent Research*, 2, 203-222.
- Gruba, E. (2008). The attributes of adulthood recognised by adolescents and adults. *Polish Psychological Bulletin*, 39 (3), 129-137.
- Guess, D., Benson, H. A., & Siegel-Causey, E. (2008). Concepts and issues related to choice making and autonomy among persons with severe disabilities. *Research & Practice for Persons with Severe Disabilities*, 33 (1-2), 75 - 81.
- Havighurst, R. J. (1948). *Developmental tasks and education*. New York: Longman.
- Luyckx, K., Goossens, L., Soenens, B., Beyers, W., & Vansteenkiste, M. (2005). Identity statuses based upon four rather than two identity dimensions: extending and refining Marcia's paradigm. *Journal of Youth and Adolescence*, 34, 605-618.
- Luyckx, K., Goossens, L., Soenens, B., & Beyers, W. (2006). Unpacking commitment and exploration: validation of an integrative model of adolescent identity formation. *Journal of Adolescence*, 29, 361-378.
- Luyckx, K., Schwartz, S. J., Berzonsky, M. D., Soenens, B., Vansteenkiste, M., Smits, I., & Goossens, L. (2008). Capturing ruminative exploration: Extending the four-dimensional model of identity formation in late adolescence. *Journal of Research in Personality*, 42, 58-82.
- Luyckx, K., Schwartz, S. J., Goossens, L., & Pollock, S. (2008). Employment, sense of coherence and identity formation: contextual and psychological processes on the pathway to sense of adulthood. *Journal of Adolescent Research*, 23 (5), 566-591.
- Luyckx, K., Seiffge-Krenke, I., Schwartz, S. J., Goossens, L., Weets, I., Hendrieckx, C., & Groven, C. (2008). Identity development, coping and adjustment in emerging adults with a chronic illness: the sample case of type 1 diabetes. *Journal of Adolescent Health*, 43, 451-458.
- Marcia, J. E. (1966). Development and validation of ego-identity status. *Journal of Personality and Social Psychology*, 3 (5), 551-558.
- Maslow, A. (1971). *The Farther Reaches of Human Nature*. New York: Viking Press.
- Meeus, W., Ledema, J., & Maassen, G. H. (2002). Commitment and exploration as mechanisms of identity formation. *Psychological Reports*, 90, 771-785.
- Newacheck, P. W. (1989). Adolescents with special health needs: Prevalence, severity and access to health services, United States, 1984. *Pediatrics*, 84, 872-881.
- Oleś, P. K. (2008). O różnych rodzajach tożsamości oraz ich stałości i zmianie [On various kinds of identity, their stability and change]. In: P. K. Oleś & A. Batory (eds.), *Tożsamość i jej przemiany a kultura* [Identity, its vicissitudes and culture] (pp. 41-84). Lublin: Wydawnictwo KUL.
- Piotrowski, K. (2010). *Wkraczanie w dorosłość. Tożsamość i poczucie dorosłości młodych osób z ograniczeniami sprawności* [Transition to adulthood. Identity and sense of adulthood in young people with disabilities]. Warszawa: Wydawnictwo Naukowe Scholar.
- Schwartz, S. J. (2005). A new identity for identity research: recommendations for expanding and refocusing the identity literature. *Journal of Adolescent Research*, 20 (3), 293-308.
- Seligman, M. E. P. (1975). *Helplessness: on depression, development, and death*. San Francisco: W. H. Freeman.

- Shakespeare, T., Bickenbach, E., Pfeiffer, D., & Watson, N. (2006). Models. In: G. L. Albrecht, (eds.), *Encyclopedia of disability* (pp. 1101 - 1108). Thousand Oaks, London, New Delhi: Sage Publications.
- Smith, T. (2004). Coming of age in twenty-first century America: public attitudes towards the importance and timing of transitions to adulthood. *Ageing International*, 29 (2), 136-148.
- Wang, K., & Dovidio, J. F. (2011). Disability and autonomy: priming alternative identities, *Rehabilitation Psychology*, 2, 123 - 127.
- Wehmeyer, M. L., & Bolding, N. (1999). Self-determination across living and working environments: a matched-samples study of adults with mental retardation. *Mental Retardation*, 37, 353 – 363.
- Wehmeyer, M. L., & Garner, N. W. (2003). The impact of personal characteristics of people with intellectual and developmental disability on self-determination and autonomous functioning, *Journal of Applied Research in Intellectual Disabilities*, 16, 255- 265.
- Wells, T., Sandefur, G. D., & Hogan, D. P. (2003). What happens after the high school years among young persons with disabilities? *Social Forces*, 82 (2), 803-832.
- Wood, W. M., Fowler, C. H., Uphold, N., & Test, D. W. (2005). A review of self-determination interventions with individuals with severe disabilities, *Research & Practice for Persons with Severe Disabilities*, 30 (3), 121 - 146.