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Slovenia

SKILLS FOR THE FUTURE

Experts Articles Compendium

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Foreword

We may not really know exactly what the future will bring, but maintaining a commitment to lifelong learning that is increasingly important now, will be essential also in future.

Two-thirds of employers surveyed reported that they expect workers to adapt independently and learn new skills. The World Economic Forum reports that more than half of its employees will need to be retrained in the near future to maintain balance between employee skills and job requirements, shows the Skills Gap Study by Deloitte and Manufacturing Institute in 2018.

To address these gaps, the study states that there are five main skills that will be essential for success: technology and computer skills, digital literacy and competence, knowledge of working with technical tools and techniques, robot programming and automation as well as critical thinking. However, we need to know that employers will continue to appreciate soft skills.

We would like to thank all the experts contributing to this Euroguidance Cross Border Seminar compendium as well as all participating Euroguidance centres for bringing together experts, policy makers and guidance practitioners from Europe to discuss our common challenges.

Zlata Šlibar,
Euroguidace Slovenia coordinator

Keynotes

Keynote

Skills in the changing world of work

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Abstract

Technological developments, demographic shifts, globalization, migration and climate change are the main drivers shaping the current, rapidly transforming world of work. The profound changes underway are also accompanied by substantial transformations in people's working life, who already are and will be in the future increasingly likely to change employers, jobs, employment status and professions numerous times and at faster paces than ever before. Given the changes in the workplace, today's skills will not necessarily match the jobs of tomorrow, newly acquired skills

may quickly become obsolete, which means people will have to increasingly learn new skills to remain employable throughout their working life.

For this reason, it is even more important on national and international levels to develop the right policies, which will shape the effectiveness of the mechanisms that will influence populations to participate in education and training that will subsequently increase the level of labour market activation and ensure skills match labour market demand.

In the article, some results of the current situation regarding the skill systems of the EU countries are presented, together with new forms of work, which demand new skills and new organisational settings.

Keywords: skills, new forms of work, changes in the labour market, labour market policies

Introduction

The world of work is inexorably changing. The labour market in the EU, like in all other parts of the world, is being transformed, and often challenged by numerous drivers such as technological changes (digitalisation, automatization, robotization), globalisation, migration, climate change, and demographic change, notably ageing (European Commission, Employment, Social Affairs & Inclusion, 2019).

When considering the future impact of technology, two great economists got it very wrong in the past. In *Das Kapital*, Karl Marx argued that new technology under capitalism would lead inevitably to the de-skilling of the workforce. While this may have seemed correct a century ago with the development of the assembly line, as Alfred Marshall pointed out, machines are now replacing the most monotonous and muscular labour. Other forms of work, involving adaptive skills and judgement, are less-readily replaced by machines (Hodgson, 2016). Nowadays we know that given the changes in the workplace, people will have to increasingly learn new skills to remain employable throughout their working life. They will be increasingly likely to change employers, jobs, employment status and professions numerous times and at faster rates than ever before. Moreover, given that people live longer, they will most likely have to work longer, out of either choice or necessity. While some have the tools and mindset to embrace this flexibly, not all are equipped with the skills, competences, and support system to capably respond to these changes (European Commission, The Future of Work: Skills and Resilience for a World of Change, 2016).

Another prediction that has failed to materialise fully (Hodgson, 2016) regards John Maynard Keynes, who predicted in 1930 a dramatic shortening of the average working day. He argued that his hypothetical grandchildren might have to work only 15 hours a week to satisfy their material needs. It is true that the average number of working hours has decreased in developed countries, but to nowhere near the levels envisaged by Keynes. Moreover, nowadays the majority of workers are on permanent contracts, the preference for lean teams has led to a marked shift from 'employees' to 'independent suppliers of services' and 'independent contractors'. These trends are feeding a patchwork of parallel employment realities that characterise today's developed economies. 'Non-standard' work, in its numerous varieties, may offer greater flexibility and autonomy. At the same time it does tend to be less paid than the full-time equivalent, and is associated with less access to training (European Commission, The Future of Work: Skills and Resilience for a World of Change, 2016).

The future of work is NOW: changes on the labour market are happening now and they are irreversible (European Commission, Employment, Social Affairs & Inclusion, 2019). Potential implications associated with the Fourth Industrial Revolution are connected to employment, skills, and job quality on the one hand and new forms of employment, which may require a new type of social system on the other hand. In the following article, three segments will be taken into focus: new forms of employment, skills and three pillars of the EU Skills Index, and finally policies and initiatives taken on the EU level to face the changing world of work.

New forms of employment

In line with the working definition, research published by Eurofound in 2015 on New forms of employment examines the types of employment that have begun to feature more strongly in the European labour market since about 2000 (Eurofound, 2015). It examines new forms of work such as:

- **employee sharing**, where an individual worker is jointly hired by a group of employers to meet the HR needs of various companies, resulting in permanent full-time employment for the worker;

- **job sharing**, where an employer hires two or more workers to jointly fill a specific job, combining two or more part-time jobs into a full-time position;

- **interim management**, in which highly skilled experts are hired temporarily for a specific project or to solve a specific problem, thereby integrating external management capacities in the work organisation;

- **casual work**, where an employer is not obliged to provide work regularly to the employee, but has the flexibility of calling them in on demand;

- **ICT - based mobile work**, where workers can perform their jobs from any place at any time, supported by modern technologies;

- **voucher - based work**, where the employment relationship is based on payment for services with a voucher purchased from an authorised organisation that covers both pay and social security contributions;

- **portfolio work**, where a self-employed individual works for a large number of clients, carrying out small-scale jobs for each of them;

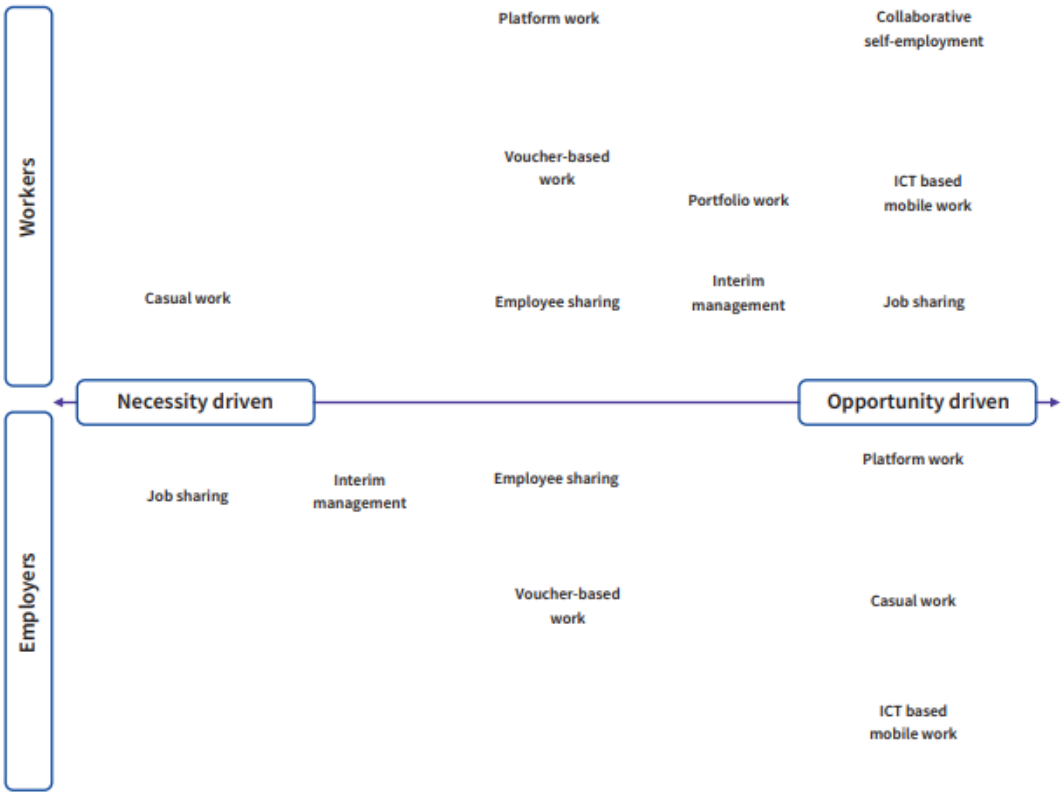
- **crowd employment**, where an online platform matches employers and workers, often with larger tasks being split up and divided among a 'virtual cloud' of workers;

- **collaborative employment**, where freelancers, the self-employed or micro enterprises cooperate in some way to overcome limitations of size and professional isolation.

These new types of employment may be new models of employment relationship between employer/employee, or client/worker; alternatively, they may be new patterns of work (how the work is conducted). At the same time, the forms of employment may be differentiated by whether they involve employees or self-employed workers/freelancers (alternatively, they may apply to both groups of workers). Notably, overlaps among these nine types are possible: an individual employment situation can fall into more than one category (Eurofound, 2015).

New forms of employment have been emerging due to an increased demand from employers and/or employees for enhanced flexibility, due to either economically challenging times or societal developments. Consequently, some of the forms of employment discussed are opportunity-driven while others emerge out of necessity, and the respective drivers might differ between employers and workers (Eurofound, Overview of new forms of employment – 2018 update, 2018).

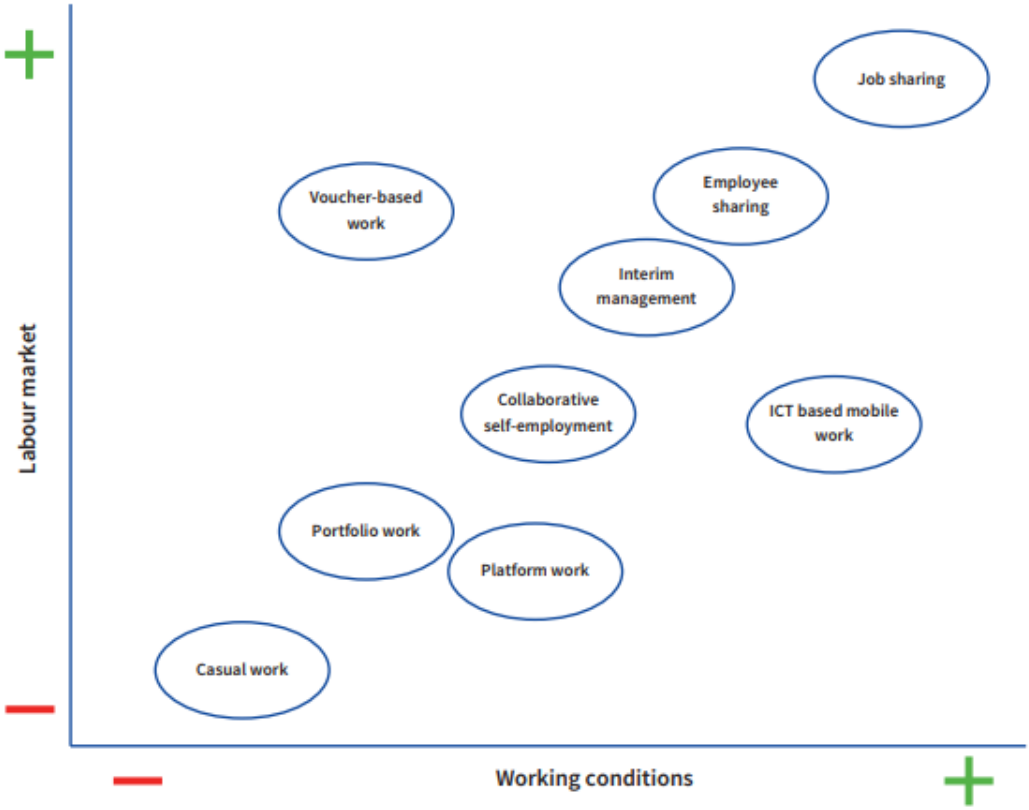
Figure 1: Workers' and employers' drivers for engaging in new forms of employment (Eurofound, Overview of new forms of employment – 2018 update, 2018).



In most EU Member States, most of the analysed forms of employment do not have a specific legal or collectively agreed upon basis. This might be attributed to their recent emergence as a practice rather than being a strategically planned labour market development. Exceptions are casual work and voucher-based work, for which a regulatory framework has been established in order to avoid abuse or as a means to legalise undeclared work. Employee sharing, job sharing, interim management, casual work, voucher-based work and cooperatives have been found to be more prominent in traditional industries, while ICT-based mobile work, portfolio work, platform work, umbrella organisations and co-working are more related to sectors such as IT or creative industries (Eurofound, Overview of new forms of employment – 2018 update, 2018).

While it needs to be highlighted that the operational implications of each form of employment might strongly vary from case to case, some generalisations can be derived from the research on hand, bearing in mind that elements presented as beneficial can be disadvantageous in individual cases and vice versa; depending on the employers' and employees' characteristics and preferences, as well as the bilateral agreements between them (Eurofound, Overview of new forms of employment – 2018 update, 2018).

Figure 2: Assessment of implications of new forms of employment for working conditions and labour market (Eurofound, Overview of new forms of employment – 2018 update, 2018).



In summary, among the analysed new forms of employment, job sharing, employee sharing, and interim management seem to provide the most beneficial working conditions and labour market implications. ICT-based mobile work brings about some positive working conditions, while the labour market effects might be partly negative. However, voucher-based work has some good labour market potential, while working conditions show room for improvement. Casual work is the form of employment that – from both a labour market perspective and regarding working conditions – raises the most concerns (Eurofound, Overview of new forms of employment – 2018 update, 2018).

There is not much difference in the number of countries in which each new employment form was reported, many being found in around 10 countries (Table 1). Interim management and voucher-based work were less common, and ICT-based mobile work was the most common.

In most EU Member States and Norway, more than one new employment form was identified. Only in Bulgaria, Croatia, Luxembourg and Poland was just one emergent employment form identified, while in Greece and Hungary seven were found (Eurofound, New forms of employment, 2015).

Table 1: New forms of employment identified in European countries (Eurofound, New forms of employment, 2015).

	Employee sharing	*Job sharing*	*Interim management*	*Casual work*	*ICT-based mobile work*	*Voucher-based work*	*Portfolio work*	*Crowd employment*	*Collaborative employment*
Austria	x					x			x
Belgium	x			x	x	x		x	x
Bulgaria	x								
Croatia				x					
Cyprus					x		x		x
Czech R.	x	x	x					x	
Denmark					x		x	x	
Finland	x				x				
France	x		x	x	x	x			x
Germany	x				x			x	x
Greece	x		x		x	x	x	x	x
Hungary	x	x	x	x	x		x		x
Ireland		x		x					
Italy		x		x		x	x	x	x
Latvia			x		x		x	x	
Lithuania					x	x	x	x	x
Luxembourg	x								
Netherlands				x	x		x		x
Norway			x		x		x		
Poland		x							
Portugal					x		x	x	
Romania				x					
Slovakia		x		x					
Slovenia		x		x	x				
Spain					x		x	x	x
Sweden				x	x				x
UK		x	x	x			x	x	

Non-standard forms of employment provide more flexibility to employers, and certain workers may also seek such flexibility, but labour market outcomes vary significantly across non-standard workers. While new forms of work increase choice about where and when to work, there is also

concern that they are shifting risks and responsibilities away from employers onto workers. On average, the large differences in employment protection by type of contract trigger differences in job security and generate persistent divides between non-standard and standard workers. There is no evidence that non-standard workers are compensated for their lower job security through higher wages; given that certain population groups are over-represented in non-standard forms of work, such forms of work risk generating a source of inequality in access to good jobs resulting in labour market segmentation. Excessive use of non-standard employment not only harms equity, but also efficiency; firms invest less in non-standard workers, which in turn may depress productivity growth. Dealing with job quality issues associated with non-standard employment will require a strengthening (and possibly a modernising) of labour relations, in addition to interventions in the areas of employment regulation, social protection, and skills. In the future government interventions may be needed to put in place a favourable regulatory environment (OECD, 2018).

Skills and jobs

The emerging contours of the new world of work in the Fourth Industrial Revolution are rapidly becoming a lived reality for millions of workers and companies around the world. The inherent opportunities for economic prosperity, societal progress and individual flourishing in this new world of work are enormous, yet depend crucially on the ability of all concerned stakeholders to instigate reform in education and training systems, labour market policies, business approaches to developing skills, employment arrangements and existing social contracts. Catalysing positive outcomes and a future of good work for all will require bold leadership and an entrepreneurial spirit from businesses and governments, as well as an agile mindset of lifelong learning from employees (World Economic Forum, 2018).

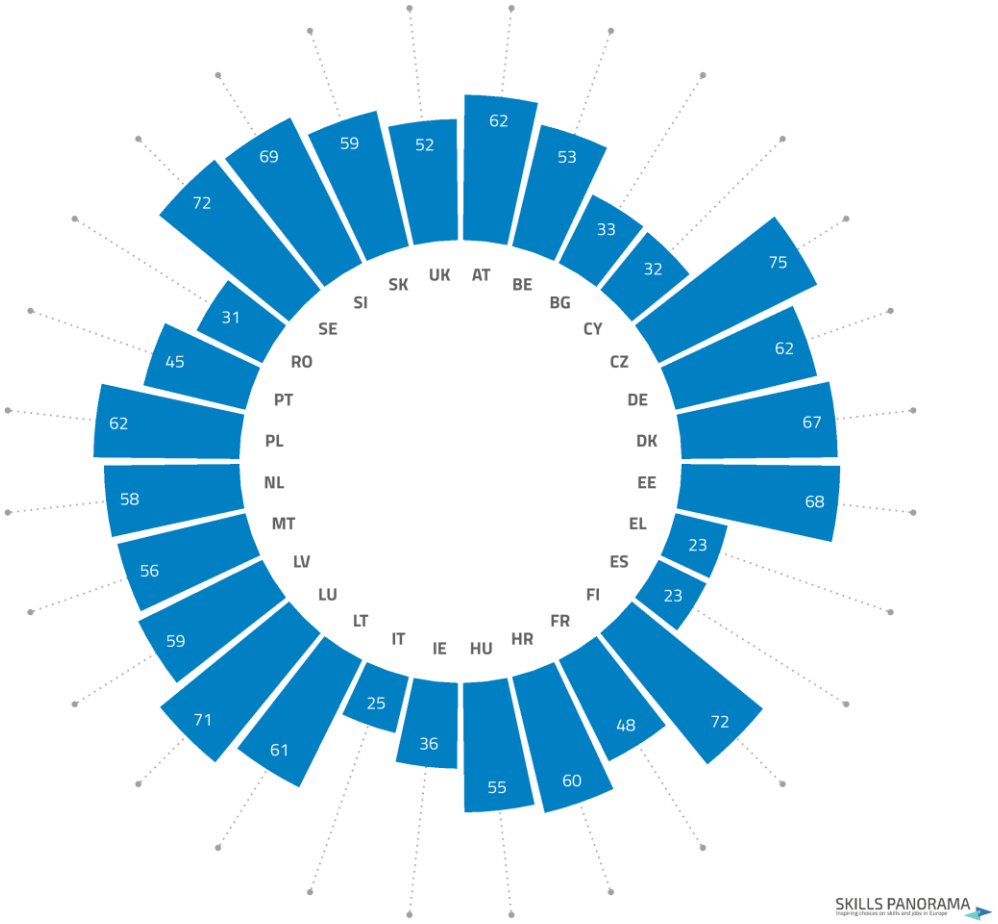
Changes in the demand for and supply of skills on the labour market are creating skills imbalances, including shortages, surpluses, and mismatches. In the context of changing skill need, developing the right skills that respond to labour market needs and ensuring, that these skills are fully utilised by individuals and employers becomes increasingly important (OECD, Employment, 2019).

The European Skills Index (ESI) is Cedefop's composite indicator measuring the performance of EU skills systems. It consists of three pillars: skills development, activation, and matching, each of which measures a different aspect of a skills system. The ESI measures countries' "distance to the ideal" performance, a score of 100 corresponds to achieving the 'frontier', that is an aspirational

target performance for that indicator, a score of 0 corresponds to a lowest-case performance (Cedefop, 2019).

European Skills Index in 2016. The minimum score is 23 for Spain, while the maximum is 75 for Czechia.

Figure 3: The European Skills Index overall score (Cedefop, 2019).

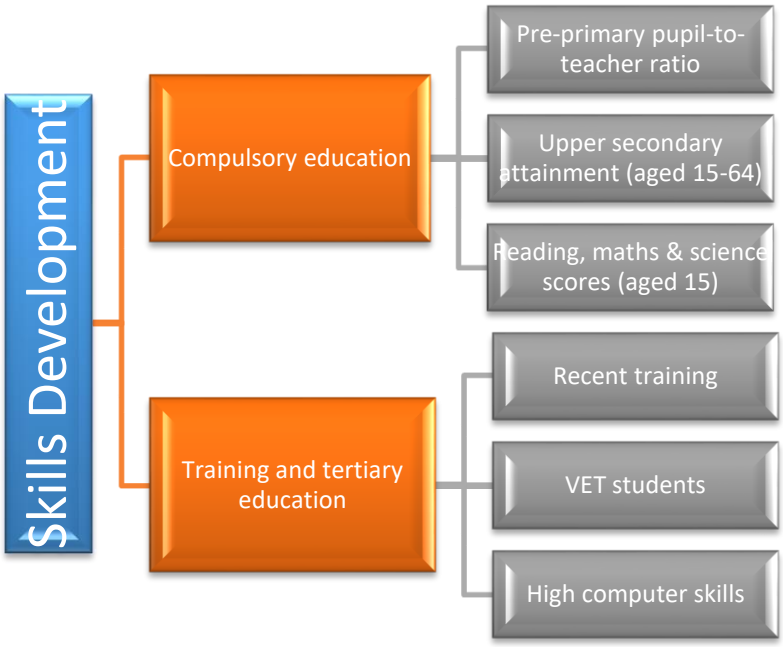


Skills Development Pillar

Skills Development represents the training and education activities of the country and the immediate outputs of that system in terms of the skills developed and attained.

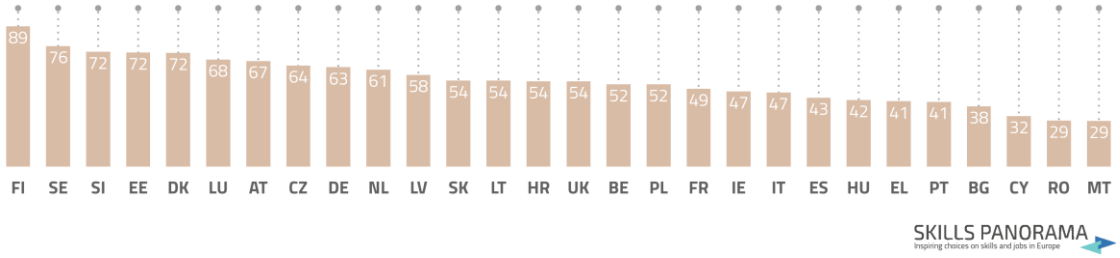
Sub-pillars are included to distinguish compulsory education, and other education and training - lifelong learning activities (Cedefop, Skills Panorama, 2019).

Figure 4: Skills development sub-pillar structure (Cedefop, 2018 European skills index, 2019).



The compulsory education sub-pillar comprises 3 indicators to measure quality, participation, and achievement in compulsory education, the training and other education sub-pillar comprises 3 indicators to measure participation and achievement in lifelong learning activities. Detailed information on the definitions and the background of these indicators can be found in the Technical Report (Cedefop, Skills Panorama, 2019).

Figure 5: Skills Development across Member States in 2016 (Cedefop, Skills Panorama, 2019).



The minimum score is 29 for Malta, while the maximum is 89 for Finland (Cedefop, Skills Panorama, 2019).

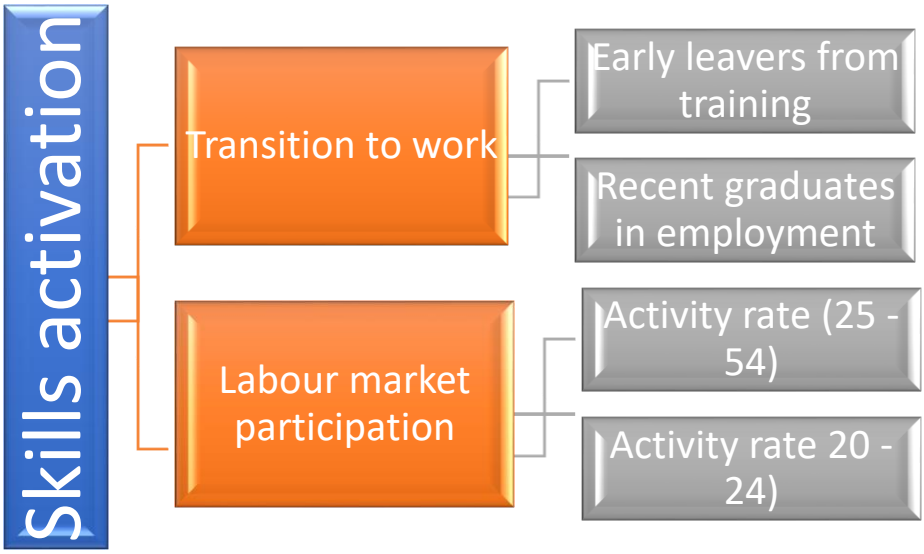
Out of 28 Member States, 19 saw positive growth in the Skills Development score over the 2014-2016 period. Interestingly, out of the seven Member states in the Low-achievers group, only Ireland

experienced a decrease, with Cyprus reaching growth in score of 12% between 2014 and 2016. On the other hand, three out of seven Member States in the Leaders group experienced a decrease over the same period. This trend might point to a slow process of catching-up, with the Low-achievers group slowly improving their Skills Development system from their low starting point, whereas some better performing countries are facing difficulties in improving beyond the high scores they have already achieved in Skills Development (Cedefop, 2018 European skills index, 2019).

Skills Activation pillar

Skills Activation includes indicators of the transition from education to work, together with labour market activity rates for different groups of the population, to identify those, which have a greater or lesser representation in the labour market. The transition to work sub-pillar comprises 2 indicators to measure transition from education to employment: early leavers from training; and recent graduates in employment (Cedefop, Skills Panorama, 2019).

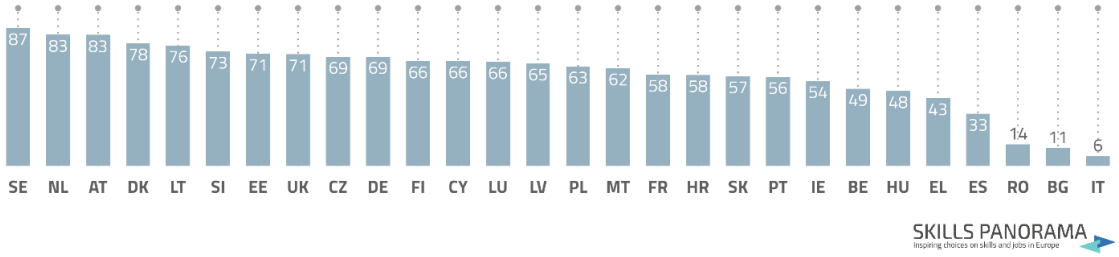
Figure 6: Skills activation sub-pillar structure (Cedefop, 2018 European skills index, 2019).



The labour market participation sub-pillar comprises 2 indicators to measure activity rates of different groups of the population: activity rate of the 'core' working population (25 - 54 year olds) and the youth activity rate (20 - 24 year olds). Detailed information on the definitions and the

background of these indicators can be found in the Technical Report (Cedefop, Skills Panorama, 2019).

Figure 7: Skills activation across Member States in 2016 (Cedefop, Skills Panorama, 2019).



The minimum score is 6 for Italy, while the maximum is 87 for Sweden (Cedefop, Skills Panorama, 2019).

Out the 28 Member States, 20 improved their scores in the Skills Activation pillar between 2014 and 2016, although some of them only marginally. Four out of seven Member States in the Low-achievers group experienced a decrease, pointing to persistent difficulties in improving Skills Activation in laggards Member States. Italy stands out as an outlier with a 72% increase caused by a minor absolute increment in a very low starting value (Cedefop, 2018 European skills index, 2019).

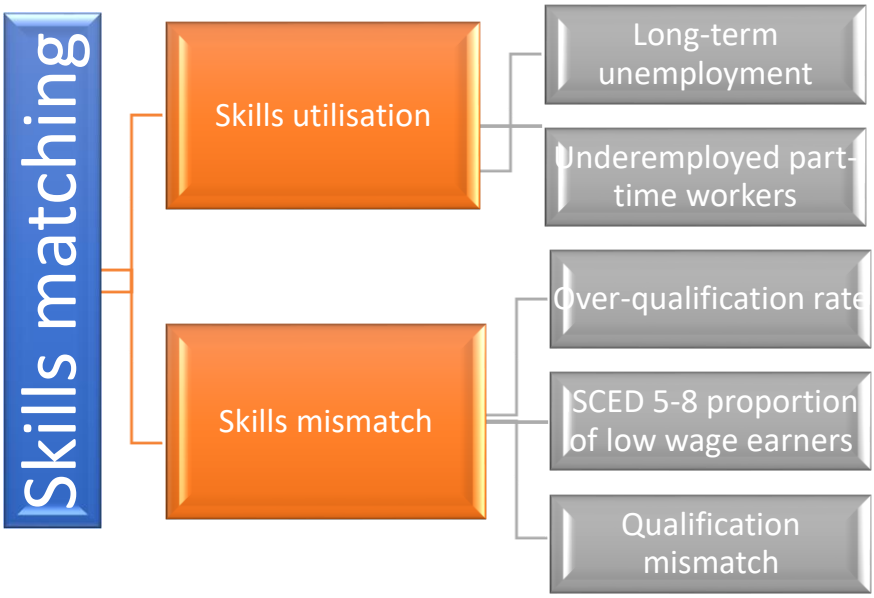
Skills Matching Pillar

Skills Matching represents the degree of successful utilisation of skills, that is, the extent to which skills are effectively matched in the labour market.

This can be observed in the form of jobs and mismatches, which include unemployment, shortages, surpluses or underutilisation of skills in the labour market. Sub-pillars are included to distinguish skills underutilisation and skills mismatch.

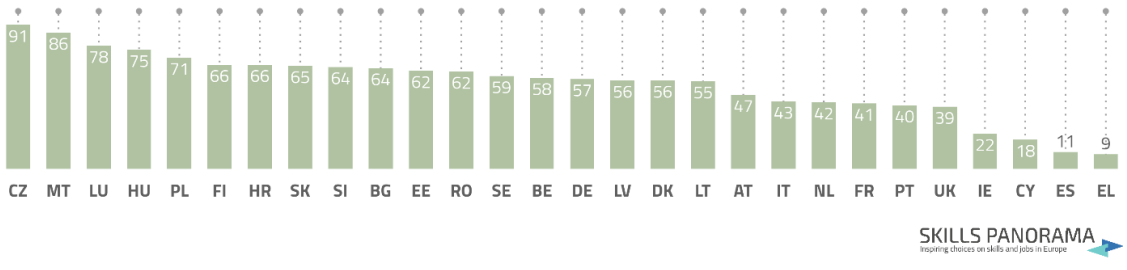
The skills underutilisation sub-pillar comprises 2 indicators to measure different aspects of skills under-utilisation: long-term unemployment and the underemployment of part-time workers (those who declare that they work part-time because they are unable to find full-time work) (Cedefop, Skills Panorama, 2019).

Figure 8: Skills matching sub-pillar structure (Cedefop, 2018 European skills index, 2019).



The skills mismatch sub-pillar comprises 3 indicators to measure different aspects of surpluses or underutilisation of skills in the labour market: higher education mismatch (those with higher education that have a job that does not require it); ISCED 5-8 proportion of low wage earners (tertiary graduates that are low wage earners); and qualification mismatch (the extent to which each employee's education attainment level matches the modal education attainment level for each occupation in each industry). Detailed information on the definitions and the background of these indicators can be found in the Technical Report (Cedefop, Skills Panorama, 2019).

Figure 9: Skills matching across Member States in 2016 (Cedefop, Skills Panorama, 2019).



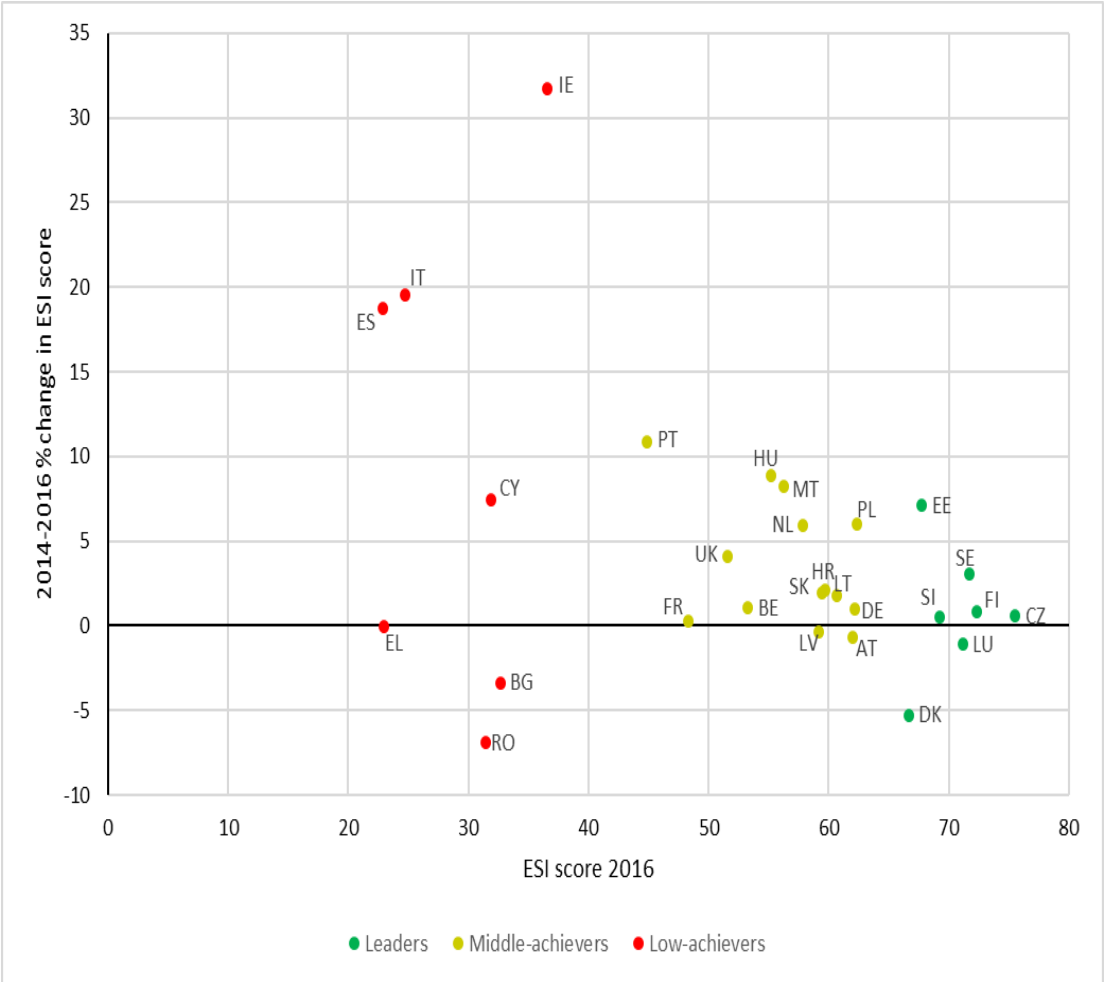
The minimum score is 9 for Greece, while the maximum is 91 for Czechia (Cedefop, Skills Panorama, 2019). Twenty out of 28 Member States experienced a growth in the score in years between 2014 and 2016, pointing to some gradual improvements. The overall picture is therefore mixed, pointing to gradual improvements among some laggard Member States in Skills Matching

and to difficulties to rise above already good levels in certain top-performing Member States (Cedefop, 2018 European skills index, 2019).

How is ESI related to other measures?

In general, we can observe mostly positive changes over time in ESI, but more could be achieved. In the Figure 10 we see the growth rate in ESI in the period 2014-16.

Figure 10: The growth rate of the ESI score in the period 2014-2016 (Cedefop, 2018 European skills index, 2019).

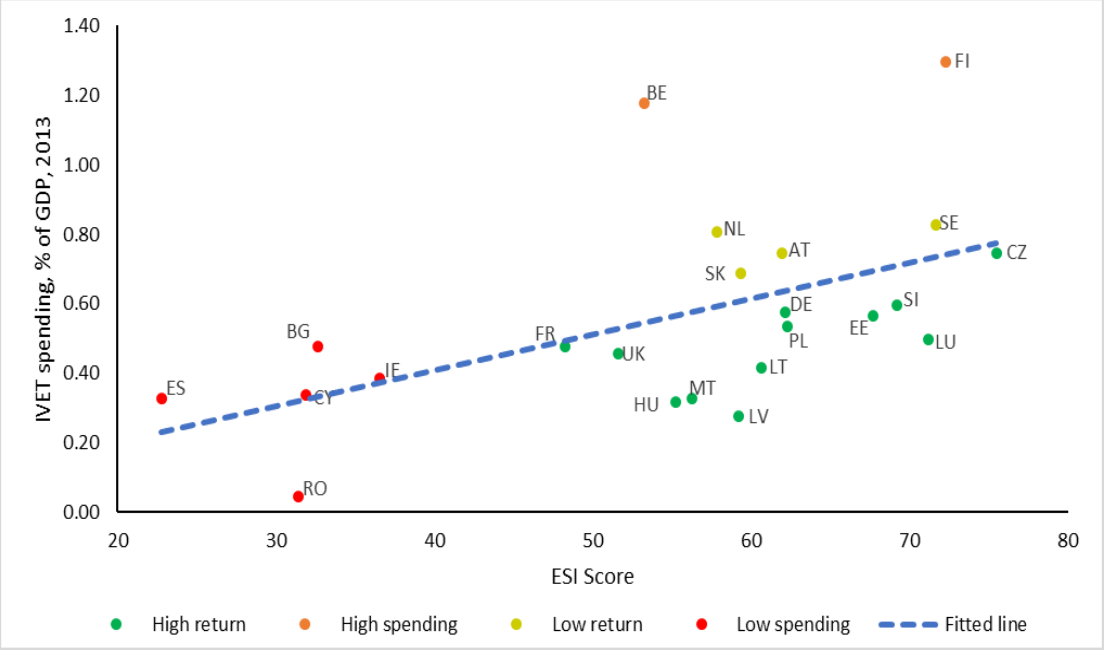


Twenty-two out of 28 Member States saw an increase in the ESI score during the 2014-2016 period, meaning that the general trend seems to be toward a gradual improvement of the skills system

across the EU. In conclusion, progressing towards a better skills system requires time, effort, and the right set of policies (Cedefop, 2018 European skills index, 2019).

As expected, there is a positive relationship between the overall ESI scores and IVET spending. Figure 11 shows that Member States with higher spending also have higher scores in ESI so we can conclude that IVET spending is linked to better skill systems (Cedefop, 2018 European skills index, 2019).

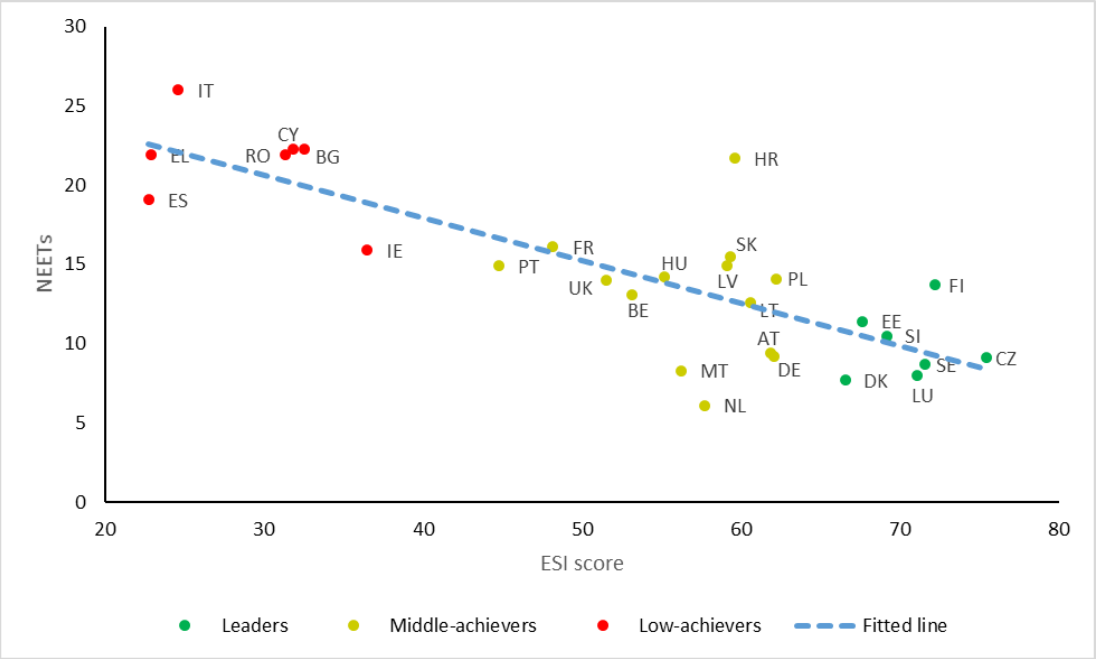
Figure 11: IVET expenditure is linked to better skills systems (Cedefop, 2018 European skills index, 2019).



Better functioning skills systems produce a more employable labour force, thus reducing the share of young people Not in Employment, Education or Training (NEETs). Therefore, there is a negative relation between the NEET rate and the ESI, which measures the effectiveness of a country's skills system and does not include the former indicator. In other words, Member States capable of effectively developing skills, of activating skills, and of matching those skills with the appropriate jobs, are expected to be in a better position to offer a way out of unemployment and inactivity to the younger cohort, i.e., 18-24 year-olds, which we can see from Figure 12 below (Cedefop, 2018 European skills index, 2019).

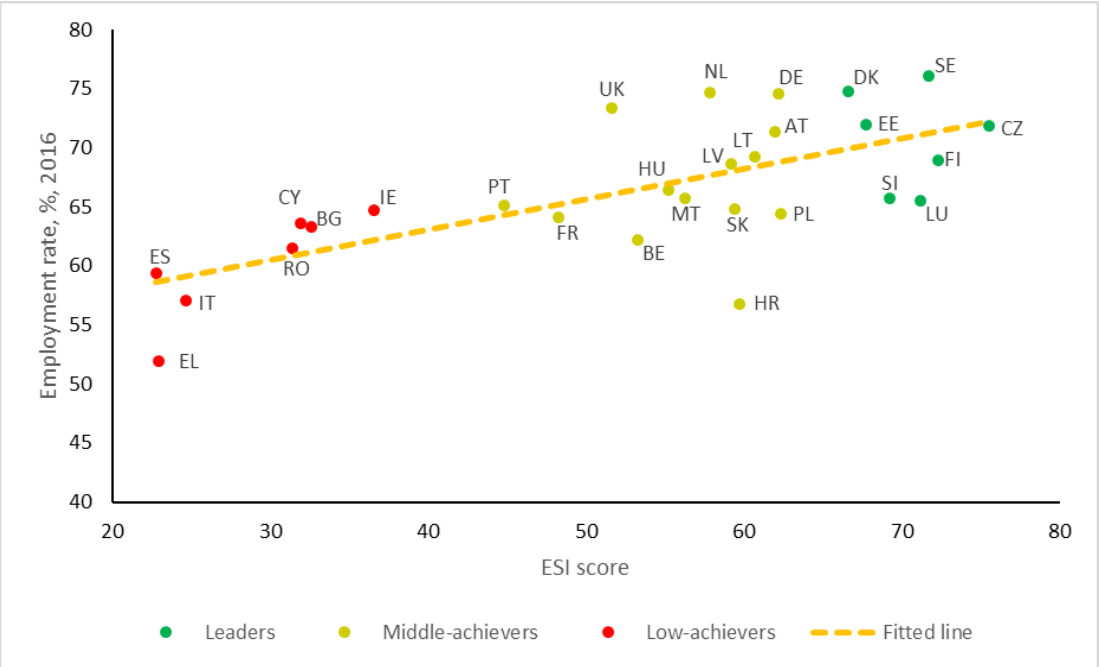
As expected, there is a clear positive relation between ESI scores and employment rates, meaning that better skills systems are associated with higher employment rates (Cedefop, 2018 European skills index, 2019).

Figure 12: Better skills systems have fewer NEETs (Cedefop, 2018 European skills index, 2019).



The latter are influenced by a variety of factors, but Figure 13 suggests that one way to foster employment would be to improve the effectiveness of the skills system within the Member States (Cedefop, 2018 European skills index, 2019).

Figure 13: Better skills systems have higher employment rates (Cedefop, 2018 European skills index, 2019)



Conclusion

It is inevitable that jobs are going to be impacted as technological developments automate a variety of tasks. Workers can spend more time on creative, collaborative, and complex problem-solving tasks that machine automation is not well suited to handle. However, workers with less education and fewer skills are at a disadvantage as the Fourth Industrial Revolution progresses. Businesses and governments need to adapt to the changing nature of work by focusing on training people for the jobs of tomorrow. Talent development, lifelong learning, and career reinvention are going to be critical to the future workforce (Trailhead, 2019).

As an answer to these changes and challenges affecting people's lives, some actions were already taken at the EU level, namely the European Pillar of Social Rights and The New Skills Agenda for Europe. The latter, adopted by the European Commission on 10 June 2016, launched 10 actions to make the right training, skills and support available to people in the EU. The European Pillar of Social rights, which was first announced in 2015, presented by the European Commission in April 2017 and solemnly proclaimed on 17 November 2017 at the Social Summit for fair jobs and growth in Gothenburg, builds upon 20 key principles, structured around three categories: equal opportunities and access to the labour market, fair working conditions and social protection and inclusion (European Commission, Employment, Social Affairs & Inclusion, 2019). Both initiatives along with other measures represent important endeavours toward a better future of employment relations.

The imperative for achieving a positive vision of the future of jobs will in the future also be an economic and societal move by governments, businesses and individuals towards agile lifelong learning, as well as inclusive strategies and programmes for skills retraining and upgrading across the entire occupational spectrum. Technology-related and non-cognitive soft skills are becoming increasingly more important in tandem, and there are significant opportunities for innovative and creative multi-stakeholder partnerships of governments, industry employers, education providers, and others to experiment and invest in new types of education and training that will be most useful to individuals in this new labour market context (World Economic Forum, 2018).

The outcome of the Fourth Industrial Revolution will depend as much on political and other developments as on technology itself. What is certain is that the 21st century is bringing massive changes to economic systems and our patterns of work (Hodgson, 2016).

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Keynote

The contemporary labour market: how to provide career guidance when we do not know exactly what future brings?

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Contemporary labour market is in process of transformation and radical changes; some professions are vanishing, new professions are just coming to live and other are in the process of transformation. The key escalators of change are scientific and technological development in the 3th and 4th (and 5th) industrial revolution, globalisation, demography and ecology.

The constant changes produce doubt in how the education system could follow this process. The focus of an individual's career is shifting from certificates to competences and skills, with which an individual can qualify and cooperate in society. Radical changes on the labour market are (or at least should be) deeply connected with transformation of the society as a whole. Our traditional understanding of the concept of career needs to be re-questioned again. What is career, its meaning and its benefits for us and others?

When we are thinking about the upcoming changes on the labour market, we are more or less without adequate answers. Slowly we started to understand what is happening at scene of labour market, but we are less successful with the predictions about the changing conditions in the present and future. Our starting point is the realisation that the labour market is changing radically and that the changes will become permanent events in our life. The outcomes of those changes are unpredictable and dependent on the environment and circumstances. We must remember that the outcome of those changes is very specific for each individual. The labour market is a vital and integral part contemporary society and, of course, it reflects that in radical changes in the society. The history did not end with the decent of the socialism and upraise of capitalism as Fukuyama presumed,[1] with the decent of the forceful development of science and technology at the turn of the century, the history did end.[2] Now let us enter into the future, the new chapter of human presence, which is much different from the previous; according to the plan to raise funds for survival, after sharing of the created, by management of the social relationships and society or societies, and by the life-style of each individual.

We know that the nature of work, work relationships and their environment, inherited from the development over the last two to three hundredth years of (mostly European) history, are going to keep on changing. Meanwhile in these processes a lot of jobs and professional occupations, vital for the development in the past centuries, are disappearing. Additionally also many traditional occupations are changing and adjusting to the new era. Many new jobs, which are demanded by the new era, are constantly appearing. Individuals on the labour market must adjust constantly to those changes.

Career paths of the 20th century are no longer effective nor are linear and self-evident. We know that the expectations, not only from employers but also from employees are changing. They are becoming more co-workers, looking for new relationships and conditions for collaboration. The

[1] Francis Fukuyama, *The End of History and the Last Man*, Free Press, 1992.

[2] The time of human presence on the earth is divided on two relatively well known epochs: the time of pre-history – the world before the class society, state and alphabet were established, and history – the time of also our own experiences but anyway the past time.

fast development in science and technology demands development and upgrade of new skills and competences for every individual, which has direct effects on the education system. It is no longer enough to individual upgrade (only) with inherited knowledge, but with the skills of lifelong learning, re-building and gathering new knowledge, personal growth, capability to cooperate, perseverance and, in the context of impetuous development, with resilience.

Main escalators of changes in the 21st century are:

- globalisation, information, digital and physical connection and consequently co-dependence of the word;

- development in science and new technology and with that other processes, such as automatization, robotization and digitalization of working processes (and consequently replacing human work force);

- demography or the world population movement and the consequences the demography division on "younger" and "older" part and on less or more developed countries brings with it;

- ecology and global processes, connected to climate and environmental changes.

In the past, the main accelerators were connected mainly with the ways of gathering resources for survival. The great revolution with permanent settlement (very limited in time and space) more than 10.000 years ago, began the process to decisively accelerate with the industrial revolutions. The 1st industrial revolution[3], marked as coal and steam and first machines in mining, traffic and in textile industry, had in comparison with the 2nd industrial revolution limited impact, in geographical and social sense. The 2nd industrial revolution[4] brings radical and permanent environmental, political and social changes. There were new social stratification, political reforms, social mobility, urbanization, changes in demography, professionalization and construction of public and vertical education system, key partner and accelerator of changes. Through the transition from traditional into modern, industrial society the population needed to be re-educated; the better paid job become central career goal and the crucial mark of self-evaluation for every individual.

[3] Beginnings in England in 17th and 18th century limited spread across Europe.

[4] 19th century marks the beginning of iron, railway, electricity, telegraph, fordism, mass production of commodities, consumption society and our own way of life in Europe, later in the USA and in 20th century all over the world.

New face of work appears, which concentrates on paid work and limits on individual's community coexistence. The very concept of work and its importance for the community and for every individual is today one of the most commonly addressed inherited stereotypes. New conditions in the society and on the labour market demand reconsideration about what work means for individual and what it means for new, different society of the 21st century.[5]

The 3rd industrial revolution began in the second half of the 20th century and is best described with the development of the internet, new technology, which upgrades and finishes the five hundred years long process of globalisation. It has strong potential for becoming a platform for sharing information, goods, knowledge and technology, for learning, motivating, manipulating, etc.

On the turn of the last century we have encounter the 4th industrial revolution, which is (till now!) best described with technology, such as: Internet of things (IoT), 3D-print, self-learning artificial intelligence and biology as the most promising science discipline. An important influence of the 4th industrial revolution is evident in education or sharing of knowledge for needs of an individual's career and the development of society as a whole. The education system is now facing existential, fundamental even problem connected with its traditional focus and purpose: what and how to teach, so that the given knowledge will be helpful, useful for and in the individual's life-long career. For the first time in history of public education system, we are faced with the fact that schools cannot longer alone prepare new generations for efficient, creative and long-lasting cooperation in the world of creation and production.

Current focus of education to share the commonly established knowledge, too often uncritically inherited from previous, different and past times, is becoming too narrow. The knowledge is more clearly and among general public seen and perceived as changeable cultural entity. However, the school field too often remains the space of knowledge transfer acquired by teachers during their schooling. On the labour market, on the creative collaboration market and in society with a general accessible education system the competences and skills, achievable (more or less) with extracurricular activities, are becoming more and more important comparable differences among individuals, and sometimes even surpass the certificates.

[5] Work (as noun) is »activity involving mental or physical effort done in order to achieve a purpose or result;« and (as verb) »be engaged in physical or mental activity in order to achieve a result; do work.« https://www.google.si/search?source=hp&ei=YbdNXfymGsmOrwSaj7OQCg&q=the+meaning+of+word+work&oq=the+meaning+of+word+work&gs_l=psy-ab.3..33i22i29i30l10.1702.10752..11164...0.0..1.322.4080.1j18j5j1.....0....1..gws-wiz.....0i131j0j0i22i30j0i19.KN0gWMt7qq4&ved=0ahUKEwi826nbsfbjAhVJx4sKHZrHDKIQ4dUDCAk&uact=5) (accessed June 2019)

The changes brought by technology from the 4th industrial revolution are effecting the whole society and they concern every individual and his or hers personal and professional life. We stepped in society 5.0 as named by the Japanese governmental program. In addition, Slovenia sees a challenge in this very program and tries to adjust it for Slovenian reality.[6] Program 5.0 has very clear goals to:

- cultivate new technology,
- humanize the technology and
- avoid the danger of new stigmatization among those who master the new technology and use it and those who do not.

Because society transition into new social communications, gratification of rights and perfecting duties, it is more than necessary to equip the new generations with tools and skills to master and use it. If we do not equip the new generations and (with even greater importance!) older generations effectively, we cannot even start to think about a modern and functional society. We need to realize that the 5.0 program is vital because of modern demographic trends with aging and the opportunities for the new technology to become a vital and helpful part of human society.

So why are we now, of all times, facing the disappearance of so many jobs and professions? When many jobs disappeared with the last global economic crises, we were sure that the lost jobs would eventually re-appear with the end of crises. Not only that, we hoped that with the help of new technology many new jobs would appear. However, that did not happen. From the present perspective, we can see that even (long) before the crisis and even stronger and faster during it, the deeper and long-term focus was on work. This fact can be confusing considering our previous experience that past industrial revolutions brought with them many new jobs, new professions, new business opportunities and demands for new qualified employees. The 4th industrial revolution has very unique consequences and potentials. Its uniqueness is the fact that it shuts down many work places and that the human work force is replaced with new technologies.

For the first time in history humankind is faced with a real change that something unbelievably to realise, the strongest (even severe) cultivated and hidden desires (working less and living better),

[6] »Do družbe 5.0 preko pilotnih projektov«, https://www.klipingmap.com/v3.0/media/pdf/view?filePath=2019/02/06/f9436a8c-956a-3e1c-a882-8541fa19ad85&language=sl&topicGroupId=7eb5f3be-2f3e-3de1-8d7a-7249e58eeb6b&showHighlights=true; (accessed March 2019)

can actually happen. Obviously, the industrial revolutions are, at their very core, directed forwards that very goal to provide a stable production of goods.[7] The 4th industrial revolution allows us just that, with a little bonus that the need for human work, above all in that health-threatening, dull, physically strenuous, almost nullified. The reaction to this (only vision, option) shows again, that human societies are not rational, that when it comes to decision making we are not lead by clear thought, reason, but mostly emotions. Among those, we can find fear, doubt, uncertainty and inflexibility.

Which jobs and professions are in the light of the 4th industrial revolution mostly in danger of disappearance? By definition the jobs, which can be decomposed on separate phase, which can be cheaply automatized, robotized, digitized or made reachable to new technology. In the industrial field, this process has been going on for a while now, even before the 4th industrial revolution. Work places in factories started to disappeared, human work force has been replaced by robots, which have very different needs from humans.

According to McKinsey's consulting company data "in Slovenia, because of technology and automation, more than 43 percent of work places in industry are potentially at risk,"[8] explained Peter Wostner, the head of coordinating smart specialization in government service for development and European cohesion policy, on the GoDigital conference in Ljubljana in December 2018. We find ourselves in a phase, when work places, not only in so-called "blue collars"[9], but also "white cellars" jobs are shrinking. Klaus Schwab stresses in his book The Forth Industrial Revolution[10] that by the year 2020 more than a million work places will disappear, most of them in administration, those are professions represented in Slovenia as mainly women workforce. Among those, we will find such jobs as tax advisor, real estate agent, secretarial and administrative staff, currier, sport referees, etc.

On the other hand, some jobs are subjected to automatization, just long enough for the content and the nature of the profession to change, such as psychologists, educators, psychiatrists, human resources officers, counsellors, archaeologists, physicians, legal expert, etc. Those are jobs, which satisfy peoples' (mostly) emotional needs, which research human psyche. These differ in the fact how to upgrade and use different human potentials and capabilities and in how to care coexistence

[7] As well as with them connected development of society, science, technology, professionalization, etc.

[8] The assessment, prognosis is valid on more than one hundred thousand persons, who will lose their jobs in various industries. (Delo, »Namesto strahu mora digitalizacijo voditi strast«, P&D/Svet IKT; 10. 12. 2018, str. 13).

[9] Of course, this does not mean that all kind of physical jobs, occupations are vanishing; for instance gardener, landscape designer, different craftsmen will be preserved, become even better, more efficient with support of new technology.

[10] Klaus Schwab, The Fourth Industrial Revolution, World Economic Forum, 2016.

and are based (mostly) on human creativity and knowledge with potential for interdisciplinary cooperation.[11] The professions, which are essential for basic function of every society, will experience real transformation. There are professions, which have already and will be facing with even more challenges with connecting, transferring processes of work to new technology, costumers, clients' new changeable needs and expectations. New scientific knowledge and new opportunities, which are brought on by developing technology, are bringing new challenges and new opportunities. Many of those professions will change considerably or they will become a platform and source for new jobs and/or their new requirements.

Some new jobs, which are in close contact and related to the modern and evolving technology and society, are already among us. These are for example dispatcher of drones, coordinator for teaching children at home, executive seller, investment banker, software developer, expert for 3D print, digital archaeologist, idea manager data miner, social media editor, editor of digital social communities, social gerontologist, expert for privacy, analyst for business databases, personal coach, manager for the happiness of employees, expert for virtual currency, expert for online marketing, expert for web marketing, web seller/advisor, computer user support specialist, professional friend, lawyer for virtual property, expert for 3D print, personal coach, etc.[12]

Furthermore, the use of modern technology is necessary or it can be the important tool for all those professions is characteristic that the content of work is fluid, dependent of changeable needs. This, of course, means that prior education is not prescribed or in other worlds the existing syllabuses not (yet) empowered for that exact work. What really counts among those "new professionals" are their skills and competences in constant development and obtained from different ways of individual's life learning.[13]

Majority of those new jobs, professions are still not visible clearly. We have mostly more or less serious discussions on internet, which try formalizing unclear, different and fluid happening on the market supply and demand for working collaborations.

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[11] "The advantage is in intellectual professions, others will be substituted by robots and machines", Dnevnik, 26. 9. 2012, https://www.dnevnik.si/1042553995; (accessed December 2018)

[12] On this topic we can find on net not only many popular articles but also more technical, professional articles that touch futuristic analyses of our near future;
»Poklici prihodnosti«, Talentiran.si,
http://www.talentiran.si/index.php?option=com_content&view=article&id=1731:poklici-prihodnosti&catid=110&Itemid=547;
»Poklici prihodnosti«, Dijaskisvet.si, https://www.dijaskisvet.si/dijaski-os/clanki/poklici-prihodnosti/;
»100 Best Jobs«, https://money.usnews.com/careers/best-jobs/rankings/the-100-best-jobs.

[13] Learning is a lifelong process constructed through various forms of learning: formal, (mostly) school learning, informal and occasionally learning trough life. The majority of our knowledge (in the broadest sense of the word) is not from school.

Professions, which are just appearing, are for instance: data detective, commercial space pilot, cyber city analyst, personal memory curator, genetic diversity officer, agent for human organs, disaster expert, psychotherapist for death, man machine teaming manager, galactic tour operator, personal memory curator, digital tailor, etc.[14]

In the 21st century, knowledge is still a core value and foundation of all our skills and competences. However, we have to be aware (especially in our future time!) that knowledge is cultural entity, it is variable, which demands constant testing and up grading.[15] Knowledge must be functional, connectible and communicative; our knowledge must transdisciplinary cooperate with/in the most diverse creative, working teams. At this point, we must once again emphasize that formal school places are not the one of gathering and updating our knowledge. That is why certificates and diplomas are not the only one and (often) the most important evidence of our competences.[16]

Skills and competences are becoming the most desirable and distinctive quality by individual. The following skills are considered the most important among new colleagues, talents seekers and employers:

- Communication skills,
- Analytical/research skills,
- Computer/technical literacy,
- Adaptability/flexibility and the ability to manage multiple priorities (multitasking),
- Interpersonal skills (teamwork skills, ability to motivate, conflict mitigation),
- Leadership/management skills,

[14] »Top 10 Jobs in 2030: Skills you need now to lend the Jobs of the Future«, https://www.crimsoneducation.org/ru/blog/jobs-of-the-future;
»21 Occupation of the Future«, https://www.axios.com/21-occupations-of-the-future-1513307252-c5ab6487-ccc1-4177-8100-31c853460973.html;
»Best Career for Future: 51 Jobs for 2020 and Way Beyond!«, https://www.trade-schools.net/articles/best-careers-for-the-future.asp;
»Here are 7 Potentially Interesting Jobs of the Future«, https://interestingengineering.com/here-are-7-potentially-interesting-jobs-of-the-future;
»20 Common Jobs in 2040«, https://futuristspeaker.com/future-of-work/20-common-jobs-in-2040/

[15] The science Polish microbiologist Ludwik Fleck (1896-1961) wrote in 1935: »In science, just as in art and in life, only that, which is true to culture is true to nature.« *Genesis and Development of a Scientific Fact.* (1979, 35), Chicago: Chicago University Press.

[16] Especially if we finised education many years ago.

- Multicultural sensitivity/awareness,
- Planning/organising skills,
- Problem solving and creativity.[17]

While keeping in high and up-to-date level of knowledge to presume, social, soft skills represent higher comparative advantage and distinctive feature of individual (relations, cooperation, flexibility, adaptability, taking on responsibilities, etc). There are the qualities, which are rarely gained within the education system and are most often derived from on individual's extracurricular activities.

The Institute for the Future of the University of Phoenix Research Institute made a list of the most demanded skills and competences until the year 2020[18]:

- **Sense–making**: ability to determine the deeper meaning or significance of what is being expressed.
- **Social intelligence**: ability to connect to others in a deep and direct way, to sense and stimulate reactions and desired interactions.
- **Novel and adaptive thinking**: proficiency at thinking and coming up with solutions and responses beyond that which is rote or rule–based.
- **Cross–cultural competence**: ability to operate in different cultural settings.
- **Computational thinking**: ability to translate vast amounts of data into abstract concepts and to understand data–based reasoning.
- **New–media literacy**: ability to critically assess and develop content that uses new media forms, and to leverage these media for persuasive communication.

[17] Career Centres of the University of Ljubljana resources of information: cooperation with the representatives on the labour market, with talents seekers.

[18] Davies, A., Fidler, D and, Gorbis, M. 2011. Future work skills 2020. Institute for the Future of the University of Phoenix Research Institute.

- **Transdisciplinary**: literacy in and ability to understand concepts across multiple disciplines.

- **Design mind-set**: ability to represent and develop tasks and work processes for desired outcomes.

- **Cognitive load management**: ability to discriminate and filter information for importance, and to understand how to maximise cognitive functioning using a variety of tools and techniques.

- **Virtual collaboration**: ability to work productively, drive engagement, and demonstrate presence as a member of a virtual team).

The need for interpersonally, cognitive and systemic skills will certainly continue to grow in the future until 2030. OECD in its document The Future of Education and Skills, Education 2030[19], in particular emphasizes that the educational system needs to adjust to new demands, which are waiting on future generations: »Children entering school in 2018 will need to abandon the nation that resources are limitless and are there to be exploited; they will need to value common prosperity, sustainability and well-being. They will need to be responsible and empowered, placing collaboration above division, and sustainability above short-term gain.«[20]

The third most important personal qualities, which will allow individuals of 21st century successful and satisfactory coexistence, are motivation, thrust for new knowledge/learnability, emotional intelligence and mental resilience.

Instead of conclusion

So how to regulate your own career and which might be an even more difficult question is how to guide people to benefit their own career for greater good? It is important to emphasize that the time to relyon (at least relatively) basic rules and instructions is gone forever. Instead of already created and always working protocols we find ourselves in those conditions, which will become our decisions, advises and actions certainly dependent on a given situation, of specific conditions

[19] »The Future of Education and Skills, Education 2030«; OECD, 2018, https://www.oecd.org/education/2030/E2030%20Position%20Paper%20(05.04.2018).pdf.

[20] ibidem, page 3.

by our clients. The work of guidance practitioners requires constant audibility, keeping up with the changing trends, gathering new knowledge, information and (equal important) professional and personal width. Guidance counselling is one of modernized traditional professions, which does not have a clear, prescribed pre-education in which the specialist, professional is constantly "under constriction".

The building and leading of a career can be summed up in:

- Knowledge, which has to be as up-dated as possible, communicative and capable for transdisciplinary cooperation, co-working.

- Skills, competences, which were obtained in and out of education system and are shown as individual's distinctive feature, strength and advantage. Guidance practitioners are given possibilities to help a client to raise awareness of acquired knowledge, skills and competence. Only then, with due awareness and evaluation, clients have option to manage and make them useful.

- Values, which are gaining importance, are collaboration, responsibility for the community and environment, connectivity, etc.

- Personal characteristics, especially to gain in importance the resilience. [21]

We have to keep in mind (at least) that:

1. We stepped into a new era, which demands adjustment, not only when it comes of gathering of the goods, commodities, but (maybe most of all) also when it comes to social relationships. We are "a little late" with new social contract, agreement, which would after two hundred years admitted that the world and conditions of coexisting are radically changed, that the contribution of individuals and community to social welfare changed, that the expectations changed and we have to consider new conditions.

2. What we understand under the word "work"? Can we (still and only) understand it as a payed job, or it is time for rehabilitation and extension the term as the most human

[21] Resilience, as a crucial personal characteristic of individuals, which give us the opportunity for satisfactory life (and survival) under conditions of constantly changing 21st century, highlights also the historian Yuval Noah Harari, the author of the book *21. Lessons for 21st Century*, Vintage Publishing, 2018. See also Why the rise of AI makes "mental resilience" so important on https://www.youtube.com/watch?v=Gn7uDObRtNc

distinctive feature? We have to take into account also the possibilities' that we are in the beginning of the time not only with less and less (payed) work but in front of the time without a work at all – or at least for majority of us.[22] (And then – what?!)

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Austria

Austria

Jopsy – how to find the job of your dreams?

Dr.in Martina Aicher and Mag.a Heike Angerer

Dr.in Martina Aicher, employee of the Chamber of Labour in Vienna, Austria and educational counsellor.

Mag.a Heike Angerer, employee of the Chamber of Labour in Vienna, Austria and cultural anthroplogist, mediator, jobcoach, educational guidance counsellor.

Workshop annotation

A brandnew job-App, providing vocational guidance for pupils aged 13 until graduating from highschool. **"Jopsy"** - a play on the words "job" and "psychology" - was especially developed for the youth of today, who is mainly using smartphones and tablets for quick researches and inputs.

Participants of the workshop will gain insights into the scientific principles and models "Jopsy" is based on (**Hollands' RIASEC - model**) and how this model was used to develop a picture-based app that will allow pupils and young adults to find out their three principal areas of interest within five minutes. Based on the areas the app then suggests jobs and occupations that could be of interest to the pupils/young adults.

Teachers in the classroom and professional career counselors can also use "Jopsy" as a quick motivational tool to get young people thinking about their interests and how to find the right job for them. Because the app works mainly visually, the pictures can also be used to start a conversation with the individual pupil/young person or to initiate a more profound talk about individual preferences and wishes regarding their further education.

Introduction

Early school leaving is a long-lasting phenomenon. In a society where the educational system serves as the main determinant of status, dropping out of school early leads to substantial exclusion and discrimination when it comes to career paths as well as other crucial parts in life.

In Austria, young people are counted as early school leavers (ESL) when their highest qualifications are from new middle school (MS), the lower stage of a general secondary school (AHS) or from a one- or two-year VET school course (see Oberwimmer, Konrad et al., 2018).

A study by the Chamber of Labour in Vienna (Arbeiterkammer Wien) shows that around 300.000 people under the age of 35 have left school after post-compulsory education. This includes secondary school, a school for vocational training and a college for higher vocational training or having started an apprenticeship (Lindinger, Korinna et al., 2018).

It is alarming, since around half of those who were employed after two years of having left school mainly had an unqualified job. It is a matter of fact that those who have no proper education are struggling enormously on the labour market to gain a salary that can sustain them. This particular group of people is mostly suffering under precarious working conditions and is more at risk of losing their jobs whenever a socioeconomic crisis arises. Furthermore, we are currently confronted with rapid technological development and digital progression. Therefore, a solid education is a vital basis to deal with crucial changes and the accompanying substantial transformations in the world of work and professional lives.

A solid education becomes an increasingly important factor for developing the ability to critically reflect future advancements in terms of these rapid changes concerning our personal and professional lives. Considering these circumstances, we believe that much needed awareness should be raised among teenagers from the ages of 13–19 and they should be informed about vocational

orientation. Vocational orientation constitutes an important contribution in preventing early school leaving.

It is very important to provide a service for young people, where they receive orientation highlighting a wide range of educational and occupational possibilities. Furthermore, they need guidance and support to make well-informed choices from an institution, which is not combined with school or parents. The Chamber of Labour has therefore decided to implement an education counselling service called 'Bildungsnavi'. It will be one of the main pillars of the Chamber of Labour's Future programme, with the aim of preparing the current generation of students for the rapidly changing workplace. Drastic changes in private and professional lives have arisen from flexibilisation, digitalisation and new technologies. While new jobs are created, others are disappearing (Futurezone, 2018).

Life-long learning is required now more than ever, and it is much easier to meet these requirements when you can build on the foundation of a solid education.

This leads us back to 'Bildungsnavi', the service recently implemented by the Chamber of Labour. It is true that you are more likely to complete your education when you have found something that suits your abilities and interests, which is what makes vocational training so important. In Austria, students have to decide on their further education when they are just 14 years old, instead of 16 years old, like in many other European countries. It is easy to imagine that 14-year olds are generally not adequately informed about the wide range of training or educational opportunities that are available. This is why the Chamber of Labour offers services like educational guidance as a contribution to prepare students and young adults for their professional life and all the challenges it will bring with it.

Why Jopsy?

Our approach is to meet the students, no matter their situation, in order to help prepare them for challenges the future may bring. To help achieve this, an app was developed that can be used on portable devices. After all, students use their mobile phones for everything else, why shouldn't they use it to help with vocational orientation?

No sooner said than done, the **vocational orientation app 'AK Jopsy'** was created to reach out to the optimal target group: students 13 to 15 years old. Since kids at that age already use their

smartphones for researching all kinds of information, we thought this approach was best suited to meet their requirements. The app can be used either within a learning environment or students can use it on their own, no matter the time or place.

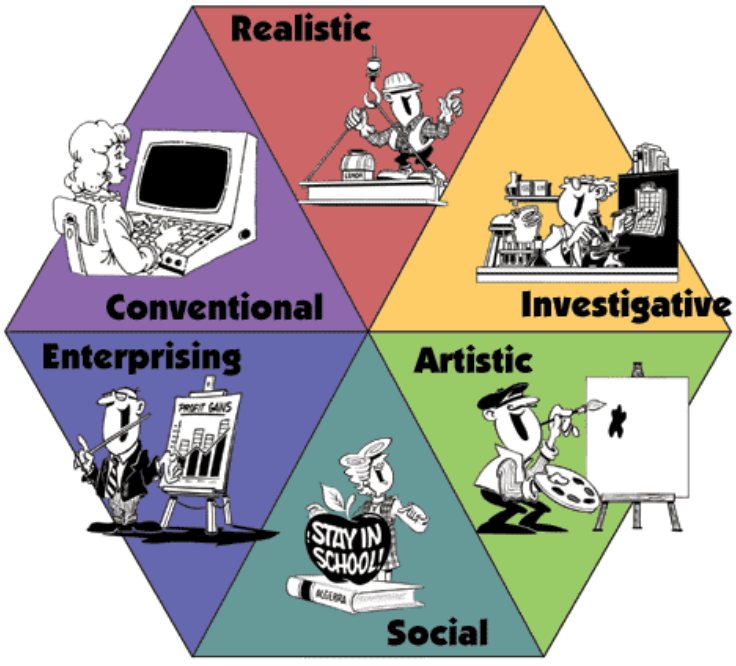
Jopsy is a picture-based app and provides easy access to around 60 images relating to occupations and a wide range of possible jobs (approximately 758) from the national job centre database. This picture-based interface is state-of-the-art and is well suited to this specific age group.

Jopsy and the scientific model it is based on

Jopsy, a play on the words 'job' and 'psychology', is based on the well-known 1971 RIASEC model by John Holland, which combines usability and scientific insight. The Holland Codes, or the **Holland Occupational Themes (RIASEC)**, refers to the theory behind careers and vocational choice, based upon personality types (see Wikipedia, 2019). It assigns people groups based on their suitability for six different occupational categories, the basic premise being that one's occupational preferences are an expression of underlying character (Marti, 2011).

Holland established six general types (ibid): Realistic (Doers), Investigative (Thinkers), Artistic (Creators), Social (Helpers), Enterprising (Persuaders) and Conventional (Organisers).

Illustration 1: RIASEC model (Source: https://psyfan.wordpress.com/tag/riasec/).



It is very important to point out that there is no pure representative of one type; they all correlate to each other. We believe that this is the main assertion of the model and attach great importance to this fact. Whenever we use Jopsy with students in a counselling session or when students use it in a lecture, we always emphasise that the results that Jopsy offers are just a snapshot. Nevertheless, it is something that can be used as a starting point or perspective from where educational journeys could possibly begin from or to reflect more intensively on your own strengths, interests, skills, abilities and weaknesses.

This is actually the main reason why we use this particular tool, to motivate students to consider vocational training and career ideas in the first place. This is an important consideration to make, as previously mentioned, students must make their decisions on further education ehrn they are 14 years old in Austria, compared to 16 years old students in many other EU countries.

An overview of our workshop

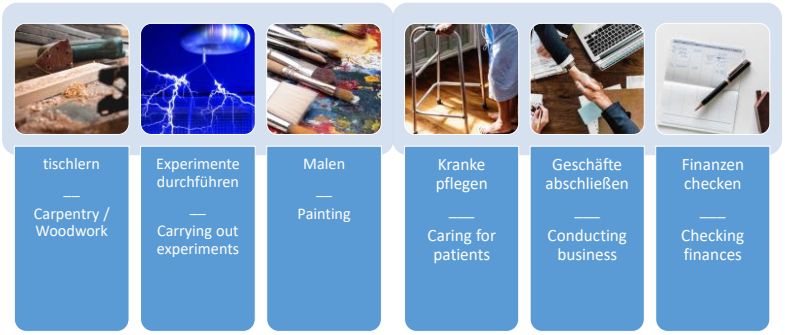
It was clear that our partners were interested in digitalisation and future skills workshops, since they were fully booked.

The participants, who mainly worked within the field of adult education, but within different occupations, were encouraged to try out Jopsy themselves by downloading AK Jopsy on their smartphones. Some of the participants were swiping fast through the 60 pictures, which are all accompanied by short descriptions related to various occupations, whereas some needed around 10 minutes or more to make their decisions. It was refreshing for us to observe because when we use AK Jopsy in our counselling sessions, the students swipe through rapidly, mostly in about 5 minutes. Once the results are in, they are provided with three main types of interests; by clicking on each interest, a more detailed description appears and a range of related jobs as well.

We invited the participants to form pairs with someone they did not already know in order to guess each other's occupation based on the Jopsy results. It was remarkable that a lot of the pairs could solve the riddle and even though the app was programmed for students, most of our participants did actually work in the fields suggested by Jopsy. Aside from that, they got an insight into how we use Jopsy or how they could use Jopsy in their daily work.

The app is in German, so we have provided translations of the short picture descriptions that relate to occupations.

Illustration 2: Example of the app



We appreciated that the participants of our workshop were actively engaged in discussions about the scientific approach and digital solutions. Furthermore, many participants asked for a more advanced version of the app for young adults as well as a translation into English. This shows how a tool like this is in great demand for vocational guidance.

We were provided with a lot of interesting and stimulating feedback, including:

- 'Fast, fun, facts and picture choice'.
- 'It is an interesting use of the Holland theory, adapted to the needs of new generations'.
- 'A modern tool for counselling'.
- 'A good app for young people to use in starting their guidance process'.

The advantages of the tool and final remarks

Our final remarks coincide very well with the feedback we received on Jopsy during the workshop.

Jopsy is easily accessible (App Store and Google Play), free of charge and has no need to store personal data.

For us, it is very important that Jopsy offers a wide range of applications when used such as starting conversations with students on their career plans, about their skills, talents, abilities and to get them thinking about their interests in the first place.

It acts as a basis for students to carry out more profound research regarding their educational decisions. Beyond that, it is a basis for labour market research to find out more about job opportunities associated with the specific educational background.

An advanced version of Jopsy is in the pipeline, with the first steps having already been implemented.

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Croatia

Croatia

Presentation skills as a competitive advantage

Helena Smoljo

Helena Smoljo is a psychologist and has been working as a career counsellor in Lifelong Career Guidance Centre (CISOK) within the Croatian Employment Service (CES) since 2013. She previously worked as a school counsellor and a teacher in high school.

She has experience in conducting workshops as well as individual work with elementary and high school pupils, faculty students and the unemployed.

Presentation skills are essential in every aspect of the professional life. To be good at something is not enough: if you do not show it, no one will know it.

Through everyday work with job seekers and the unemployed of all ages, we become aware of the importance of self-evaluation and quality presentation in the labour market.

Whether it is applying for a job and sending a resume, preparing for a job interview or just performing tasks in everyday work, you will achieve better results if you master the necessary presentation skills.

The workshop presented examples of good practice and some exercises in our work with job seekers in order to strengthen them in their job search process.

CISOK, as a career guidance centre, aims to assist people in their different needs when it comes to labour market activities. In our everyday work, my colleagues and I noticed that a great number of our users have trouble presenting themselves when asked about their achievements, experiences, and skills. They do not feel comfortable talking about themselves or highlighting their qualities.

Presentation skills can be defined as a set of abilities that enable an individual to interact with the audience and transmit messages with clarity.

During job interviews, you present yourself: who you are, what you have learned, what you are capable of. There are three key elements for improving your presentation:

- **Preparation** is really important. You need to do the research about the potential employer; find out what you can about the vacancy. You need to prepare yourself for questions about your achievements, your skills, your previous work experiences.

- **Practice** as many times as you need to feel comfortable to deliver it with ease and confidence. Rehearsals reduce anxiety and enable the person to look confident. It is important to rehearse, but not to go for memorizing the presentation, as it will make the presentation look mechanical.

- **Presentation** is important to practice, how to perform on a job interview. During the presentation, the person has to project confidence, maintain eye contact and be an active listener.

Instead of the usual all-around introduction, at the beginning of the workshop, the participants were asked to present themselves in their group, like answering to employer's question "Tell me something about yourself". During a job interview, people usually get sufficient time to present themselves. But we ask them: if you had some key points you wanted them to remember, what would it be? When you leave the room, are you satisfied with how it went, did you say all you wanted to say or at least the most important things?

Participants were then given a list of different types of skills and they had to select those skills they consider they have and like to use, and how to present that skill to a potential employer. It is recommended to mention some examples from work experience when they had the opportunity to apply that skill.

The last exercise was creating their portfolio. A portfolio is important because it gives a good overview of the individual's profile. When you introduce yourself during an interview, you present

your personality, behaviours, skills, knowledge, and experiences so that the interviewer can assess whether you would be a valuable asset for the company. We have to be aware of all that so we could present them.

The point of these exercises was to show that good self-evaluation is the basis for good self-presentation. Participants were very active during exercises and found them interesting.

After establishing what they want to say, users need to work on improving how to say it. We have many workshops that address this topic and help our users in enhancing their presentation skills. For example, "Enhancing self-confidence as a way of accomplishing professional success", "How to be more successful in communication", "How to overcome fear of public speaking", "How to listen by looking - the importance of nonverbal communication", "Step by step through job interview questions" are some of our workshops. In these workshops, we create a safe place for our users to practice, to exchange information and advice with others who have similar problems. They gain insight into what they could improve to be more competitive on the labour market.

Participants were very interested to learn more about our workshops and had some questions regarding the application of the exercises and giving feedback to users.

At the end of the workshop, I mentioned a few users that are good examples from practice, of different backgrounds and different profiles, but one thing in common – all of them had a certain insecurity and the need to improve their presentation and to boost their self-confidence. Whether they needed encouragement or concrete advice regarding their resume or how to answer a specific question on the job interview, they came to our workshops or they came for an individual meeting. Some came once; others came several times before they felt they were prepared for the next job interview. We later received feedback from them that they were successful and that they got the job because they felt well prepared and confident during the interview.

A quality self-presentation is important now, and will be in the future. By improving your presentation skills, you improve your chances for employment.

Czech Republic

Czech Republic

Where and how find clients' qualities for future?

Bc. Martina Milotová and Mgr. Pavlína Vašátová

Bc. Martina Milotová works as career counsellor with students, adults and teachers. She has also experience with career counselling with Roma people. She prefers creative work and solution focus approach.

Mgr. Pavlína Vašátová works as talent counsellor with students and adults. She likes creative techniques in her work.

Present could be called the time of turbulent changes. One discovery alternates with the other very quickly. Topic, which is actual for everybody, is impact of the 4.0 industry especially on the labor market and the field of HR. From our practice as career counsellors we know that it is very useful speak about this topic with clients, students and teachers. The importance of our work is growing. The main role is to support clients in understanding their strengths. However, sometimes it is difficult and we try a lot.

In our workshop, we wanted to be very practical and show to our colleagues, other career counsellors, how we work in Czech Republic. What kind of techniques we use, produce and have good experience with. As we saw on the workshop in Slovenia, we all love sharing.

First technique, which is also very good icebreaker, is called simply 'the sun'. At the beginning of the session, you ask the clients to: "Draw your own sun on the paper". Then let the client make it.

Sometime can be useful talk about the process, for example somebody might need to know more information such as – How big? Where should I draw it? Should the sun have sunbeams? Etc.

Than we just say to clients to write on each sunbeam activities, which they like, makes them happy, gets them energize as a sun. Than is the counselor´s job to talk about those sources from the sun and ideally use them in the labor office context.

We keep on trying to be creative in our Centre. Last year we developed a great tool for work with students. We made mental map for pupils after our experience with them. Mostly they feel lost and it is very difficult to make career decision. Very often they haven´t got any sources or support. One of our next inspiration for professionals is free to download including materials on this link:

https://drive.google.com/file/d/1Lkf5cz0IneWu0jfzMfacckp7AgToU_3P/view

Twice in worskshops´ groups, we worked with colleagues form Europe. They tried all activities we bring and after each, there was a discussion. It was nice to exchange contacts and find new inspiration.

I hope that Euroguidance will continue to promote guidance across Europe and thus enrich the world of career guidance.

Germany

Germany

What about the old skills? Brain works versus digitalisation

Dr. rer. nat. Bernd Lienstädt

Dr. rer. nat. Bernd Lienstädt is counsellor for academic professions with scientific background as research associate at the neurobiological department of the University of Bremen, Germany.

If we are looking at the actual development of economy, education, labour market and society, we often cannot resist a feeling of uncertainty and the question arouses: Is there something in these fast, changing world, which will last, as we know it? Yes, it is the Human Brain.

Its main challenges, survival and reproduction, in all their immense complexity have not changed much since 5 million years, even in our highly, technological world. Nor have the basic influences that are responsible for making a Human Brain efficient, in general and individual. The workshop dealt with the conjunction between the Human Brain's functional development and the impact of digitalisation.

The awareness that economy 4.0 should have an influence into the educational system, led to the "Digital pact" in Germany, which shall bring IT knowledge and technology into German schools, making young people capable for the future labour market and the actual digital environment. As the author is a "consultative neurobiologist" working in the educational system in behalf of the German Federal Employment Agency, the focus of the workshop was on the following topics:

- How is the actual situation at German schools regarding digitalisation?
- Brain's challenges, in the past and now.
- How do neural networks get efficient (intelligent)?
- Does digitalisation and brain efficiency go together well?

How is the actual situation at German schools regarding digitalisation?

To the actual day, there is no real concept regarding digitalisation in the German educational system. Nor have teachers and pupils a good IT knowledge before and after their graduation.

Even more crucial are the more basic problems German schools have to face nowadays: infrastructure, not enough teachers, less lessons in manual training, sport and music, a high heterogeneity and the implementation of the concept of inclusive classes, etc.

The basic needs of education should be settled, before throwing some IT into schools.

Brain's challenges, in the past and now.

The Human Brain's challenges have not changed so much. We are usually not aware of the huge amount of work our brain does in every second to haul us healthy though our immense complex physical/chemical/social world.

Yet because it is built precisely for that task, during its live time, the human brain highly appreciate massive input of complex stimuli and information from the outside world. That is what makes a neural network efficient or to say intelligent.

For this input, IT or digital devices are not necessary (or probably unprofitable) – it is all there, in the natural world and in the construction of the human body. We just have to use it!

How do neural networks get efficient (intelligent)?

The Human Brain is a network of cca. 90 billion nerve cells, while each of these have 20.000 – 30.000 connections to other nerve cells. The reason for its efficiency based on bigger and more complex nerve cells in the neocortex compared to animals. Which enables a faster transport of information via faster action potentials and a more efficient cell-to-cell information transfer over synapses. To deal with new information or situations these cell-to-cell connections have a high plasticity.

However, the efficiency of the whole system depends on outer stimulation; this is particularly the case early in development and during education.

The differences in individual intelligence lies in a more or less complex cell structure inside the neocortex. This is defined between 50% and 80% by inheritance, the rest of a healthy and diversified environment during childhood and youth.

Nevertheless, even the part of individual intelligence, which is defined by inheritance is influenced from the environment. It is believed that the environment has an effect from plus/minus 20 – 30 IQ points, which mean the difference between an inferior and a high intelligence.

Does digitalisation and brain efficiency go together well?

Not really! Actual scientific publications gives evidence that digital media might decrease reading comprehension, as well as pupils' attention for different reasons.

Digital media presumably give no benefit to overall school performance, but have negative effects on the performance of inferior pupils.

Digital media and devices are usually to one-dimensional for a successful (early) development and education.

Conclusion

As a conclusion, we can assert that the "old skills" made our brains so efficient. Before concentrate on a "Digital pact" for schools the basic needs of education should settled, because an effective brain can deal with anything.

No question, we need a good concept and a good infrastructure for digitalisation in schools, because IT is a mighty tool for anything in the modern world and children have to learn to deal and (maybe more important) to work with it. However, the emphasis should be to enable pupils just learn to think!

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Hungary

Hungary

"New skills for future jobs"

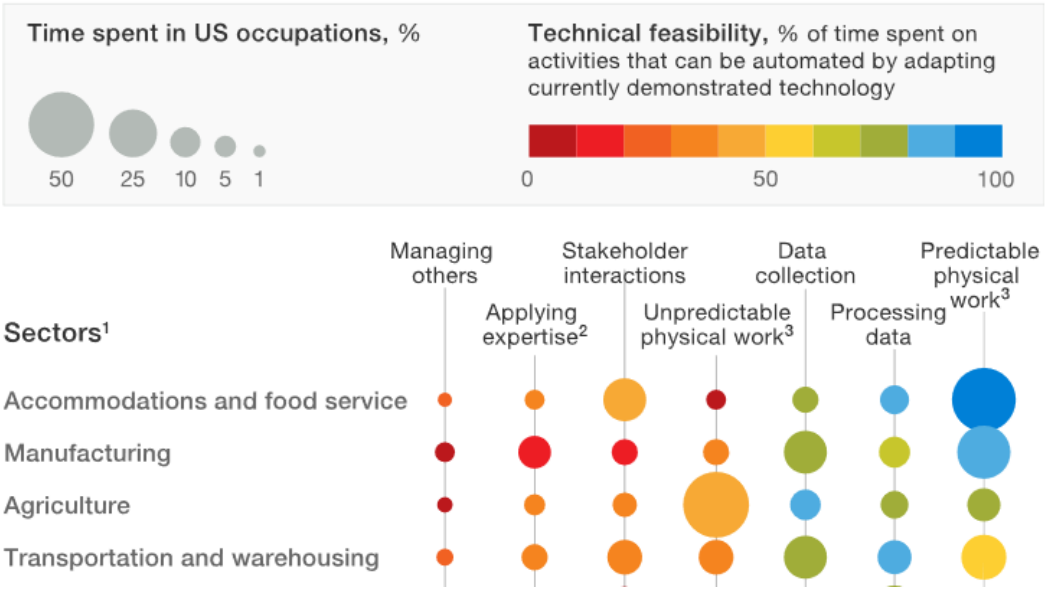
Tamás Jankó

Mr. **Tamás Jankó**, representing the Centre for Digital Pedagogy and Methodology in Hungary, (https://dpmk.hu/) worked for development projects in the past nineteen years since 2000 for the Hungarian Government. As a senior adviser, Mr. Jankó was heavily involved supporting the digital transformation of Vocational Education and Adult Learning in Hungary from 2015-2018. As a national coordinator, he has supervised the fine-tuning process of the translation of the Hungarian version of a school level digital self-assessment tool SELFIE_EU (https://ec.europa.eu/education/schools-go-digital_en).

The "New Skills for future jobs" seminar explored the dynamic new world of digital transformation regarding the learning-teaching and skills domains. The seminar itself tried to show rather a giant leap than a small step regarding the rapid pace of change. The participants had to explore the ins and outs of organising the Cross Border Seminar 2030, which perhaps might take place in Bled, Slovenia again. The participants discussed the consequences of the fact that in 2019, all students who took the secondary school leaving exam were born in this century, but all the teachers were born in the last century.

The workshop investigated the latest ideas and predictions regarding future skills forecasts, based on the evidence from surveys and studies. During the workshop, all the experts themselves gave examples on serious wake-up calls on what to do, how and why regarding the upcoming skills revolution of Economy 4.0.

As a message from the workshop, please find here a graphic image from a study published by McKinsey Global Institute[23], on the predictable change of certain occupations:



Introducing the Center for Digital Pedagogy and Methodology (DPMK), the organisation is an intermediary body, responsible for supporting the implementation of the Hungarian Government's Digital Strategy for Education. It provides methodological and professional support for educational institutions in digitalizing their teaching and learning environments and processes. As an organisational unit of Digitális Jólét Nonprofit Kft (Digital Success Non-Profit Ltd), DPMK actively participates in carrying out educational development programs supported by both the Hungarian state and the European Structural Funds of the European Union. It also provides assistance for educational institutions in planning and carrying out projects aimed at supporting the digital transformation.

The Digital Education Strategy of Hungary[24] aims to transform learning and teaching methods, to be able to reflect on the challenges of the age of Industry 4.0:

- all students and teachers should be able to connect to a digital network using digital devices (either their own or those of the school);

- digitally prepared teachers use digital methodologies and digital teaching materials;

23 https://www.mckinsey.com/~/media/mckinsey/featured%20insights/Digital%20Disruption/Harnessing%20automation%20for%20a%20future%20that%20works/MGI-A-future-that-works-Executive-summary.ashx

24 https://www.kormany.hu/download/0/4b/21000/The%20Digital%20Education%20Strategy%20of%20Hungary.pdf

- education administration and the further training of teachers also take place on a digital basis.

This strategy and all the other strategies (https://www.kormany.hu/en/cabinet-office-of-the-prime-minister/hu/digital-success-programme/strategies) approved by the Hungarian Government are closely and deliberately interconnected to the European Union general, complex strategy for the Digital Single Market Strategy (https://ec.europa.eu/digital-single-market/en).

Poland

Poland

Establishing and using Sectoral Qualifications Frameworks: good practice from Poland

Katarzyna Trawińska-Konador

Katarzyna Trawińska-Konador is education policy development expert with 9 years experience in implementation of national qualifications system, international cooperation and consultancy (Erasmus+ projects, Cedefop projects and Twinning projects).

Former deputy leader in the National Qualifications Framework project in Educational Research Institute and expert on development of sectoral qualification frameworks (banking, IT, telecommunication, sports and tourism). She is co-author of national methodology for sectoral qualification frameworks development and member of European Commission's EQF Advisory Group.

She is academic teacher and research assistant at Warsaw School of Economics, works in a team of University President's Proxy for a Quality of Education. Main activities include the review of teaching programmes in Warsaw School of Economics, their update in terms of Bologna Process and Polish and European Qualifications Frameworks, support in developing Internal Quality Assurance Procedures.

She is PhD candidate in social sciences in discipline of public policy.

In 2008, Poland began implementing the Recommendation on the establishment of the European Qualifications Framework for lifelong learning (European Parliament and Council of the European Union, 2008). The first notable shift took place in formal education in the 2010s with the

introduction of core curricula based on learning outcomes and the validation of non-formal and informal learning, among others, in the form of extramural examinations.

These changes established a new approach to developing qualifications that takes into account learning outcomes, their transfer, validation and quality assurance in accordance with European standards. This provided a foundation for the implementation of the Polish Qualifications Framework and other instruments promoting lifelong learning that would soon encompass the labour market as well.

At that time, the Polish Referencing Report (Sławiński and Dębowski, 2013) was already being developed. When it was presented to the European Commission in 2013, another important stage was completed, as it defined the most important arrangements for the national qualifications system that would allow validation to be performed directly in line with the Recommendation on the validation of non-formal and informal learning (Council of the European Union, 2012).

The result of these efforts was the adoption of the Act on the Integrated Qualifications System (IQS) in December 2015 by the Polish parliament (IQS Act). The IQS introduced a new type of qualification to be developed by the labour market that could be awarded as the result of a process designed specifically for adult learners, which allows their learning outcomes to be recognised irrespective of how they were acquired.

Figure 1: Integrated Qualifications Register (Source: Educational Research Institute)

Currently, the IQS is implemented with the support of the Educational Research Institute (Instytut Badań Edukacyjnych – IBE) working on behalf of the Ministry of National Education. In cooperation with the system's stakeholders, the Institute has undertaken multi-directional activities aimed at promoting, among others, the validation of non-formal education and informal learning as one of the most novel elements of the IQS. This compliments other strategic initiatives launched by the Polish administration, evidence of a long-term commitment to strengthening human capital (Gmaj, Grzeszczak, Kwiatosz, Pierwieniecka i Walicka, 2018, p. 4).

Polish Qualification Framework and Sectoral Qualification Framework as unique knowledge management tools

Establishment and development of the PQF in Poland was envisaged as an important process to enhance opportunities and use of lifelong learning. Despite very good outcomes of formal education system, as confirmed by very high scores of Poland in Programme of International Student Assessment (PISA), very low levels of early school leavers and high participation of young people in higher education (more than 40% of population 18-24), lifelong learning participation is below 5%. Existing barriers, both on demand and supply side, can explain such low level of participation.

Establishment of the PQF was seen as one of the measures that reduce or eliminate these barriers, through:

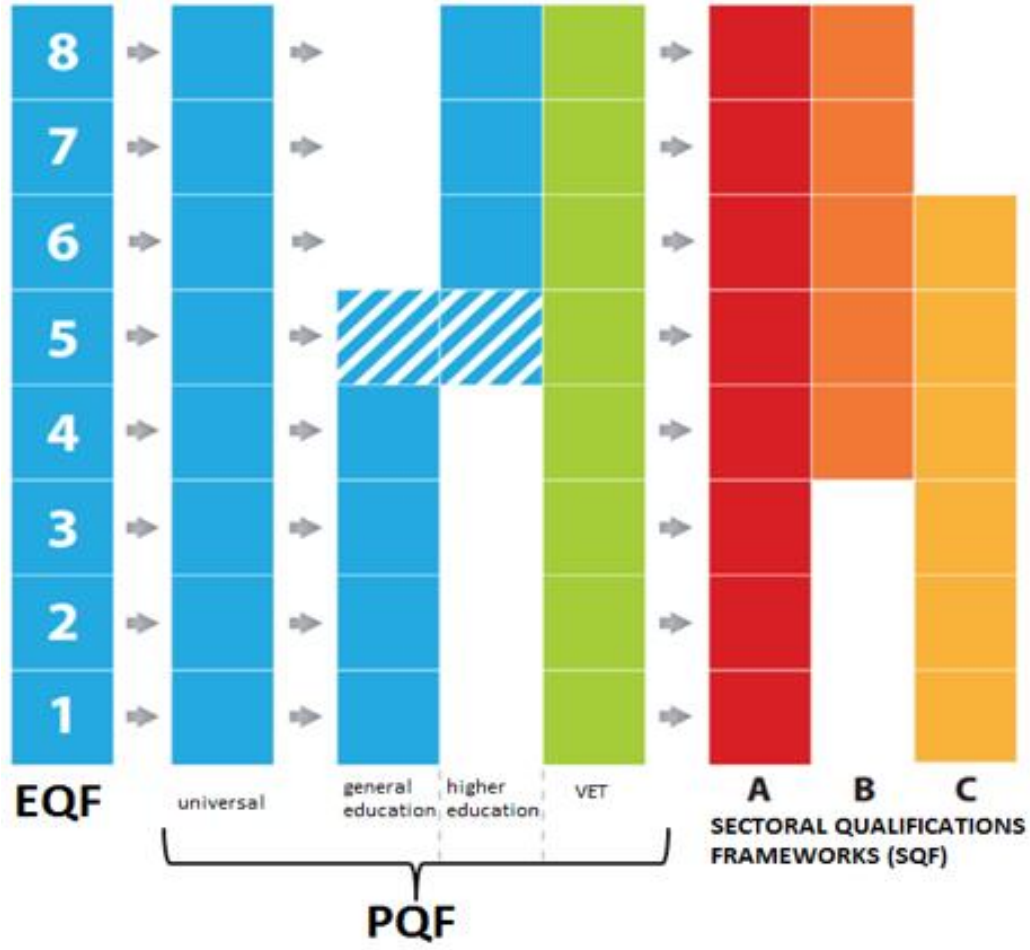
- Increasing transparency and understanding of qualifications offer by clear description and specification of qualifications' learning outcomes and linking qualifications to levels of PQF.

- Increasing credibility of qualifications through quality assurance mechanisms, including also validation process.

- Increasing access to information on available qualifications through establishment of Integrated Qualifications Register accessible through internet portal.

The unique solution adopted in the PQF is its structure that encompasses level descriptors on universal stage (applicable to all qualifications) as well as level descriptors specific for general education, vocational education and higher education (see Figure 1).

Figure 2: Structure of the Polish Qualifications Framework (Source: Educational Research Institute)



Inclusion of level descriptors specific for different types of education allows focusing on competences developed in the context of further learning paths. In the case of level descriptors specific for vocational education these include in particular knowledge, skills and social competences, which are needed on the labour market. These include the following.

In the case of **knowledge**:

- theories and rules (methods and solutions, economic activity, ethics),
- phenomena and processes (properties, conditions),
- work organisation (methods and technologies, organisational solutions, health and safety at work),
- tools and materials (functioning, properties).

In the case of **skills**:

- information (documentation, analysing, synthesising and forecasting, calculations),
- work organisation (planning, implementation, correcting of plans and activities),
- tools and materials (choice, usage),
- learning and professional development (own development, supporting of development of others).

In the case of **social competences**:

- following rules (instructions, law),
- co-operation (maintaining communication, relations in professional environment),
- responsibility (respecting ethical norms, quality, consequences).

The PQF level descriptors on generic stage as well as typical for vocational education are general, which means that they are applicable to all types of vocational and profession qualifications, regardless branch of industry or sector in which qualifications are developed. SQF are an extension of the PQF that allow further focusing on the qualifications supply and demand in the context of specific branches of the industry (sectors). This is a voluntary tool that is available for interested sectors (Chłoń-Domińczak, Sienkiewicz i Trawińska-Konador, 2015).

Sectoral qualifications frameworks – idea and design

There are several approaches to prepare the sectoral qualifications frameworks and therefore their definitions. They differ not only among the sectors (since they need to be sector-specific), but also among countries or institutions. Two main approaches are: treating a "sectoral qualifications framework" as an extension or detailing of "general" framework, with direct reference to NQF or EQF, or more labour-market centered tool, based on tasks and skills directly at the workplace, sometimes called (more adequately) the competence frameworks. The latter are represented by a various international projects, mainly but not exclusively in German-speaking countries. Best-known examples are CarEasyVET project, in car industry, BAQ in construction sector or Metalog in logistics sector. They usually focus on VET qualifications, in particular those on levels 3-5 of EQF, therefore there are of lesser concern in context of quality assurance in higher education.

The examples of the former approach are framework in Triple-E Project for a banking sector, held by European Banking & Financial Services Training Association, Sectoral Qualifications Framework for Border Guards (see Frontex, 2013) and various examples of SQFs prepared in Poland.

According the definition from the Polish Law on Integrated Qualifications System "Sectoral qualifications framework is a description of levels of qualifications functioning in a given sector or branch; Levels of sectoral qualifications frameworks refer to adequate levels of Polish Qualifications Framework". First part of this definition signals, that it is "classical" qualifications framework (not a competence framework), based on learning outcomes. The third part shows, that Polish SQFs are extensions of Polish Qualifications Framework, as a consequence e.g. level 4 of SQF refers to level 4 of PQF (and therefore to level 4 of EQF). Finally, it is explicitly stated that SQF covers only the key sectoral learning outcomes that are specific to the sector and understandable for their stakeholders.

In Poland as for mid-2019 there exist eleven SQFs in sectors: banking, sports, IT, tourism, telecommunications, development services, construction and fashion industry, public health, car industry and chemical engineering. Table 1 shows few examples on how the level descriptors are made in various SQFs.

The key methodological idea for the sectoral qualifications frameworks "from sector for the sector". That is why the sector experts' team prepares them. For example, in the team that developed SQF for banking took part: 10 representatives of commercial banks (as the employers' side), representatives of cooperative banks, Union of Polish Banks, Polish Financial Supervision Authority, Labour unions, universities (Department of Banking, Warsaw School of Economics), and non-formal education institutions.

Table 1: Examples of level descriptors in Polish sectoral qualifications frameworks (level 6, knowledge). Source: Educational Research Institute (2016, 2017a, 2017b, 2017c, 2017d, 2018a, 2018b).

Descriptor of Polish Qualifications Framework	**Is able to innovatively complete tasks and resolve complex and non-routine problems under variable and not fully predictable conditions**
IT	Is able to design, produce and implement IT system software using various components and distributed processing, and is especially able to use mathematical and IT knowledge to describe and simulate processes, develop models, write algorithms and perform other related activities.
Banking	Is able to analyse forecasts of important economic variables, including sectoral data, present them in a synthetic form and use them to build/restructure customers' portfolios or to properly manage the bank.
Telecommunications	Is able to design telecommunications networks in different technologies in a manner consistent with the requirements of the Construction Act, Telecommunications Act, related and industry laws, and the principles of technical knowledge.
Tourism	Is able to prepare analytical, diagnostic and planning documents pertaining to the conducted business activity, taking into account analyses of the operations of competitors and changes in the tourism and accommodation market; Monitor changes occurring in the accommodation market and take them into account when planning long-term activities in the market.
Sports	Is able to carry out sports training processes in non-routine conditions (e.g. in various geographic and environmental conditions, during convalescence in a sports training process).
Construction	Is able to prepare the operational documentation of a construction consisting of the current multi-sectoral technical documentation, including the energy performance certificate, situational plan, repository in the registry of land and mortgages, the construction log, necessary operating instructions and multiyear operating programme of the facility.

Such cooperation helped to develop the tool that will be both understandable for all the stakeholders in the sector, as well as will correctly reflect the current labour market needs (Trawińska-Konador, Katarzyna; Żurawski, Andrzej, 2018, p. 3-5).

Making use of sectoral qualifications frameworks

Sectoral qualifications frameworks are usually designed with a labour market purposes so they focus on VET qualifications and competences. There are several ways to make them very useful for sectors.

First and foremost, the process of a design the SQFs assumes the involvement of various stakeholders, both from education and labour market side. This is a good opportunity for a constructive discussion about the actual needs of a labour markets and future trends.

From the perspective of a given sector, SQF is a reference point and a tool to organize competences and qualifications in a given sector.

In Poland, SQF has become a response to disregulation that has covered many sectors. In addition, SQF is the reference point for analyzing the demand and supply of competences and qualifications in a given sector. In 2017-2018, in the telecommunications and banking industries, SQF pilot tests were carried out as a tool supporting HR processes in large enterprises. The outcomes of these pilots are very satisfying and indicate that SQR is an important tool supporting the identification and comparison of specialized industry competences.

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Poland

Design thinking for guidance counsellors

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What does it mean that a product or service is well designed? We can all recall it from our experience – a great design of a particulary handy ballpen or a teacup. Perhaps an ill-designed process that leads to confusion, time loss and frustration or a solution that does not comply with the actual needs.

The Design Thinking approach – or human centred design – seeks to define an actual problem and solve it combining the empathy for the person, creativity in the generation of insights and solutions, with the rationality to match solutions to the context.

As such, a process can be successfully embedded into the professional practice of vocational counsellors to support them in the decision-making and collaborative creation of the solution for their clients.

In the article below, the background of that particular strategy will be discussed, along with its principles and main characteristics. The main steps will be described as well as the exemplary implementation for the professional context. In addition, some insights from the workshop will be given to summarise the process experienced by the participants.

During the workshop, the participants experienced the design process in a comprehensive way in order to understand the principles and be able to relate it to their professional practice. The follow-up presentation and discussion will wrap-up the main characteristic and inspirations for use.

Design thinking: the principles

The design challenge is a starting point for any design process - it is an element that requires creative thinking and collaboration to be solved successfully for the user/client. The design thinking approach can support solving such problem in a well-organised yet creative process that focuses on empathic understanding of the needs and motivation of the user.

It is not an invention of the last years. On the contrary, it's been successfully used for decades now, by companies such as Apple or Ikea, to develop products that respond to their clients' needs. Stanford University and IDEO are the institutions behind the structure and theory of the design thinking, backed up by huge developments.

The history of design thinking is already well written, if you are interested look at the bibliography list in the end of the article to find more about its use throughout the years of product and services' development.

I would like to focus the four main principles:

- The process is **fast**: that means that it helps you generate ideas and solutions quickly.

- It is also relatively **cheap**: gathering a bunch of people for a couple of hours to ideate is an investment that can save loads of resources afterwards.

- Is its **effective** in that sense that generates many ideas and verifies them immediately in order to validate the product (or service, or a solution) with the real users.

- It is **iterative** so going back and re-thinking.

Design thinking: the process

The whole process is triggered by a decision to solve the problem with design thinking. It requires collaboration, so setting up a diversified team is crucial. Once it is decided, the design process is launched.

The Stanford model of the process is a great start to understand how the process works step by step:

1. Empathy:

It is a crucial starting point of the process. Its aim is to understand the users and their needs, hidden motivation or unconscious needs that drive humans behaviour and decisions. The tools focus on listening and/or observing the user in order to understand. There is no conclusion drawing yet but gathering information and learning.

Tools: Interviews, user's observations, ethnographic research, personas, surveys.

Workshop: The participants in pairs and in turns had a few conversations about a morning routine in order to get some insight into the most troubleshooting situations or particularly stressful moments.

2. Define a problem:

This stage focuses on the synthesis of all the information gathered and breaking the mindset in order to get beyond the obvious solutions. It is a great challenge to define the problem as it will have impact on the direction of development in further stages. If defined too quickly or too widely they can hinder the development. However, as the design thinking process is iterative the modification of the problem definition is always possible in the validation stage level.

Tools: User journeys, empathy maps, 5 whys.

Workshop: The participants captured some main findings and made a short statement to define the main issue identified.

3. Ideate:

It is now time to generate ideas and the team should create as many as possible, for example 50 possible solutions to the problem. The creative process here allows for a complete freedom of ideas to be shot in the air without any judgement or selection. Once the ideas are posted, the democratic selection takes place in order to decide on the one (or a few only) solutions that will form a basis for a prototyping.

Tools: Post-it notes, structured brainstorming, lotus blossom diagram, decision-making (e.g. SWOT).

Workshop: In pairs participants presented minimum five solutions to the problem defined and gathered initial feedback. Then one solution was selected for further development.

4. Prototyping

In this stage, a physical object is built: not necessarily complicated, but able to interact with a user. Rapid prototyping can include a basic schema or an object made of paper but it can be also a simple drawing or a comic strip. It is important only to make a step behind a simple description and allow user to interact with the solution.

Tools: Customer journey maps, scene, roleplay, blueprint, any arts and crafts objects.

Workshop: The participants created their prototypes with paper, clay, wooden sticks or other creative art and crafts products. With a lot of fun - as fun factor is essential in any creative processes - set of prototypes was demonstrated to the participants.

5. Testing

Here the prototype is shown to the users, preferably in a real-life situation. Close observation and evaluation of the user's behavior and feedback are the drivers for further decisions - whether the prototype can be developed into full-grown product or going back to problem definition (2nd phase) or ideation (3rd phase) are necessary in order to respond to the users' needs.

Why bother with design thinking?

Design thinking comes in handy when the problem is very complex and can be addressed with many solutions - "a wicked problem". A complicated issue that covers various areas, such as any educational and human problem can be, requires an approach that is able to integrate competences form psychology, ethics, design, ergonomy, business and technology.

Design thinking as a set of strategies can significantly improve the processes as well as can lead to creating greater experience for people in various settings. It is a mindset that stimulates creativity and problem solving in a light and iterative way.

In addition, creative participation in the development of a solution for a client gives satisfaction and greater ownership of one's work. Participation in a creative process expands our minds and boosts your own creativity for various professional areas, not necessarily connected to the task given.

As design thinking is always a team exercise it enhances group collaboration and communication developing social bonds, networking and social skills. It is important especially for vocational counsellors, because it helps in development of an emphaty-related skills, active listening and question-posing skills.

Overall, it leads to a better product that fits to the clients needs so the satisfaction of the designer and the user is fulfilled.

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Portugal

Portugal

Early Warning System for School Failure – SAPIE Presentation of a digital system in support of inclusive education

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Abstract

In accordance with the new legislation on inclusive education, policies to fight school failure and early leaving must essentially be centered on preventive work and must be scientifically grounded, implemented early and empirically validated by efficient systems for warning, monitoring and impact evaluation. With this goal in mind, the Early Warning System for School Failure - EWS-SF (or SAPIE – Sistema de Alerta Precoce para o Insucesso Escolar) has been developed to fight school failure and prevent dropout. This is an innovative digital tool that flags students at risk of school failure and early leaving, monitors students' progress in risk indicators and examines the over-time impact of inclusive intervention. This paper presents SAPIE, describing its scientific

grounding, development and implementation processes, with reference to its objectives, functionalities and predicted results. SAPIE's advantages and limitations are discussed, and its predictive robustness and relevance for research is underlined, within the framework of an inclusive education policy.

Keywords: inclusive education, school failure, early school leaving, early warning systems, A-B-C risk model, SAPIE

Introduction

Combating school failure and early leaving remains a priority theme in the national political agenda and is fully aligned with transnational directives (Verdasca, 2019). The 2030 Agenda proposed by the UN for Sustainable Development Goals to ensure inclusive, equitable and quality education for all aims to ensure that all children will complete secondary education by 2030. In line with this recommendation and under the Operational Human Capital Programme (Programa Capital Humano Operacional - POCH) and the Major Planning Options (Grandes Opções do Plano – GOP) – 2016/19, the Portuguese Ministry of Education has defined fighting against school failure and early leaving and fostering success as priorities for strategic action. The aim is to ensure schooling up to 12th grade (Ministry of Finance, 2016) and strengthen young people's qualifications for employability. The lesgislation targets early diagnosis and preventive intervention (Rodrigues, Ramos, Félix & Perdigão, 2017) as critical alternatives to retention. With the approval of Decree-Law No. 54/2018 (Diário da República, 2018), in which the foundations of inclusive schooling were established, all students, regardless of their personal and social situation, must be provided differentiated responses in school that ensure the acquisition of a level of education and training which will facilitate their social inclusion. In order to achieve this mission, and within the framework of the policy of territorialisation of education, the mission unit of the National Programme for the Promotion of School Success (PNPSE – Unidade de Missão do Plano Nacional de Promoção do Sucesso Escolar) was created, while extra funding has been also approved for projects and programmes aimed at combating school failure. Among the most impacting are the Integrated and Innovative Plans to Combat School Failure (PIICIE-Planos Integrados e Inovadores de Combate ao Insucesso Escolar) executed by the city councils, and the projects to promote autonomy and flexibility of curricula, designed by the school clusters. Increased funding for combating school failure intends to create conditions to achieve the common goal for European countries of reducing early school leaving rates to below 10% by 2020 (Europe 2020 Strategy – *European Commission/EACEA/Eurydice*, 2015). This is a challenge,

when Portugal is ranked among the four countries with the highest school retention rates in Europe (European Commission/EACEA/Eurydice, 2015).

A clear statement has now been made: the well-established culture of school retention must be progressively be replaced by multilevel inclusive intervention approach (Recommendation nº.2/2015, Diário da República, 2015). This assertion is subsidized for several reasons.

Firstly, research findings show that early retention seems to have zero or even a negative effect on learning recovery and school outcomes. Various studies have concluded that retention relates to dysfunctional cognitive-motivational, emotional and behavioural processes that compromise learning, well-being and adjustment. It specifically undermines the development of self-regulatory skills and involvement in learning that grow together with indicators of de-motivation, low self-esteem and indiscipline. It is also associated with symptoms of school alienation, an enhanced difficulty in socialization and a heightened probability of students leaving school prematurely (Almeida, 2013). These effects are more harmful when they develop early and grow unnoticed or are intervened only when they crystalize in severe learning difficulties or psychopathology. Retention is a major educational risk for its early onset and continuous average growth across the different levels of primary education, manifesting most in the post-cycle transition years in secondary education (e.g. Miguel, Rijo & Lima, 2012).

Secondly, retention is currently the most expensive measure to combat school failure (Verdasca, 2019). According to the Court of Auditors (2012), retaining students costs the Portuguese state an average of €4,415 per year per student, which generates a direct cost to the country of about 250 million euros (OECD, 2016; Empresários para a inclusão social, 2013).

International studies (e.g. in Finland and the Netherlands) also point to the indirect costs of early school leaving, which are around one million euros per individual over their lifetime (Smyth & McCoy, 2009).[25] This figure is highly significant, considering that the dropout rate in Portugal is 11.8% (14.7% in boys and 8.7% in girls, Pordata, 2019).[26] Thus, preventive intervention seems to be a key educational measure to reverse trajectories of school failure

[25] Indirect costs include poverty, higher incidence of health problems, high-risk and criminal behaviour, recurring and/or systematic unemployment, dependence on social benefits and unemployment benefits, lower participation in political, social and economic activities (European Commission/EACEA/Eurydice, 2015), and, for the public purse, increased expenditure related to justice and the fight against crime.

[26] School failure implies inability to undertake learning within the expected time limits for each year or cycle of education indicated by subject failure rates, retention and/or early school leaving. Early school leaving refers to all young people aged 18-24 who drop out of education and training before completing their Year 12 (Level 3 or 4 of the National Qualifications Framework; ANQEP, 2014).

and early leaving at an earlier stage of development, when the risk has not yet crystalized into actual failure or leaving.

Causes of school failure and early school leaving

Educational contexts adoping preventive action must undertake cost-effective programmes based on theory and validated by research, that make clear the multiple determinants and complex and intricate causes that underlie school failure and early leaving. From the student´s characteristics viewpoint, risk factors include the presence of specific learning disabilities, behavioural issues (e.g. opposition-challenge, school absenteeism; poor behavioural self-regulation and lack of study routines), psychosocial maladjustment (including poor relationships with teachers, poor social and classroom integration (e.g., Simões, Fonseca, Formosinho, Dias & Lopes, 2008). The individual risk factors also include the experience of negative psychological states, including low self-concept and school self-efficacy, performance anxiety, low perceived value of learning, non-adaptive attributions of failure, depressive symptomatology and frustrated basic psychological needs (Cordeiro, Paixão, Lens, Lacante & Sheldon, 2016; Fortin & Picard, 1999; Fortin, Royer, Potvin, Marcotte & Yergeau, 2004; Miguel et al., 2012).

Regarding contextual factors, low socioeconomic status, low educational background of the mother, the presence of controlling teaching practices and belonging to non-dominant cultural groups seem to negatively predict achievement and retention rates, absenteeism and early school leaving (e.g. Hoff, Olson & Peterson, 2015). Research point out that each factor, when taken in isolation, does not appear to have very significant predictive power (e.g. Legters & Balfanz, 2010; Neild, Balfanz & Herzog, 2007) which, in tandem with the poor knowledge of how factors are organised into possible risk profiles, points to the potential for innovating research in this area of knowledge.

Preventive projects and programmes are challenged by the diversity currently prevailing in the conceptual and operational domains (e.g. early school leaving was assessed for "exclusion due to absence", "cancelled enrollments" or "absenteeism"), making clear the need to bring greater structure and integration in educational policies and intervention.

In order to overcome these limitations, it is necessary to implement earlier, systemic and systematic interventions that provide greater cost-effectiveness in fostering learning and inclusion (e.g. Rodrigues et al., 2017). This type of approach to intervention should be grounded in

theoretically sustained risk models based on empirical evidence and assessed by robust research methodologies (e.g. Simões et al., 2008, Verdasca, 2019) and be thoroughly aligned with the policy-institutional directives that define the priority axes of intervention in each educational area (European Commission/EACEA/Eurydice, 2015). Based on these guidelines, preventive efforts must be designed to:

- set clear goals, unify conceptual definitions of risk indicators, dimensions and metrics, based on science and empirical evidence,
- early identify at-risk students *vs* adopting standard remedial support (Decree-Law 3/2008),
- articulate preventive efforts, involving the schools, the family and the community and
- design tools and deliver activities that allow the systematic monitoring and impact evaluation of interventions.

R. Balfanz's A-B-C Risk Model

Preventive action must be integrated in well-established theoretical models. One of the most parsimonious risk models validated by research is Balfanz, Herzog and Iver's (2007) multidimensional A-B-C risk model. The A-B-C model identifies students at risk of failure and early leaving in three dimensions:

A) **Attendance** – a dimension of school involvement measured by the percentage of student absences;

B) **Behaviour** – measured by the presence of incident reports or the application of corrective measures and sanctions and

C) **Course Performance** – measured by the end-of-period results in mathematics, first language and science subjects.

Taken together, the three indicators have strong predictive power (Legters & Balfanz, 2010), explaining about 50% of the rate of early school leavers.

The attendance dimension targets school absenteeism. It is measured by the percentage of students' justified and unjustified absences (missing classes or days, depending on the level of studies). Absenteeism, when chronic, generates a cyclical social problem of failure and early school leaving. It is more prevalent in underprivileged students (Balfanz & Byrnes, 2012) and is a condition, which facilitates early school leaving.

Balfanz (2016) identified three **key characteristics of absenteeism**:

- it varies according to *educational level*, with higher rates in kindergarten, first year and transition years;

- it varies over *time* and is a recurrent and cumulative phenomenon, with higher incidence in consecutive years;

- it varies with *context* and is more frequent in specific school subgroups or culturally non-dominant social groups.

In terms of its etiology, five categories of factors seem to increase students' risk of school absenteeism, namely:

- outside-school reasons: disruptive life events (illness; family or work conditions and/or responsibilities; unstable residence; involvement with the juvenile justice system; Balfanz & Byrnes, 2012);

- lack of motivation to continue schooling: some students, even those with good school results, express boredom and find no reason to persevere; others leave after experiencing general failure in the school year (Legters & Balfanz, 2010);

- avoidance of threats at school: students who experience unpleasant or dangerous situations such as bullying and other insecurity-related constraints (Balfanz, 2016);

- absence of involvement in school: after multiple suspensions, transfers and expulsions, staying in school ends up being perceived as irrelevant and possibly harmful (Legters & Balfanz, 2010) and

- the presence of erroneous beliefs about the importance of attendance: many students (and parents) undervalue absences, which reflects a negative valuation of school (Balfanz & Byrnes, 2012).

The behaviour dimension (Hoff et al., 2015) has been operationalized and measured based on various indicators, such as missed classes, drug and/or alcohol abuse (Ruebel, Ruebel & O'Laughlin, 2002), suspensions (Balfanz, Wang & Byrnes, 2010) and inappropriate behaviour (Sparks, 2013) or disciplinary actions (Klare, 2008). It is important to note that disciplinary actions, by themselves, are not a direct cause of early leaving, and interaction with other factors (environmental and personal) should be taken into account. Indeed, Sparks (2013) claims that students with inappropriate behaviour who have a positive relationship with teachers are more likely to complete basic education. In this regard, Balfanz (2016) warns of the need for governments, regions and municipalities, which use these data to define educational policies and measures, to coordinate with school clusters to standardize measurement of the indicator.

Lastly, the course performance dimension is indicated by end-of-term or semester outcomes, including individual subject marks, test scores, and overall performance average. School achievement is considered an explanatory factor in school failure and early leaving at all levels of schooling (Balfanz et al., 2010), as when it is low, it dramatically reduces the involvement and control perceived by the student (Balfanz et al., 2007). Indeed, students with failing scores in maths and/or reading and students whose averages are lower in grade 1 are at greater risk of early school leaving in later years (Klare, 2008; Hoff et al., 2015).

According to Balfanz et al. (2007), the combination of the three dimensions results in four early leaver profiles or typologies:

- **quiet dropout:** students with low achievement, lack of inappropriate behaviour and medium or high levels of school involvement (attendance and participation),

- **disengaged dropout:** students with average achievement, average or below- average levels of inappropriate behaviour and low involvement,

- **low achiever dropout:** students with low achievement, average or low levels of maladjusted behaviour and low involvement and

- **maladjusted dropout:** students with low achievement, high levels of inappropriate behaviour and low involvement with school. For Balfanz et al. (2007), the quiet and maladjusted dropout typologies represent, respectively, 77% to 85% of potential early leavers.

Early Warning Systems for School Failure and Early Leaving – SAPIE

The Early Warning System for School Failure (Sistema de Alerta Precoce para o Insucesso Escolar) EWS-SF or SAPIE (Cordeiro & Paixão, 2018) is supported by the results of research under Balfanz's A-B-C model. It is presented as a universal screening system that predicts whether students will complete their year or cycle at the expected age, or leave before completing the 12th grade. SAPIE arises from the need to develop digital solutions to support decision-making processes within educational support and as a logical follow-up to research on the impact of cognitive-motivational factors influencing the development of career decision- making processes (e.g. Cordeiro, Paixão, Lens, Lacante & Luyckx, 2015).

SAPIE is the result of an adaptation of analogous early warning systems implemented in the US, namely the *Early Warning Intervention and Monitoring System* (EWIMS) and *Early Warning Intervention Systems – Middle Grades* (EWIS-MG; American Institutes for Research [AIR], 2019; Balfanz et al., 2007); both have proven evidence of their added value in redirecting school failure trajectories. The EWIMS was developed by the US Department of Education National High School Center to help schools effectively use data to identify potential early leaving students, monitor school progress, and provide targeted support to help them complete schooling at the expected age. Implementation of EWIMS has yielded notable results in reducing chronic absenteeism (in EWIMS schools, the rate of chronic absenteeism was 4% lower than in control schools) and in reducing failing marks for individual subjects (5% reduction in pupils failing at school in one or more subjects compared to control schools (Faria et al., 2017). As regards the EWIS-MG it shows markedly divergent results from the agreed standards of school success in attendance, behaviour and achievement indicators, and issuing alerts for flagged students, advising on interventions and assessing their impact. Data obtained from a longitudinal study (Faria et al., 2017) show that schools monitored by EWIS-MG, in comparison with schools with conventional screening systems, have an almost 20% reduction in the number of pupils with a failing grade in at least

one subject. Both systems identify children at risk of leaving early from the first cycle of elementary school with an accuracy of around 75% (Hoff et al., 2015).

The Functionalities of SAPIE

SAPIE issues alerts to the risk of school failure in two broad areas: individual characteristics and contextual characteristics. At the individual level, students are flagged in the attendance dimension, indicated by the student's absenteeism rate, the behavioural dimension, indicated by incident reports, suspensions or behaviour reports, and the school achievement dimension, indicated by qualitative endorsements or the quantitative final marks for the term or semester. At the contextual level, risk is flagged via family-based risk predictors, which include household income, as indicated by the Educational and Social Action (ESA) scale (Ação Social Educativa - ASE scale of the School Social Support Service) and the mother's educational background, taking into account the highest level of education, which she attended and/or completed.

SAPIE issues risk alerts on single and composite indicators whenever students achieve results below agreed thresholds or cut-offs. Alerts on single indicators mean that the student is at risk on one or more risk indicators. Alerts on composite indicators mean that the student is at risk in three specific combinations of indicators, namely risk status, risk level and risk trajectory. Risk status indicates whether the student or group of students is on a predicted on-track (passing) or off-track (failing) trajectory; the risk level refers to the degree of risk in the current school term (high, moderate and low), and the risk trajectory refers to changes in the school result indicators from the previous school period to the current one (progress, downturn or unchanged).

At both levels of analysis, risk can be analyzed on an individual (per student) and collective (class, school, educational establishment or cluster) level and on a synchronic (data from the last term) or diachronic (data from previous school years or terms) time axis, providing insight into risk in each school year or throughout the school year. Note that warning signs are not sufficient to make a diagnosis of difficulties nor to indicate measures to support inclusive education. Rather, they represent general indications that serve the purpose of universal screening of at-risk students, providing dimensional indications of the student's difficulties, and activate support systems, suggesting a type of intervention that should be further explored with the Multidisciplinary Inclusive Education Support Team of each school cluster.

Implementing SAPIE in the Educational Territory

SAPIE was developed according to a 7-step sequential model designed by the American Institutes for Research (Faria, 2017). The first step comprises 3 core activities. The first consists of a literature review on risk prediction models and adapting indicators and cut-offs to the Portuguese situation. The second concerns the programming of the system, in keeping with the provisions of the General Data Protection Regulation (Comissão Nacional de Proteção de Dados - CNPD) and the memorandum signed with the Directorate-General for Education. The third refers to the organisation of the partner network. The partnership with the Directorate-General for Education and, more specifically, the PNPSE ensures the inscription of SAPIE in national policies to combat school failure.

The presence of the social investors *Educoach* and the PT-Altice Foundation further ensures the financial sustainability of the project, within the scope of the application for funding (approved) for Social Impact Bonds (TIS-Títulos para o Impacto Social) from the Portugal Social Innovation Programme (PIS – Portugal Inovação Social). Finally, the Faculty of Psychology and Educational Sciences of University of Coimbra ensures the research dynamics the project.

The second step describes the SAPIE piloting process. It includes activities for presenting and contracting the system to the intermunicipal communities, municipalities and school clusters of the regions. The third and fourth steps describe the data analysis activities provided in SAPIE risk reports, the decision-making process regarding the selection of intervention and the process for recording interventions. The fifth step concerns the monitoring of pupils' achievement in order to determine the need to maintain, modify or cease ongoing interventions at the end of each school term. The sixth step is to obtain and analyze impact assessment reports of interventions on risk indicators. Finally, the seventh step prepares the process for scaling SAPIE to the international level.

Knowledge and Technology Transfer

The dissemination of SAPIE in educational territories is achieved by its framing in national and local educational policy. SAPIE is conceptually and operationally aligned with the inclusive education model in place, while allowing the inclusion of integrated activities in the strategic action plans and fostering of school success in the SCs' projects for autonomy and flexibility of

curricula. By using SAPIE, community and local authorities will be able to combat school failure with educational policies and strategic plans designed to be more in line with the real needs of the educational territory and to include them in SAPIE, for the purposes of monitoring and impact assessment.

Dissemination of SAPIE also involves the publication of scientific publications, articles and book chapters and technical reports, as well as the holding of scientific events on the theme of combating school failure and early leaving. In short, the transfer of SAPIE technology makes inter-institutional coordination and convergence and scientific anchoring key factors in boosting school success.

Results Expected in the Short Term

The impact assessment study of SAPIE will be based on a quasi-experimental design with control group and repeated measures, ensuring SC equivalence as far as possible in both experimental and control groups in terms of geography, size, socioeconomic status and projects to prevent early leaving.

With the use of SAPIE the retention/non-approval rate is expected to reduce by 2% at the pilot stage, at the end of the 2018/19 school year and by 3% at the end of the 2019/2020 school year in schools that adopt the system, compared to control schools that maintain traditional system of screening and intervention management.

SAPIE presents other **key advantages**:

- Firstly, compared to conventional sorting systems, it adds objectivity, integration, and focus to traditional risk analysis provided in intuitive, easy-to-read outputs.

- Secondly, it is an intuitive system which is easy to use and does not depend on extra effort by teachers to activate the risk forecasting system, but rather on data periodically imported from the students' administrative management systems (e.g. J.P.M & Abreu, E-schooling, Inovar).
- Thirdly, it allows for a comprehensive and integrated reading of risk, taken into account its multidimensional and historical nature, as it provides information on interventions conducted in previous years or school cycles.

- Fourthly, information from monitoring progress on indicators enables Multidisciplinary Inclusive Education Support Teams (Equipas Multidisciplinares de Apoio à Educação Inclusiva – EMAEI) not only to expand knowledge on intra- and interpersonal risk development, but also to support decision-making processes on intervention priorities, selection of measures and assessment of the impact of educational, psychoeducational and psychosocial interventions that may have been carried out.

- Last but not least, SAPIE can be a robust tool to support research, advanced training and scientific initiation for young students, insofar as it allows studies to be undertaken with representative samples of the national population enrolled in the psychological, longitudinal and sustainable research projects in fields as diverse as school success, psychological health, career development and learning literacy.

Notwithstanding the advantages presented, the implementation of SAPIE in the educational territory is a challenge, as it is pivotal in processes of change in local educational policy and in the organizational dynamics of the school groupings. Yet, we believe that SAPIE has enormous potential to assert itself as cutting-edge technology in combating school failure in Portugal.

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Romania

Romania

Future skills. Guide others to design and build their careers!

Cosmina Mironov, **Anca Popovici**

Cosmina Mironov and **Anca Popovici** are associate professors at the Faculty of Psychology and Sciences of Education at University of Bucharest in Romania with relevant background in school counselling.

Cosmina Mironov is certified GCDF-NBCC (Center for Credentialing and Education, USA) and is director of the Masters in School Counselling and Career Development, while teaching courses in the field to bachelor and masters students.

Anca Popovici is teaching courses in the pre-service teacher training programmes with expertise in the field of learning.

Starting at the intersection of the future of work and learning as predicted by relevant studies in the field, the **Future Skills. Guide others to design and build their careers!** workshop engages the participants in discovering and anticipating the skills needed to live richer and more fulfilling lives in a society that's undergoing unprecedented change, in an economy that's unlike any we've seen before, while the prospects for employment of our youngsters and not only around the world are troubling indeed.

The workshop approach involves two perspectives: one including the counsellors – participants own career and the second one – the one of their beneficiaries.

The first introductory part of the workshop is dedicated to identifying participants' goals in relation to this workshop and providing a short personal presentation by filling in the following two statements – *I am* ... and *I become* ... Related to the participants' goals, it was proposed a short questionnaire on sli.do, as follows:

1. It is clear to me, what the topic of future skills and careers entails.

2. I know where to find resources for counselling students about future skills and careers.

3. I know how to contribute to the development of future skills and careers.

In addition, this part acknowledges the changes in the counselling profession, the changes in the careers and the need to break the reference frames we become FREE and OPEN and ENGAGED, focused to solve old problems in new ways!

In this light, the questions opening the second part of the workshop are highly relevant:

- Which are the skills required for a successful personal, social and professional life?

- How are skills learnt?

- How current and future generations operate?

- How do they build their educational and professional career?

As career counsellors and teachers, we are all aware of the way in which new technologies, work patterns, and practices are disrupting how we learn, where we learn, and what we need to learn. A brief cross analysis of the **labour market, education** and **career counselling** is being undertaken while engaging the participants in debate.

The **labour market** as it is the most dynamic and easy to grasp component as we can actually see the changes generated by the 4.0 industrial revolution: the internet of things, artificial intelligence, nano-technologies, quantic computers, renewable energy, and biotechnologies. These developments lead to the conclusion that the future careers depend on: complexity and creativity, imagination, innovation, interdisciplinarity, personalised solutions and direct human contact.

On the other hand, education is a field, where things tend to be more complicated, while the dynamics of events are quite different, due to the fact that the educational systems are quite inertial especially compared to the labour market.

The global statistics are quite surprising: the world education/learning market is huge (2016) – 107 bil. $, 20% of the planet workforce works in education, 6.7% of world population have graduated from a HEI, over 750 million illiterate people – 10% of the world population cannot write, read or calculate. Not in the least to the basic competences, there are added new skills in the field of technology and coding.

For years, **education** systems have claimed that upwards 80% of their graduates are ready for work. Unfortunately, employers report much lower, less than 20%, graduates who are ready for work. Starting from relevant frameworks proposed by various prestigious actors in the field (e.g. Key competences - European Commission, OECD 2030 learning framework, 21st century skills, etc.), the discussion related to the future skills becomes key in building up the next generations. The most relevant categories are:

- learning and innovation skills (critical thinking, creative thinking, cognitive flexibility, problem solving skills, decision-making capacity, collaboration, communication),

- digital skills,

- life and career skills (initiative and self-development, social and intercultural interaction, productivity and responsibility).

The **career counselling** component has a central role in supporting the learning processes and helping the matching of interests and needs from one side with those on the other. Besides the challenges already acknowledged (the changing of the world of jobs, moving from one job to the next etc.), there are at least 3 major changes that will put pressure on the career counselling systems:

- the increase in life spam,

- the relation with technology, robots and artificial intelligence,

- changing the reference framework (e.g. up to 40.000 people will be working in space by 2030).

The **theories and practices related to career counselling** state that the 21st century is characterized by uncertainty and unpredictability. New theoretical models emerge trying to explain and predict the changes in career counselling:

- **Caleidoscop career model** (Mainiero & Sullivan, 2006) focuses on three parameters that change over the course of life: (a) authenticity, defined as being true to oneself; (b) balance, defined as the equilibrium between work and non-work demands; and (c) challenge, defined as stimulating work and career advancement.

- **The Chaos Theory of Careers** (Pryior & Bright, 2003) suggests that the development of an individual's career is the interaction of a dynamic complex system (person) with a number of other more or less generalized complex systems, including other individuals, organizations, cultures, laws and social contexts. That we do not always need to weigh and measure factors such as interests, skills, and personality traits, letting these factors dictate, which path our clients should choose. The Main Principles of the Chaos Theory of Careers are to be open-minded and curious, experiment with new things and look for clues, take baby steps, understand the bigger picture and receive constructive feedback whenever possible.

The "Changing Career Nature" (Sullivan, 1999, p. 457) imposed by the dynamism of the current world and the various perspectives it approached made possible the emergence of new concepts such as "intelligent career" (Arthur & DeFillippi, 1994), "boundaryless career" (Arthur & Rousseau, 1996) and "protean career" (Hall, 1996, 2004).

- **Intelligent Career** (Arthur & DeFillippi, 1994 and Arthur, Claman, DeFillippi, 1995) is based on the three dimensions of organizational competence, proposing three ways of knowing: know why - motivation, professional identity; know how - practical skills and experience; know who - the network of relationships inside and outside the professional area.

- **Borderless Career** (Arthur & Rousseau, 1996) represents the opposite of the organizational career and is distinguished by physical mobility along a horizontal continuum and psychological mobility along a vertical continuum. Defined as career opportunities beyond the boundary of a single employer, an individual is independent rather than dependent on a traditional organizational career arrangement.

- **The protean model** (Hall, 1996, 2004) is built on the metaphor of the Greek god Proteus who could change his form as he wanted. The protean career is directed by the person, not the organization, according to the individual goals set and by the psychological success and values,

rather than the material success. The protean careerist is able to rearrange and repackage his or her knowledge, skills, and abilities to meet the demands of a changing workplace as well as his or her need for self-fulfilment. The individual, not the organization, is in control of his or her career management and development.

The third part of the workshop focuses on stimulating future thinking in relation to career development as it leads to action, while in its turn action fuels future thinking. In this workshop, future thinking is based on the following ideas:

1. The future world will likely differ in many respects from the present world.

2. The future is not fixed, but consists of a variety of alternatives.

3. People are responsible for choosing between alternatives.

4. Small changes can become major changes over time.

The participants are invited to work in teams of 4. The application is based on **Futures Thinking Toolkit, Science Learning Hub, The University of Waikato** (http://sciencelearn.org.nz).

Each team get one working sheet. As counsellors, what are your ideas about the future skills and careers? How can the career guidance and counselling contribute to their development? Explore your ideas. Delve more deeply. Work out what you think and why. In teams, discuss and argument on the following points:

- **Existing situation**: What happens now and why in career guidance and counselling related to the future skills and careers?

- **Trends**: How does the existing situation in career guidance and counselling differ from the past and why? Are the changes desirable? Who benefits? Who loses?

- **Drivers:** What is causing the changes in career guidance and counselling related to the future skills and careers?

- **Possible futures:** What might happen in the future?

- **Probable futures:** What is most likely to happen in the future? Which trends and drivers are likely to persist? What might change them?

- **Wild cards:** What unlikely events might occur that would have a big impact on the future?

- **Preferable futures:** What do you want to happen in the future and why, regarding future skills and careers and the support provided by the career guidance and counselling in this respect?

The workshop ends with some conclusions related to LIFE, LEARNING and WORK:
Career co-creation metaphor; All CREATION is CO-CREATION! - You and the others, Your experiences and others', Practitioners community.

Serbia

Serbia

Skills for the future

Svetlana Petrovic, Natasa Jankuloski

Svetlana Petrovic has a background in pedagogy and problem solving – she is a specialist for mediation. She is working in the secondary VET school as well as a trainer for assertive communication (leading seminars for teachers and workshops for pupils), a trainer for autogenic training (technique for relaxation and reducing stress) and a career counsellor. She actively participates in Erasmus+ activities such as conferences, study visits, youth exchanges, as well as a presenter of good practices in career guidance and counselling. Together with her colleague, Natasa Jankuloski, she is the author of 4 workshops in teachers' handbook for career guidance and counselling.

Natasa Jankuloski has been working as a teacher of economic and tourist subjects at Technical School in Knjazevac since 2006. She is the author of numerous articles published in professional journals and one of the authors of the teachers' handbook for career guidance and counselling. She has been training teachers since 2010 when she moderated her first workshop and today, she successfully leads two online seminars for teachers. She is an IT lover, implementing web 2.0 tools in teaching and extracurricular activities. She participates in Erasmus+ projects, conferences and workshops and she is an active guidance practitioner, which has been confirmed by several prizes.

Together, as members of Team for career counselling in their school, they are regularly implementing workshops on this topic with their pupils.

When working in schools as teachers or school counsellors, can we realize the difference between the skills that we have and the skills that we need? In every workplace, we need to develop our skills relevant to the context that we work and live in. The future is not the same for all and it is

not equally far away but we all have to be prepared for life and work in future and skills are our tools for that.

What are the skills for the future?

In the world of changes, technology revolution and increasingly demanding jobs, the role of career practitioners is and have to be very important. How can we, as career counsellors, prepare our clients for the jobs that are innovative, new and demanding? That is a serious topic and requires an open-minded approach.

In our practice with students of secondary vocational school in Knjazevac, a small town in the southeast of Serbia, we focus our career guidance and counselling activities on the development of various skills. Communication skills as basic ones for every job in future are one of the competencies in the focus of our activities. Assertive communication, written communication and work communication are also in focus in our work with students in every class.

During Cross Border Seminar in Bled, Slovenia we presented, during our workshop *Set of skills for future careers – examples of good practice from Serbia*, how we work with our students. We think that is very important when working with students, but teachers and adults as well, to focus on development of set of skills for the future, especially problem-solving skills, skills for accepting changes, public speaking and presentation skills, but we also recognized the need for stress-balancing skills, so we do some of the techniques for relaxation with our students.

Photo: workshop Set of skills for future careers – examples of good practice from Serbia

During the workshop, in an interactive way, participants had the opportunity to try these techniques and methods for developing various skills and got some tips for implementing these techniques with their clients:

- **Constructive problem-solving techniques** showed participants (but also shows our students in our everyday work), how they can analyse their own behaviour in the problem-solving situations and compare individual and group strategies as a way of turning goals into concrete activities. In addition, they could get to know the techniques of productive problem-solving pathway – *circular flow of problem solving and brainstorming*. Most people, entrepreneurs (especially smaller) are not used to developing a strategy, but react instinctively. These techniques aim to develop an awareness of personal behaviour in solving problems and strengthening individual entrepreneurial abilities, developing personal strategies, teamwork and communication skills.

- **Accepting changes technique**: Changes are an integral part of life, but many people are not open for changes and sometimes are afraid of them. However, we have to face the constantly changing world, therefore a need for developing skills for accepting changes. During the workshop, participants personally experienced this going through a simple but very effective *technique for accepting change* (if you try to cross your hands in a different way than the usual, it might feel strange or uncomfortable at first, but it is possible and after a while, we can accommodate to it). All participants recognized the possibility of using this technique in their work.

- **Public speaking and self-promotion technique**: At some point in our lives, we all encounter the need to speak in public. Whether it is a part of our profession, moderating a small meeting, or maybe hosting a conference with a lot of people, or speaking in public on some private party, or celebration, speaking in public can be difficult, because studies show that public speaking is many people serious fear. Therefore, a technique such as preparation, creating a positive mindset, awareness of body language, and fine-tuning vocal cords can be very useful in preparation for this.

- **Stress-balancing technique**: In our experience with working with students in school, we recognized the need to work on this topic because students' comments are that they are in stress, and they do not know how to deal with it. We focus our work on developing stress relief techniques of abdominal breathing, teach them how much is important to calm down and focus on themselves and breathing.

With automatization, machines will replace many jobs. Machines are faster and last for a long period of work, but we have one advantage - we have the ability for lifelong learning. Our skills are unreplaceable and no machine can completely replace us. Constant skill developing as our key asset for the future has to be part of our everyday life and work.

Slovakia

Slovakia

Lifeology as a non-formal tool for talent support in high schools.

Henrieta Holúbeková

Henrieta Holúbeková studied Andragogy at the Faculty of Philosophy of the Comenius University in Bratislava and has, for the past 20 years, worked as a lecturer. She created and implemented numerous training programmes and courses (e.g. an accredited "Lecturer in Adult Education" course entitled "Leadership of Tomorrow", which is taught at the University of Economics in Bratislava) and trained educational advisors and youth leaders from Slovakia and abroad (e.g. Poland, Lithuania, Slovenia, Croatia, Turkey, Greece, Bulgaria, Czech Republic, Hungary, Italy).

She specializes in non-formal techniques of education and her main focus, since 2014, is working with youth. To this purpose, she developed an educational programme based on the mix of formal and non-formal learning techniques under the title “Lifeology", for which she received a Special Award in the Slovak National Career Guidance Award 2016.

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This entry aims to present an accredited educational programme Lifeology, which comprises elements of non-formal education and thus complements the formal school educational system of Slovak secondary schools. It is based on Comenius play School, Socratic dialogues and storytelling of youth mentors.

Introduction

Evidence shows that there is a lack of personal and social education programmes in our families and schools. Young people are therefore often unprepared for the essentialities of their daily lives - they cannot communicate effectively, struggle to manage and resolve conflicts, and they do not possess skills to manage their lives - their time, their talents, their dreams and desires.

That was the reason why we have designed and launched a non-formal educational programme for young people – **Lifeology** – that is aimed at acquiring and developing their personal competencies and social skills. A specific feature of the Lifeology programme is that the subject of learning is a young person him- or herself, his personality and his relationships with people.

The programme focuses on developing cognitive abilities, self-discovery and self-empowerment, self-regulation, psychological and emotional well-being, creativity and curiosity, interpersonal relationships, communication, collaboration and competition, and encourages young people to reflect on their values, attitudes, practical ethics and skills such as decision-making and problem solving.

The programme was piloted in 6 regions of Slovakia at 6 different types of secondary schools (public grammar school, church grammar school, private business school, public business school, secondary vocational school – hotel academy, joint secondary vocational school). Over 6300 students have gone through the programme to date. In addition, numerous training courses for teachers and guidance practitioners were organized within the Lifeology programme to develop their competencies.

Characteristics of the program

Lifeology is an annual "tailor-made" training program for high school students. It is taught by trained volunteers ('teen mentors') two hours per week. It complements the knowledge gained in schools and focuses on development of practical competencies and skills that a young person should possess in order to successfully cope with everyday life challenges. With the help of young mentors, participants are led to developing their communication, leadership and social skills in an entertaining way to fully explore their potential. During the programme delivery, various pedagogical, sociological, psychological, diagnostic and non-formal methods are employed, e.g. interview, brainstorming, role plays, evaluation methods, communication trainings, energisers, dialogue and argumentation battles, ice breakers, techniques to increase group dynamics, teamwork, etc.

Objectives of the program - focus on real needs

Schools seldom teach young people how to get along with their parents, how to manage emotions that come with the first love, how to respect others and be respected, how to set up a life vision and how to cope with demanding life situations in relationships, career success, family and oneself, how to communicate clearly, comprehensibly, and to be able to assert one's needs while also communicating sensitively, how to be part of the community around you, to succeed and to support others.

The aim of the programme is to develop self-esteem and the ability to take responsibility for their behavior in different life situations. Young people learn to understand the value of interpersonal relationships and to respect the opinions, needs and rights of others. Lifeology follows a guiding principle, which is characterized by non-directivity, so young people can set their own goals, which they want to achieve through the Lifelology programme.

Furthermore, the programme reflects the changing nature of the labour market (Industrial Revolution 4.0) and incorporates activities focused on the development of 'new' in-demand skills: complex problem solving, critical thinking, creativity, people management, coordinating with others, emotional intelligence, judgement and decision-making, service orientation, negotation, cognitive flexibility (World Economic Forum, 2016).

The 4 key areas of the Lifeology programme:

- **Inner Science** - getting to know and understand oneself.
- **Relationshipology** - learning about relationships - understanding relationships with parents, authorities, your first love, learning to love yourself.
- **Carrieristic** - how to achieve success, to communicate and guide others, getting to know your strengths, weaknesses and motivations, improving time management, vocational orientation.
- **Health** - overlapping with the entire program - caring for body and mental health. We bring forward the importance of sleep, movement, diet, etc.

Methods used in this informal learning

The basic elements of non-formal learning in this program are:

- Students do not sit behind school desk, but on chairs in a circle.
- They do not use workbooks or writing supplies, they may use smartphones and have a "notepad" app.
- No blackboard or flipchart during the programme.
- We use many different props that we have prepared in advance.
- We cooperate based on pre-agreed rules.
- Both students and mentors are equal partners and address others by their first names.
- Homeworks are called “a personal challenge” - it encourages students to apply newly acquired skills and knowledge in the real life (either at home or at school) on that very same day.

- Interaction with students on social networks (e.g. a closed group on Facebook), where students can ask additional questions that they were hesitant to pose during the lesson.

- Mentors apply an individual approach to each student.

- In addition to the **Certified Teen Mentors of Lifeology**, other external (host) mentors are invited to conduct lessons or workshops. These external mentors are usually personalities who have achieved something in their lives and they may pass on their experiences, advice and support to young people.

Cross-sectoral approach

Teen mentors (currently 20 accredited and certified) come from different sectors and areas of our social life. These include representatives of state administration and municipality, students, entrepreneurs, freelancers, experts, youth workers at international level, teaching staff, non-profit workers, social workers from labor, social affairs and family offices, employees of multinational companies, pedagogical-psychological counselors, students of pedagogical disciplines, students of economic universities, future political scientists and, last but not least, representatives of international organizations, so that students can experience collaboration and communication in a multicultural environment.

In addition to teen mentors, 28 other mentors-in-the-making are preparing for a certification.

Cross-generational solidarity

We are creating a common dialogue between generations, as the mentoring staff comprises universitz and high school students, people in their parents' age, and even mentors of the age of their grandparents.

Multiplier effect

Graduates of the Lifeology programme are at the end of each cycle offered an option to become teen mentors of their younger peers under set conditions. At the moment, there are 3 Lifeology graduates as Teen Mentors, who keep developing their leadership skills in Lifeology.

Social dimension and talent support

The main idea and mission of the whole project is that talent is found in every individual, not just in exceptional and brilliant children. The potential of everyone is unlimited and the role of today's school is to find and develop it. That is why it is crucial in the project that at least 2 mentors of different professions and different ages frequent each group. Only then, there will be time for each student to participate actively at every lesson. In one group, a maximum of 15 students are allowed, so that everyone can participate actively in teaching.

Responding to a changing social role of teachers

1. Students need to learn "HOW" to learn and at the same time learn, how to orient themselves in that amount of information and knowledge. To be able to sort out what is needless and choose the direction in which they want to specialize.

2. A young person needs to learn the skills and abilities that he needs for everyday life. For example: How to find or create a job, how to make a living from earnings, how to build or secure housing, start a family, how to work in a happy partnership and raise children. The family is also a community in which it is important to learn how to coexist.

3. The current teacher should be a "mix" of coach and mentor. A coach is a person who, with questions, encourages students to think and explore. On the other hand, a mentor is the one who already has experience and knowledge, serves as a role model and accompanies student along his journey. To do all that, a mentor must know pupil's personality, his background and his starting conditions. This requires a highly individual approach.

For all these reasons, there is a need to educate Lifeology teachers to learn the elements and methods of non-formal learning that are employed during the programme. Practice shows that students have a very positive relationship towards teen mentors and hold a natural respect for them. School principals and teachers are also interested in these trainings, so we are expanding the range of certified mentors as well as high school teachers to use these methods and elements of non-formal education on their subjects.

Conclusion

"If you want to change something, start from yourself, show others how it can be made possible, then others will join you and eventually change others."

This is the way in which the true leaders and future graduates of Lifeology work today.

Slovenia

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Skilled for the future?

Uroš Kopavnik

Uroš Kopavnik is career counsellor for jobseekers, students and pupils at Career Centre Kranj of the Employment Service of Slovenia. He also coordinates and implements work at the Career Center, while developing new methods, contents and approaches for individual or group career counseling. In his career counselling work, he always focuses on the individual's advantages and opportunities in the labor market.

Talking about or predicting the skills of the future is always ungrateful task. However, since we are professionals, our users are expecting of us that the job will be done well or with the other words, the advice or at least a pointer will be given. Then we meet two problems that we usually have. First is our own unsureness, what to say and predict. In addition, the second is our personal feeling of the professional obligation (and pressure), that we need to give the right information, and not to let the users down and take the professional stand about all of it. In the workshop and in this article, I will try to point out and suggest some solutions about these dilemmas. Maybe many of you expect from the article the listings of simple practical skills that will be needed in the future. However, what I am trying to expose here is the way of thinking about the future.

Keep it simple!

When we are dealing with that kind of situation, I suggest being on the safe side. What do I mean by that? That means that our answer should be straight and forward and that it must contain usable information. If our answers during the counseling process are too philosophical or too abstract, the client would not be satisfied. On the other hand, if our answer is much above (or below) of his/her level of understanding, it would not do any good also.

Therefore, my proposal is that we must do it as plain and simple as we can. From time to time, that can mean, that we need to have the courage, to use the words, language and vocabulary understandable to the most simple and uneducated client. Even more, I think that the highest level of knowledge any of expert is demonstrated, when the one can and is able to explain the most difficult problem or phenomena with the simplest language and with simple examples. Counseling about the lifelong learning or career question goes the same way.

So, let us talk about skills!

Firstly, let us define the word or definition of the skills or competences itself. There are many different definitions of them, and here is one, I prefer the most by Sabina Žnidaršič: *The skills are the creative sum of individual knowledge, experience, motivation and ambition*. All of those are important to be the part of the sum. Let us see what happens if one is missing, motivation, for example. Someone can have all of the above, experience, knowledge, creative thinking, everything! However, if there is lack of motivation – would that particular individual really be at any help for the demanding employer? With other words, can the employee (despite being the best expert in the world), but without personal motivation, be any good for the employer?

This is why the motivation for the job and for being a part of the solution is always the first and major characteristic of the candidate, the selectors are attentive to. This is why I claim that the motivation is a part of someone being skilled (or unskilled) for the job. That goes for today and as well for the future and must be highlighted several times.

Flexibility

Science, economy, information technology and consequently the labor market is going on with the speed of light. There are several forecasts (and guessing) of the jobs, skills and professions of the future. Some seems logical, and other seem just a funny result of (too) creative thinking. Nevertheless, no matter what will happen, there will be one, that will be needed and expected. I call it flexibility. It is (again) a sum of different characteristic features of the individual.

The major one?

My guess for the major skill of the future is a **motivation**. I know that, on the first sight, it looks way too simple, maybe even simplified. But, during my several years of counseling, almost all of the candidates for employees or job seekers have tried to insured me that »they are very motivated« and so it seems that the motivations is there for granted. Let us face it, it is not. We are professionals, as that, we need to be realistic, and we need to avoid the mistaken thinking.

The fact remains, that only sufficient motivation is an assurance, that the other needed professional skills will be gained and developed. The major skill brings the major question to all the young people. That goes to the pupils, high school students, college students, who will or are entering the labor market. That goes to the others that want to change career of professional goals. The major question for someone, who wants to be happy in his career, is »What I want to do in the future and what am I prepared to do, to make it happen?«. You can see, that I have used letter »I« two times. That means, that we are not talking about the question, what others need to do for my future career, but what am I prepared to do. This can often be a very annoying question or dilemma, especially for the student or employee, who are used to live, work and behave at the expense of others. In many occasions with many costumers, the career counselor is the first person in life, who asks them that kind of questions. I believe that the sooner, we are starting to expose that kind of question, the better the answers are going to be. So this and those are the real questions, we need to ask pupils, students and employees on the beginning of their careers. Moreover, as mentioned, the one, who will research and recognized his wishes good enough, the one will answer the question properly. Therefore, I believe that motivation can be used and presented as a competence of the future, through which we will achieve career and personal goals.

Man vs computer?

Many are talking about how, in the future, the computers and robots will prevail. Yes, they will, but I am sure, not in a negative way. Today, we are facing with the automatization of all the major manufacture process. That means that the hard physically demanding work, which includes repetitive process, is and will be replaced with the robots. On the other hand, there are several sectors and professional areas, when the robot, computer or application of any kind, cannot be the option. Therefore, we can for example expose the professions that are not the subject of automation. Social workers of all kinds, doctors, therapists, executives and so on. The common thread of them is that they require direct interaction with the individual and all of its complexity. However, by doing that, we must be able and skilled to use complete on-line generated communications, apps and so on.

My beliefs, my enemy …

Let us expose something that can do the most damage to any kind of thinking about the future. That are our beliefs. Many times, I was a witness, when one of the forward thinking proactive employee tried to give a suggestion or two. However, he was brutally stopped from his either colleagues either superiors. Do you guess the argument? »Because this is the way we are doing it for several decades!« Let me put here one of my very personal experience. A few years back, at our employment service office, my current superior tried to delegate me some additional tasks. I resisted strongly, by listing all the existing tasks I already had. I was sincerely sure, that I just cannot take any new ones, and I told that to my boss honestly. She listened to me and said very calmly: »Uroš, I know exactly what you are capable of.« Who do you think was right?

Values, do they value?

When we are looking for new business paths, processes, solutions, ideas, consulting, we always come across man and his needs. A part of our human needs is a need for communication and relationship. Here we come across various value systems through which we communicate and are communicated. At first glance, it seems that part of the tasks - even part of the communications -

either take over the computer, or our values, beliefs are guided and lost in the melting pot of multiculturalism. As long as it is important for us to wish you good morning and afternoon arena, so far, our values will be our main building. That is why my attitude towards colleagues, subordinates and superiors is also part of the basic skill of the future. By taking into consideration of possible 'traps' of modern communication, we need to be even more aware of this.

Conclusion

Let us be an example and keep the conclusion plain and simple, as said before. By trying to predict the skills of the future, we must follow two main goals. First is to name the right skills. That mean the skills that we truly believe, that will be needed. I have set few examples, you can suggest yours. In addition, to make our clients aware, when they are talking to (for example) future employers, that they must find ways to back those skills up with firm examples. If so, they will be convincible and credible. That will make the decision maker sure, that he or she is worth a while, worth of his time and money.

At the Cross Border Seminar Seminar in Bled (Slovenia), we also tried to ask ourselves whether the competencies of the future could also be influenced by location, region, and place or perhaps the history of a nation, the cultural peculiarities. Surely they are, but the others, previously mentioned, are more firm and desired in every time or place.

Along with the positive attitude and respect, that is obviously expressed at all and every level of our profesional communication. Good luck!

Slovenia

Career Guidance for Teachers: An Example of Short Training programme

Miha Lovšin, PhD and Lea Avguštin

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Contemporary life-long career guidance service in school is not only the domain of school counsellors anymore. It mobilizes the entire school staff. In this respect, National School for Leadership in Education launched short training programme for teachers in kindergartens, primary and secondary schools.

Background of the training was programme Training of teachers to support leadership (2016-2018) funded by European social fund. Programme lasted one year (40 hours) and was divided into three content sections:

- **Communication,**
- **Ethics,**
- **Lifelong career guidance.**

Together 18 public institutions (6 kindergartens, 11 primary schools and 1 secondary school) with 296 members of educational staff applied for the programme.

The training Lifelong career guidance took eight hours and was held in schools and kindergartens in two separate workshops.

The aim of the first workshop was to recognize current situation, where in my career am I as a person (teacher). In this context, four exercises were conducted:

- Getting acquinted with career guidance competence (exercise: Factors that influence individuals' career).
- The concept of career and career guidance (exercise: Playing cards with DOTS model questions).
- Analysis of the career guidance in the school/kindergarten (exercise: Questionnaire for assessing career guidance based on Dots model).
- Managing yourself 1 (exercise: Career balance wheel).

The aim of the second workshop was to recognize, to look forward into the future, and to put emphasis on the students'c career. In this context, four exercises were conducted:

- Skills review and analysis of activities during workshops (Putting one activity from first workshop into practice with students).

- Understanding the competencies needed in the future (Future student assembled with Lego).

- Reflection on schools/kindergartens of the future - reflection on one's own teaching methods (short video clip with innovative school and kindergarten).

- Managing yourself 2 (Career plan according to Smart goals).

The activities in this training programme were focused primarily on the understanding of the career management skills concept and on the solutions for its implementation into educational programme as a whole.


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