



Grandis XXI. - Vocational Education for Interprofessional Elderly Care

in the 21st century

2016-1-HU01-KA202-023044 ERASMUS+ Strategic Partnership 2016-2018

Ageing Report in Hungary

2017





Document identification

Author:	lstván Bessenyei PhD.
Version:	V04
Intellectual Output:	O1 - Training needs for caregivers
Date:	March 2017
Document Type:	Report/study/
File:	National_Report_EN.docx
Target group:	Partners

Document history:

Date	Version	Change	Contributor
12.12.2016	1	Review	Mária Hartyányi
02.02.2017	2	Review	Ildikó Balassi
17.03.2017	3	Correction	Dr. István Bessenyei
28.03.2017	4	Final Review and correction	Mária Hartyányi





Table of Content

1	INTRODUCTION	4
2	SOCIAL CARE POLICY, LEGISLATION	4
3	REVIEW OF EDUCATION OF SOCIAL CARE WORKERS (VET, H	E)5
4	AGEING STATISTICS, INTERNATIONAL BENCHMARKING	
5	CASE STUDIES	21
6	ASSISTIVE TECHNOLOGIES	23
7	PROJECT DETAILS	26
8	BIBLIOGRAPHY, LINKS	24
AN	VEX	ERROR! BOOKMARK NOT DEFINED.





National Report – Hungary

Introduction 1

Due to demographic changes, social care institutions face great difficulty in providing appropriate institutional services for the increasing number of elderly people. At the same time, there is a growing demand for supporting elderly people in their own homes for as long as possible, promoting active independent living and well-being. More ICT based tele-care systems are being developed to accommodate the demand but there is a general lack of competence for using them effectively, which is a barrier to their widespread adoption. There are a number of contributing problems:

- there is no appropriate learning content in the vocational training programmes for health and social care to inform students of changes in population age profiles and care needs;
- in ageing societies, it is important to consider keeping older people at work for economic sustainability but businesses are not prepared for this;
- health and social care vocational training programs do not cover ICT based tele-care systems (EIP-AHA), and modules for developing advanced digital competencies for managing eHealth systems are limited;
- vocational and HE curricula do not contain necessary information on the potential of virtual ٠ networks in social care and do not develop necessary ICT skills needed for establishing and facilitating virtual communities, despite their potential to prevent mental and physical deterioration of ageing persons living alone.

GRANDIS XXI. project aims to develop a competence-based, modular training programme for formal and informal caregivers in order to empower them with advanced health literacy and tailored digital competencies, with special ICT skills in using eHealth technologies like smart devices, social alarms, wristbands, and special tele-diagnostic tools installed in the home.

As a part of a focused needs-analysis, this national report includes a state-of-art summary about the ageing policy, a review of the education of social care workers and t the supply on the national telecare and telehealth market, penetration of technology in supporting wellbeing and active ageing. In the last part of the study the results of the surveys with stakeholders will be summarised in order to provide a solid base for developing a competence map, syllabus and learning content for the 21st century caregivers.

Social care policy, legislation 2

In Hungary, social care is regulated by Act III. of 1993 on Social Administration and Social Benefits ¹.

This law was modified by the government in 2016. The newly introduced measures included severe restrictions. First of all, the condition of the elderly people receiving home care was revised. Based

¹ see: http://net.jogtar.hu/jr/gen/hjegy_doc.cgi?docid=99300003.TV





This project has been funded with support from the European Commission. This publication [communication] reflects the views only of the author, and the Commission cannot be held responsible for any use, which may be made of the information contained therein.

4 - 26



on the results, from 1st January 2016 on, certain proportion of the elderly people is entitled to a limited care, called "social promotion". This help can be provided by unqualified persons too.

The next category is "personal care" which means more intensive nursing tasks. According to the new legislation, an elderly person living alone may receive maximum four-hour daily help with state support. 2

In line with the new regulation, the executives had had to revise the care needs of patients receiving home care, decide whether they are entitled to social promotion or personal care and set the daily hours in accordance with the new categories until the application deadline for state support for 2016 but until 31st December 2015 the latest. The aspects to be considered for the revision of the care needs are defined in the Social Act's Implementing Regulation.

A further change is that the assessed care need may be revised and modified by the operating authority. The new legislation – most probably to avoid any misuse – may issue 200 000 HUF penalty in case the executive did not set the kind and hours of care in line with reality. The regulation includes a point system which defines who is entitled to home care. To set the necessary help, the chart gives points from a five-point scale to each domain. (For example, they count zero point if the patient does not have any problem with getting dressed, one point if s/he needs minimal help, and four, if the elderly person needs significant help or attendance to get dressed.) The final score decides whether the person is entitled to help and if s/he is, in how many hours per day. These points were raised in January 2016 by the Ministry of Human Resources (EMMI).

3 Review of education of social care workers (VET, HE)

Competence requirements and curricula of social care in the Hungarian training system

Hungary, social workers (family care, child protection), nurses (hospital care, home care) and social care providers are trained for the social sector – all with different curriculum.

In Hungarian educational system, it is possible to receive a qualification as a health and social care provider relevant for the present project at four different levels:

- 1. Secondary vocational education
 - Nursing assistant (32 723 01)
 - Social care provider (34 762 01)
- 1. Upper secondary education (initial training 4+1 or 4+2 years)
 - Practicing nurse (54 7223 02)
 - Specialised social worker (54 762 03)
 - Social work assistant (54 762 02)

² see: <u>http://24.hu/belfold/2015/07/31/hazi-beteggondozas-az-allam-bekemenyit-felmerik-az-idosek-allapotat/</u>





- 2. Upper secondary education (built on initial training + 5 months or 1 year)
 - Nurse (55 723 01)
 - Gerontology caregiver (55 762 02)
 - Hospice special nurse (55 723 09)
- 3. Higher education (BSC or BA)

The trainings are defined by throughout curricula in which the modules are detailed and broken down to competencies, courses and methodological recommendations. Qualifications contain professional and exam requirements as well as the curricula and programs conforming to the relevant legislation of the given educational level. The qualifications contain the requirements of EQF and MKKR standards in form of output results (competencies) in adult training, professional training and in higher education as well. In vocational training, the module descriptions are also set by central regulations.

For example, the competency requirements of social training's professional qualification are the following:

3513 Social care provider, specialised social worker, Social care provider and nurse (competences) (National Vocational Qualification's Register, (FEOR 3413):

Having obtained the qualification, one is able to:

- understand written and read out general and technical texts
- write general and technical texts
- search for information
- feel empathy and tolerance for people living in various circumstances
- maintain balanced attitude and emotional stability
- establish devoted and helpful contacts
- communicate adequately and lead a non-directive, supporting conversation
- motivate the clients
- act responsible and be open-minded
- use general knowledge in special situations
- recognise social emergencies and problems
- obey to professional ethics and represent professional values
- work systematically and precisely
- use info-communication tools and a computer
- see the practical side of tasks
- use health care's fixed assets, nursing tools and instruments adequately
- use, maintain and clean medical aids and amenities
- use first-aid equipment and bandage
- use household apparatus and kitchen devices, use and cleanse textiles³

³ see: <u>http://szakkepesites.hu/szvk2013/34</u> 762 01 Szocialis gondozo es apolo.pdf





Curriculum for specialised social workers' formal training and education includes the following topics: Curriculum for vocational education and training of specialised social workers in formal qualification

Requirement Module	Descrtiption
11499-12 Employment II.	Employment II.
11498-12 Employment I. (for trainings built on a secondary school leaving certificate)	Employment I.
	Vocational skills training and communication practice
	Social politics, legal rights and ethics
10569-16	Basics of psychology
Basic tasks in care and nursing	Basics of health care
	Basics of care and nursing
	Monitoring and first aid practice
	Social studies
	Clinical studies
	Nursing practice
10570-16 Assessment of needs	Care studies
	Assessment of care needs practice
	Monitoring practice
	Theory of social work
	Social work in practice
10571-16 Special caregiving tasks	Social care
	Social care in practice
	Mental health





Requirement Module	Descrtiption
	Case analysis and supervision in practice
10576-12 Administration of special care	Administration of social services Information technology, Information technology in practice
10572-16 Administration of care and nursing	Social administration in practice
	Vocational skills training and communication practice
	Sociology, socio-politics, legal and ethical aspects
10525-12 General tasks in social care	Sociology and social politics in practice
	Psychology and pedagogy
	Psychology in practice
	Basics of health care
	Public health
10559-12 First aid tasks	First aid in practice
	Basics of nursing
	Basic nursing tasks in practice
10556-16 Care and nursing tasks	Basics of care
	Care needs
	Care in practice
	Social work
	Social work in practice
10574-16 Personal care	Social care
	Social care in practice
	Protecting the social worker's character

Although competence lists and study plans – at all five levels – include "working with IT devices", "basics of information technology" or "info-communication devices in theory and practice", there is no competence group which could serve as the backbone of the GRANDIS project training: for example the competence of using IT and info-communication devices in care and community organizing or the conditions to introduce such devices.





Differentiation of the target group and outline of educational needs

As Balázs Krémer points out in his thorough study⁴, the statistical analysis of people who need care and nursing is rather controversial. The stratification of this group is complex: the group includes those who need permanent attendance and are unable to support themselves, those patients who need daily help but are able to move, and also the lonely jet basically self-reliant people over 60 who often need help to organize their social life and find partners for conversation. (To this need reflects for example the "nondirective, supporting conversation" in the NVQR requirements too.) Caring for in-patients is, first of all, a nursing and health care task, while the latter group's needs may be dominated by mutual help, organizing communication or joining volunteer work. Moreover, managing retirement homes or social and home care institution whose tasks include organizing cooperation among social and health care institutions also need a different set of skills. (No wonder that "active aging" and "deinstitutionalisation" are the key words of the past few years, which mean more rational distribution of costs between solutions relying exclusively on health care practices and supporting independent living at the same time.)

There is a significant fight for prestige between the two sectors for the division of funds, tasks and competencies as the differentiated medical solutions are getting more and more expensive, which might force the distributors to diminish the care sector's budget – see the new point system of Hungarian social care.

As a result of the group's differentiated nature, the demand-structure of the group is also diverse – which has to be considered when designing the training (which we intend to develop in the frame of the project).⁵

It is not easy to define the group statistically either.⁶ The available information by Hungarian Central Statistical Office includes the following data on the provision of institutions and regions: ⁷

⁷ See:http://www.ksh.hu/docs/hun/xstadat/xstadat_eves/i_fsi001.html



This project has been funded with support from the European Commission.This publication [communication] reflects the views only of the author, and
the Commission cannot be held responsible for any use, which may be made
of the information contained therein.9 - 26

⁴ Krémer Balázs: Idős? Gondozás? Miről beszélünk? - Esély, 2013/3

⁵ For the most recent statistical prognosis of EU see:

http://ec.europa.eu/economy_finance/publications/european_economy/2015/ee3_en.htm ⁶ For more details see the study of Balázs Krémer.



Patients of the ins	Patients residing in social institutions providing permanent or temporary accommodation according to the type of the institution (1995-) [person]							
Year	Home and care centre for elderly people	Home for psychiatry patients	Home and care centre for disabled people	Home for addicts	Home and accommodation for homeless people, night shelter	Other homes	In total	
1995	32 473	7 480	14 362	801	5 738	1 411	62 265	
2005	47 273	8 074	16 307	2 085	7 642	44	81 425	
2006	50 037	8 132	16 267	2 118	7 579	-	84 133	
2007	50 903	8 153	16 457	2 176	7 594	-	85 283	
2008	49 894	8 253	16 405	2 070	7 822	-	84 444	
2009	51 353	8 659	16 398	2 127	8 377	-	86 914	
2010	51 736	8 775	16 391	2 151	9 175	-	88 228	
2011	52 140	8 889	16 230	2 186	9 441	-	88 886	
2012	52 281	8 842	16 143	2 150	10 684	-	90 100	
2013	52 852	8 760	16 024	2 155	11 210	-	91 001	
2014	53 540	8 775	15 812	2 116	10 068	-	90 311	
2015	54 209	8 802	15 741	2 070	10 376	-	91 198	

Patients receiving home care by county ⁸								
	2008	2009	2010	2011	2012	2013	2014	2015
Budapest	4 457	4 547	4 920	4 656	4 841	4 834	5 039	4 568
Pest	2 426	2 903	2 860	2 892	5 073	5 135	3 190	3 185
Central Hungary	6 883	7 450	7 780	7 548	9 914	9 969	8 229	7 753
Fejér	1 651	1 864	1 931	2 081	2 129	2 064	2 052	1 759
Komárom- Esztergom	815	749	1 069	1 025	1 940	2 403	2 444	1 530
Veszprém	1 678	2 787	3 753	3 320	5 191	5 566	5 901	5 527
Central Transdanubia	4 144	5 400	6 753	6 426	9 260	10 033	10 397	8 816
Győr-Moson-Sopron	1 366	1 619	2 088	2 111	2 974	3 014	2 845	2 264
Vas	1 224	1 489	1 689	1 699	2 107	2 404	2 452	2 088
Zala	2 307	2 920	3 608	3 788	3 444	3 288	3 188	3 093
Western Transdanubia	4 897	6 028	7 385	7 598	8 525	8 706	8 485	7 445
Baranya	2 971	4 220	4 818	5 231	5 926	6 169	6 198	5 633
Somogy	2 174	2 314	2 508	2 476	2 972	3 481	3 590	3 145
Tolna	1 634	1 672	1 699	1 801	1 855	1 905	1 932	1 822
Southern Transdanubia	6 779	8 206	9 025	9 508	10 753	11 555	11 720	10 600
Transdanubia	15 820	19 634	23 163	23 532	28 538	30 294	30 602	26 861

⁸ <u>http://www.ksh.hu/docs/hun/xstadat/xstadat_eves/i_fsi002b.html</u>





Patients receiving home care by county ⁸								
Borsod-Abaúj-Zemplén	4 278	6 186	7 958	10 842	13 746	15 078	15 588	11 798
Heves	1 667	1 960	2 111	2 126	2 549	2 515	2 667	2 626
Nógrád	1 545	1 314	2 089	2 284	3 017	2 829	2 766	2 144
Northern Hungary	7 490	9 460	12 158	15 252	19 312	20 422	21 021	16 568
Hajdú-Bihar	2 365	6 479	8 269	8 636	16 370	17 033	16 488	12 764
Jász-Nagykun-Szolnok	1 974	2 300	2 496	3 293	4 675	4 697	4 735	3 192
Szabolcs-Szatmár-Bereg	4 407	6 406	6 872	11 787	24 492	25 407	25 989	22 701
Northern Great Plain	8 746	15 185	17 637	23 716	45 537	47 137	47 212	38 657
Bács-Kiskun	2 132	2 966	3 379	3 614	4 093	4 084	4 193	4 041
Békés	5 268	6 701	8 828	12 407	15 550	17 609	19 427	17 173
Csongrád	1 781	1 996	2 109	1 872	2 337	2 276	2 301	1 967
Southern Great Plain	9 181	11 663	14 316	17 893	21 980	23 969	25 921	23 181
Great Plain and Northern Hungary	25 417	36 308	44 111	56 861	86 829	91 528	94 154	78 406
Hungary in total	48 120	63 392	75 054	87 941	125 281	131 791	132 985	113 020

Despite the demographic change the number of patients receiving home care has been gradually decreased during the last five years.



Patients receiving home care per ten thousand people over 60 years

(Source: Krémer 2013:96)

Every international statistical forecast confirms that the increase of average age will result in the dramatic rise of proportion of elderly people within the population, which means new challenges for both health care and social care systems.





"In EU countries, the proportion of people over 65 years had risen by around half (9.6% - 16%) between 1960 and 2010, and this increase in proportion is also reflected in the proportion of population over 65 versus population between 15-65. The Old Age Dependency Ratio (OADR) has also risen by half (15% - 23,6%). All these data seem to be a modest change as compared to the forecast for 2010-2060 claiming that the proportion of 65+ generation will double (16% - 29.3%), which also means a more than twofold worsening of the dependency ratio (23.6% - 52.4%)." (Krémer:67)

"If we want to convert priorities to money, the equivalent in spotlight, then both austerity issues fuelling the mainly institution based care of today (home care, coordination, informal care, specification of rights and prevention of unauthorized access, self-care, migrant caregivers) and cost increasing – quality and efficacy – aspects (quality, full coverage, burden sharing, development of formal institutions and training of professional caregivers) emerge." (Krémer:75.)

In 2014, the **average life expectancy of Hungarian men was 72,3 years** as opposed to 78,1 years of EU-28 and 79,2 years in Eurozone; while it was **79,4 years for Hungarian women** as opposed to 83,6 years of EU-28.⁹

Internet usage

The data of EUROSTAT reveals that internet usage of the Hungarian population in 2015 was but slightly under the average of EU-28 (79.3%): 76.1% of the population used internet. This data does not reveal the difference in level of education or age groups nor does it show geographical distribution. (see Annexes, Table 1.).

"The data of EUROSTAT show that there are significant differences within the country. While practically 100% of qualified young people use internet, in the case of less qualified, middle-aged people, internet usage hardly exceeds 40%. The worst situation is that of the elderly over 55 years, but in this case, educational attainment plays a crucial role. While in this age group, only 9% of those who have primary school attainment use the internet, this number is 85% in the case of people having obtained higher education." (see: Szuhi:2014)

EUROSTAT's analysis shows the communication and networking potential of social media surfaces:

"One of the most common online activities in the EU-28 in 2015 was participation in social networking. Half (50%) of individuals aged 16 to 74 used the internet for social networking, for example using sites such as Facebook or Twitter. Around two thirds (66–68%) of people in the United Kingdom, Belgium and Luxembourg used social networking sites, in Norway the proportion reached 73% and in Iceland it was 83% (2014 data). At the other end of the scale, there were three EU

http://www.ksh.hu/docs/hun/xstadat/xstadat_eves/i_int009.html



This project has been funded with support from the European Commission. This publication [communication] reflects the views only of the author, and the Commission cannot be held responsible for any use, which may be made of the information contained therein.

⁹ https://www.ksh.hu/docs/hun/eurostat_tablak/tabl/tps00025.html



Member States where less than 4 in 10 people used such sites, namely France, Italy and Slovenia." (see: EUROSTAT 2015)

Ageing statistics, international benchmarking 4

Situation in Hungary according to the data of Active Aging Index

The performance of Active Aging Index¹⁰ countries are measured in 4 domains:

- Employment
- Participation in Society (including family relations)
- Independent, Healthy and Secure Living
- Capacity and Enabling Environment for Active Aging

Employment	Participation in Society	Independent, Healthy and Secure Living	Capacity and Enabling Environment for Active Ageing
Employment Rate 55-59	Voluntary activities	Physical exercise	Remaining life expectancy at age 55
Employment Rate 60-64	Care to children and grandchildren	Access to health services	Share of healthy life expectancy at age 55
Employment Rate 65-69	Care to older adults	Independent living	Mental well-being
Employment Rate 70-74	Political participation	Financial security (three indicators)	Use of ICT
		Physical safety	Social connectedness
		Lifelong learning	Educational attainment

Active Ageing Index (Resource: UNECE)

¹⁰ http://ec.europa.eu/eurostat/statistics-explained/index.php/Statistical themes http://ec.europa.eu/eurostat/statistics-explained/index.php/Population_and_social_conditions http://ec.europa.eu/eurostat/statistics-explained/index.php/Digital_economy_and_society



This project has been funded with support from the European Commission. This publication [communication] reflects the views only of the author, and the Commission cannot be held responsible for any use, which may be made of the information contained therein.



AAI definition: Employment (35%), Participation in Society (35%), Independent, Healthy and Secure Living (10%), Capacity and Enabling Environment for Active Ageing (10%).



AAI 2014 (Resource: UNECE)

The Active Ageing Index for Hungary (28,3) is far below the EU average, only Poland and Greece is ranked below Hungary, it is 63% of the highest value (Sweden, 44.9).





	A		a a		•		0		69	
Rank	Overal		Employme	nt	Participati in societ	on y	Independe living	ent	Capacity f active age	or ing
1	Sweden	44.9	Sweden	43.4	Ireland	24.1	Denmark	79.0	Sweden	69.2
2	Denmark	40.3	Estonia	39.7	Italy	24.1	Finland	79.0	Denmark	65.1
3	Netherlands	40.0	Denmark	35.8	Sweden	22.9	Netherlands	78.9	Luxembourg	63.6
4	UK	39.7	UK	35.8	France	22.8	Sweden	78.6	Netherlands	61.8
5	Finland	39.0	Germany	34.4	Netherlands	22.4	Luxembourg	76.7	υκ	61.3
6	Ireland	38.6	Netherlands	33.9	Luxembourg	22.2	France	75.9	Finland	60.5
7	France	35.8	Finland	33.7	UK	21.6	Ireland	74.9	Belgium	60.3
8	Luxembourg	35.7	Portugal	32.6	Finland	20.5	Germany	74.4	Ireland	60.0
9	Germany	35.4	Latvia	32.0	Belgium	20.2	Slovenia	74.2	France	59.1
10	Estonia	34.6	Cyprus	31.4	Denmark	19.6	Austria	73.8	Austria	58.2
11	Czech Rep	34.4	Romania	31.0	Czech Rep	18.8	UK	73.7	Malta	57.
12	Cyprus	34.2	Ireland	30.6	Croatia	18.7	Belgium	72.5	Spain	56.3
13	Austria	34.1	Lithuania	30.5	Austria	18.3	Czech Rep.	71.2	Germany	55.8
14	Italy	34.0	Czech Rep.	28.0	Cyprus	18.0	Malta	70.1	Czech Rep.	54.3
15	Belgium	33.7	Bulgaria	25.1	Spain	17.8	Spain	69.8	Italy	53.4
16	Portugal	33.5	Austria	24.7	Malta	17.3	Croatia	69.5	Croatia	52.8
17	Spain	32.6	France	24.1	Slovenia	16.3	Italy	69.0	Bulgaria	52.2
18	Croatia	31.6	Spain	23.3	Hungary	15.4	Hungary	68.0	Portugal	52.
19	Latvia	31.5	Italy	23.0	Lithuania	14.7	Cyprus	68.0	Cyprus	50.4
20	Lithuania	31.5	Poland	22.4	Portugal	14.1	Estonia	67.3	Slovenia	50.0
21	Malta	31.5	Slovakia	21.9	Latvia	13.8	Portugal	67.3	Latvia	48.2
22	Bulgaria	29.9	Luxembourg	21.9	Slovakia	13.7	Lithuania	66.2	Poland	47.9
23	Slovenia	29.8	Croatia	21.7	Greece	13.7	Slovakia	65.8	Estonia	47.
24	Romania	29.6	Belgium	21.0	Germany	13.6	Poland	64.9	Slovakia	47.
25	Slovakia	28.5	Greece	20.4	Estonia	12.8	Greece	64.9	Hungary	46.9
26	Hungary	28.3	Malta	20.1	Romania	12.7	Bulgaria	62.7	Greece	45.8
27	Poland	28.1	Hungary	19.3	Bulgaria	12.5	Romania	61.8	Lithuania	45.3
28	Greece	27.6	Slovenia	19.1	Poland	12.1	Latvia	58.7	Romania	40.9
	EU28 avg.	33.9		27.8		17.7		70.6		54.
		•		-		-		-		-

Ranking by domains 2014 (Resource: UNECE)

	Employment	Participation in society	Independent living	Capacity for active Ageing
Highest value	43,4	24,1	79,0	69,2
Hungary	19,3	15,4	68,0	46,9





The overall ranking of Hungary is determined by the figures of Employment and Capacity for active Ageing, while the other two figures

Changes in o Participation	domai n'. bet	n-spe ween	cific score for the 2nd do the 2010 AAI, 2012 AAI a	main 'Social nd 2014 AAI	
Participa	tion i	n soci	ety 2010, 2012 and 2014-AAI		
Rank 2014	2010 AAI	2012 AAJ	2014 AAI	Change 10-14 Overall	Change 10-14 MEN WOMEN
1 Ireland	15.1	24.1	24.1	9.0	6.4 11.2
2 Italy	18.4	24.1	24.1	5.7	5.4 5.8
3 Sweden	21.0	22.9	22.9	1.9	3.3
4 France	20.5	22.8	22.8	2.3	2.5
5 Netherlands	21.7	22.4	22.4	0.7	1.D 0.1
6 Luxembourg	16.7	22.2	22.2	5.5	8.4
7 UK	18.0	21.6	21.6	3.6	2.9
8 Finland	17.9	20.5	20.5	2.6	1.4
9 Belgium	19.3	20.2	20.2	0.9	2.2
10 Denmark	17.5	19.6	19.6	2.1	4.0
11 Czech Rep.	12.0	18.8	18.8	6.8	9.3
12 Croatia	11.9	18.7	18.7	6.8	8.1
13 Austria	15.4	18.3	18.3	2.9	3.5
14 Cyprus	12.5	18.0	18.0	5.5	5.5
15 Spain	11.4	17.8	17.8	6.4	7.5
EU28 Avg.	14.9	17.7	17.7	2.8	2.8
16 Malta	14.4	17.3	17.3	2.9	3.9
17 Slovenia	16.6	16.3	16.3	-0.3	10
18 Hungary	13.4	15.4	15.4	2.0	2.6
19 Lithuania	12.9	14.7	14.7	1.8	12
20 Portugal	10.2	14.1	14.1	3.9	3.0
21 Latvia	13.4	13.8	13.8	0.4	34
22 Slovakia	13.2	13.7	13.7	0.5	0.2
23 Greece	11.1	13.7	13.7	2.6	3.7
24 Germany	16.6	13.6	13.6	-3.0	46
25 Estonia	13.0	12.8	12.8	-0.2	-1.2
26 Romania	10.2	12.7	12.7	2.4	-1.0
27 Bulgaria	9.1	12.5	12.5	3.4	5.2
29 Doland	12.2	12.1	10.1	41	-3.8

Participation 2014 (Resource: UNECE)





	thy and s Independ	ecure lent, h	living	/', between the 2010 AAI, 2012 / and secure living 2010, 2012 and 20	AAI and 2014 AAI	
tank VAI	2014	2010 AAI	2012 AAI	2014 AAI	Change 10-14 Overall	Change 10-14 MEN WOMEN
1 0	Denmark	78.3	78.9	79.0	0.7	0.0
2 F	inland	78.6	78.6	79.0	0.4	0.0
3 N	letherlands	77.8	78.5	78.9	1.1	10 17
4 8	weden	77.4	78.5	78.6	1.3	0.8 17
5 F	rance	75.3	75.3	75.9	0.6	-0.2 9.8
6 L	uxembourg	75.2	74.9	75.7	0.5	0.2
7 li	reland	73.9	74.3	74.9	0.9	10
8 0	lormany	74.0	74.4	74.4	0.4	0.2 9.8
9 8	lovenia	70.9	74.0	74.2	3.4	2.6
10 A	lustria	71.7	73.2	73.8	2.1	2.4
11 U	ΙК	72.3	74.3	73.7	1,4	2.0
12 B	leigium	73.6	73.1	72.5	-1.1	-0.7 -1.5
13 0	zech Rep.	69.9	70.8	71.2	1.3	D.6 53
E	U28 avg.	68.7	69.6	70.6	1.9	8
14 N	Aalta	70.8	69.4	70.1	-0.7	-0.9 -0.4
15 8	ipain	67.5	68.9	69.8	2.3	2.1
16 C	roatia	64.4	64.8	69.5	5.0	5.3 3.5
17 8	taly	67.9	69.1	69.0	1.1	9.9
18 H	lungary	67.8	68.6	68.0	0.2	0.5
19 C	yprus	66.3	66.1	68.0	1.6	0.8 2.6
20 E	istonia	64.1	69.6	67.3	3.2	2.8
21 P	ortugal	66.9	66.4	67.3	0.4	0.5 0.6
22 L	ithuania	62.3	67.3	66.2	3.9	4.6
23 8	llovakia	66.9	66.4	65.8	-1.1	-0.8 -1.6
24 P	oland	65.9	64.9	64.9	-0.9	03 12
25 0	ireece	63.7	64.4	64.8	1.1	12
26 8	Bulgaria	51.2	60.4	62.7	11.5	12.8
27 R	tomania	56.7	60.2	61.7	5.0	4.5

Independent Living 2014 (Resource: UNECE)



This project has been funded with support from the European Commission. This publication [communication] reflects the views only of the author, and the Commission cannot be held responsible for any use, which may be made of the information contained therein.

17 - 26



Canaci	ty and	enabli	ng environment for active a	geing 2010 2012 and 20	14-0.01
enhant.	.,	citabili	ig chillen inchillen uctive u	genig 2010, 2012 and 20	
Rank 2014 VAI	2010 AAI	2012 AAI	2014 AAI	Change 10-14 Overall	Change 10-14 MEN WOMEN
1 Sweden	66.2	68.6	69.2	3.1	32
2 Denmark	64.6	66.7	65.1	0.5	0.7
3 Luxembou	rg 60.4	63.0	63.6	3.2	22
4 Notherland	is 62.9	61.3	61.8	-1.1	-1.4
5 UK	61.2	61.8	61.3	0.1	0.0
6 Finland	59.0	60.5	60.5	1.4	2.5
7 Belgium	59.7	59.6	60.3	0.6	-11
8 Ireland	57.4	59.2	60.0	2.6	27
9 France	57.5	57.5	59.1	1.6	1.9
10 Austria	52.7	56.3	58.2	5.5	6.4
11 Malta	50.6	55.4	57.1	6.5	63
12 Spain	55.5	56.1	58.3	0.8	-0.6
13 Gormany	66.2	55.8	65.0	0.6	20
14 Croch Por	50.5	64.4	64.9	20	0.3
EU29 our	50 A	59.0	54.4	20	3.6
EU28 avg.	52.4	53.6	54.1	20	24
15 Italy	50.0	55.9	53.4	3.4	27
16 Croatia	50.5	49.8	52.8	2.3	2.6
17 Bulgaria	48.1	51.9	52.2	4.0	4.4
18 Portugal	46.4	51.0	52.1	5.7	6.0
19 Cyprus	46.6	50.6	50.4	3.8	4.9
20 Slovenia	51.7	49.0	50.0	-1.7	1.9
21 Latvia	43.7	45.7	48.2	4.5	5.2
22 Poland	46.9	47.3	47.9	1.0	0.6
23 Estonia	44.7	47.4	47.5	2.8	1.9
24 Slovakia	43.5	46.0	47.1	3.5	5.0
25 Hungary	45.7	45.3	46.9	1.2	10
26 Greece	48.4	46.2	45.8	-2.7	-1.9
27 Lithuania	44.1	46.4	45.3	1.2	12
	44.7	00.0	10.0		0.6

Capacity 2014 (Resource: UNECE)

Relative to other European countries, in Hungary only very little (almost zero) increasing could be identified between 2010-2014 in all components of AAI.







Percentage of 55-74 year-olds reporting computer use in the previous three months, 2010 and 2015

Source: UNECE Statistical Database.

Notes: Graph presents data for 31 UNECE member states with data available in both 2010 and 2015

Resource: UNECE

Hungarian situation

- We are at the bottom of the ranking, at the 26th place scoring 28,3 points (only PL and GR have lower ranking than Hungary scoring 28,1 and 27,6 points);
- The scores of Scandinavian countries are higher, Central-European countries (expect from CZ) are in the last third of the list;
- Small but higher than average (1 point) improvement between 2010-2014 (2 points);
- Gender differences are low, they are more significant in countries with significantly different employment profile for the two sexes

The situation in Hungary is especially difficult if the complex index of active ageing and employment is considered (see Lukács: 2016)

What consequences can be drawn if the aim is to set the care needs – at least broadly – based on which the differentiated training of care providers can be developed?





First of all, we have to differentiate between at least two major groups:

- patients who need permanent and long-term care (nursing and health care medical dominance), and
- <u>patients who are partly self-reliant</u> and do not need constant care jet their ability to do certain tasks (shopping, etc.) is limited, people living alone in whose case social relations, communication, supporting conversation or life therapy may serve as the most important aspects of support besides health surveillance and medical care.

Whereas the first group needs first and foremost nursing skills, in the case of the latter group life management and counselling, and teaching to use IT devices are equally important skills if not more important ones.

The variables of Active Ageing Index show that social connectedness (mutual assistance networks, organizing leisure activities and nurturing family relations (with the help of ICT devices), political activity or volunteering) are important indicators of well-being, no surprise that AAI devotes 30% of the points to this variable.

The topic of the present project, possibilities provided by information and communication technology, has a prominent place amongst cost-efficient solutions. Remote diagnosis and remote surgery are spreading in medical practice and in medical care, the presence (and price, of course) of technology devices is increasing – from emergency response systems till smartphones designed for elderly people, from using the more and more common web communication devices and networks till telecare through the phone. (The German weekly newspaper, Die Zeit, published astonishing data about the latter: in the Philippines, the qualified, English speaking workforce of call centres is gradually diverted into telecare. In the first five months of 2016 only, 2000 Philippine nurses were retrained for providing online care to patients in the USA and this tendency keeps growing.)

In more advanced countries, dispatch centres were established to receive and handle (select, forward) incoming alarms, which implies new tasks on the one hand for the technical staff and on the other hand for managers coordinating health care and nursing – and it has to change their training as well.

"For teaching grandmothers how to use the Internet and Skype especially (as Skype really is a cheap and effective tool to make up for the absence of social connections) may be a renown social caretaking task financed by development programmes, it is useful only if one has broadband internet connection and a computer, and speaks basic English; otherwise it is good for nothing. And to mention the other side too: a lot of sensible and decent nurses in the countryside help to cut the wood and bring it into the house (because one must heat during the winter and many patients having a stove are not able to do these tasks); however, user-friendly provision of fuel as a care task is never included in the literature on care and nursing, neither is it described how to do it effectively and professionally. Just the same, when talking about the needs of middle class people, implicitly or





explicitly we consider not only the fact that they have money, which means that they are not poor, but also that, similarly to other consumers of the post-industrial world, they spend a significant proportion of their income on buying services related to their living standards.

They go to the hairdresser, thermal bath and massage, they do not take pains in shopping and cooking when they are hungry, they order warm meal from the delivery service instead, etc.; and if they are hindered in these activities for any reason, care includes overcoming the difficulties (e.g.: covering taxi and home delivery costs, medical referral to thermal bath and physiotherapy, etc.).

Naturally, this assumption is not true in the case of each group needing support and thus they do not have access to similar innovative care tools." (Krémer:109)

Here, we should return to the competency requirements of the Hungarian training for caregivers concerning information technology. **The Hungarian requirements miss the competencies included in the outline of GRANDIS-project training, for example:**

- Being familiar with and using remote diagnostic devices
- Using various sensor and emergency response systems
- Teaching the patients how to use telecommunication devices, inviting volunteers and/or family members to the teaching process
- Community building with the help of social networks to support the communication of elderly people among each other
- Getting in contact with the (remote) family members with basic info-communication devices (Skype, Messenger, etc.) and social networks.
- Being familiar with the market of developed, complex technical devices (motion sensors which evaluate activity and give feedback, smart house)

5 Case studies

An interesting case study

Zsuzsa Széman reports an experiment where elderly (75-80 years old) patients were taught how to use the internet. In the first stage, the experiment took place in a more developed, urban environment, whereas in the second stage, it was held in a less developed, rural environment. ICT technology was provided by Malteser International and a small entrepreneur, due to financial limitations for 15 people only.

The training focused mainly on using Skype, partly because of its relative simplicity and partly because of its supposed potential to strengthen the interpersonal and intergenerational relations of the elderly people, which may help to fight loneliness and depression.

The researchers deliberately chose to work with elderly people who had never used computer before and had an aversion to it because they hoped to register change easier this way.





The first stage of the experiment took place between December 2010 and December 2011. Most of the participants were patients over 80 in a rather bad mental state.

The beginning of the experiment was difficult; on the one hand, because of the aversion of the elderly; on the other hand, because of the lack of experience of the caretakers or family members. Moreover, the experts providing the technology doubted that the skills of the elderly people could be improved. (At the beginning, it was also a problem that pictograms had to be enlarged and the mouse sensitivity had to be lowered because of the poor sight of the participants.)

It had given great impetus and taught many lessons when high school students who wanted to complete their obligatory 50 hours of community service in this field and the social worker students joined the program from the third month on. The students worked in pairs, and they were available for two hours per week. Besides the basics of ICT, they taught the patients how to use Skype, which was also fuelled by the potential to communicate with grandchildren and relatives. Soon, the grandchildren themselves came up with ideas, games and suggestions to use Facebook and online shopping systems.

The aversion dissolved and the project – in addition to the positive mental and emotional impact on the participants through the new connections – served with useful lessons to strengthen the relation of the different generations and to narrow the huge gap in ICT competences.

In the second stage of the project from 2012 on, the volunteers were invited to work on the project from the very beginning, and new elements were included in the methodology. For example, the prior knowledge of the elderly people was assessed and the pairs exchanged their didactic experience when they changed each other.

As Zsuzsa Széman puts it in the final chapter of the case study:

"The model project proved: with the help of info-communication devices not only the loneliness of elderly people can be dissolved, their relationship network can be reversed, their knowledge of infocommunication, similar to that of the youngsters, serves as a new basis of intergenerational relations. Elderly people become integrated members of society instead of being outcasts. An elderly man, who had been using the computer for 8 months only, has just passed away but he led a pleasant life with his computer until his death. What is this if not social inclusion? The research is to be continued; at different places with different sample we are likely to encounter different problems and find new solutions, but based on our past experience it seems: info-communication training by young volunteers outlines a new solution to "elderly care"." (Széman:2013)





It is very important for the GRANDIS-project that a similar project¹¹ requires new organising and management skills both from the managers and the social workers which must be considered when developing the thematic of the planned training.

6 Assistive technologies

Products of the Hungarian manufacturers

Manufacturers offer a wide scale of ICT services: from big data-based integrated health care reporting application called MENTA, including emergency response systems, GPS-based positioning and emergency applications, smart phone programs and remote diagnostic devices till smart watches. Health care government devoted significant funds to the development and introduction of MENTA. As a result, technology licences are ready to be used in Hungary; at the same time, it is unclear whether a model analysis of mass introduction costs was conducted.

It is striking that reports on development focus on health care sector as a target market, and they *do not even mention the social sector as a possible market*. Whereas there seem to be sufficient budgetary framework for large-scale infrastructural investments, the government withdraws budgetary resources from the social sector – for example by tightening the eligibility criteria for state support. (See the new point system of entitlement conditions). As a result, manufacturers – seeing that social sector is a poorer market – are right to orient themselves towards the application of the products in health care, even though MENTA for example could serve as a tool of just in time follow up of elderly people's health condition.

The financial conditions of care sector's technical supply is clearly shown in the fact that the average Hungarian retirement pension was 117.000 HUF ($383 \in$) in 2015; the monthly rental of a wrist worn emergency alarm is about 15 \in , while the rental of a bit more complicated alarm with inbuilt GPS tracker is already 15-20.000 HUF (50-80 \in) per month; not to mention that the health and care dispatch centres of the alarms – if they exist at all – are not integrated.

7 Conclusions

The primary assumptions were underlined by the Hungarian national report: the present offer of the Hungarian standard national vocational curricula is not able to give relevant answer to the demand generated by the demographic changes. While the consequences of the demographic changes challenge the social care system and the vocational education as well in Hungary, the VET teachers should be supported in order to prepare their students for using ICT tools in Ambient Assisted Living.

European Guide in Excellent innovation for ageing, <u>https://ec.europa.eu/research/innovation-union/pdf/active-healthy-ageing/rs_catalogue.pdf</u>



This project has been funded with support from the European Commission. This publication [communication] reflects the views only of the author, and the Commission cannot be held responsible for any use, which may be made of the information contained therein.

¹¹ Innovative and empowering strategies for care, UNECE Policy Brief on Ageing No. 15 February 2015 <u>http://www.unece.org/index.php?id=10575</u>



8 Bibliography, links

- The 2015 Ageing Report Economic and budgetary projections for the 28 EU Member States (2013-2060), European Commission Directorate -General for Economic and Financial Affairs, 2015.
- Long-term care in ageing societies Challenges and policy options, Towards Social Investment for Growth and Cohesion – including implementing the European Social Fund 2014-2020., Brussels, 20.2.2013 SWD (2013) 41 final.
 http://ec.europa.eu/economy/ finance/publications/european_economy/2015/pdf/ee3_eu

http://ec.europa.eu/economy_finance/publications/european_economy/2015/pdf/ee3_en. pdf (Accessed: 02/10/2017)

- EUROSTAT (2015): Az információs társadalomra vonatkozó statisztika háztartások és magánszemélyek <u>http://ec.europa.eu/eurostat/statistics-</u> explained/index.php/Information_society_statistics_-_households_and_individuals/hu
- 4. EUROSTAT (2015):Information society statistics households and individuals <u>http://ec.europa.eu/eurostat/statistics-</u> <u>explained/index.php/Digital_economy_and_society_statistics_-households_and_individuals</u>
- Computer use increasing among older persons in UNECE region, United Nations
 Economic Commission (UNECE), 2015
 <u>http://www.unece.org/info/media/news/statistics/2016/computer-use-increasing-among-older-persons-in-unece-region/doc.html</u>
- Innovative and empowering strategies for care, UNECE Policy Brief on Ageing No. 15 February 2015 http://www.unece.org/index.php?id=10575 (Last access:
- 6. Mapping of Effective Technology-based Services for Independent Living for Older People at Home, European Commission, Joint Research Centre, Institute for Prospective Technological Studies, 2015,

http://publications.jrc.ec.europa.eu/repository/bitstream/JRC91622/lfna27072enn.pdf

- Innovative and empowering strategies for care, UNECE Policy Brief on Ageing No. 15 February 2015 <u>http://www.unece.org/index.php?id=10575</u>
- 8. European Guide in Excellent innovation for ageing, https://ec.europa.eu/research/innovation-union/pdf/active-healthy-ageing/rs_catalogue.pdf
- EUROSTAT (2015): Az információs társadalomra vonatkozó statisztika háztartások és magánszemélyek http://ec.europa.eu/eurostat/statisticsexplained/index.php/Information_society_statistics_-_households_and_individuals/hu
- EUROSTAT (2015):Information society statistics housholds and individuals http://ec.europa.eu/eurostat/statisticsexplained/index.php/Digital_economy_and_society_statistics_-_households_and_individuals
- Krémer, Balázs (2013): Idős? Gondozás? Miről beszélünk? Esély, 2013/3 www.kulturaeskozosseg.hu/pdf/2013/3/2013_3_03.pdf (Elderly? Care? What are we talking about? in HU)





- 12. Lukács, Erika Ildikó (2016): Az Aktív Idősödés Indexe (AAI), mint az aktív idősödés előmozdításának egy hatékony eszköze (prezentáció, Aktív idősödés konferencia) http://www.demografia.hu/hu/letoltes/eloadasok/Megoregedni-ma-konferencia-2016/Lukacs.pdf (The promotion of active aging Index (AAI) as an effective tool for Active Ageing (presentation, conference Active Ageing, in HU)
- Széman, Zsuzsa (2013): Új utak az idősgondozásban: infokommunikációs tanítás fiatal önkéntesekkel, Kultúra és közösség, 2013/3 (A new pattern in long term care in Hungary: Skype and youth volunteers, in HU)
- 14. Széman, Zsuzsa. (2014). A new pattern in long term care in Hungary: Skype and youth volunteers. Anthropological Notebooks (SLOVENIA) 20(1):105-117.
- 15. Széman Zsuzsa (2015): A tartós idősgondozás alternatívái: technika, környezet (nemzetközi kitekintés) www.esely.org/.../2015-1_2-1_szeman_tartos_idosgondozas.pdf (The long-term elderly care alternatives: technology, environment (international perspective, in HU)
- 16. Széman, Zsuzsa. (2015). Transition of Long-Term Care in Hungary: Problems and Solutions. European Journal of Mental Health, 10(2): 245-255
- Szuhi, Attila (2014): Google gyarmat leszünk?- Internethasználat Magyarországon (Will we be Google colonies? - Internet usage in Hungary, in HU (ite.hu, 2014 08/18) http://ite.hu/google-gyarmat-leszunk-internethasznalat-magyarorszagon/
- 18. Summit (2016) : European Summit on Digital Innovation for Active and Healthy Aging http://ec.europa.eu/research/conferences/2016/aha-summit/index.cfm?pg=about
- Misuraca, G., Colombo, C., Kucsera,, Cs.,, Carretero S., Bacigalupo, M., Radescu, R. (2015): ICT-Enabled Social Innovation in support of the Implementation of the Social Investment Package (IESI), Mapping of Effective Technology-based Services for Independent Living for Older People at Home, European Commission, Joint Research Centre, Institute for Prospective Technological Studies

http://publications.jrc.ec.europa.eu/repository/bitstream/JRC91622/lfna27072enn.pdf



This project has been funded with support from the European Commission. This publication [communication] reflects the views only of the author, and the Commission cannot be held responsible for any use, which may be made of the information contained therein.

25 - 26



9 Project details

Title: GRANDIS XXI - 21st - Vocational Education for Interprofessional Elderly Care of the 21st century Identifier: 2016-1-HU01-KA202-123044 Program: Erasmus+ KA2: Cooperation for innovation and the exchange of good practices Countries: Hungary, United Kingdom, Ireland, France Duration: 1 September 2016 – 30 June 2018 Coordinator: Prompt-H Ltd. Contact: Mária Hartyányi. Email: maria.hartyanyi@prompt.hu

GRANDIS XXI. project aims to develop a practice oriented, competence based and modular syllabus and further training program for the vocational education ("Networked Elderly Caregiver") delivered trough attractive, motivating digital learning content for social caregivers. The course will develop the advanced digital skills of formal and informal social caregivers, to prepare them for effective use of the ICT-based telecare systems, like smart devices, and prepare them to apply web-based tools for communication, keeping contact through the Internet for supporting independent living of elderly people.

Target groups:

- students of vocational education,

- formal caregivers, care workers,
- informal caregivers (relatives, family carers),

- "young" elderly people in pension from related professions (e.g. teachers), who are open and active enough to work as informal caregivers in online communities.

Intellectual outcomes:

- Study on training needs of 21st Century Social Caregivers based on surveys in four countries
- Curriculum for "Networked Elderly Caregivers" aligned with the European and national standards (EQF, NQF, ECVET)
- Grandis XXI. course book and online learning content in five modules of "Networked Elderly Caregivers" course, delivered online and tested in four countries
- Networked Elderly Caregiver Certification for national and EU-level accreditation

Partners:

- Prompt-H Számítástechnikai Oktatási, Kereskedelmi és Szolgáltató Kft. -HU
- SZÁMALK-Szalézi Szakközépiskola HU
- Veszprémi SZC Öveges József Szakképző Iskolája és Kollégiuma HU
- Balatonalmádi Család- és Gyermekjóléti Központ és Szociális Szolgálat HU
- ASTON University UK
- ICS Skills IE
- GUIMEL FR
- Corvus Kft. HU



This project has been funded with support from the European Commission. This publication [communication] reflects the views only of the author, and the Commission cannot be held responsible for any use, which may be made of the information contained therein.

26 - 26