Education and knowledge











The Danish education system

The ordinary education system comprehends education ranging from oth grade to long-cycle higher education and Ph.D. degrees. The figure below gives a picture of how the education system is structured. The scale on the left side shows the minimum amount of years a student has been educated to complete the actual education level. It is also possible to see, the age of a student on a certain educational level - provided that the student has started in pre-school class as a 6-year old, has not had any breaks and has gone through the educational system at the normative time. The scale on the right side shows the different educations' placement in the international education nomenclature ISCED.

Beside the ordinary educational system, there is the educational system for adult. The educational system for adult is distinct from the ordinary system by consisting of short courses and part-time education. Typically this education system consists of isolated courses, which in some cases can be combined into a full qualification equivalent to the qualifications of the ordinary system.



¹ Higher preparatory examination. ² Higher commercial examination. ³ Higher technical examination.

⁴ International Standard Classification of Education

Population by status of education

Increase in the level of education

In 2013, 70 per cent of the 30-69-year-olds had completed education providing them with professional qualifications, defined as vocational or higher education aimed at specific types of jobs. The proportion was 64 per cent in 2003. There is an equal distribution between men than women who have completed education courses providing them with professional qualifications.

High frequency of vocational education

The highest level of qualifications among the 30-69 age group was most frequently a vocational education. 38 per cent had completed this type of education, while 32 per cent had completed a higher education in 2013. In 2003, 38 per cent of the 30-69-year-olds had completed a vocational education and 26 per cent had completed a higher education.

Among the remaining 30 per cent of the 30-69-year-olds of the population, 22 per cent had completed basic school education, 5 per cent general upper secondary education as the highest level of education, while there is no information for the last 3 per cent.

Regional differences

Regional differences are evident with regard to educational patterns within the Danish population in 2013. There is, however, a trend for the highest proportion completing education courses providing them with professional qualifications to be found around the large cities, with correspondingly lower proportions being evident in the provinces.

Over the recent decade, differences have been sharply evened out as many outlying districts have experienced a higher increase than the major urban areas. Large differences still exist within each region.



Sharp divisions in educational patterns between the sexes

Sharp distinctions were observed in the educational patterns for 30-69-year-old men and women with regard to both educational levels and fields. More men than women had completed vocational education or long-cycle higher education in 2013, whereas more women than men had completed medium-cycle higher education has become less pronounced during the last ten years, and since 2003 more women than men have finished a Master's degree.



www.statbank.dk/hfu1 and krhfu1

Among the vocational educations, there are major male-dominated disciplines such as iron and metal (e.g. mechanic, blacksmith), construction (e.g. carpenter and electrician), transport, agriculture (e.g. driver and farmer) and the graphic area (e.g. graphical). Commercial and office (e.g. assistant), engineering and industry (e.g. technical designer), pedagogy, service (e.g. hairdressing) and health (e.g. social and health care) is however dominated by women.

Most medium-cycle courses are dominated by either men or women

As far as medium-cycle education is concerned, three in ten disciplines were sharply dominated by men: These were technical (e.g. building technicians and engineers), transport (e.g. marine engineers and shipmasters) and public security education. However, three disciplines (pedagogy, the food sector, and the health sector) are dominated by women. Among the major courses are, for example, school teachers and trained nurses.

Long-cycle higher education is more mixed

As far as long-cycle higher education is concerned, particular two disciplines (technical and defense) were dominated by men, whereas the distribution between men and women were more equal in the following disciplines: agriculture, social studies, artistic studies, and medical studies (e.g. physicians).



www.statbank.dk/hfu1 and krhfu1

Full time education

Pre-school to 10th

Basic school forms the foundation of the Danish educational system. It begins with pre-school class and leads up to the voluntary 10th school year. In 2013, 710.400 pupils attended basic school. Of these, 66,100 had started in pre-school class, while 175,200 attended 8th to 10th grade, and among these, 27,300 attended continuation schools.

Higher number of students attending medium-cycle higher educations

In total 259.200 students are attending higher educations in 2013 – not including Ph.D.students. The largest part, 34 per cent, is attending the medium-cycle higher educations, followed by bachelor and long-cycle higher educations by 31 and 26 per cent respectively. The smaller part is accounted for by the students at short-cycle higher educations with 9 per cent of the attending students.

Typically, a short–cycle higher education can be taken at Business and Technology Academies and comprises educations such as estate agent, market economist and computer scientist. The medium-cycle higher educations are offered by University Colleges and comprises educations such as school teacher, social worker, nurse and pedagogue. Bachelor- and long-cycle higher educations are most often offered by the universities.

Increase in students in vocational educations

The number of students in vocational educations has increased by 5 per cent and by 33 per cent in higher educations from 2001 to 2013. In 2013 there were 130,500 students in vocational educations and 259,200 students in higher educations, such as policeman, nurse or doctor. Ph.D.-students are not included in this figure.





www.statbank.dk/u11 and u1107

Courses and adult education

Adult education at almost all levels of education

Outside the main educational system, there are a number of public-managed courses providing formal qualifications. Adult education courses covering almost all levels of education within the ordinary education system are available.

In the school year 2011-12, more than 1.2 million course participants completed their participation in public-managed adult or supplementary courses, and course participants at adult vocational training constituted 58 per cent of these. Course participants at general courses, i.e. 8th and 9th form and higher preparatory course, constituted 32 per cent, while course participants at further education constituted 10 per cent, respectively.

38 per cent of the course participants had vocational training as highest education completed, 29 per cent had basic school, 7 per cent had general upper secondary school, 9 per cent had unknown education stated, and 17 per cent had completed a higher education.

6 out of 10 of the course participants at general courses were women

52 per cent of the participants in public courses were women. The proportion of women at the general courses was 59 per cent, while the corresponding figure at the adult vocational training centres was a mere 46 per cent. At the higher education centres, 60 per cent were women.

Educational performance

Half of the students commence general upper secondary education immediately after leaving basic school

Of all students leaving school in 2011-12, 79 per cent had commenced further education after a period of three months. 59 per cent had chosen to attend general upper-secondary education or vocational education (general programmes of education at second level, second stage, hhx, htx), while 20 per cent opted for vocational education and training, e.g. carpenters, bricklayers or hairdressers.



Figure 6 Students three months after leaving basic school

www.statbank.dk/afgang11

44 per cent of the students leaving school in 1992-93 attended traditional general upper-secondary education or vocational general upper-secondary, while 17 per cent opted for vocational education and training within a period of three months after leaving basic school. In the period from 1992-93 to 2011-12 there has been an increase in the proportion of young people choosing an uppersecondary education, while relatively fewer young people choose a vocational education. The proportion of young people who are not enrolled in education three months after leaving primary school has increased marginally from 23 per cent to 24 per cent during the ten year period.

27 per cent of students who graduated from traditional general upper-secondary education in 2011-12 continued their education immediately after completing their general upper-secondary education. The corresponding proportion of graduates from 2001-02 was 19 per cent. The proportion of graduates from 2011-12 who continued their education immediately after graduating from vocational general upper-secondary education was 39 per cent.

84 per cent of the graduates from general upper-secondary education or vocational education in 2011-12 who had enrolled for further education three months after their graduation chose higher education.

Ten years after basic school half of the Danes have profess. qualifications

Ten years after leaving basic school in 2001-02, about 47 per cent had completed training providing them with professional qualifications. Of this group, 26 per cent had completed a vocational education course and 21 per cent had completed higher education, while 29 per cent were still studying. The educational remainder – young people who had not attended any educational institution or had completed an education course providing them with professional qualifications ten years after leaving basic school – accounted for 24 per cent of the year 2001-02.

Education has a significant effect on employment

In 2013 67 per cent of the age group 30-69 yers were employed, 3 per cent unemployed, 27 per cent outside the workforce and 2 per cent under education. Persons with professional qualifications have a higher employment rate than those without professional qualifications. Higher levels of education can lead to better employment.



Education in an international perspective

Level of education in Denmark above OECD average

In all OECD countries, an average of 32 per cent of the 25-64-year-olds had completed a higher education in 2011. At 34 per cent, Denmark was among OECD countries above average percentage. The three highest percentages were found in Canada, Japan, Israel, while Portugal, Italy and Turkey accounted for the lowest percentages.

Danes proceed through 18.1 years of education

Children that began primary education in Denmark in 2011 will proceed through an average of 18.1 years of full time education during their lifetime. Ireland, Iceland, Australia, New Zealand and Finland are topping the list with Denmark, all accounting for 18 years of education or more. Among countries lying around 15 years of education are Israel, Slovakia and Switzerland. The OECD average was 17.0 in 2011.



Figure 8 Persons having completed tertiary education in selected OECD countries. 2011

Source: OECD, Education at a glance 2013.

Research, development and innovation

The private sector contributes with two thirds of total R&D-expenditure

Research and development as well as innovation activities are important factors for the development of the competitiveness of the firms and, consequently, for economic growth in society. The creation of new knowledge and its subsequent use in the enterprises are important factors for the dynamics and innovation of the business sector by way of introducing new products and production processes.

R&D activities take place both in the private and the public sector. Total Danish R&D expenditure in the public and private sector has more than doubled in the period 1998-2012 and has been estimated at DKK 56 billion in 2012. The private sector's share of total R&D expenditure has been approximately two thirds during the period.



Figure 9 R&D expenditure of the public and private sector

Manufacturing has the highest R&D expenditure

R&D expenditure is particularly high in manufacturing and total expenditure on own R&D activities reached DKK 20.7 billion in 2012. This amount corresponds to 56 per cent of the private sector's expenditure on R&D.

The remainder of private sectors R&D expenditure is dominated by the industries business service, information and communication, and finance and insurance. Enterprises in business service accounted for R&D expenditure amounting to DKK 4.9 billion (13 per cent) in 2012. Information and communication (television and radio, telecommunication and ICT and information services etc.) accounted for 4.7 DKK billion (13 per cent) and finance and insurance for DKK 4.1 billion or 11 per cent.



Figure 10 Percentage of innovative enterprises by industry. 2010-2012

46 per cent of all enterprises are innovative

The greater majority of Danish enterprises do not carry out research and development activities. Instead, they attempt to increase their competitiveness by introducing new products and production processes, or by introducing new organisational methods or marketing initiatives, i.e. innovation. 46 per cent of the Danish enterprises have introduced innovations during the period 2010-2012.

Innovative enterprises are found primarily among businesses in information and communication where 57 per cent innovated during 2010-2012.

The innovation activities of Danish enterprises are characterized by large industrial variation. Enterprises in information and communication have more innovation in products than in processes, whereas enterprises in construction to a larger degree introduce new production processes.

Enterprises in manufacturing industry have almost the same frequency in product and process innovation (23 per cent and 22 per cent respectively). Total innovation expenditure amounted to DKK 45.9 billion in 2012, of which DKK 37.1 billion was used for own R&D. In addition Danish enterprises purchase of R&D-services amounted to DKK 17.6 billion in 2012.

Information society

About the information society

An analysis of the information society can be made partly via the supply side in the form of enterprises and employment in the ICT sector and partly via the demand side in the form of the use of information technology by enterprises, the public sector and by individuals.

The ICT sector

The ICT sector comprises enterprises that produce products and services within electronics, ICT, computer software, telecommunications, and other areas primarily based on information technologies. The ICT sector can be divided into ICT manufacturing, ICT wholesale, telecommunications, and ICT consultancy services.

Fall in employment in ICT manufacturing

In 2011, the Danish ICT sector employed a total of 82,870 full-time employees, which is minor decrease of 4 per cent compared to 2007. However, there was a fall in ICT manufacturing of 42 per cent and an increase of 5 per cent In ICT services, consultants, etc. Out of total employment in ICT manufacturing, 59 per cent was employed in ICT services, 19 per cent in telecommunications, 16 per cent in ICT wholesale and 6 per cent in ICT manufacturing.



Figure 11 Full-time employees in the ICT sector

Use of ICT by enterprises

At the beginning of 2013, nearly all enterprises had access to the Internet and almost nine out of ten enterprises had their own website. Nine out of ten enterprises also had a broadband connection to the Internet (i.e. ADSL or another wire-based connection).



Figure 12 Use of ICT by enterprises. 2013

Note: Broadband connection, connection faster than analog modem or ISDN

Danes own more and more ICT goods

An increasing number of Danish families have personal computers, access to the Internet and mobile phones. Since 2000, penetration of mobile phones has passed penetration of PC's. In 2013, 98 per cent of Danish families had a mobile phone, compared to 68 per cent in 2000. In 2013, 93 per cent of families had access to a computer at home, compared to 60 per cent in 1999.

Figure 13 Families' access to ICT goods



Note: 1 January. www.statbank.dk/varforbr

Almost all Danes have now access to the Internet from their home

In 2013, 80 per cent of the population accessed the Internet daily or almost daily. However, there are great differences among the age groups. While almost all 16-54-year olds access the Internet every day, only 75 per cent of persons aged 55-64 and 57 per cent of persons aged 65-74 go online every day. The proportion of 75-89-year olds, who access the Internet daily, is as low as 29 per cent

Use of Internet via a mobile phone is most common among young people 44 per cent of the population accessed the Internet daily via a mobile phone. But there are also great differences among the age groups here, as the use of Internet via a mobile phone is most common among young people. A little over 70 per cent of all 16-34-year olds accesses the Internet via a mobile phone daily, while it is only 28 per cent of the 55-64-year olds and 11 per cent of those aged 65-74 years.





www.statbank.dk/bebrit03

Electronic case and document management

During recent years public authorities are to an increasing extent making use of electronic case and document management. In 2011, 83 per cent of the public authorities used a system for electronic case management, while this was true of 76 per cent of the public authorities in 2010. Among all public authorities 52 per cent stated that at least every second case is managed without the involvement of papers – this an increase from 40 per cent in 2010. The introduction of electronic case management does not imply that all cases are managed in a paperless way.





Note: Electronic case management is a system underpinning the case history between caseworkers

Table 136

Educational institutions. 2013

	Number of institutions	Students		Total
		Men	Women	
Total	2 844	624 365	631 395	1 255 760
General schools	2 571	408 768	410 074	818 842
Basic schools, public	1 589	297 443	276 876	574 319
Basic schools, private	557	53 422	54 879	108 301
Continuation schools	251	13 742	13 534	27 276
Upper-secondary schools	174	44 161	64 785	108 946
Vocational institutions of education	273	215 597	221 321	436 918
Social and Health schools	45	5 899	33 323	39 222
Schools of Teacher training and Education science	24	9 963	23 329	33 292
Transport and Navigation schools	9	721	85	806
Institutions of education within Police and Defence	6	1 155	234	1 389
Academies of Fine art and Music, Library schools etc.	28	2 641	3 325	5 966
Institutions of education within Agriculture and Food science	14	2 984	1 074	4 058
Colleges of Social work	6	1 382	4 083	5 465
Engineering colleges and schools of Architecture	9	5 073	1 858	6 931
Universities	8	76 088	84 082	160 170
University colleges	7	4 626	5 597	10 223
Business academies	9	15 301	10 995	26 296
Other vocational institutions of education	108	89 764	53 336	143 100

Note: The number of institutions is the legal entities.

Table 137	Students in the edu	cational systen	n. 2013		
1.10.2012 -30.09.2013	Students 2012	Entrance	Graduates ¹	Did not complete education	Students 2013
Total	1 249 410	397 284	223 894	164 179	1 254 691
Basic school/preparatory	720 676	166 242	85 933	83 632	715 942
General upper-secondary education	146 858	60 196	45 346	10 626	149 047
Vocational education and training	135 759	72 712	33 907	36 227	130 462
Short-cycle higher education	23 182	13 133	7 857	11 321	24 528
Medium-cycle higher education	83 037	29 894	17 732	7 830	87 369
Bachelor	77 016	29 921	16 577	9 695	80 665
Long-cycle higher education	62 882	25 186	16 542	4 848	66 678
Men, total	621 280	198 063	106 319	85 752	624 937
Basic school/preparatory	370 444	84 861	43 646	42 493	368 309
General upper-secondary education	69 021	28 602	20 979	5 040	70 086
Vocational education and training	75 390	39 728	16 823	21 574	72 955
Short-cycle higher education	12 739	7 263	4 263	6 145	13 399
Medium-cycle higher education	30 528	12 090	6 171	3 531	32 917
Bachelor	36 142	14 375	7 210	4 933	38 374
Long-cycle higher education	27 016	11 144	7 227	2 036	28 897
Women, total	628 130	199 221	117 575	78 427	629 754
Basic school/preparatory	350 232	81 381	42 287	41 139	347 633
General upper-secondary education	77 837	31 594	24 367	5 586	78 961
Vocational education and training	60 369	32 984	17 084	14 653	57 507
Short-cycle higher education	10 443	5 870	3 594	5 176	11 129
Medium-cycle higher education	52 509	17 804	11 561	4 299	54 452
Bachelor	40 874	15 546	9 367	4 762	42 291
Long-cycle higher education	35 866	14 042	9 315	2 812	37 781

¹ Entrance of pupils to basic school comprises entrance of pupils to 0st to 6th class and to 7th and 10th class.² Ph.D. is not included in the table.

www.statbank.dk/u1107, u2107, u3107 and u4107

Table 138	Students by national origin. 2013										
	Basic school/ preparatory	General upper- secondary school	Vocational education and training	Short- cycle higher education	Medium- cycle higher education	Bachelor	Long-cycle higher education/ ph.d	Total			
				— per cent —							
Men and women, total	57	12	10	2	7	6	5	1 254 691			
Of whom: immigrants and descendants Western countries Non western countries	52 32 58	10 6 12	10 9 11	4 8 2	8 13 7	7 10 6	9 22 4	143 406 33 866 109 534			
Men, total	59	11	12	2	5	6	5	624 937			
Of whom: immigrants and descendants Western countries Non western countries	55 36 61	10 6 11	10 9 10	4 8 3	7 13 6	6 8 5	8 20 4	69 069 15 442 53 625			
Women, total	55	13	9	2	9	7	6	629 754			
Of whom: immigrants and descendants Western countries Non western countries	49 29 55	11 6 12	11 8 12	4 8 2	10 14 8	7 11 6	10 24 5	74 337 18 424 55 909			

www.statbank.dk/u13

Table 139	Students enrolled in general education										
	Entrance of students 01.10.12–30.09.13		Graduates 01.10.12–30.09.13		Disrupted educations		Students 01.10.13 ¹				
	Men	Women	Men	Women	Men	Women	Men	Women			
Total	113 303	112 969	64 625	66 654	53 630	52 772	438 243	426 589			
Pre-school class	•	•	•	•	•	•	•	•			
Basic school/preparatory	84 861	81 381	43 646	42 287	43 352	41 691	368 309	347 633			
Upper-secondary school	13 712	20 506	10 046	15 867	2 644	3 335	36 365	54 955			
Higher preparatory examination	4207	5276	2 738	3 765	1 412	1 540	7 482	9 408			
Adult upper secondary school	166	294	113	153	108	120	279	440			
Entrance course to higher education	29	126	24	108	17	39	31	130			
Higher commercial examination	5 504	3 940	4 366	3 372	1 084	772	15 020	10 632			
Higher technical examination	3 744	1 255	2 929	962	832	241	9 931	3 280			
Entrance examination to engineers	1 080	191	763	140	336	51	826	111			

¹ The newest number of students is equal to the old number of students plus the entrance of students minus those who either graduates or leaves without examination.

www.statbank.dk/u1107, u2107 and u3107

 Table 140
 Students in upper-secondary education. 2013

 Completed educations
 Average mark

 Men
 Women
 Total
 Men
 Women

 Total
 20 979
 24 367
 45 346
 •
 •

 Total
 20 979
 24 367
 45 346
 •
 •

Total	20 979	24 367	45 346	•	٠	•
Upper-secondary school	10 046	15 867	25 913	6.8	7.1	7.0
Higher preparatory examination	2 738	3 765	6 503	6.3	6.1	6.2
Adult upper-secondary school	113	153	266	6.9	6.7	6.8
Entrance course to higher education	24	108	132	•	•	•
Higher commercial examination	4 366	3 372	7 738	6.0	6.3	6.2
Higher technical examination	2 929	962	3 891	6.4	7.0	6.6
Entrance examination to engineers	763	140	903	•	•	•

www.statbank.dk/u3107

Total

Table 141	Students in higher education - correction									
	Entrance of 01.10.12–3	students 0.09.13	Gradua 01.10.12–30	tes 0.09.13	Disrupt educatio	ed ons	Studen 01.10.	ts ¹ 13		
	Men	Women	Men	Women	Men	Women	Men	Women		
Total Short-cycle higher education Educational	46 135 7 263 2	54 457 5 870 29	25 732 4 263 0	34 592 3 594 13	12 967 2 340 2	13 615 1 590 9	118 471 13 399 7	150 478 11 129 93		
Communication and applied language The artistic Social sciences Technical	971 13 4 114 1 526	731 21 3 137 1 335	545 4 2 065 926	381 6 1 869 817	287 4 1 381 549	212 12 883 337	1 687 52 7 575 2 721	1 272 71 5 695 2 624		
Agriculture and fishing Transport, etc. Health care Public security	131 190 35 196	131 77 227 64	108 108 26 437	96 43 196 104	31 53 9 8	48 20 47 5	226 315 75 582	190 239 137 610 198		
Medium-cycle higher education Educational Communication and applied	12 090 2 958	17 804 5 806	6 171 1 430	11 561 4 336	3 531 1 111	4 299 1 608	32 917 9 673	54 452 20 774		
language The artistic Natural sciences Social sciences Technical	316 147 452 1 874 4 162	515 597 87 3 433 1 320	153 109 249 847 2 125	137 376 70 1 676 684	65 12 105 402 1 243	134 48 20 642 329	1 043 365 631 3 848 11 497	1 214 1 220 129 8 358 3 232		
Food industry and home economics Agriculture and fishing Transport, etc. Health care	124 32 939 987	600 37 51 5 344	51 506 514	385 17 10 3 858	44 12 229 290	156 11 14 1 335	338 62 2 407 2 772	1 966 104 136 17 292		
Public security Bachelor The humanities The artistic Natural sciences Social sciences	99 14 375 3 131 232 2 744 5 275 2 078	14 15 546 5 353 274 1 711 5 382 937	185 7 210 1 346 184 1 108 3 046 916	12 9 367 2 907 253 845 3 479 491	18 4 933 1 370 33 1 048 1 748 534	2 4 762 2 019 41 625 1 464 233	281 38 374 8 446 676 7 417 13 953 5 145	27 42 291 14 385 799 4 597 14 306 2 468		
Food industry and home economics Agriculture and fishing Health care	2 078 29 95 791	937 83 308 1 498	910 9 47 554	491 43 194 1 155	10 27 163	233 30 59 291	5 145 86 273 2 378	2 400 218 925 4 593		
Long-cycle higher education The humanities The artistic Natural sciences Social sciences Social sciences The humanities Technical Food industry and home economics Agriculture and fishing Health care Public security	11 144 217 1 758 181 1 633 4 238 2 216 42 127 683 49	14 042 809 3 598 267 1 358 4 917 1 052 119 328 1 593	7 227 92 1 115 165 1 004 2 777 1 456 19 78 441 80	9 315 438 2 300 214 822 3 525 649 81 237 1 039 10	2 036 287 420 40 212 746 292 2 8 28 28 1	2 812 808 803 46 143 785 142 5 11 69 0	28 897 805 4 534 514 3 967 11 793 4 855 89 416 1 851 73	37 781 2 904 9 490 700 3 144 13 708 2 324 342 974 4 194		
PhD-Degree The humanities and theology The artistic Natural sciences Social sciences Technical Food industry and home economics Health care	1 263 90 28 301 156 419 29 240	1 195 96 14 230 196 184 42 433	861 63 18 183 88 292 47 170	755 68 24 119 87 123 90 244	127 24 0 19 24 39 3 18	152 39 4 16 35 23 4 31	4 884 398 70 1 067 585 1 446 302 1 016	4 825 522 76 702 685 673 484 1 683		

¹ The newest number of students is equal to the old number of students plus the entrance of students minus those who either graduates or leaves without examination.

www.statbank.dk/u13, u23 and u33

Table 142

Participants in courses of adult and supplementary education. 2011/2012

				Highest com	pleted level o	of education			
Public courses	Basic school	General upper secondary education	Vocational education and training	Short- cycle higher education	Medium- cycle higher education	Bachelor	Long- cycle higher education	Not stated	Total
Total ¹	353 866	89 400	468 076	52 445	99 876	12 733	39 866	105 365	1 221 627
Participants in general and									
preparatory courses	179 172	36 710	54 552	5 695	14 592	3 527	9 473	83 572	387 293
Basic school	109 861	8 098	28 457	2 221	3 816	1 124	2 064	48 784	204 425
Of which: General adult education Danish lessons by language	107 504	7 341	27 452	1 828	3 337	847	1 590	17 816	167 715
centres	2 357	757	1 005	393	479	277	474	30 968	36 710
Preparatory education Of which: General and vocational	9 114	6 032	8 755	2 343	9 081	1 912	6 751	32 285	76 273
courses Danish lessons by language	8 647	5 703	8 304	1 431	8 278	591	3 779	4 108	40 841
centres	467	329	451	912	803	1 321	2 972	28 177	35 432
Upper secondary education	60 166	22 528	17 288	1 125	1 691	491	655	2 499	106 443
Of which: Higher prep. courses Entrance courses to	59 525	8 166	16 512	730	1 242	236	544	1 874	88 829
long-cycle higher education	641	14 362	776	395	449	255	111	625	17 614
Vocational education at second level	31	52	52	6	4	0	3	4	152
Participants in vocational courses	174 694	52 690	413 524	46 750	85 284	9 206	30 393	21 793	834 334
Vocational training and main courses Supplementary education of semi-skilled	2 542	1 361	4 919	793	9 502	612	1 764	333	21 826
and skilled manual workers	167 702	39 991	384 975	33 510	29 605	4 321	8 300	18 131	686 535
Of which: Manufact. and metal produc. Distributive trade, administration, communication and	25 568	4 545	61 502	4 196	2 604	414	977	3 467	103 273
management	44 138	19 875	125 283	15 638	13 732	2 639	4 878	3 576	229 759
Service sector	15 672	2 747	16 193	1 216	1 364	221	336	2 691	40 440
Construction, manufacturing Dairy industry and	13 699	1 424	27 244	1 187	936	81	248	1 303	46 122
agriculture Kitchens, hotels, restaurants, baker's shops and	5 863	582	14 782	784	471	74	199	552	23 307
meat industry	6 243	1 407	9 034	644	1 152	120	179	1 070	19 849
Transport sector Educational, social and	31 127	4 910	38 597	5 319	1 852	258	553	3 301	85 917
health services	10 292	1 713	59 382	1 296	5 225	219	373	620	79 120
Other courses	15 100	2 788	32 958	3 230	2 269	295	557	1 551	58 748
Short-cycle higher education	2 149	3 149	11 255	4 144	3 351	718	2 642	433	27 841
Medium-cycle higher education	2 095	6 753	11 621	7 416	36 561	2 143	9 641	901	77 131
Bachelor	26	407	58	151	312	307	432	447	2 140
Long-cycle higher education	180	1 029	696	736	5 953	1 105	7 614	1 548	18 861

¹ Includes only courses which are publicly financed and supervised.

www.statbank.dk/veugeo1

Educational level three years after leaving basic school. 2012

	Year of leaving school							
	2002	2003	2004	2005	2006	2007	2008	2009
Graduation class, total	56 679	59 597	61 204	64 701	68 051	67 056	69 602	69 615
Total number receiving education three years								
after	22 390	23 349	23 124	24 243	27 690	28 817	30 185	29 575
Preparatory education	78	84	120	173	369	370	504	600
General upper secondary school	2 784	2 789	2 486	3 270	4 040	3 909	4 160	4 209
Vocational upper secondary school	1 903	1 913	1 708	1 850	2 119	1 820	1 980	1 979
Vocational basic education	2 929	3 006	2 711	2 738	3 628	4 042	4 180	3 498
Vocational education	10 928	11 440	11 281	11 826	12 424	12 631	12 195	11 540
Short-cycle higher education	629	600	683	648	813	911	1 022	1 085
Medium-cycle higher education	1 062	1 136	1 300	1 292	1 636	1 957	2 163	2 320
Bachelor	2 071	2 373	2 832	2 441	2 657	3 172	3 978	4 340
Long-cycle higher education	6	8	3	5	4	5	3	4

www.statbank.dk/afgang11

Table 144Educational level three years after leaving general upper sec. education.
2012

	Year of leaving school							
	2002	2003	2004	2005	2006	2007	2008	2009
Graduation class, total	20 331	19 475	19 993	20 846	22 467	22 696	23 466	25 643
Total number receiving education	15 546	14 980	15 509	16 209	17 453	18 183	19 438	21 481
Preparatory education	11	9	8	4	8	10	5	8
General upper secondary school	•	•	•	•	•	1	4	7
Vocational upper secondary school	15	9	12	10	15	10	7	7
Vocational basic education	331	273	248	190	240	201	238	272
Vocational education	1 202	1 063	1 065	1 100	997	869	798	921
Short-cycle higher education	824	805	784	785	980	964	943	1 034
Medium-cycle higher education	5 397	5 008	5 202	5 468	5 945	6 317	6 741	7 547
Bachelor	6 630	7 073	7 635	8 063	8 571	8 904	9 967	10 902
Long-cycle higher education	1 136	740	555	589	694	907	735	783

www.statbank.dk/afgang21

Table 143

Table 145	Highest general ed	Highest general education completed by population. 2013									
Age on 1 January 2013	1 -6 grade or unknown	7 -10 grade	Upper- secondary school, higher preparatory examination, adult upper-secondary school	Higher commercial education, higher tech. education, and entrance examination for technical colleges	Total						
Total	238 653	2 444 753	963 579	330 281	3 977 266						
15 -24 years 25 -29 years 30 -39 years 40 -49 years 50 -59 years 60 -69 years	37 750 45 338 59 623 40 992 37 731 17 219	485 648 128 475 308 158 458 872 494 109 569 491	142 510 102 115 222 312 228 371 168 314 99 957	51 941 46 294 109 941 87 659 27 597 6 849	717 849 322 222 700 034 815 894 727 751 693 516						
Men	120 844	1 313 102	393 679	171 617	1 999 242						
15 -24 years 25 -29 years 30 -39 years 40 -49 years 50 -59 years 60 -69 years	17 869 22 075 30 717 21 446 20 736 8 001	265 142 78 066 183 439 257 393 252 714 276 348	53 364 37 643 82 408 92 341 75 325 52 598	30 492 24 963 54 253 40 856 16 022 5 031	366 867 162 747 350 817 412 036 364 797 341 978						
Women	117 809	1 131 651	569 900	158 664	1 978 024						
15 -24 years 25 -29 years 30 -39 years 40 -49 years 50 -59 years 60 -69 years	19 881 23 263 28 906 19 546 16 995 9 218	220 506 50 409 124 719 201 479 241 395 293 143	89 146 64 472 139 904 136 030 92 989 47 359	21 449 21 331 55 688 46 803 11 575 1 818	350 982 159 475 349 217 403 858 362 954 351 538						

www.statbank.dk/krhfu1

Table 146	Highest education completed analysed by age and sex. 2013									
Age on 1 Jan. 2013	Basic school G or not known	eneral upper- secondary education	Vocational education and training	Short-cycle higher education	Medium-cycle higher education	Bachelor	Long-cycle higher education/ ph.d.	Unknown	Total	
				per	cent					
Total	21.9	4.8	38.1	5.2	16.0	1.4	9.3	3.3	2 937 195	
30 -39 years 40 -49 years 50 -59 years 60 -69 years	15.2 18.5 25.4 29.0	6.2 5.9 4.4 2.5	33.1 39.5 38.1 41.3	6.2 6.0 4.8 3.8	16.4 15.6 16.6 15.4	2.7 1.8 0.8 0.4	14.0 9.9 7.3 6.1	6.3 2.8 2.6 1.5	700 034 815 894 727 751 693 516	
30 -39 years 40 -49 years 50 -59 years 60 -69 years	17.5 20.7 24.2 25.1	6.4 5.6 4.7 2.9	36.6 41.4 42.5 45.0	6.9 7.0 5.4 4.4	10.1 10.6 10.8 12.4	2.4 1.3 0.8 0.5	13.3 10.2 8.6 8.2	6.9 3.2 3.0 1.6	350 817 412 036 364 797 341 978	
Women	22.0	4.6	34.8	4.5	21.0	1.6	8.6	2.9	1 467 567	
30 -39 years 40 -49 years 50 -59 years 60 -69 years	12.9 16.2 26.6 32.9	6.0 6.3 4.0 2.0	29.6 37.6 33.7 37.8	5.5 4.9 4.2 3.3	22.7 20.7 22.5 18.2	2.9 2.3 0.8 0.4	14.7 9.6 6.1 4.0	5.7 2.4 2.1 1.5	349 217 403 858 362 954 351 538	

www.statbank.dk/krhfu1

Table 147Highest education completed analysed by region. 2013									
30-69 year-olds	Basic school or not	General upper-	Vocational education	Short-cycle N higher	ledium-cycle higher	Bachelor	Long-cycle hiaher	Unknown	Total
Place of residence on 1 Jan. 2013	known	secondary education	and training	education	education		education/ ph.d.		
Denmark, total	643 173	140 982	1 117 990	153 260	469 133	42 337	273 938	96 382	2 937 195
Region Hovedstaden	162 756	61 181	277 102	47 496	147 618	20 908	145 544	40 299	902 904
København	49 045	23 204	63 850	13 102	45 305	9 893	57 452	18 829	280 680
Frederiksberg	6 397	4 244	11 054	2 600	9 162	1 870	14 147	2 754	52 228
Region Sjælland	107 845	17 610	191 527	23 090	66 694	3 937	24 836	10 673	446 212
Region Syddanmark	152 475	23 386	261 165	32 645	101 792	6 614	33 919	18 629	630 625
Region Midtivlland	143 584	28 529	260 469	35 989	107 666	8 112	52 021	18 287	654 657
Region Nordjylland	76 513	10 276	127 727	14 040	45 363	2 766	17 618	8 4 9 4	302 797

www.statbank.dk/krhfu1

Table 148Highest completed education, by labour market. 2013					
30-69 year-olds	Students	N	Total		
		Employed	Unem- ployed	Not in the labour force	
Total	66 798	1 980 505	96 505	793 387	2 937 195
Basic school/not known General upper-secondary education Vocational education and training Higher education	13 318 9 391 17 610 26 479	352 843 95 778 786 372 745 512	30 973 5 676 36 187 23 669	342 420 30 137 277 821 143 009	739 554 140 982 1 117 990 938 669
Men	26 609	1 041 339	51 251	350 429	1 469 628
Basic school/not known General upper-secondary education Vocational education and training Higher education	5 488 4 242 6 774 10 105	206 368 51 135 447 410 336 426	17 937 3 043 19 874 10 397	144 699 14 337 133 831 57 562	374 492 72 757 607 889 414 490
Women	40 189	939 166	45 254	442 958	1 467 567
Basic school/not known General upper-secondary education Vocational education and training Higher education	7 830 5 149 10 836 16 374	146 475 44 643 338 962 409 086	13 036 2 633 16 313 13 272	197 721 15 800 143 990 85 447	365 062 68 225 510 101 524 179

www.statbank.dk/krhfu2

Table 149	Expenses for Research & Development (R&D)					
	2007	2008	2009	2010	2011	2012*
			— DKK mio. in 2012	-prices		
Total R&D expenses	45 562	52 744	56 502	54 407	55 609	56 430
The public sector	14 410	15 900	17 073	17 934	18 505	19 377
The private sector	31 152	36 844	39 430	36 473	37 104	37 053
	DKK mio. in current prices					
Total R&D expenses	40 433	48 787	52 611	52 826	54 383	56 430
The public sector	12 788	14 707	15 897	17 413	18 097	19 377
The private sector	27 645	34 080	36 714	35 413	36 286	37 053
per cent						
R&D-expenses in per cent of GDP	2.39	2.78	3.16	3.00	3.04	3.09
The public sector	0.75	0.84	0.95	0.99	1.01	1.06
The private sector	1.63	1.94	2.21	2.01	2.03	2.03

www.dst.dk/fui

Table 150	The ICT sector in Deni	The ICT sector in Denmark. 2011					
		Enter- prises	Full-time employees	Turn- over	Wages and salaries		
				DKK mic			
	ICT industries, total	12 397	82 870	192 148	47 488		
	ICT manufacturing	294	5 314	9 842	2 330		
	ICT wholesale trade	1 068	13 190	54 585	7 691		
	Telecommunications	373	15 881	47 672	7 057		
	ICT services industries	10 662	48 485	80 048	30 410		

Note: The figures cannot be compared with previous publications due to shift to new industry classification.

www.statbank.dk/iterhv

Table 151	Enterprises' use of ICT. 2013		
	Internet access	Own web site	Broadband connection to the internet ²
		per cent	
All enterprises ¹	99	92	97
Sectors Manufacturing Construction Trade and transport etc. Information and communication Business service and finance	99 100 99 100 99	94 95 87 96 96	97 97 97 99 98
Fuldtidsansatte 10-19 employees 20-49 employees 50-99 employees 100 employees +	99 99 99 100	90 94 94 96	96 98 99 99

¹ All enterprises with at least 10 employees. ² All connections faster than than analogue modem or ISDN. Inclusive mobile broadband.

www.statbank.dk/vita and www.dst.dk/vita1

Table 152	Goods and services purchased on the Internet. 2012							
	16-24 years	25-34 years	35-44 years	45-54 years	55-64 years	65-74 years	75-89 years	Total
		per cent of age group						
Total	88	89	86	81	69	47	17	72
Tickets for events	60	63	65	51	38	25	7	47
Other tavel arrangements	44	59	59	54	44	29	8	46
Holiday accommodation	30	49	57	51	42	26	7	41
Clothes, sports goods	60	57	56	39	24	13	3	39
Household goods (e.g. furniture,								
toys, etc)	24	45	50	33	25	16	5	31
Internet, television, phone subscription	34	43	42	32	26	17	3	30
Music, movies	37	44	38	28	19	9	2	27
Other computer software	24	31	33	25	23	15	5	24
Books, magazines, newspapers	27	33	29	23	15	8	2	21
Electronic equipment	28	34	33	26	22	14	4	24
Video games software	29	26	31	18	5	3	1	17
Computer hardware	20	25	26	19	12	7	2	17
Share purchases, financial services								
or insurances	16	20	16	14	10	7	3	13
Food or groceries	8	19	17	12	9	5	1	11
Medicine	12	8	9	5	4	1	0	6
E-learning material	3	6	5	8	11	8	3	7

www.statbank.dk/bebrit08

Table 153	Access to computer and internet in the home							
	2009	2010	2011	2012	2013			
		per cent of households						
Computer access from home								
Total	86	88	90	92	95			
Single adult without children	80	82	84	84	87			
Couple without children	87	90	93	94	98			
Single adult with children	93	96	94	97	96			
Couple with children	98	98	98	99	99			
Internet access from home								
Total	83	86	90	92	94			
Single adult without children	74	79	84	83	87			
Couple without children	84	88	93	93	97			
Single adult with children	91	95	91	99	96			
Couple with children	97	97	99	99	99			

www.statbank.dk/fabrit01

Table 154	Internet and telephony					
	2010	2011	2012	2013		
Subscriber line, fixed network (1.000) ^{1,2}	2 311	2 212	2 088	1 930		
Per 100 inhabitants ¹	41.7	39.7	37.4	34.4		
Mobile subscriptions ^{1,3} (1.000)	7 655	7 907	8 284	8 220		
Per 100 inhabitants ^{1,3}	138.1	142	148.3	146.6		
Internet subscriptions ¹ (1.000)	2 114	2 147	2 181	2 263		
Per 100 inhabitants ¹	38.1	38.6	39.6	40.3		
xDSL subscriptions ¹ (1.000)	1 240	1 221	1 200	1 178		
Cable modem subscriptions ¹ (1.000)	554	563	593	636		
Fibre subscriptions ¹ (1.000)	149	187	245	295		
Mobile broadband subscriptions ⁴ (1.000)	3 060	4 258	5 085	5 732		
Dedicated data subscriptions ¹ (1.000)	740	854	980	1 038		
		mio. minutes —				
Domestic traffic, fixed network ⁵	6 381	5 685	4 934	4 203		
International traffic, fixed network ⁵	434	419	439	421		
Domestic traffic, mobile network	10 249	11 086	11 433	11 556		
International traffic, mobile network	513	682	727	730		
		mio				
SMS sent	13 205	12 179	11 781	10 527		
MMS sent	75	97	119	172		
	mio. MB in period					
Mobile data traffic	10 888	19 808	34 034	54 396		
	DKK mio					
Revenues	40 601	39 466	37 255			
¹ Figures are updated for the first six months	of the year ² Including fixed network IP telepho	ony subscriptions So	urce: www.itst.dk/statistik/Telesta	atistik/halvarsstatistik		

¹ Figures are updated for the first six months of the year. ² Including fixed network IP telephony subscriptions ³ Include GSM-, UMTS-, CDMA2000-subscriptions, mobile broadband and active GSM- og UMTS-prepaid cards. A prepaid card is active, if there within the last three months was incoming or outgoing traffic or reloads of the prepaid card.⁴ Cover the following subscriptions with a marketed/theoretical downstream capacity of a minimum of 256 kbit/s: Standard mobile subscriptions used for Internet data traffic, supplementary data subscriptions for mobile subscriptions and dedicated data subscriptions.⁵ Including traffic from fixed network IP telephony.