



NORWEGIAN MINISTRY  
OF EDUCATION AND RESEARCH

Summary of Report No. 16 (2006-2007) to the Storting

# Early Intervention for Lifelong Learning



## **Summary of Report No. 16 (2006-2007) to the Storting, the Norwegian Government's white paper on early intervention for lifelong learning**

### **Chapter 1 A knowledge society for all**

The Government will pursue an active policy to reduce the differences in society. Its goals are to diminish class distinctions, reduce economic inequity and combat poverty and other forms of marginalisation. Society must develop in a way in which power, benefits and obligations are distributed in the fairest possible way.

Everyone must have the same possibility of developing themselves and their abilities. A society characterised by community and equal worth provides the best setting for individuals to pursue their own life projects. Societies with small economic and social differences are also among the most productive in an economic sense.

Education systems are affected by changes in other areas of society and actors at all levels of the education system must use their knowhow to develop a proactive approach to developments in society. When social inequality increases, efforts to combat the differences must be intensified in the education system. This white paper presents the Government's policy for how the education system can make a greater contribution to social equalisation.

Education, knowledge and skills contribute to inclusion in the workplace, to better economy and better health, to greater participation in society and to a lower crime level. Furthermore, participation in training and education has great significance for self-realisation. Including each individual in a learning environment that stimulates life-long learning is an important contribution to creating a good life.

#### **The need to level out social inequality**

There are social differences in participation in and learning outcome from the education system in all countries. None of them has succeeded in wiping out these differences completely. International comparisons show however that there are a number of countries which have been more successful than Norway in achieving social equalisation in their education systems. This shows that there is room for improvement in our system.

The disparities in the knowledge and skills that children, pupils, students and adults acquire through the education system, and thus also in the opportunities that are open to them later in the social and labour market, are too great. Failure to acquire basic skills in primary and lower secondary school increases, for example, the probability of dropping out of upper secondary school. The differences are closely linked with family background, that is to say with the parents' level of education and income, or whether the pupil or student comes from a majority or minority background. There will always be individual variations in learning achievement and participation. The Government has two objectives. One is to increase the current number of people who achieve their goals and the other is to ensure that the education system does not reproduce or reinforce social differences. Social equalisation means making the probability of succeeding in the education system less dependent on family background.

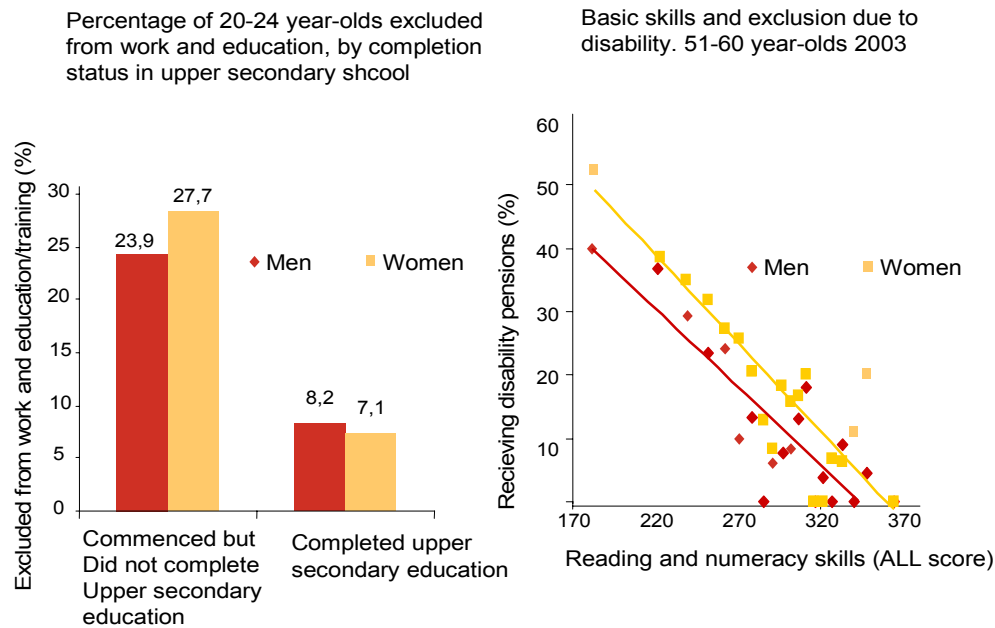


Figure 1 Correlation between education/skills and exclusion from upper secondary school and work

Today, older members of the population have a lower level of education than younger members, and most people over a certain age whose highest level of education is lower secondary school have managed well in the workplace and in their private lives. However, there has been a tremendous change over the last few decades in the demand for qualifications. Around 700,000 people of working age are now receiving benefits from the national insurance scheme. Many of the people who meet problems in the labour market do not have adequate basic reading, writing, arithmetic and ICT skills.

Statistics from Statistics Norway show that the probability of being excluded from higher education and the workplace even as a young adult is many times greater without an upper secondary education (Figure 1). Of young adults between 20 and 24 years of age who commenced but did not complete upper secondary education, about 24 per cent of the men and 28 per cent of the women are excluded from both work and education. Only a small number of those who have completed upper secondary education are not working or furthering their education.

An OECD survey of Adult Literacy and Life Skills (ALL 2003) in selected countries shows that more than 400,000 adults in Norway have such weak literacy and numeracy skills that they may have difficulty functioning in today's workplace and in society. Adults with weak basic skills run the risk of losing their jobs in the event of a workplace reorganisation. Figure 1 shows that persons with weak basic skills are overrepresented in the group receiving disability pensions. Nearly half of 50-60 year olds with very weak skills are disabled. This proves that we do not have a knowledge society for all.

### The possibilities lie in early intervention

Everyone has a potential for learning. When a large number of people are prevented by poor learning development in childhood and adolescence from participating in the knowledge

society, the system is to blame. This particularly affects children and young people who do not have parents who are able to compensate for weaknesses in the education system.

The Government wishes to improve the ability of the education system to meet individual needs by organising teaching and learning in a favourable way. Early intervention is one of the keys in this work. Early intervention must be understood both as action at an early stage of a child's life and as intervention when problems arise or are revealed at pre-school age, during basic education or in adulthood.

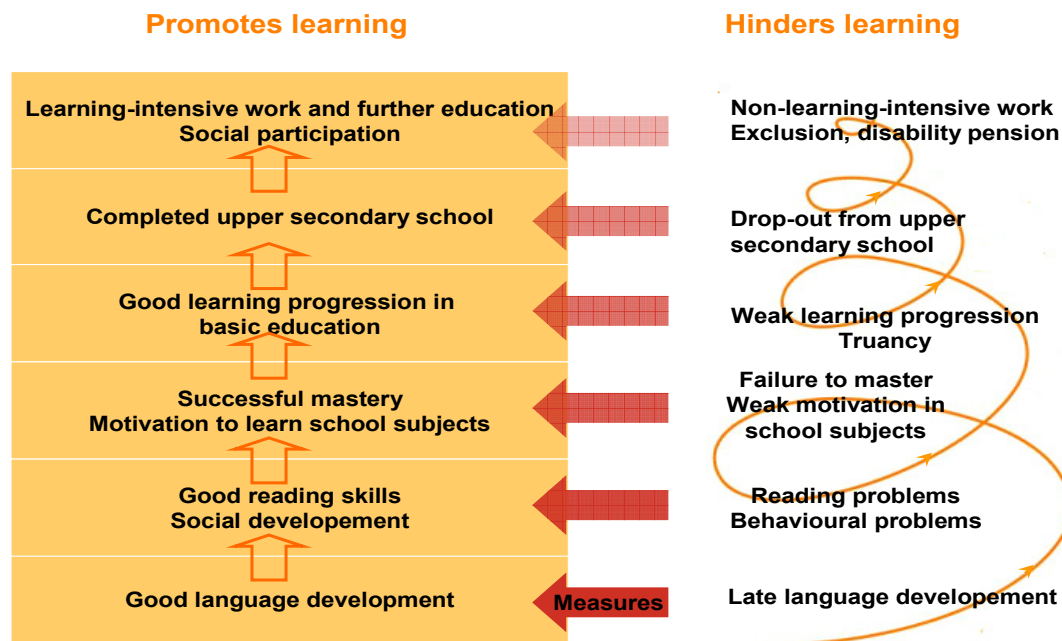


Figure 2 Factors that promote and hinder learning

The possibilities for children and young people to learn must be built up block by block. The illustration in Figure 2 shows how important it is for the education system to pave the way and ensure that everyone is included in good learning processes at an early stage. The ability to learn depends among other things on skills and experience acquired earlier in life. Learning breeds more learning. Persons who are not offered good learning processes will have a greater risk of falling into a downward spiral (right of Figure 2).

There is great potential for reducing social inequality by initiating measures in early childhood and the socio-economic benefits of providing effective measures for children who need extra stimulation are very high. Early childhood is an important period for developing communication skills, conceptual understanding and vocabulary. Children have an innate curiosity and interest in learning that has to be encouraged and developed throughout their entire schooling. Research shows that children with good language development before they start school make better social progress and reading progress in primary school than children with delayed language development. Reading progress affects motivation, which in turn affects academic learning.

There will also be pupils at school who are in danger of falling behind in learning and mastering. There are a number of effective measures that help to get vulnerable children into a good learning process. The earlier these measures are initiated, the more effective and less resource-intensive they are. The best way to prevent marginalisation is to help at any early

stage when there are still many possibilities and the child's motivation has not been weakened by failure.

If measures are to be initiated at an early stage, efforts must be made at all levels of the education system to identify the children and young people who are not making satisfactory learning progress. This entails assessing children's development and abilities and having the professional knowledge to determine which follow-up measures to initiate. There are a number of useful tools and aids that can be utilised in an evaluation process. Many child health clinics and day-care centres have benefited from the use of various language assessment tools. In the primary and lower secondary school, there are compulsory tests and other material teachers can use to assess pupils' abilities and skills.

It is equally important to remember that it is never too late to reverse a downward spiral learning process. A number of measures have been tried and found successful in helping young people with serious learning and behavioural problems at lower secondary level, or pupils who have dropped out of upper secondary school. The same is true of adults who have completed compulsory education without acquiring the reading and writing skills that are needed to be able to function well in society and in the workplace.

### **Better opportunities for all**

The measures to promote social equalisation that are presented in this white paper aim mainly to ensure that everyone acquires the necessary knowledge and basic skills at primary and lower secondary school and that as many persons as possible complete upper secondary school with good results. Education and training must therefore be based on a broad view of knowledge. Good knowledge and basic skills in for example reading, writing, arithmetic and ICT are essential for participation in a modern workplace and in society. It is also important for everyone to develop social, cultural and ethical knowledge and skills and the ability to cooperate and think critically. Everyone must develop knowledge and insight that will enable them to take part in democratic processes and to take responsibility for their own lives.

## **Chapter 2 A well-developed education and training system**

Making a contribution towards social equalisation has been an important goal for many educational reforms. The Norwegian education system has many strengths that are worth building on, also with a view to levelling out social differences. The education system is based on principles of community, equal access for everyone and opportunities for life-long learning. One of the recommendations in OECD Report "Equity in Education, Thematic Review Norway" dated January 2006 is to preserve the basic structure of the education system. It also stresses that the system has a good equalisation profile as regards financing and participation. The social differences in access to the education system have been reduced by providing more day-care institutions, introducing a ten-year compulsory school for everyone and the right to upper secondary education. The possibility of participation regardless of financial means has also been improved.

Today, children, young people and adults in Norway are well on their way to having equal access to education and training. One of the Government's goals is full day-care provision. Primary and lower secondary schooling is compulsory and everyone has the right to upper secondary schooling. Those who wish to and who have the required qualifications can acquire a higher education. Following the Competence Reform, adults now have the right to complete



their primary and secondary education, and employees also have the right to leave of absence to do this. In spite of a high degree of formal equality in the right to participate in the education system, there are still great social differences in learning outcome and participation in education. This shows that development and resources are not in themselves sufficient to ensure a more socially equalising system. The challenges we are now facing are therefore of a different character. These are presented in Chapters 3 and 4.

### **Chapter 3 Barriers to good learning processes**

This chapter describes the factors in the Norwegian education and training system that contribute to differences in learning outcome and participation in education and work. Chapter 4 documents how these lead to systematic disparities between different groups.

#### **Early childhood**

In the course of the past 20 years, we have acquired more knowledge about the significance of early childhood for the individual's possibility of life-long learning. The development of language plays a central role. Language makes it possible to communicate and it helps to create identity and a sense of belonging. With the help of language, a child learns to understand itself and its surroundings. Language development is therefore crucial to a child's further development – intellectually, socially and emotionally. Studies show that early language stimulation can prevent social differences in later learning achievement in school. Early language stimulation can, for example, be playing actively and consciously with language using story-reading, songs, rhymes and jingles.

#### *Language testing at child health clinics*

The child health clinics are the only institutions that, in principle, meet all pre-school children whether they attend a day-care institution or not. They assess their language development at two and four-year check-ups. Professional guidelines recommend that “a systematic observation of communication, language understanding and spoken language” be carried out as part of the general medical examination. A survey in 2000 revealed a noticeable lack of systematic approaches to language evaluation at the child health clinics. The health visitors reported a great lack both of formal referral routines and of satisfactory cooperation with other professional bodies. More than 90 per cent of them expressed the wish for systematic testing material to uncover language and speech problems.

#### *Access to high-quality day-care institutions*

National and international research shows that good educational pre-school programmes have a positive effect on learning and development in all children, irrespective of family background. Educational programmes have a clearer effect on later learning in children with a difficult background or minority language background.

A shortage of day-care places and the family's financial situation are the main reasons why some children do not attend a day-care institution. The National Childcare Survey also indicates that some parents do not want day-care places for their children. About 5 per cent do not want places, even if the parents' fee was reduced to NOK 500 per month. The cash benefit scheme is an alternative and a supplement to day-care for parents with children between one and three years old who do not use a day-care centre or who combine part-time day care with a reduced cash benefit. The cash benefit is of more importance to immigrant families' income than to families in the population as a whole, because on an average the cash benefit represents a higher share of those families' total income.

In addition to its goal of full day-care provision, the Government emphasises the importance of a high-quality content in the day-care institutions. The provision of good day-care facilities is particularly advantageous for children who are more likely to find it difficult to master school subjects. This includes children from families with little support at home and children who do not speak the majority language at home. Day-care institutions can achieve good results with children's language development by using methods that are compatible with the day-care institution's tradition of learning through games. The use of language games in day-care institutions can help to prevent later reading and writing difficulties. An important prerequisite for high quality is a competent and qualified day-care staff. The OECD points out that Norwegian day-care institutions have a lower percentage of personnel with pre-school teacher training than our neighbouring countries, Denmark and Sweden. Looking at the number of children per teacher in these countries in 2004, we see that Sweden had 11.2 children aged three to five per pre-school teacher, while Denmark had 6.9 children in the same age group per pre-school teacher. These two countries have the highest teacher density in Europa. We do not have corresponding figures for Norway, but the regulations issued in pursuance of the Norwegian Day Care Institution Act require one trained pre-school teacher per 14 to 18 children when the children are over three years of age. It is therefore likely that teacher density is lower in Norway than in Sweden and Denmark.

### **Primary and lower secondary education**

#### *Early intervention or wait and see*

Children with a good foundation when they start school are more likely to make a success of further schooling, studies and a career. The sooner children are given help, the greater the probability of avoiding more serious and more complex problems.

Surveys show that there has been a tendency in Norwegian schools to 'wait and see' instead of intervening at an early stage of the pupils' development and learning. According to the Progress in International Reading Literacy Study (PIRLS) in 2001, one of the teaching strategies of every second 4<sup>th</sup> grade teacher in Norway is 'to wait for the pupil to mature' if the pupil is lagging behind in reading skills. Statistics showing the scope of special education support the assumption that measures are initiated too late. The use of special education increases with the pupils' age, which conflicts with the principle of early intervention. In Finland, a great deal of extra help is given at an early stage of the learning process. Finland has very high scores in international reading surveys and has few pupils with weak basic skills.

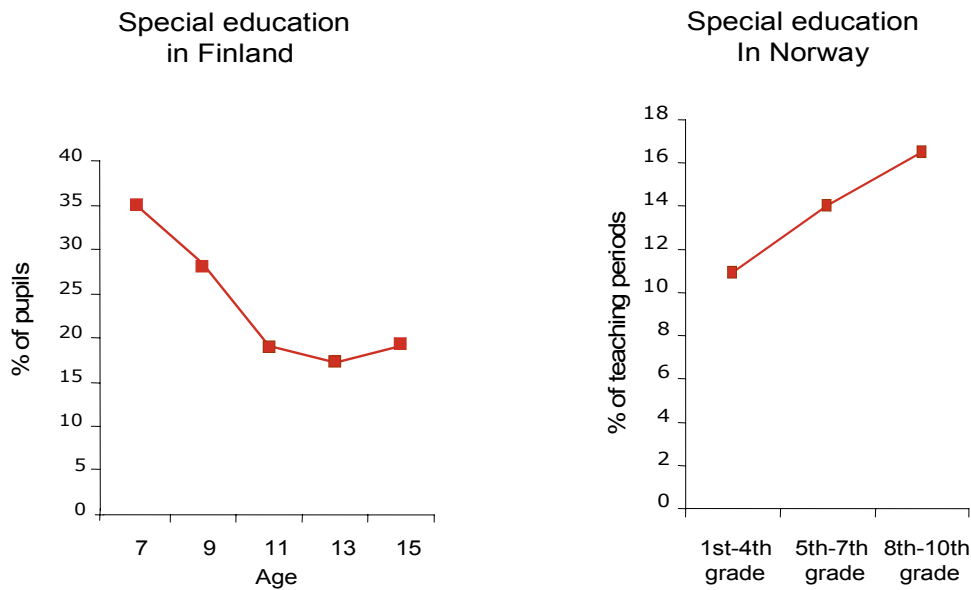


Figure 3 Use of special education in Finland and Norway by the pupil's age. Percentage of pupils and percentage of teaching periods per pupil respectively.

The above graphs show the difference in use of special education in Finland and Norway. The graph for Finland shows the percentage of pupils receiving special education at different ages. The graph for Norway shows the percentage of total teaching periods that are used for special education in the different grades. In this context, however, it is the shape of the curves that is interesting.

#### *Importance of expectations and follow-up for learning*

International research shows that high expectations play a decisive part in ensuring that children and young people actually do learn. In a comparison with pupils in the other Nordic countries, Norwegian pupils report the lowest demands from their teachers regarding schoolwork. The research also shows that teachers systematically have lower expectations of certain groups, such as minority language speakers with poorly educated parents. These low expectations are based on preconceived ideas about the parents, and can lead to too low a level of ambition and thus to social reproduction.

The evaluation of Reform 97 indicates that learning routines in the Norwegian primary and lower secondary school are characterised by a lack of system and coherence. There is a great deal of activity in class, but the teachers often switch from one activity to another without any clear purpose. There is little systematic reflection on the point of the different activities and little time is spent rounding off and summing up.

If teaching goals and criteria for evaluation are not clear, this can lead to preservation of social differences. The more diffuse the evaluation criteria are, the greater the advantage to pupils with highly educated parents. It is more likely that this group of pupils will be able to understand implicit demands and expectations and it will be easier for them to make adjustments without any further explanation of which criteria the evaluations are based on.

International surveys show that a lack of training in the basic skills is a problem in many Norwegian schools. Automaticity of skills is the area in which Norwegian pupils, according to the Programme for International Student Assessment (PISA), are weakest. Norwegian



pupils are, for example, noticeably weak in elementary arithmetic. It is clear from the PISA survey that basic skills training is barely used as a learning strategy. Schools with a high score in mathematics among 10<sup>th</sup> graders are shown to emphasise this type of training. This training is important for all pupils, but a lack of it will particularly affect pupils who need more time to develop automaticity or who do not get help at home.

A fruitful learning process depends on quick and constructive feedback along the way. About 20 per cent of Norwegian teachers reply that they monitor homework in 8<sup>th</sup> grade science, while the international average is close to 80 per cent (see Figure 4). If this is representative of how teachers follow-up homework in Norway, many parents may find themselves with more responsibility for the pupils' learning than they are willing to accept or are capable of accepting. Surveys show that help from parents is more important in Norway than in most other countries.

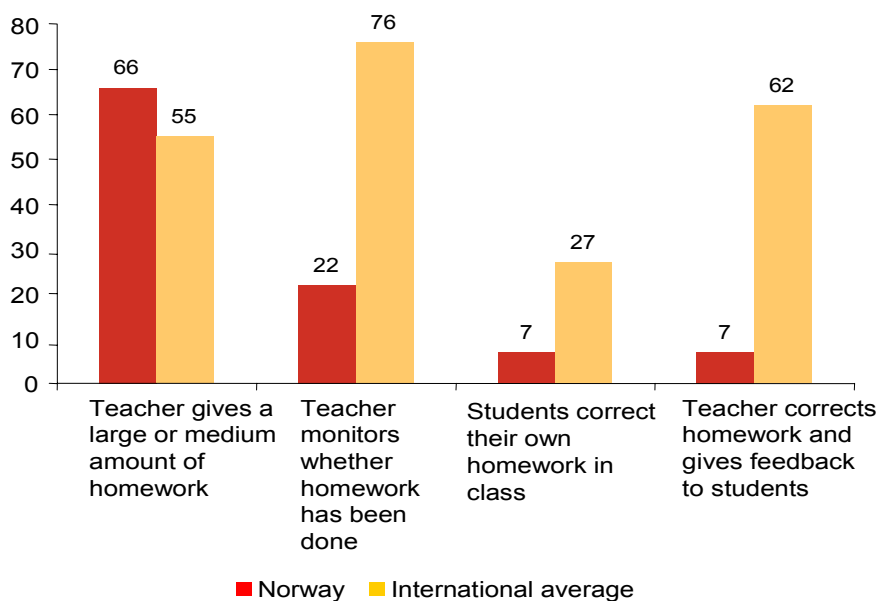


Figure 4 Science homework. Norway compared with the average of the countries that took part in the Trends in International Mathematics and Science Study (TIMSS). Percentage of pupils in the 8th grade 2003

### Upper secondary schooling

The main challenge in upper secondary education is getting as many pupils as possible to complete their schooling with a certificate of upper secondary education, a craft certificate or a journeyman's certificate. Without a certificate from the upper secondary school, the probability of poverty or marginalisation later in life increases dramatically. Weak learning in the primary and lower secondary school appears to have great significance for the probability of dropping out of upper secondary school. Choices, learning and drop-out rates in the upper secondary school are linked with lower level grades, which vary according to the pupils' family background. Pupils with poor basic skills from primary and lower secondary school find it very difficult to acquire knowledge that is presented in writing or in a theoretical form. The introduction of Reform 94 brought to light the problems young people face in later education and in the labour market if they have not acquired adequate skills in primary and lower secondary school. The current labour market demands competence in the form of basic skills. This is reflected in the organisation of and requirements regarding technical and vocational education in Reform 94 and in the Knowledge Promotion programme.

### *High drop-out rate in technical and vocational education*

The completion rate is particularly low in vocational training programmes. This is linked, for example, with the fact that there are a larger number of pupils with poorer grades and a great deal of absence from lower secondary school on these courses. This must in turn be seen in the light of the pupils' family background. Moreover, it appears that the quality of technical and vocational education varies.

It is extremely important that apprenticeships and traineeships are available to pupils following vocational training programmes to ensure that they do not break off their education after two years. The difficulty of finding an apprenticeship or traineeship varies from occupation to occupation. There also appears to be a correlation between family background and the probability of securing one. It is easier for pupils who have parents with upper secondary school as their highest completed education than for other pupils. This can be explained by a network of contacts in different enterprises through their parents' job connections. Pupils with good grades find apprenticeships more easily than pupils with poor grades, but boys get apprenticeships more easily than girls in spite of poorer grades. Minority language boys are the group that has more difficulty any of the others. This is even true when they have the same grades as other applicants, and in spite of the fact that they have a satisfactory command of the Norwegian language, a good knowledge of Norwegian culture and Norwegian friends. This may be because minority language boys are discriminated or they do not have such a good network of contacts in the workplace. On the other hand, minority language applicants do very well in the girl-dominated occupations.

### *Limitations in counselling service*

A good start in upper secondary education for the individual pupil depends on making the correct choice of educational programme. There is reason to believe that educational and vocational counselling offered by the schools is particularly important for pupils who do not learn about the educational system and the possibilities inherent in different occupations and educations through family and networks. Studies indicate that access to counselling in the lower secondary school is not good enough. Today, pupils have a statutory right to guidance regarding studies, career opportunities and choice of career and on social issues. The OECD points out, however, that allocation of resource hours is inadequate, particularly in the primary and lower secondary school.

At some schools, the current procedure is for individual pupils to contact the counselling service for help. This means that it does not necessarily see them all. Furthermore, insufficient information is given about the consequences of different study and career choices. At the same time, it is pointed out that the Norwegian system places too much importance on information at the expense of guidance. The OECD also believes that coordination between the different actors is not good enough.

### **Adults**

As part of the Competence Reform, a number of measures were initiated to build up competence in the adult population. However, this has not increased participation among those who have most need for such training. Low participation in training among persons with a low level of education is due both to the lack of demand and the shortage of good training opportunities adapted to the needs and life situations of adults.

By law, the municipal authorities are responsible for providing primary and lower secondary education for adults. The Norwegian Institute for Adult Education (Vox) finds that 60 per cent of all municipal authorities have no plans for how they are going to provide primary and

lower secondary education for adults. This may be due to limited resources and a shortage of qualified teachers, but must also be seen in the light of the lack of interest.

Studies show that only a small percentage of the adult population are familiar with their right to primary and lower secondary education. Some of them see no point in participating or they find the financial aspect difficult. Many adults with a poor primary and lower secondary education have bad experiences from school and are not motivated for school-based tuition. Many wish for a greater degree of specially adapted courses. Education at primary and lower secondary school level often consists of ordinary day-time classes. The municipal authorities rarely provide targeted tuition in basic skills such as reading, writing, arithmetic and ICT and special courses are rarely offered in the workplace or in connection with vocational training or other job-oriented training.

A growing number of adults lack the right to upper secondary education. This applies to persons born after 1978 who have had no upper secondary education or who have dropped out. This particularly affects immigrants who were born after 1978 but who came to Norway too late to exercise the right of young people to upper secondary education.

#### **Chapter 4 Consequences for participation and learning outcome**

Weaknesses in the education system are reflected in systematic differences in participation and learning outcome between children, young people and adults with different family backgrounds and between girls and boys. Norwegian and international research presented in Chapter 4 shows that the probability of participating and succeeding in education or training and in the workplace is linked with family background and gender.

##### **Day-care institutions – differences in attendance**

There is a considerable difference in day-care attendance between minority language children and children with a majority background. Children with a minority language background have a lower day-care attendance than all children in the same age group. In 2005 13,757 minority language children aged one to five attended a day-care institution. This equals 54 per cent of all minority language children in this age group. This is far lower than the average attendance rate of 76 per cent. The difference is particularly noticeable among the youngest children. While 65 per cent of two-year-olds in the whole population go to a day-care institution, the figure for minority language two-year-olds is only 30 per cent.

The National Childcare Survey in 2002 showed that there is also a correlation between day-care attendance and the parents' level of education and income. Children of parents with a lower secondary education attend a day-care institution more seldom than children of mothers with a higher education. Children who grow up with parents with a high income attend a day-care institution more often than children from low-income families.

##### **Primary and lower secondary school – considerable differences in learning outcome**

International surveys of reading and numeracy skills indicate that Norway is one of the countries with the greatest variation in learning outcome among the pupils and that Norway has a large percentage of pupils with weak basic skills. According to the PISA survey, 18 per cent of Norwegian pupils have weak reading skills, while 22 per cent have weak mathematics skills. Norway has a relatively large share of pupils with weak skills compared with, for example, Finland, Netherlands and Canada and a higher share than both Denmark and Sweden.

In addition to a large number of pupils with weak skills, there is a strong link in Norway between the pupils' home background and their skills. Figure 1 shows the correlation between the parents' level of education and the pupils' skills both in reading in the 4<sup>th</sup> grade and in reading and mathematics among 15-year-olds. The correlation can be seen in all of the countries that took part in the survey and applies to all skills surveyed (reading, mathematics, English, natural sciences, democracy), but it is stronger in Norway than in many other countries.

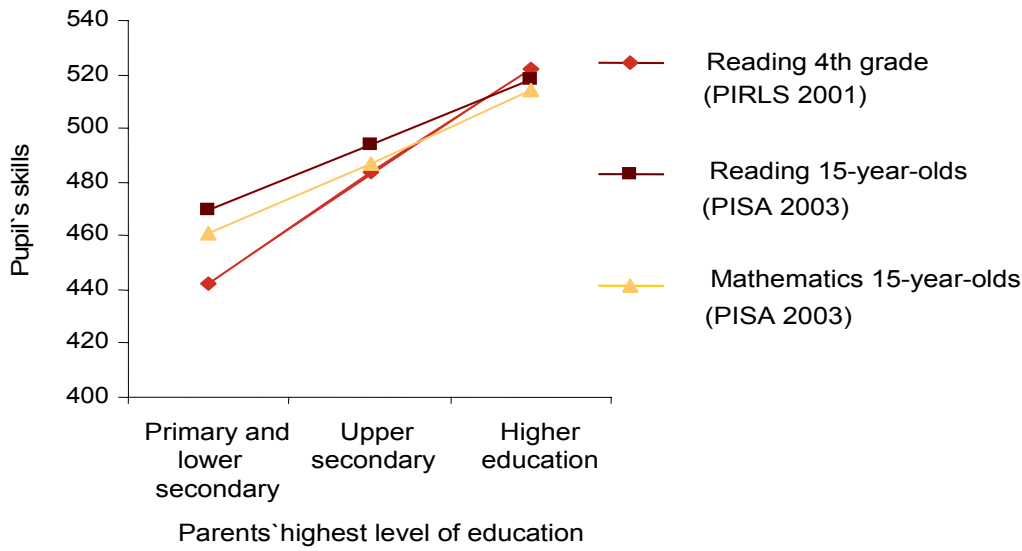


Figure 5 Correlation between parents' level of education and pupils' reading and mathematics skills

There is a strong correlation between learning outcome and parents' education. Lower secondary school pupils who have parents with a post-upper secondary education score as much as eleven credits more than pupils who do not. By comparison, the difference between pupils from high and low income families but with otherwise identical characteristics is four credits. There is a similar difference between boys and girls in the girls' favour. There is also a difference in the grades achieved by minority background pupils and those achieved by majority pupils. However, much this difference disappears in a comparison of minority and majority language pupils with otherwise identical characteristics. It appears that minority language pupils have lower grades than majority language pupils because on an average they have parents with a lower education and come from families with fewer financial resources than the majority language pupils.



*Figure 6 Estimated lower secondary school credits for construed groups by family characteristics and gender (all else being equal) 2002 and 2003*

### **Upper secondary school – differences in choices and completion rate**

After lower secondary school, the great majority of pupils decide to start on an upper secondary education. Nearly 100 per cent of pupils leaving 10<sup>th</sup> grade apply for admission and around 96 per cent go straight on to upper secondary school. While 96 per cent of 16-year-olds with highly educated parents were enrolled in upper secondary education on 1 October 2004, the figure for 16-year-olds with parents with a lower secondary school education was 85 per cent. Differences in participation can also be found between pupils with a minority language background and pupils with a majority background. In autumn 2005 about 90 per cent of lower secondary school leavers with a minority background went straight on to upper secondary school. This is slightly lower than the average for the population as a whole.

Six out of ten pupils who started their first year of upper secondary schooling in autumn 2005 enrolled in a vocational course. The better the grades achieved by the pupils in lower secondary school, the greater the chance of them choosing general studies (which will qualify them for higher education). The level of the grades is connected with family background. The average grade increases with the parents' level of education. The correlation between family background, grades in primary and lower secondary school and choice of programme thus leads to a socially lopsided recruitment into the different upper secondary school programmes. However, a difference in choice of education can also be seen between pupils with the same lower secondary grades but with different family backgrounds. Pupils with highly educated parents have a greater tendency to choose general studies than pupils with less educated parents, even if they have the same grades in lower secondary school.

More girls than boys choose programmes for general studies. Since choice of education is influenced by grades, this difference can be seen in the light of the fact that girls average better lower secondary grades than boys. A comparison of boys and girls with the same level of grades shows that boys have a stronger tendency to apply for general studies.

Girls and boys make gender-stereotyped choices. A distribution by gender of the various vocational choices shows for example that the percentage of girls doing health and social

studies and design, arts and crafts is 89 and 86 respectively. Building, electrical, mechanical and technical/engineering subjects are typical boys' subjects, with 90 per cent boys.

### ***Completion of upper secondary schooling***

Every fourth pupil who started on a foundation course for the first time in 2000 dropped out in the course of five years, i.e. did not get a certificate of secondary education or a craft or journeyman's certificate. Completion of upper secondary education is also linked with the parents' education.

*Table 1 Status in 2005 for pupils who started on a foundation course for the first time in autumn 2000, by completion time and parents' level of education. As a percentage of total pupils.*

<b>Parents' education</b>	<b>Total pupils</b>	<b>Completed in normal time %</b>	<b>Completed in more than normal time %</b>	<b>Still in upper secondary school in 2005 %</b>	<b>Dropped out of upper sec. school %</b>
Long higher education	5 197	78	9	2	10
Short higher education	14 184	69	11	5	16
Upper secondary school	29 257	49	12	7	31
Lower secondary school	2 457	30	12	8	50
Not given	855	28	12	6	53
<b>Total</b>	<b>51 590</b>	<b>56</b>	<b>11</b>	<b>6</b>	<b>26</b>

Source: Statistics Norway 2006

The percentage who complete upper secondary education increases with the level of the parents' education, while the percentage who drop out increases as the level of their parents' education falls. Almost 80 per cent of the pupils and apprentices in the 2000 cohort with parents with a long higher education completed upper secondary education in the normal time, but this only applies to 30 per cent of pupils with parents with lower secondary school as their highest level of education.

The correlation between parents' education and the probability of dropping out is however drastically reduced in a comparison of pupils with the same grades in 10<sup>th</sup> grade. It therefore looks as if poor grades in lower secondary school have most significance for dropping out. It is important to emphasise that there is also a strong link between the parents' education and the pupils' grades at lower secondary level. One can therefore say that there is an indirect correlation through lower secondary school grades between parents' education and dropout rates.

The completion rate for minority language pupils is lower than the rate for majority language pupils. Of the minority language pupils who began upper secondary education in 2000, 39 per cent had dropped out without gaining a full certificate or completing a planned course at a lower level by 2005. The average percentage for the whole cohort was 26 per cent. The difference between the completion rates for majority and minority language pupils is linked with the fact that on an average minority language pupils have parents with a lower level of education and the fact that they average lower grades from lower secondary school. A comparison of minority and majority language pupils with the same lower secondary school grades and parents with the same level of education shows that non-Western minority language pupils – both descendents of immigrants and immigrants – have less of a tendency to drop out than the majority language pupils.



### Higher education – the differences are reproduced

The probability of taking a higher education is connected with the parents' level of education.

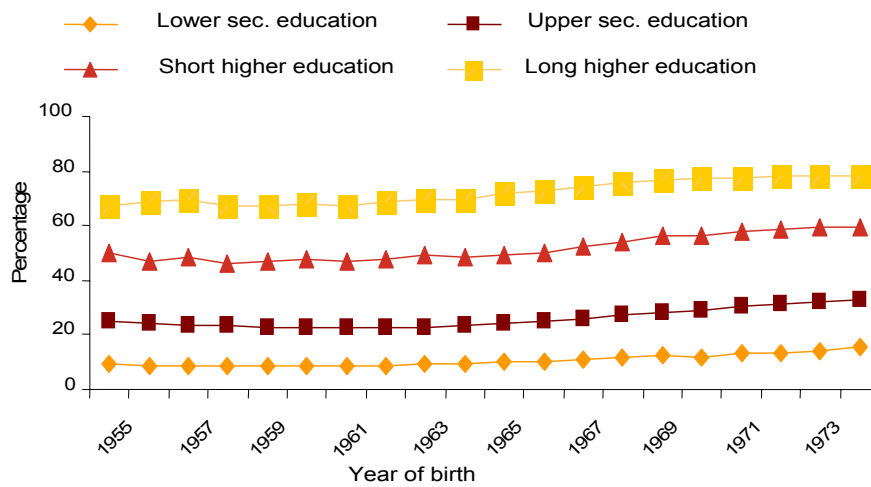


Figure 7 Percentage of 30-year-olds who have gained a higher level education, by the parent's level of education. 1955-1974 cohorts.

The tendency to take a higher education increases considerably with the rising level of education among the parents. In the 1974 cohort, nearly 80 per cent of the group whose parents have a long university education have themselves achieved a higher education by the time they are thirty. This is true of only 15 per cent of pupils whose parents' highest level of education is lower secondary school. The significance of the parents' education for recruitment into higher education is about the same for thirty-year-olds born in 1974 as it is for thirty-year-olds born in 1955.

The *type* of higher education chosen is also linked with family background. Young people with highly educated parents are more likely to choose a university education than college studies, while students whose parents have a low level of education prefer to apply for a college education. Recruitment to high status professions such as law and medicine is particularly lopsided. The probability of choosing one of these professions is about 35 times higher among children of highly educated parents than among children of unskilled workers. The probability of studying medicine is about 80 times higher among children of doctors than among children of parents with a low education and a low income.

### Adults – differences in participation and learning opportunities

Adults in the education system are a complex group. Some need knowledge and skills at primary and lower secondary level, while others focus on a higher education. Moreover, adult learning largely takes place outside the formal education system, most often taking the form of skills development in the workplace.

A considerable percentage of adults in Norway have completed their lower secondary education without mastering the basic skills. The ALL survey (2003) shows that more than 400,000 persons in the adult population have such poor literacy and numeracy skills that they can find it difficult to function in the workplace, for example if the workplace is reorganised. Yet there are few who exercise their right to education at primary and lower secondary level.

There is great uncertainty surrounding statistics on adult participation in upper secondary education, but in recent years 20,000 adults are estimated to have participated at this level.

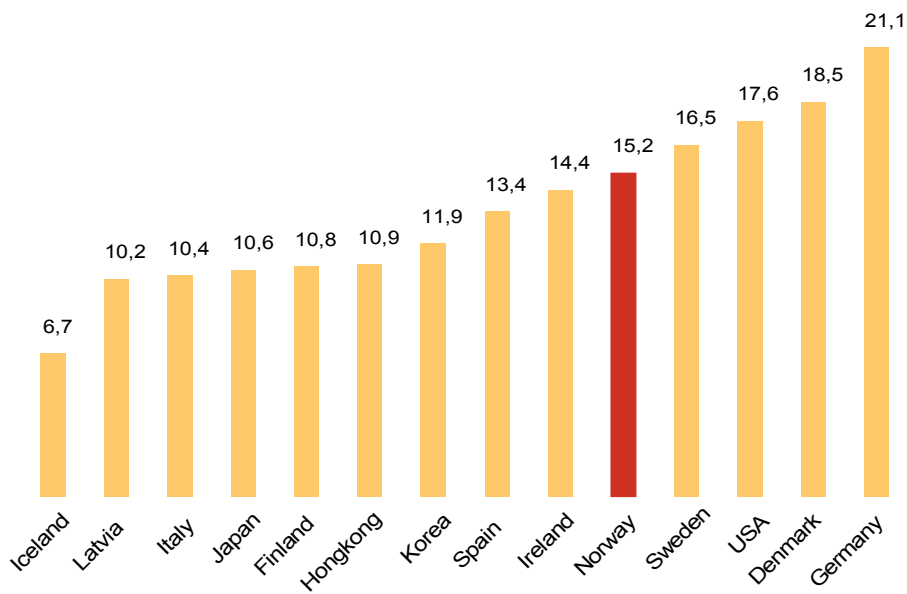
There has been an increase in the number of older students at universities and colleges in recent years. A considerable number of new students taking higher education are over 25 years of age. Figures issued by the Norwegian Universities and Colleges Admission Service show that almost 28 per cent (16–17,000 students) of the applicants who were admitted in 2003 and 2004 were over 25 years of age. These older students generally have a different background from the younger students. They have more often taken a vocational course in the upper secondary school and their parents have a lower level of education than the average parent among the younger students.

Studies show that social background also has significance for learning in the workplace. Adults with a low education have less learning-intensive work and take less part in courses, training and formal supplementary education than adults with a high education. While 67 per cent of adults with a high education participate in work-related courses and training, only 31 per cent of adults with lower secondary education do so.

## **Chapter 5 Change is possible**

The close correlation between family background and learning achievement is often interpreted to mean that the education system cannot make a difference and that the explanations for social reproduction lie outside the education system. The education system is part of a larger society and to some extent the differences in the education system also reflect the differences in society in general. However, this knowledge gives no reason to renounce the idea that education can be used to promote social equalisation to a greater extent than is the case today. Studies show that the significance family background has for learning varies from one country to another and that it is possible to achieve more success with social equalisation in learning outcome than the Norwegian education system does today. The Ministry believes that future efforts to level out social differences should focus attention on factors within the education system, which can promote better learning for everyone, rather than on external circumstances which the education system can do little about.

International surveys indicate that other countries have been more successful than Norway in reducing social differences.



*Figure 8 Correlation between family background and proficiency in mathematics*

Figure 8 shows that there are considerable differences in the significance of family background in different countries. The correlation between family background and proficiency in mathematics is far weaker in, for example, Japan, Finland and Iceland than it is in Norway. The PISA survey in 2000 also shows that there are a number of countries where the correlation between family background and reading skills is far weaker than it is in Norway. These surveys give good reason to believe that schools can in fact do a great deal to level out differences.

There are many examples indicating that it is possible to create greater equity between different groups of pupils. A Swedish study has compared schools with relatively similar pupil bases but differences in learning outcome. The study shows that the schools had different expectations of their pupils. The schools that succeeded in ‘lifting up’ children of parents with a low education took more responsibility for the pupils’ progress and introduced more measures to help them than the schools that were not so successful. The schools with poorer results were more inclined to say that there were limits to what they could do, and the blame for poor learning was often laid at the door of the parents. Other studies show that the teaching methods practised by schools affect the pupils’ performance. There is, for example, a clear correlation between pupils’ reading habits and their home background, but the schools can also do a great deal to influence these habits.

## **Chapter 6 Priority areas and measures**

The different parts of the education system and their contribution to social equalisation must be seen as a whole. It is the totality of the measures from early childhood and up through the whole education and training system that determines whether we will be more successful in creating social equity than we are today. This is the basis for the priority areas and measures that are presented in this chapter. Chapter 6 discusses the Ministry’s collective efforts to promote social equalisation, including ongoing measures, measures that will be further developed and new measures.

## **Competent pre-school teachers and school teachers**

It is not possible to achieve the objective of greater social equalisation without competent pre-school teachers and school teachers. Research shows clearly that the teachers' competence is essential to the pupils' learning. Competent employees are the most important prerequisite for good quality and social equalisation throughout the education system.

### Measures:

- Assess the way general teacher education is organised with a view to meeting the needs in school in a more satisfactory way
- Consider introducing new national regulations stipulating qualifications required to teach important subjects and at certain levels
- Ensure that we look after newly qualified teachers when they first start working in day-care centres and school
- Continue to invest substantially in competence-building for teachers and ensure that funds are used as intended
- Continue to invest substantially in competence-building and research and development in the day-care sector.

## **Knowledge about what works**

To ensure the success of the above measures, we need more knowledge and research on learning and teaching than we have today. This is important if we are to be able to achieve our objective of social equalisation. It is the children, young people and adults with the least learning-supportive environments who have the most to lose if the education system does not base its practice on what we know works, but on what we think – or want to think – works.

### Measures:

- Establish a major research programme on learning and teaching
- Strengthen our Knowledge Promotion programme
- Strengthen the transfer of research results to the education sector.

## **Early childhood**

Studies show that early language stimulation can prevent social differences in later learning achievement in school. We also know that this reduces the need for later special education in school. Many children attend a day-care centre, but not all of them do. It is therefore important to provide stimulation for children both in and outside day-care institutions. However, the Government believes that the day-care centre is the most important preventive arena *outside* the home. This is the reason for the Government's historic investment in day-care facilities.

Measures:

- Ensure that all children who need it are offered language stimulation before starting school
- Follow-up project for children with delayed language development
- Pilot project with ambulatory teachers
- Full day-care provision by the end of 2007
- Right to a day-care place
- Pilot project to test free core-time in the day-care centre.

**Primary and lower secondary education***Early intervention – assessment and follow-up*

To achieve the goal of greater social equalisation, all children and adolescents must be included in good learning processes as early as possible and be given an education which encourages achievement (mastering) and a good learning outcome. Early intervention is also necessary to be able to provide adapted education for all pupils. We also need to know at an early stage whether a pupil is falling behind and ensure that he/she gets help as required. A closer link-up is therefore needed between the individual pupil's results in assessment tests and the school authority's responsibility for follow-up to ensure that the pupil is guaranteed a good educational programme. It is moreover important that the regulations regarding individual assessment help to promote the pupils' learning development and achievement. It is crucial that the teachers give the pupils continuous and constructive feedback regarding their progress.

Measures:

- Evaluate the current legal basis for the duty to provide individually adapted education
- Further develop national tests and assessment tests to ensure that the school can uncover possible problems at an early stage
- Review the legislation relating to individual assessment
- Make a review of the special education support service to ensure that it functions sufficiently well for the children, young people and adults who need special educational assistance and special education

*Good framework for learning*

Every pupil should have a good framework for learning. A longer, more coherent school day with help to do homework, provision of fruit and greens, and a better balance between physical activity and more sedentary activities are important ways of achieving the same framework conditions for all pupils and thus better learning opportunities for them all.

Measures:

- Implement a gradual extension of the primary school day to maximum 28 teaching periods per week
- Develop and initiate help-with-homework schemes
- Introduce schemes to provide all children in primary and lower secondary school with fruit and greens
- Work to ensure that the schools facilitate physical activity
- Initiate the drawing up of guidelines for standard contracts with parents

**Better completion rate in the upper secondary school***Strengthen the school counselling service*

The high dropout rate in the upper secondary school can be related to factors at an early stage of education. Research shows that the majority of pupils who do not complete their upper secondary education have left lower secondary school without acquiring sufficient knowledge and skills. Measures to reduce the dropout rate in the upper secondary school must therefore target the primary and lower secondary school. The school counselling service in the lower secondary school is an important priority area.

Measures:

- Split the school counselling service into social-pedagogical counselling and educational and career guidance.
- Draw up competence criteria for counsellors

*Development of the trainee scheme and work to increase the number of apprenticeships and traineeships*

A committee appointed by the Ministry of Education and Training proposed in its final report that an organised, practice-based two-year training be introduced. At the end of this training pupils will be given a final assessment in the form of a practice certificate. This scheme will be a continuation and formalisation of the trainee scheme and it will be tested in collaboration with the social partners. The completion rate for apprentices depends very much on whether they get apprenticeship or whether they have to take their entire training at school. Work will also be done to increase the number of traineeships by, for example, following up the Government's decision regarding more traineeships in the civil service.



Measures:

- Pilot project to test a practice-based two-year training in the upper secondary school
- Work to establish more apprenticeships and traineeships

*Tuition in Norwegian for minority language speakers*

Good language tuition is one of the keys to success for minority language children and pupils in education and in the workplace. Research shows that it is important to have knowledge of and in your mother tongue before learning other languages. At the same time, there is a need for more extensive knowledge about the content, quality and scope of mother tongue tuition. The Ministry has called for a synthesis of existing research on mother tongue tuition, including bilingual vocational education and Norwegian as a second language, with a view to achieving greater insight into effects and significance.

Measures:

- Propose an amendment in the Education Act to include a separate provision regulating the right of minority language pupils to special Norwegian tuition in the upper secondary school
- Introduce level-based curricula for basic Norwegian, combined with assessment material.

**Higher education**

Higher education has a high capacity and a good regional distribution, and the costs of taking a higher education are low. There are a number of gateways to higher education, and the possibilities for adults to participate are good. Higher education is however not distributed equally in the population. The probability of embarking on a college or university education increases with the level of the parents' education. There are strong indications that this social reproduction is mainly caused by differences that have arisen earlier in the education process. The central message of this White Paper on early intervention will therefore also lead to broader access to higher education in the long term. The Government's goal is to give everyone an equal right to education regardless of financial means and social background. Every student must be given the possibility of studying full-time.

Earlier studies show that persons whose parents have a low education and a low income have a higher threshold to cross before taking up a study loan to pay for higher education. The task of getting new groups to continue their education after upper secondary school is a study-financing challenge. Students who borrow from the Norwegian State Educational Loan Fund can choose a floating or fixed rate of interest. Persons looking for predictability may find a fixed rate to be the best solution. Fixed interest rates for three or five years are now available. The Ministry will offer a third option of ten years. This option will give students the possibility of long-term predictability in repayment of study loans.

Measures:

- Follow up the efforts of the educational institutions to provide flexible study programmes
- Introduce the possibility of a 10-year fixed interest rate on study loans, in addition to the present 3 and 5-year options.

**Adults**

*Adults* with no basic education and no basic skills deserve another chance. The Government wants an adult population that takes an active part in the workplace and in society. As part of the Competence Reform, a number of measures were initiated to build up the skills of the adult population. However, this has not led to an increase in participation among those who are in greatest need of such education and training.

The low participation in education and training among persons with a low education is due both to a lack of interest and to a shortage of good training programmes adapted to adult needs and life situations. Today, there is an increasingly large group of young adults who do not have the right to upper secondary education. This also applies to a growing number of immigrants who have arrived in Norway too late to exercise the right of adults to education.

Measures:

- Extend the right to upper secondary education for all adults (abolish the 1978 regulation)
- Increase grants for the Programme to promote basic skills in the workplace
- Strengthen educational and career guidance for adults

**Information through dialogue**

To communicate the central message, priority areas and measures in this white paper, a constructive and broad dialogue is required with the affected groups in the sectors. These are the day-care centre and school authorities, social partners, pre-school teachers, general teachers and other employees in day-care centres and schools, principals, parents, children, pupils and teacher training institutions. The purpose of such a dialogue will be twofold: first to pass on information about the basis for and content of this white paper and secondly to help to ensure that the different actors in the sector do in fact implement the many measures that are proposed.

In following up this white paper, the Ministry will therefore attach considerable importance to communicating with the different sectors. One important objective will be to create a dialogue and involve the target groups directly in the follow-up work. It is the Government's aim to help to establish local arenas for the exchange of information and experience and for the circulation of good examples, important reports and analyses. Major conferences in different parts of the country are another possible means of furthering this process.