



Stockholm Institute of Education

Inclusion of Children in Outdoor Education

Learning in Motion Report I

Jane Brodin & Peg Lindstrand

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Foreword

Transnational cooperation is regarded as a strategic task in order to contribute to the development of European research and education. In the project Learning in Motion (LIM), within the Socrates programme, Grundtvig 1, five countries are involved: Sweden, Finland, Latvia, Germany and Greece. Two parties are involved from Sweden: Studieförbundet, Uppsala, who is also the coordinator of the project, and the Stockholm Institute of Education, represented by The Disability and Handicap Research Group within Child and Youth Science. The overall aim of the European project is to develop, examine and spread learning modules in outdoor education containing modules for both physical and sensitivity training for the main target group: children and adolescents with intellectual impairments in inclusive education.

The LIM project is financed by the European Commission and the number of partners is seven in five countries. Sweden is responsible to conduct two brief literature reviews and to conduct empirical studies on inclusion in Sweden, Finland and Germany. The research will focus on inclusion of two groups: children 12-18 years and young persons 18-25 years. For the participants the final project result is expected to contribute to innovative ideas, learning material, examples of good practices and an increased quality of life. The contribution of the Stockholm Institute of Education is thus to highlight inclusion in outdoor activities as specified in the signed partner agreement based on the 'Application proposal' by 26/2/04 for the project Learning in Motion, 113719-CP-1-2004-1-SER-G1. The tasks are specified as follows:

Inclusion in outdoor activities

This project will focus on inclusion of young persons in outdoor activities. The first part of the project will be to conduct a literature review on outdoor activities for children and adolescents in order to find out what the conditions and prerequisites are. The second part includes field studies in Sweden, Finland and Germany in two different groups:

1. Children 12-18 years
2. Young persons 18-25 years

The first group with focus on children is to be regarded as a reference group. The main aim is to find out how inclusive education is working in outdoor environments in different countries and when exclusion is a reality (p. 3, Partner Agreement).

The planning of the project started already 2002/2003 and the practical work started in October 2004. The first meeting was held in Uppsala in December 2004. Jane Brodin, professor of Child and Youth Science is the project leader at the Stockholm Institute of Education and associate professor Peg Lindstrand participated. In April 2005 assistant professor Magnus Magnusson was included in the project.

The first task was to conduct two literature reviews on inclusion in outdoor education; one for children up to the age of 18 years (Jane Brodin & Peg Lindstrand) and another for young persons up to the age of 25 (Magnus Magnusson). This is the result of the first report.

Stockholm in January 2006

Jane Brodin

Project leader

Abstract

Brodin, J. & Lindstrand, P. (2006). *Inclusion of children in Outdoor Education. Learning in Motion, Part. 1.* TKH-report No. 43, Stockholm Institute of Education, Child & Youth Science.

Focus on the European Socrates project Learning in Motion (LIM) is Outdoor Education and Inclusion. This report is one out of two reports concerning Outdoor Education in relation to inclusion of children with and without disabilities. This report, Part 1, covers children up to the age of 18, while Part 2 covers young persons between 18 and 25 years. A limited literature review will give an idea of the concepts outdoor education and learning, what these terms mean and how they are connected to learning and especially learning in outdoor environments. One essential task has been to define the concept outdoor education as many different terms like adventure, experiential, experimental, wilderness, nature, environment, recreation and leisure time are also used with sometimes the same meaning. From our point of view outdoors in the nature is a main pillar. The literature reviews were conducted in the databases ERIC and Libris and on the Internet Altavista and Google. Searches have also been made in reference lists of scientific journals.

The results show that children participate in outdoor education from the early years in preschool (0-7 years) and after that they continue with about the same or similar activities outdoors (7-12 years). Outdoor play will be refined towards sports and competitions over time. Playing outdoors stands for freedom for most children. During the first seven years they often go to preschool and spend much time outdoors on the preschool playground. This is an inclusive setting and all children (typical and atypical) are included. The disability is seldom an obstacle for participation. Up to the age of four most children are accepted and the disability does not cause any problem. After that time experiences of being different start. When the children start school at about seven years the difference between children become more and more visible and after a semester or two they recognize that they have limitations. In play this is evident and when they have breaks in school they might have difficulties to take part in different activities outdoors. In leisure time the number of friends has decreased. Many of these children now chose to go to a leisure time activity and have to select what is possible for them.

Between 12 and 18 the interests differ. In this age group they are still interested in sports and other leisure time activities and some of these activities are outdoors and some indoors. Scouting is one activity where many children and adolescents are involved. Sports of different kinds are others, e.g., riding, soccer, football, tennis and orientation. Walking in the nature is arranged by many voluntary organizations both for children and adults.

Keywords: outdoor education, inclusion, children, outdoor learning, play

Introduction

The well-known pedagogue Friedrich Wilhelm Fröbel (1782-1852), who has influenced the Swedish preschool, was strongly impressed by the philosopher Jean Jacques Rousseau (1712-1778) and his interest for the nature. Rousseau was the first one to recognize childhood as a separate stage in life and in his book about the young boy Emile he showed how the boy learned from exploring the nature instead of learning from books and by formal learning. He stated that children learn best from direct experiences from the immediate environment and meant that learning primarily arrived from nature, persons in the environment and from objects around the child. The image of the child was idyllic and the child was described as an innocent being prepared to be influenced by impressions from the environment. Fröbel on the other hand is primarily known as the creator of the kindergarten. He based his ideas on the object lessons methodology stressed by the educator Johann Heinrich Pestalozzi (1746-1827) and he stressed that play was separated from work, i.e. it was two different activities. Fröbel continued to open kindergartens all over Germany and the idea spread to England and later wide world. The unique idea to educate young children was popular and especially mothers were eager to place their children in specially designed educational settings. The main focus was on learning and based on the child's want to play and Fröbel argued that play activities were free from influence and requirements from adults.

Play and learning

The expression “children learn best in playful situations” states that play and learning are closely connected, and that learning is enhanced when amusing.

However, the discussion if play should be regarded as means for learning or as a tool for assessment of the developmental level of the child is evident, especially in studies of children with severe and multiple disabilities (e.g., Brodin, 1991). Many studies show how play has previously been used as a tool for assessment of the cognitive and physical abilities of the child in order to support the total development (e.g., Hanline & Fox, 1993; Mahoney, 1992). However, a paradigm shift arose and the usefulness of play as a tool for training of the social skills was stressed. For young children learning often starts in nature with its richness, and the child learns by exploring different objects in the nature. Outdoor play and adventure activities are thus in focus for learning and for child development. A creative play experience also supports the child to test his/her skills, to risk to try new ideas and to look for challenges instead of impeding the natural development.

From the very beginning of the 19th century play and physical competition outdoors were closely connected to daily life for children and adults. These activities were related to work and festivities during the different seasons, e.g. the harvest time. Play was as a matter of fact an integrated part of life in all social classes and children and adults played together and participated in the same games and competitions outdoors. The child was present in everyday life and also present as a fellow-worker side by side with the adult. Time for play was always there as many children worked instead of attending school. Children were regarded as “small adults” who had the same demands and expectations as adults, which is also visible when looking at paintings from that time. Art has always illuminated the existing views on human beings and the social values at a certain time in society.

Play research often highlight the positive relation between play and learning for young children and how different play experiences affect the child later in life. Today many preschool teachers stress that learning is the main activity in preschool – not play – and this may make it even more difficult to understand that outdoor activities should have a value per se. It is obvious that educators tend to valuate indoor activities much more important than outdoor activities which can be explained by the fact that outdoor activities are strongly connected to recreation and leisure time while indoor activities are connected to learning. One problem is that generally outdoor activities are not interpreted as learning and therefore the value is low, which is complicated. There is also a tendency in the western society to push children forwards instead of letting them be “just” children, with children’s rights to “just play”. Although opportunities to play and learn in outdoor environments have been included in the curriculum in the early childhood education, the value of outdoor education has sometimes been overlooked. From the extensive database Libris, hosted in Sweden, a search on the keywords *outdoor education* gave 111 hits (December 28th 2005) and out of these 50 have been published from 2000 and onwards. A conclusion of this is that the research field is still young although an increasing research interest can be noted during the last five years. Another aspect is that when *outdoor education and children* were used the number of hits decreased till 25, and when *preschool* was added only seven hits were given, but none of these were relevant for this study as focus was on other issues. This limited search will give an idea of the status of outdoor education in general.

“The value of outdoor play has been recognized in some capacity since childhood was first recognized as a separate period of life” (Wellhousen, 2002, p. 2). Wellhousen states that outdoor activities at present have a value and

means that this is due to the view on the child and childhood. However, it is evident that during different periods of time the value of outdoor play and education has been underestimated, despite that Rousseau, Pestalozzi and Fröbel early stressed the importance of outdoor education and gave it an important role in child development.

Play for all

Segal, Mandich, Polatajko and Cook (2002) highlight that physical activity is important for the social life of children in terms of making and maintaining friends and belonging to various peer groups. They state that such activities may be difficult for children with coordination problems to master, and this difficulty appears to reduce their opportunities for participation. School children with special needs often receive help through the public school system and, as a result, also the interventions are primarily focused on the children's academic skills. It is reasonable to believe that the heavy focus on academic needs and skills may come at the expense of other important aspects of children's lives, particularly their social lives.

The above mentioned authors refer to Blatchford (1998) and his longitudinal qualitative and quantitative study of British children's experiences during break time in school. In that study Blatchford describes how friendships develop in conjunction with physical play when children begin their first year in school at the age of seven, and at the beginning of the school year, the children play in different groups and in various physical play activities. However, as the year progresses, the playgroups become more stable in the games played and in the children who belong to the groups. In Blatchford's study, parents of children

with Developmental Coordination Disorder (DCD) explained that their children's inability to participate in physical activities contributed to their social isolation. Some of the mothers described how their children could be identified on the playground from distance because they were never moving or playing on any of the play equipment on the yard. These mothers also described how peers excluded their children from physical games during recess because they knew that the children with DCD were unable to perform these activities.

Segal et al. (2002) highlighted the International Classification of Functioning, Disability and Health (ICF) and the way it presents a framework for organizing and describing human functioning and its restrictions. This framework is based on the concept that impairment, which is defined as problems in body function or structure, may impact an individual's ability to perform activities and fully participate in life. According to ICF the manner and the extent of the impact on an individual's activities and participation depend on the impairment, individual characteristics, and social context. The results showed that parents' descriptions of the social impact of their children's DCD indicated that children's impaired performance of physical activities in the context of play in the middle of childhood may lead to restrictions concerning participation. One important factor parents identified was accepting peer groups. The most significant findings of this study are related to the occupational therapy. Children with DCD who had the opportunity to master the performance of a desired activity or occupation in a safe environment took advantage of this opportunity. Parents reported that the effects of mastering such new activities

and occupations were an increase in the size of the children's social group and in their adventurousness in bicycling to visit friends (Segal et al., 2002).

Skar (2002) acquires a deeper understanding of how children with disabilities perceive their technical aids in play situations. Skar transcribed interviews with eight children with disabilities and analyzed the interviews according to the constant comparative method of grounded theory described by Glaser and Strauss. Three categories were found, forming a model describing the child's relations in play situations to technical aids, to assistance and to the play environment. Two of the categories included relationships with adults. The children's opportunities to play required a parent or an assistant to be present. Access to the playground also required assistance of adults. The third category, relation to technical aids, was an individual one, as all children involved in the study perceived the technical aids differently. The technical aids were also seen as an extension of the child according to Skar (2002). The eight children with motor disabilities who selected to participate in an interview were between six and eleven years old. Each child had a medical diagnosis and was in need of a technical aid for his/her daily activities. The inclusion criteria were: six to twelve years of age, no intellectual disability, good verbal communication skills, and disability related to the medical diagnosis of Cerebral Palsy, Spina Bifida or different kinds of muscle diseases. A semi-structured interview guide was designed to assess issues of the study. Areas included were: type of games, play environment, and playmates. Example of requests used were: 'Tell me about the type of games you like to play', 'Tell me what it looks like where you play', and 'Tell me about your technical aids when you play'.

The results showed that playing outdoors was considered having fun, but a number of these children described hindrances in the environment (Skar, 2002). It was, for example, difficult or impossible for those who used wheelchairs to get to the playground. Once there, one of the limitations was the surface of the ground, which often was sandy. Many playgrounds had sand on the entire area, which made it difficult or impossible to walk around with a walking frame or to drive in a wheelchair. The snow was also a barrier for those children who had disabilities. Several playgrounds were fenced in, which made them difficult to enter with a technical aid. Three children described their accessibility problems in a similar way. One of them said that he could not even get into the playground because of the wheelchair. Five out of eight children reported that they needed assistance from adults in order to get on or off the different play equipment. The design of the playground equipment also limited the children's ability to make use of them. Several of the children were afraid when they were on top of the climbing facilities. There was no fence and some of the climbing facilities were very high. It could happen that other children's play on the playground was an obstacle for the children with disabilities. The games played by other children had a high speed and the children switched between the different play equipment all the time, exactly in the same way as described by Engdahl (2005). Her interpretation of this was that the children were extremely flexible and wanted to try everything in the yard. Skar (2002) however pointed out that access to technical aids and adjustment of the environment were two factors of great importance for children with disabilities and when this was attended to it actually created the necessary conditions for children with disabilities to live a social life that could enhance self-esteem and participation. The results of the study showed that barriers imposed by the play environment may severely limit the children's opportunities for free play. For

the most part, buildings and playgrounds have been constructed to meet the needs of children without disabilities. A playground or a schoolyard that is not adapted to children and adolescents with disabilities sends a message that this environment is meant for non-disabled children, and that other children are not welcome (Skar, 2002). It is in this way the physical environment can include or exclude certain groups of individuals.

The nature as a treasure for all

Swedish people in general are interested in nature, and as a group, the Swedes are known as a nation consisting of nature loving people. In Sweden you will find many nature reserves and these reserves are protected by the Nature Conservation Act. By a special law called “Allemansrätten” [The right of all people] everybody has the legal right to have access to private land (open country) if they follow the rules of protection of the nature which often is regarded as a treasure. This right is unique in the world and probably influence and support the interest for nature in Sweden. The woods are open for use and people are allowed to pick berries and mushrooms. At present the value of learning in outdoor education both for children and adolescents (with and without disabilities) are discussed, primarily as a consequence of inclusion - “a school for all” and “a society for all” - i.e. inclusive education, but outdoor education is also stressed for health reasons. There is also another expression which is frequently used in Sweden: “There is no bad weather, there are only bad clothes”. This means that nothing, but the clothes, can stop you from going outdoors. A good practise or example of this is that we in Sweden have preschools in outdoor environments called “Ur och skur” (in all weathers or in rain and shine). These kind of preschools can be found all over the world and

countries like Norway, Sweden and the United States are just a few of them.

In Sweden the positive and genuine attitude to nature is one of the starting points for outdoor activities and education in a wider perspective and also a starting point for this report. However, also this kind of preschools have been criticized mainly as it could also be regarded as a way to save money on children as the costs for the regular school premises can be excluded from the budget. With a little good will you can see the outdoor preschools as primarily positive, and a way to support good health conditions by an active life outdoors in the nature.

Another important starting point is that all human beings have the same rights to participate in social and cultural activities, and that all children have the right to education, play and leisure time according to The UN Convention on the Rights of the Child (UN, 1989). When talking about children the upper age is 18 years, which means that all young persons up to the age of 18 can be regarded as children from a legal point of view. However, it is essential to point out that the age aspect is only relevant in some respects and therefore it is adequate to mention the age of the child when you talk about children. The same difficulty will arise in transition from preschool to school, from school to higher education and from youth to adulthood. What concepts do we use when we talk about outdoor education and what are they based on? As a matter of fact there are so many different concepts on the Internet and they all define outdoor education in their special way, in order to be useful in different situations. The main problem is to find the 'right' definition for each situation and depending on how you will use it and for what reason. The only purpose for defining concepts is that other persons who read a text should be able to

understand what the terms mean in the specific context where it is used. To be provocative you could say that outdoor means to be outside the doors of an institution or to be outside the doors of an institution but indoors a museum? I suppose that most people would agree on the first part of this sentence but not on the second. It also depends on what glasses you wear when you look at “outdoor education” and what your purposes and perspectives are.

What is Outdoor Education?

The definitions could be based on different perspectives e.g. psycho-social perspectives or on aspects related to the role of nature and the environment per se. Outdoor Education can be defined in many different ways which is also evident in the project Learning in Motion (LIM) – Outdoor Education for adults with mental disabilities.

The definition is thus a difficulty in this context. The more countries, organisations and cultural groups that are involved the more difficult it is to make an agreement, suitable and acceptable for all. The definition and keywords suggested by the members in this project is:

‘Outdoor Education is a method of learning with the use of all senses. It takes place out-of-doors in a natural environment or other outdoor learning spaces. It is a ideal complement to the classroom and to traditional teaching methods’ (Eriksson-Dobrovich, 22 April, 2005).

The above definition is based in the role of nature and the environment and is a mixture of different definitions that can be found on Google (2005-06-13).

However, it is added an important sentence to this utterance that ‘the definition is maybe not applicable to the educational field Outdoor Education in general, but is the guideline for this specific project’. As far as it is regarded as a guideline it is acceptable, but it can never be a definition used in research. The main problem with all information on the Internet is that it is difficult to value and to get an idea of the scientific base of the information given. The keywords in the project origin from the Outdoor Education Research & Evaluation Centre and are: education/learning, outdoor, environment/nature/wilderness, adventure

The above definition is complicated as it is not really a definition, but a normative statement, as it argues that it is “a ideal complement to the classroom and to traditional methods”. It might be a complement to the former classroom teaching but in order to say anything about the fact how ideal it is or not cannot easily be stated as it depends on the pupils and on the school subject. From educational history it appears that teachers have since long time back taken their pupils out in the nature to learn from ‘reality’. Concepts like ‘learning by doing’ or practical experiments in nature conducted by the scout movement have shown that learning takes place in many informal contexts in today’s society. We believe that outdoor education can be used to describe activities going on outdoors and our philosophy of learning is that learning takes place in all situations and contexts where a human being is involved. This means that there are no situations in real life where learning does not take place. Outdoor learning could therefore be another dimension of learning. The theoretical approaches of outdoor education is therefore depending on the research questions you ask and the aim of the study you intend to conduct.

What categories are mainly used when talking about outdoor education and adventure education, and which concepts are used in computerized data bases?

The main concepts coming up are:

1. Learning & education
2. Wilderness & nature
3. Psycho-experimental activities
4. Psycho-social aspects of outdoor education
5. Facilitation in different contexts outdoors
6. Multi-dimensional aspects

In order to avoid ‘to event the wheel again’ i.e. that financial resources are used for the same kind of project as the LIM-project we tried to find out about similar projects supported by the European Commission and found one in Kinda Municipality (Kommun). They participated in the European project “Outdoor Education –Authentic learning in the context of landscapes” (1999-2002) in the Socrates Comenius programme. The objectives of the project was to find, compare and develop different perspectives on learning through landscape in the participating countries and use this knowledge in developing a continuing course in outdoor education within the European teacher training programmes (www.kindase.se/web/kinda/internet.nsf/, (2005-11-09). The main basis was a health perspective with focus on physical skills, concentration and personal growth in order to increase the interest for outdoor education.

In the description on the web side it appears that the purpose of this project was to build a bridge between outdoor education and knowledge and the participants wanted to facilitate learning about the different landscapes in

Europe. The use of information technology and outdoor education as a tool for learning will create and unite tomorrow's school. This will create a mutual place for a meeting between an analogue and a digital reality in a meaningful learning situation. It appears from the web article that "The flow of sounds, light, shapes and colour that nature offers stimulates the brain and creates a 'flow experience', a learning process that creates order from disorder" (<http://www.ode.kind.se/object.php> , p.1, 2004-12-15). The demands on teacher's competence, flexibility and new thinking will be changed for instance:

- to view outdoor environments as learning environments
- to work thematically and inter-disciplinarily
- to regard outdoors as a complement to indoor classrooms
- to work problem-based.

The result of the project was the development of new culturally based courses in outdoor education for the Czech Republic, Germany and The United Kingdom. However, the literature review is not published and only the literature included in the courses can be found. This is a critical point of this kind of project, which is supported by the European Commission, as one of the aspects is to transfer knowledge and information between the member states.

At present many countries have a strong focus on outdoor activities and education. One reason for this just now is probably that reports in media stress that more and more children and adolescents choose to spend many hours daily indoors playing computer games and searching the Internet instead of going outdoors to play. However, this is not the whole and only explanation for

children staying indoors. Actually many studies show that computers may be one reason why indoor activities are popular and sometimes prevent outdoor play but it is not the only one. Other reasons may be that the offering of media has increased, that children are left alone after school and prefer to stay indoors, that the western life style enhance indoor life and of course that the society as a whole support indoor activities. Many parents prefer that their children stay indoors as it is easier for them to have control of the child if they are at work.

The development of larger apartments and houses for families with children also stimulate children to stay indoors instead of going out to play. Young persons on the other hand often use the Internet to get new friends, to communicate and to get access to information that are not available otherwise (Brodin & Lindstrand, 2004). They make their own choices and use adults as models, and this will consequently lead to the same pattern as is dominating in adulthood. Children live in the present - not in the past - and they are children of the time being.

From integration to inclusion

The concepts integration and normalization were discussed already in the 50'ties and 60'ties, and the main reason was the normalization principle brought up by Nirje (2003). The main idea was that persons with disabilities should be able to live on the same living conditions as other children, adolescents and adults. A consequence of this principle was that institutions and special hospitals were abolished and that children and adolescents as far as possible moved back home and grow up with their parents and attended regular

schools, had access to technical aids and personal assistants and that individual teaching material was produced. Integration was a result of the normalization principle and instead of being isolated, persons with intellectual disabilities should live on the same living conditions as other children and adults. We took the step from a differential perspective to an integration perspective, i.e. from segregation towards integration (Brodin & Lindstrand, 2003).

From that perspective it is easy to come to the conclusion that integration has advanced fairly far in Sweden, but if we have higher demands on integration, i.e. that it should involve some kind of social community there is still much to do. A physical placement of a child with disability in a regular class does not mean integration if the child is not regarded as a natural part of the class and feels that he/she is accepted. Different forms of integration are used in research depending on what aspects you want to focus on. Integration can be based on an individual level, on a group level, on an environmental level (the school premises) or on a functional level based on the activities in the class/group. However, in order to be integrated the child must first be segregated, i.e. excluded. Segregation/exclusion is a prerequisite in order to be integrated. For a child who has been integrated from the start and never has been segregated the concept inclusion is today used. When talking about inclusion this means that the child has never been excluded and has spent all time together with typical children in preschool, school and leisure activities.

In inclusion concepts like holistic view and participatory approach are central. Our official view of inclusion is that Sweden stands for a strive for inclusion, although we doubt that we really do. We sort out children and place them in special classes if they have e.g. dyslexia, autism, ADHD (Attention deficit

hyperactivity disorders) and intellectual disabilities (Ljusberg, A.L, 2005). What we can see today is the growth of an elitist school for children who are very talented. As always this is supported by the expression “the good aim/the good will” which means that all pupils have the right to education based on their individual prerequisites. This is a cover or defence that has been used in history during many centuries. However, we would like to highlight what consequences this expression has for our view on human beings and human abilities, and what kind of knowledge this reflects.

What is obvious in this respect is to highlight the competence of teachers. For pupils with profound disabilities it is essential that we have teachers with an adequate teacher training in the Swedish schools. In this respect it is of great interest to study how teachers who will work in special education are trained. Cook and Schirmer (2003) mean that special education by tradition means that something different and extra is offered to the pupils. They argue that for many years educators have tried to find an answer to the question “what is special about special education” and they argue that instead of being a way to life, special education has been stopped even before they have got any help. Cook and Schirmer also state that the pupils are labelled and often segregated and that teachers defend it by saying “we meet the child on the level where he is” gives this labelling a legitimacy. However, in their article concerning special education they state that there are three issues that must be fulfilled in order to be regarded as special:

1. Effective educational methods must be developed to suit children with disabilities

2. The methods must be implemented and guaranteed to give results, be proved
3. The methods must be unique for special education, i.e. that they should not be used if special education was not required.

The above mentioned criteria are relevant also for outdoor education in relation to children and young persons with disabilities. When education indoors and outdoors is involved it is of great importance to stress both the prerequisites of each child and young person and to include the environmental factors which are affecting the child. In outdoor education the environmental conditions are decisive as they will include or exclude children from participation.

Aim, research questions and method

In the project Learning in Motion (LIM), within the Socrates programme, Grundtvig 1, five countries are involved: Sweden, Finland, Latvia, Germany and Greece. Two parties are involved from Sweden: Studieförbundet, Uppsala, who is also the coordinator of the project, and the Stockholm Institute of Education, represented by The Disability and Handicap Research Group within Child and Youth Science. The overall aim of the European project is to develop, examine and spread learning modules in outdoor education containing modules for both physical and sensitivity training for the main target group: children and adolescents with intellectual impairments in inclusive education.

The LIM project is financed by the European Commission and the number of partners is seven in five countries. Sweden is responsible to conduct empirical

studies on inclusion in Sweden, Finland and Germany. The research will focus on inclusion of two groups: children below the age of 18 years and young persons 18-25 years. Focus is on opportunities and obstacles to participate in outdoor activities and on the activity per se. The starting point will be two international literature reviews of outdoor education with focus on the groups mentioned above. The purpose of the partnership is to develop outdoor education for developing new learning environments for the target group. It is reasonable to believe that if "right" outdoor educational training is implemented in an organized way it will increase the intellectual capacity and the ability for the target group to develop basic skills in order to coop better in everyday life. For the participants the final project result is expected to contribute to innovative ideas, learning material, examples of good practices and an increased quality of life. The contribution of the Stockholm Institute of Education is thus to highlight inclusion in outdoor activities as specified in the signed partner agreement based on the 'Application proposal' by 26/2/04 for the project Learning in Motion, 113719-CP-1-2004-1-SER-G1. The tasks are specified as follows:

Inclusion in outdoor activities

This project will focus on inclusion of young persons in outdoor activities. The first part of the project will be to conduct a literature review on outdoor activities for children and adolescents in order to find out what the conditions and prerequisites are. The second part includes field studies in Sweden, Finland and Germany in two different groups:

1. Children 12-18 years
2. Young persons 18-25 years

The first group with focus on children is to be regarded as a reference group. The main aim is to find out how inclusive education is working in outdoor environments in different countries and when exclusion is a reality (p. 3, Partner Agreement).

The brief literature survey will result in two reports with focus on inclusion. The first report includes the first years up to the age of 18 with main emphasis on children in general and the second report will stress inclusion of young persons between 18 and 25 years with intellectual disabilities. The second part, which will start in 2006, will include field studies on inclusion in Finland, Germany and Sweden.

The focus of this report will be on children in early childhood in general and especially on children between 12 and 18 years and whether outdoor education will promote inclusion in different outdoor activities and environments. What activities are available for children at their leisure time? Do these activities stimulate and support child development and inclusion?

This report *Inclusion of children in Outdoor Education, Learning in Motion, Report 1*, is based on a limited literature review on outdoor education for all children with and without disabilities. The starting point is outdoor education for children of early ages in preschools and continue with children up to the age of 18. The main reason for this grouping in age ranges is that many researchers have found breaking points where inclusion is no longer natural for young children. In preschool this is seldom a problem but when children start at school the difficulties often come. In order to understand inclusion and what it is all about it is necessary to understand the under-laying agenda for deviation and atypical behaviour in children and young persons.

The aim of this report is thus to highlight inclusion of children and young persons with and without disabilities with a special focus on activities in outdoor education. The method used is to describe what has been done in the

field by searching the Internet (Altavista and Google), to use references in already published journal articles and to make surveys in databases (Libris and ERIC). The keywords used were: outdoor education + outdoor education and children and preschool. In the introduction part of the report an example was given about the keywords and this showed that outdoor education and children gave 25 hits in Libris and when preschool was added only four hits were given. When comparing the result with the results from ERIC, which is one of the largest in the educational and closely related fields, outdoor education and children gave 1426 hits and when preschool was added 260 hits.

In order to find out how relevant the keywords for this project is a new search in Libris and in ERIC was conducted (December 30th, 2005). The results given below show that the international literature seems to be more extensive than the Swedish.

Education and learning (3682 hits) and *outdoor* gave 3267 in ERIC and 21 hits in Libris

Education and nature and wilderness gave 3 hits in both databases – but different

Adventure and children (97 hits in Libris, 609 hits in ERIC) and *outdoor education* gave 3 hits in Libris and 22 in ERIC.

When *disability* was added all hits decreased and in Libris we found none and in ERIC four hits. Most of the literature was practical books or papers from camps – few were scientific articles. Also the results from Google and Altavista proved not to be very useful. We have also tried other keywords in order to find relevant literature but finally decided to look at the reference lists in already

published articles, as these seems to be easier to evaluate than the information received from the Internet.

Children and Outdoor Play

What is evident today is that many studies concerning information and communication technology (ICT) have been conducted on the importance of integrating technology into the elementary and secondary curriculum (Brodin & Lindstrand, 2003, 2004) and ICT is in these contexts regarded as a tool for learning. Computers are also introduced in preschools in order to give children who do not have computers at home a possibility to get acquainted with the new technology, i.e. to get equal opportunities in education and daily life for all children. For young children with severe disabilities computers can offer opportunities to play with peers. Two main areas at risk are often stressed concerning children's computer use: isolation and loss of focus of interest. Both these fears seem to be exaggerated as children in general are flexible and change play activities all the time. They move from one activity to another and seem to be extremely flexible in their choice of activities (Brodin & Lindstrand, 2004). Few young children would for instance choose to sit in front of a computer if they had to choose between a computer and a big pool of clay and water.

Engdahl (2005) has conducted a study concerning outdoor play in two preschools and stresses that there are many factors influencing the play situation for preschool children. Focus on her study is on social interaction between children who are between four and five years old in two different

preschool outdoor environments. The questions were: What games do the children play? Who is involved in the activity? How do the children interact? What parts of the preschool yard is used for playing? The study has an ethnographic approach and is based on observations and child interviews. Children's play and social interaction are complex issues and Engdahl's study does not give any clear answers to the research questions. The two preschool environments she has studied show a difference with regard to the number of conflicts between the children, how these conflicts were solved and how the children showed endurance in play. Consequently, the study rather generated new research questions. It is however reasonable to believe that many aspects may affect the climate at the preschool for instance the socio economic aspect, the number of preschool teachers present, the number of children in each group, and the architecture of the preschool yard. All these factors will probably in one way or another influence the social climate between the children in the preschool setting. Engdahl points out the necessity to continue to study different preschool yards and how children interact when they play outdoors in order to understand what they learn from outdoor play.

Also Brodin and Lindstrand (2005) have conducted studies of young children's play and learning in outdoor environments. They state that play is a natural form of movement and that an outdoor play area provides opportunities for children to explore the environment at their own individual levels of development. A creative play experience enables children to test their skills, try new ideas and seek challenges that cannot be duplicated in other environments. What is evident is that children often play in areas where adults do not expect them to play and that they by this disobedience learn about new things. Children often prefer to play at hidden places where adults have no insight and

at these places they learn to interact with peers and artefacts. When looking at preschool children's outdoor play it is evident that they prefer to play with natural material such as sand, water and clay. Outdoor play stimulates their senses and informal learning takes place. The richness of nature per se creates extensive learning situations.

Lindstrand (2005) conducted a literature review about children's outdoor play and playgrounds. She reports "A reappearing pattern in this literature review is that of plurality and complexity and also the plurality of methods that have been used" (p. 103). One finding is that it is what happens when children interact that makes their playground powerful and revealing. Children learn to cooperate with peers, they develop their communication skills and make friends. She also reports that the methods used by the various researchers gave different kind of information and thus different results.

One conclusion is however that improvements in playground design are important and especially for young children activities that stimulate their gross-motor, social, dramatic and constructive play can be further improved. An interesting issue to be explored concerns the quality of friendships in the different settings and also focus on the social interaction. Lindstrand's conclusion is that we need new ways to study playground life. She suggests an activity theory approach based on a social constructivist theory. Focus will then be on human activities and she refers to Nardi (1996) who states that "all human activity is embedded in a social matrix consisting of people and artefacts" (p. 107). From the above, it is reasonable to believe, that if children shall be able to learn from and in an outdoor environment, the playgrounds must be tempting and stimulating for them. A good outdoor environment will

thus enhance good collaboration for instance in play and the social interaction will increase and support child development.

Preschoolers with and without disabilities

English, Goldstein, Shafer and Kaczmark (1997) investigated the effects of alternative strategies that included pairing four children with disabilities with several trained peers ("buddies") during a variety of activities across the school and teaching interaction skills to both children with and without disabilities. The promotion of development of friendship for children with disabilities is considered a primary educational goal. Peer-mediated interventions have been used successfully to increase social interaction between children with and without disabilities, although implementation has usually been restricted to play time (op. cit. p 230).

From the study two main questions arose:

1. What are the effects of peer intervention on the social interaction of preschoolers with moderate developmental disabilities when paired daily with more than one trained peer?
2. What are the effects of supplemental dyadic intervention (i.e., follow-up training with both members of a dyad) on the social interactions of peer-target child dyads?

The results showed that interactions between children with and without disabilities increased significantly after peer training, and that supplemental dyadic training resulted in minimal increases in responsiveness on the part of children with disabilities. This intervention appears to be a useful approach for

promoting peer interactions, a prerequisite for the development of friendships in integrated preschools. Typically, children can be effective mediators of intervention when taught to use social strategies such as establishing eye contact, asking a child to play or share a toy, suggesting play ideas, describing their own or other children's play, and being responsive to the play of classmates with disabilities (English et al., 1997).

Outdoor play as a diagnostic tool

Outdoor play can as well as indoor play be used as a diagnostic tool. Research has shown that several studies concerning children with disabilities focus on learning and training of skills (e.g., Malone & Langone, 1994) and assessment and treatment (e.g., Fromberg, 1992). Brodin (1999) emphasizes the problems connected to using play as a tool for obtaining different goals instead of accepting play as a joyful activity without any other demands. She means that it is obvious that for children with disabilities play offers training to increase their functional skills as a side-effect, but for many parents and professionals the value of play primarily seems to be a matter of performing. One of the problems with this play/training is that children with severe and profound disabilities are not always able to indicate when they are finished or bored with an activity. For this reason they are dependent on adults who know the child well and are observant to the child. By watching a child who is playing it is possible to assess the level of development of a child, but it is also easy to over interpret or to underestimate what you see. Therefore this kind of diagnostic assessment is of limited importance for children with disabilities in general as they are on different levels of development with regard to different abilities.

Watkinson, Dunn, Cavaliere, Calzonett, Wilhelm, and Dwyer (2001) looked at the engagement in playground activities as a criterion for diagnosing developmental co-ordination disorder. The purpose was to develop a valid protocol for use by physical educators in assessing whether children suspected of having developmental co-ordination disorder (DCD) meet the American Psychiatric Association's (1994) diagnostic criterion of interference in activities of daily living when interference is defined as culturally sub-average engagement in activities of daily living in physical play (ADL-PP) on the playground. Participants were 136 children (75 girls, 61 boys) from grades one to four at three elementary schools in Canada. This study has presented a protocol for determining the activities of daily living that are specific to a meaningful cohort, i.e. a classmate, and for identifying children who meet a criterion of interference in activities of daily living in physical play on the playground. However it does not indicate what led to withdrawal or exclusion. The protocol only identifies children who may have lack of competence (Watkinson et al., 2001).

Outdoor Education

Education outdoors as method of learning is well established and has been used for many decades and is often connected to adventurous situations where young people are involved. Education in the outdoors gives however, a wide spread of practices. What we can see today is that outdoor education for young persons/young adults is mainly described in terms of lifelong learning and this will give it a new role. Any educational activity in the open air in rural areas and in urban areas can thus be regarded as outdoor education (Gair, 1997). The

main question is still what we mean by outdoor education, how we define the concept. In general outdoor education will include studies outdoors as geography or archaeology but it can also include sailing, scouting or skiing. Gair states that “the benefits of what we can achieve with regard to the development of young people through outdoor education are, likewise, unquantifiable” (p. 24). He means that outdoor education often is connected to adventurous activities and experiences, and by this give young people a challenge in life.

Hopkins and Putnam (1993) stressed three components of importance in outdoor education related to: self, others and the natural environment. The first concept (self) include the individual participant and how the adventurous activities will enhance and increase the self-conception and self-awareness. The second concept (others) may support the group development and cooperation in the group and also to forge effective underlying social structures. The third concept (the natural environment) will provide adventure education with a lot of challenges. Knowledge and awareness of the nature will grow at the same time as the participants get physical challenges. The value of learning in the outdoors is emphasized and the vital importance of outdoor education as a learning resource is highlighted. Concepts like leadership, teambuilding and problem solving are keywords in this kind of outdoor activities and many participants in this kind of outdoor education are young adults. The main group of children involved are children between 12 and 18 years and an example of an activity based on this is the scout movement, but also some sport activities

Gair argues that young people get positive support in their total development from nature as their senses are stimulated. Gair (1997) states that outdoor

education is an ongoing process where mutual support is standard. He comments that it is rare that young people are left in a vacuum, i.e. are excluded in these contexts. Based on that statement it is reasonable to believe that outdoor education could promote inclusion in social life and hinder exclusion. He also mentions that the positive support may stimulate the self-esteem and the self-confidence which shows that outdoor education has a psychological aspect for development of the self.

There are consequently many different definitions of outdoor education. The area can be both interdisciplinary and thematic. Most researchers agree upon the fact that informal learning always takes place in an outdoor environment. In schools it is often used as a complement to traditional teaching and learning methods, which is the situation in many Swedish schools today especially in subjects like geography, history, archaeology, biology and ecology. An important observation is that outdoor education is as relevant in nature in rural areas as in cities. Sometimes outdoor education is related to recreation such as walking, jogging and going on rollerblades in the open air in the parks, and sometimes it is described as an activity taking place outdoor of the home or institution (e.g. in school), but this definition is probably to go too far. Therefore going to a museum or exhibition is in this text not regarded as outdoor education with the exception of a museum in the outdoors. An example of an open air museum in Stockholm is Skansen with a zoological park and with a great number of old buildings. Many teachers go to Skansen with their pupils in order to learn about the Nordic animals and fauna and how people used to live in Sweden centuries ago. This kind of education is also a consequence of the Swedes interest in learning about and from the nature.

Playgrounds

Accessibility to playgrounds

In Sweden many organizations have tried to build a *playground for all*. The intention is good but it is not uncomplicated to cover all the areas of disability and make the playground accessible for all. In Åkersberga, a community outside Stockholm, one of the first playgrounds in Sweden was designed with financial support from the Swedish National Inheritance Fund. The organization IPA (Children's right to play) was responsible for the project and both authors of this report (Brodin & Lindstrand, 2006) were involved in this activity. Unfortunately, the money granted for the playground was not enough and we had to do many concessions which effected the quality of the playground. Sometimes contradictions between what is good for one group of children (e.g., asphalt ground to give access for wheel chairs) might be bad for another (e.g., active children with a great need of movement might fall).

In Kalmar, a city in the south east of Sweden, a playground for children with autism and elderly with dementia has been designed. Their needs are different but they can use the same area for play and recreation, which is challenging.

Spencer (2002, 2003) states that because of a renewed focus on accessibility, more and more playgrounds across America are accessible to children with disabilities. Spencer (2003) points out that play is an important part of children's lives, no matter what their abilities. Play enables children to develop skills in reasoning, creative expression and sensory perception. Socialized play, incorporating special-needs children with their able-bodied peers, serves to

further the benefits of play, allowing children to discover their peers, and learn the similarities and differences that make them unique. Through play, children are constantly learning and exploring who they are, while developing physical attributes important to their overall health and wellness. When designing a playground, incorporating accessibility into the design should begin early in the process, with consideration given to layout, circulation, and component selection (op.cit).

Doctoroff (2001) also highlights considerations in designing high-quality, developmentally appropriate environments for all children. Suggestions for arranging classroom space focus on the arrangement and accessibility of play areas. Doctoroff points out that the creation of high-quality inclusive play environments is based on the premise that the play of all young children must be supported. Environmental support for play encompasses a wide array of strategies, ranging from well-defined, individual areas for play and strategic selection and placement of play materials to making the playspace and materials fully accessible and responsive to children with diverse abilities, interests, and needs. A classroom and outdoor play environment that is carefully planned to meet the developmental, sensorimotor, behavioral, social, and emotional needs of each child has the potential to enrich and extend the play possibilities for all of the children (op.cit).

Attitudes of key persons to accessibility of playgrounds

Prellwitz and Tamm (1999) point out that playgrounds are an important outdoor environment for children. But few playgrounds are designed to be accessible to children with restricted mobility. In this study the child with

restricted mobility is defined as one who is unable to move around without the aid of a wheelchair, walking-frame, cane, or other walking device. The purpose of the study was to explore the attitudes to accessibility problems in playgrounds among two groups of key persons: “creators” and “users of playgrounds” in a medium-sized municipality in northern Sweden. Eleven key persons, five “creators of playgrounds” and six “users of playgrounds” were interviewed in a semi-structured interview. The interviews were analyzed according to content analysis and coded under different themes. The interviews with the users of the playgrounds were coded under two themes. The first theme was “The playground is not for me” and the second was “Assistance is a precondition for accessibility”. The results were discussed in the light of how the inaccessibility of play environments can affect the development of children with restricted mobility, and affect their possibilities of a life on a par with that of other children (Prellwitz & Tamm, 1999). The results showed that those who created playgrounds were hindered by disorganization, an insufficient knowledge of disabilities, poor economy, and unsuitable attitudes.

Prellwitz and Tamm (1999) point out one important question: How should playgrounds be constructed to correspond to the different needs of children? The results indicate that in the municipality studied there are many obstacles in playgrounds for children with restricted mobility. That means that the children with restricted mobility living in this municipality cannot play in a natural way in the municipality’s playgrounds. The demands imposed by this environment are in most aspects too high for children with restricted mobility. There have only been attempts to adapt the child’s ability with the help of personal or school assistants and technical aids, but no attempts have been made to adapt the environment to the child’s ability. Prellwitz and Tamm’s (1999) study

shows that the key persons who create the playgrounds have insufficient knowledge about impairment and handicaps, and that their work methods do not naturally bring them into contact with those persons who possess such knowledge. Prellwitz and Tamm tell us that the fact that economy can be an obstacle is a well-known phenomenon in all societies, including Swedish society. The interviews expressed views on the costliness of adapting play equipment, but also on the costliness of consulting other professional groups. The playgrounds also lacked accessibility, and that seemed to surprise those who create these environments (Prellwitz & Tamm, 1999).

Play environments for children in need of special support

Winter (1994) examine the implications of the Americans with Disabilities Act (ADA) and the role of developmentally appropriate practice when insuring the inclusion of children with disabilities in play environments. Winter (1994) discuss four principles that should guide the creation of safe, inclusive play environments: safety, developmentally appropriate practice, full inclusion, and interplay of the first three principles in unison. To be considered an inclusive play environment, a play area must have three components: access, activity, and variability. Many supposedly inclusive play environments provide access, but fall short in the provision of either activity or variability. Access refers to a person's ability to physically enter a desired location. This is most often discussed in terms of door widths, ramps and the absence or presence of barriers. Activity is a person's ability to take an active part in an experience. It is not enough to get close to one's playmates without being able to engage in the same activities. The third aspect of inclusion, variability, refers to the

ability of all persons to select from a range of options to find a personally appropriate choice (op. cit.).

ADA requires that reasonable steps be taken to ensure that all citizens have the same opportunities for education, recreation and job fulfillment. Winter (1994) suggest that consulting with physical therapists, occupational therapists and other specialists may yield valuable information to use in planning for the play and comfort of special needs children. Thompson, Hudson, and Bowers, (2002) confirmed these results in their study in 2002.

Playground interactions for children in need of special support

Nabors and Badawi's (1997) experience is that very young children in need of special support are likely to be placed in inclusive educational settings with their typically-developing peers. Forty-five typically-developing children and 19 children in need of special support, ages three to five, were observed interacting on the playground. Observers recorded three types of play engaged in by the children. These included: playing alone, playing with a teacher, or playing co-operatively with a peer. Children with special needs were observed playing alone or with a teacher more often than with their typically-developing peers. Results of this study provide information about the types of play engaged in by preschool-age children in need of special support and their typically-developing peers on the playground, which is a useful setting for studying the social interactions of young children. These results are similar to those presented by researchers who have examined the co-operative interactions of preschool-age children with special needs in the classroom. Children with

special needs often have more difficulty communicating and interacting with their peers compared to their typically-developing classmates and would benefit from interventions to increase their involvement in co-operative activities (Nabors & Badawi, 1997).

The results indicated that teachers used some effective interventions to increase the involvement of children in need of special support in playground interactions with their peers. Two of their most successful strategies included finding a role for a child with special needs in ongoing play and encouraging other children to participate in a teacher-directed activity with other children who had special needs. Children in need of special support often engage in one-on-one play with their teachers. Teachers then have an opportunity to promote play between children with and without special needs (op. cit.) Nabors and Badawi (1997) have some suggestions that playground equipment and structures should be designed to be user-friendly for children who have physical or other types of impairments. Teachers and therapists should develop activities that invite co-operative play between children.

Children between 12 and 18 years

What has been said above is mainly related to younger children up to age of 12. When they grew up to teenagers new interests and activities turn up. Many youngsters participate in outdoor activities of different kinds. The activities they used to take part in are still there but new activities are added e.g., sports (tennis, soccer, football, basketball, beach-ball, skiing, skating, ice-hockey,

sailing, horse riding), scouting (land or sea scouting), and special interest groups with nature and camping in focus. Generally, boys tend to participate in competitions more than girls and they are often involved in team sports. Girls seem to prefer individual sports such as horse riding and gymnastics. The differences are well-known by researchers although there is at present a tendency that girls more often are involved in team sports such as soccer and basketball. An example of a study on a sport activity will be presented below.

Football participation in the primary school playground

Smyth and Anderson (2001) investigated whether children with motor disabilities were more isolated than others on the school playground. Another question was if they play team games such as soccer less often than others. The goal of Smyth and Anderson's (2001) investigation was to examine whether early co-ordination skills were related to later soccer participation on the school playground. The participants were 64 boys, 32 in a movement-impaired group and 32 in a non-impaired group. They were divided into groups of those who were often alone and those who were not. The not-alone group was further subdivided into those who played soccer for considerable periods and those who did not. There were 10 boys with poor scores on the Movement ABC who were not often alone and who played soccer for considerable amounts of time. Each child was observed on ten separate occasions, spread over two weeks. Matched pairs were observed as closely together as possible and at the same time of the day. The analyses indicate that the balance subscale was significantly related to participation in soccer, but that some boys with relatively poor balance scores did play soccer. Only extremely poor

performance on the balance tasks of the Movement ABC was related to non-participation in soccer. Some of the key differences between groups of children with movement impairments in terms of their inclusion in social and physical games like soccer may not relate to hand/eye co-ordination and manual control. They may rather relate to the ability to remain standing while carrying out other movements, particularly when balance skills are extremely poor (Smyth & Anderson, 2001).

Smyth and Anderson's (2001) results showed that time spent playing soccer was not a pure measure of either ability or effort. A child with good soccer skills may play soccer a lot, but so may a child who is highly motivated and keen to play. Some of the outcome of early motor impairment may be related to motivation and effort; some of the boys in the DCD (Developmental Co-ordination Disorder) group spent considerable amounts of time alone, and some did not. Some of those who were not alone on many occasions played soccer a great deal, and some did not. Previous analyses have indicated that although DCD boys as a group were both more alone, and played less soccer, this does not apply to all DCD boys. Some were engaged in soccer, which is a highly regarded social and physical activity, for a large proportion of the time. Having very poor balance was strongly related to lack of participation. These children were excluded from the most active and social activity for boys in these playgrounds (op.cit).

The scout movement

The scout movement was founded in 1907 by the English citizens Robert Baden-Powell. He was a military and known for his achievements in the Boer war. The scout movement is global and has about 38 million members in the world and since the movement started about 130 millions of boys and girls have been members. What is special with the scout movement is that it is the only voluntary organization which has gathered boys and girls from different nations, religions and ethnical backgrounds (Westberg, 2004). The purpose of the Swedish scout organization is to educate children and adolescents in the spirit of the scout law. The motto is “Be prepared” and the password “Always prepared”. Scouting is an arena where young persons create their own adventures, learn different things in cooperation with others, develop the ability for leadership and cooperation, go to camps in the nature, and meet friends (Westberg, 2004). The Swedish scout organization states that the aim of scouting is to support the individual development of each scout. To be close to the nature and to learn about the nature is of great importance in scouting and for many years religion was also closely connected to the scout movement. Today scouting is more or less an organization where young people meet and have fun together. The nearness to nature is always present and many of the activities take place outdoors. From research appears that the scout should be unselfish, helpful and independent. The voluntary organization is spread over all social classes and the love for the native country is in focus. Scouting is a way of living – close to the nature and with a close connection to outdoor learning and education.

The Swedish organization for promotion of outdoor activities (Friluftsförbundet)

The Swedish organization for promotion of outdoor activities is a nation wide organization divided into districts. In the Stockholm district there are 35 local clubs who arrange outdoor activities for children, adolescents and adults. Activities like Kayak, Hiking, Pole walk and Skating are organized mainly for adults. As mentioned in the introduction – the Swedes are known as a nature loving people, and in old days the relation was much closer than it is today. People lived close to the nature and was actually part of it, which is also the case with some ethnical groups in other parts of the world.

Parents and preschool teachers are interested in providing children with knowledge about the nature and also to learn them to have respect for the nature and arrange activities in the woods such as “Knytte” for children between two and four years and “Mulle” for children between six and seven years. They also organize “In all weather schools” where the nature is the regular classroom and outdoor education reality. The basic idea with this outdoor education is to fulfill the children’s needs for knowledge, motor activities and interaction with friends during play outdoors. For children the organization has a large number of courses where they learn to ski, skate and to get knowledge about the nature. For adolescents the “Strövar” activity which is similar to scouting, might be a challenge. They walk in the woods, have camps and sleep out in the open air, learn about the nature and how to make a fire, what they can eat from the nature and how to survive in the woods. In some way, you could say that they are getting prepared to survive on what is available in the nature. This was in older times something that was extremely

important to have knowledge about but today's human beings have lost this kind of knowledge.

The organization integrates outdoor education with environmental awareness and the leaders working are well educated. Therefore the quality of the education is high and many schools and preschools have an established cooperation with the organization in order to give the pupils the best education. One aspect of being outdoors is that children get more healthy and do not catch infections as easy as indoors.

Organisations working with outdoor education

The European Institute of Outdoor Adventure Education and Experiential Learning (EOE) is located in High Wycombe in the United Kingdom. It was founded in 1996 as a non-governmental association for youth. The organization has 248 individual members and 80 organisations from 22 countries (January, 2003).

The purposes of the organisation are:

- to develop a network between youngsters, social and youth workers, teachers, educators, academics and students concerning EOE (see above)
- to organise European conferences
- to distribute information
- to conduct research on the theory of EOE and to implement research projects

and develop professional standards (<http://www.eoe-network.org/Main.htm> (2004-12-15)).

The Institute for Outdoor Learning is another organisation located in United Kingdom, that started in 2001. The purpose of the institute is to promote the value of outdoor learning and to promote and develop excellence in quality of outdoor practices. The purpose is also to enhance quality of life, provide exercise, relaxation and enjoyment and the institute organises development opportunities and support for networking good practices. The organisation has over 1000 individual members who are committed to outdoor learning for children, young people and adults in the private, voluntary, and charity sectors. Essential aims are to develop awareness and understanding of self and relationships, to encourage responsibility for self and for one's own learning, to develop awareness and respect for the environment and build the ability for purposeful recreation. The tasks are strongly related to concepts like self development, adventure and recreation.

The institute offers adventure activities, outdoor jobs vacancies, courses, conferences and forums, network of practitioners and academics, discounts on clothing, services and books.

(<http://www.outdoor-learning.org/> (2005-05-02)).

The main problem with all this information available on the Internet is that you never know how actual it is and if the organizations still exist.

Conclusion

The aim of this report is to give a brief review of inclusion in outdoor education of children below the age of 18 years. The literature review covers typical and atypical children and has an inclusive approach which means that all children are included. Inclusion in outdoor education is common when children are young which means that most children in Sweden are included in regular preschools up to the age of seven years. As a majority of Swedish women work outside the home a majority of the children have access to day care in preschools. Most preschools have a playground where the children spend part of the day outdoors.

The activities outdoors are play and social interaction with peers, and most children enjoy outdoor play. Outdoor activities mean freedom and plenty of room to move and act. The area indoors is often limited in opposition to outdoors and outdoor play often invites to running, jumping and climbing which is necessary for the muscular development. To search and investigate nature is essential in early childhood and the richness of nature will support the development of the curious child and become a tool for learning. During the first years up to the age of seven most children are included in all activities and especially in outdoor activities, where it is easier to play many together.

When children start school a new period of life starts. The children between seven and twelve still have the same interests as in earlier ages and the nature still plays an important role. The games outdoors are similar to previous years and develop continuously. Different peer groups focus on special interests and this will sometimes exclude some of children in school. Also the opportunities

for children with disabilities to participate in play and games are decreasing as they for physical or psychical reasons may have difficulties to participate. Exclusion is more and more common although outdoor education seems to stimulate to cooperation and understanding of friends who have limitations of different kinds.

From twelve to eighteen years the peers take more and more time and the young persons spend even more time with friends than with the family. The family has less importance and most of their leisure time they spend with friends. Some groups of youngsters are still interested in sports and continue to play football, soccer and ice-hockey, and the interest for team work and competitions increase. Many activities are indoors although there are also groups who are more interested in outdoor activities and outdoor education. Outdoor activities of great interest are scouting, sailing, winter sports and orientation in summer. Outdoor education excludes persons with disabilities but it may also include. What is evident is that it is not the prerequisite per se that sets the limits but also the efforts of the other participants in the immediate environment. One conclusion from the studies in this report is that inclusion is easier in outdoor environments and that outdoor learning is a way to facilitate learning, especially in certain areas which are based on the concrete reality. The next step in the LIM project will be to make empirical studies on inclusion in outdoor education.

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