ENVIRONMENTAL EDUCATION AND TRAINING IN EUROPE

Background paper for the European Union Conference on EE&T in Europe Brussels 3 - 4 May 1999

Much learning does not teach understanding
Heraclitus
A man must always study but he must not always go to school
Montaigne
Education is what remains when we forget all we have been taught
George Savile, Lord Halifax

Colophon

This background paper has been prepared upon request of the Directorate General for Environment (DG XI) of the European Commission in order to provide the participants with a background for discussion in the Conference on EE & T in Europe, to be held in Brussels on 3-4 May 1999.

SME MilieuAdviseurs devotes itself - also for coming generations - to a sustainable world. As non profit consultancy its aspiration is to contribute towards a balance between ecology and economy. A practical view on the job, focused on feasible advice, result-oriented project management, and communication products, which stimulate effective environmental behaviour. Since 1976 SME MilieuAdviseurs works for the Dutch Government, local authorities, NGO's and the private sector. This provides the organisation with access to a large network of stakeholders. SME MilieuAdviseurs helps with the formulation and implementation of environmental policies. It is specialised in learning and bottom-up processes, which really activate the involvement of people. It provides advice, training and practical involvement measures for the implementation of primary environmental care. SME MilieuAdviseurs also regularly initiates projects for a more sustainable future.

About the Authors

Frits Hesselink is a former director and co-founder (in 1976) of SME MilieuAdviseurs. He was involved for more than a decade in the formulation and implementation of the various Dutch national Programmes for Environmental Education. In 1994 he became the Chair of the IUCN Commission on Education and Communication (CEC), a world-wide network of experts with a mission to champion the integration of these instruments in the policymix and to build capacity for communication as a management and policy tool. In his capacity of Chair of the CEC network, Frits Hesselink has access to various initiatives, innovations, new strategies and developments in the field of environmental education and communication world-wide. Since 1998 Frits Hesselink is working for his own consultancy firm in the field of environmental education, communication and training, carrying out projects for governments and international organisations in Europe and in other parts of the world.

Peter Paul van Kempen has a long experience in environmental education and marketing communication. After working for SME MilieuAdviseurs and several market research companies in the Netherlands, he now is self employed. For this back ground paper he carried out the research and quick scan.

1 Introduction

Background

Since many years DG XI - the Directorate General on Environment, Nuclear Safety and Civil Protection - of the European Commission has invested considerable money, effort and time in the stimulation and co-ordination of activities in the field of Environmental Education and Training (EE&T) in the members states of the European Union. On the doorstep of the new millennium the Commission would like to review its efforts and policies, to learn from the past, to continue standing successful support and to explore new challenges for its role in the future in the field of EE&T in Europe.

Policy in Dialogue

In order to avoid decision making behind desks, the Commission has called for a conference on Environmental Education and Training in Europe, whose initiative has been taken by the Directorate General XI (Environment, Nuclear Safety and Civil Protection).. The Standing Working Group of national experts in the field of EE&T has been involved in this initiative from the start. The initiators hope that a dialogue with a broader constituency will add value to their discussions so far.

Stakeholders

The commission has invited for this conference national experts in EE&T with various backgrounds: governments, academia, private sector, NGO's and the formal education sector. In addition to these experts the Commission invited representatives of other international organisations and of several DG's of the Commission. Last but not least the Commission invited representatives of the Leonardo and Socrates Programme Committees. - as these have existing or potential links with EE&T. The conference is to be held on 3 and 4 May in Brussels, Belgium.

Desired Outcome of the Conference

The objectives of the conference are to:

- put the opportunities of EE&T on the agenda of decision-makers within the European Commission and national Governments.
- exchange information on present and future roles of EE&T in members states
- discuss in that light the added value of activities by the European Commission.
- explore new challenges for the role of the Commission
- stimulate networking and informal contacts among experts from the Commission and Member States.

Why a background paper?

To stimulate the discussion during the Conference, the Commission has asked the authors to write a background paper. The objectives of this background paper are to:

• give a synopsis of the state of affairs in the field of and training in the European Community.

- clarify different visions and highlights in the professional discussion on the role of EE&T in the light of sustainable development
- stimulate the discussion about desirable perspectives for EU activities
- generate ideas about potential tracks for the immediate future.

Scope of this paper

Within the framework of a short and readable paper it is impossible to describe the exact situation with regard to EE&T in each of the member states. Moreover the Commission has published such a state of affairs recently (Environmental education in the European Union, EC, 1997). In this paper the trends in the role of EE&T are highlighted, and especially the attention is focussed on innovation and new trends. The reality in many Members States and in the Accession Countries may vary substantially. It is the conviction of the authors however that these trends are manifest, or will be so shortly in one way or the other, in all European countries.

Methods used

To formulate some stimulating thoughts for desirable perspectives for EU activities in the field of EE&T the authors took note of evaluation studies commissioned by DG XI. They interviewed experts in the field of EE&T in the various member states. Among them members of the Standing Working Group of the Commission on EE&T, project leaders of projects subsidised by DG XI and other experts. This quick scan resulted in an overview of opinions and perceptions of the current and future role of the Commission. The scope of the quick scan make the results more an illustration of ideas of experts, than a scientific assessment of the state of affairs.

What to find in Chapter 2

To make this paper as accessible as possible the authors start with a chapter which gives an update on the framework of the mandates within which the Commission can and has been operating in the field of EE&T. This chapter also gives a short overview and analysis of the activities of the Commission so far in the field of EE&T.

What to find in Chapter 3

In the third Chapter the authors focus on the professional discussion in Europe about the role of environmental education and vocational training within the context of Sustainable Development. Among other things they base themselves on literature, international and national policy documents and the outcomes of the recent Pan European Expert Meeting on Sustainable Development and Environmental Training, convened by the Dutch Government and IUCN in the Netherlands (27-29 January 1999). They have tried to illustrate the often abstract discussion with graphics and other illustrations.

What to find in Chapter 4

In Chapter four the authors address desirable perspectives for future activities by the European Commission. They do so by analysing the results of the quick scan among experts and the general trends of the professional discussion on EE&T. The chapter looks at achievements, strong and weak points, opportunities and threats. It ends by formulating some desirable perspectives and potential future actions.

Who to blame?

The opinions expressed in this paper are explicitly not those of the European Commission but are solely to be attributed to the authors. To stimulate the discussion and facilitate a dialogue on desirable future perspectives for the Commission, the authors have chosen to be rather provocative than compromising.

Utrecht, March 1999 Frits J. Hesselink Peter Paul van Kempen

2 EE&T in the context of the European Union

This chapter summarises the framework of EC-policies in the field of EE&T and the activities of the Commission. The aim is not to be complete, but to present a selection of important policies.

2.1 Policy framework for EE&T

The 1988 Resolution of the Council on Environmental Education (date and reference of the Resolutions should be put): Objective of EE&T

The basis for the activities of the European Commission in the field of EE&T is formed by the Resolution of 24 May 1988 of the Council of the Ministers of Education. This resolution underscores the essential role EE&T plays in achieving environmental protection. The objective of EE&T, according to the resolution, is: "to increase the public awareness of the problems in this field, as well as possible solutions, and to lay the foundations for a fully informed and active participation of the individual in the protection of the environment and the prudent and rational use of resources."

The 1988 resolution: action to be taken at member state level and community level

It is important to realise that by virtue of the principle of subsidiarity, the EC mainly has a stimulating role in the field of EE&T. Member States remain responsible for policies relating to education, for organising interdisciplinary and extra-curricular activities and for training teachers. The EC can not interfere with Member States policies on EE&T.

According to the 1988 resolution, the EC should take the following initiatives:

- Stimulation the exchange of information.
- Improvement of the documentation for teachers and pupils.
- Incorporation of environmental education into current activities.

The resolution invites each Member State -"within the limits of their own specific educational policies and structures"- to:

- Promote the introduction of environmental education in all sectors of education, including vocational training and adult education. The current policy on environmental education should be set out in a document.
- Give consideration to the basic aims of environmental education when drawing up curricula and organising interdisciplinary courses.
- Encourage extra-curricular school activities by means of which theoretical knowledge of the environment acquired in school can be put into practice.

- Take appropriate measures to develop teachers knowledge of environmental matters in the context of their initial and in-service training.
- Undertake specific action to provide teachers and pupils with appropriate teaching materials.

The 1992 Council Conclusions (put date and reference), adopted as a reaction to the first report on the development of environmental education in Europe emphasises the importance of education in regard to environmental issues, and states that the lines of action of the 1988 resolution "continue to be relevant; these lines should be pursed and intensified".

The European Parliament Resolution 1993 (date and reference)

The European Parliament adopted a Resolution on Environmental Education in 1993, which invited the Member States and the Commission to take several measures in the field of environmental education, among which:

- To incorporate the environmental dimension into all aspects of education at all levels
- To promote the on-going education of adults on environmental matters.
- To integrate regional and local authorities in the development and carrying out of environmental education.

Fifth European Community Environment Programme

The fifth programme sets out a new approach to Community environmental policy. It is underlined that changes in social behaviour are needed of all the actors concerned (public, authorities, citizens, consumers, enterprises, et cetera). To achieve the necessary behavioural change, integration of the environmental dimension in all major policy areas is identified as a key success factor. Furthermore, the use of a wide range of instruments is promoted, of which 'horizontal measures' –including information, education and training- are an important component. A number of measures in the field of EE&T is recommended. All in all, the fifth programme is a strong policy fundament for the further promotion of EE&T in the European Union.

(it should be added something from the Review of the 5th Environmental Action Plan adopted in September 1998, which reaffirms the importance of EE & T and of the role EE & T can play on the way to sustainable development. Just a few lines)

Conclusion

EE&T is recognised by the EC as a factor of vital importance in achieving sustainable development. Time and time again, this importance is stressed. Essential starting point of the role of the EC though, is that by virtue of subsidiarity, efforts can only be stimulating -and not forcing- towards Member States. Furthermore the following starting points are important:

• Education is an instrument that is relevant for all policy sectors; therefore it should be integrated in all these sectors.

• EE&T is not only relevant in the compulsory years of education (primary schools, secondary schools and extra curricular activities), non-compulsory education (adult education, vocational training) is also needed to achieve sustainable development

It can be concluded that the ambitions of the EC in the field of EE&T are high, and the formal commitment to this field is strong.

2.2 Activities of the EC in the field of EE&T 1

Working Party on EE&T

Following up the 1988 resolution, a Working Party of representatives of Members States was set up in 1989. The Working Party assists the Commission with information exchange, the drafting of documents and the monitoring of the integration of environmental education in Community activities. The Working Party representatives comprise delegates from the departments responsible for environment, education, and vocational training. So far two reports have been prepared by the Commission with the help of the delegates to give an account of developments in the field of incorporating into school curricula and teacher training programmes (SEC(92) 934 and SEC(95) 1754). These reports provide a record of developments in environmental education over short transitional periods and set out priorities for the period until the year 2000.

Inventory of the situation at European level and European guide

The report 'Environmental education in Europe' (date and reference) is another accomplishment of the Commission. It aims to report on the development of environmental education in the European Union, both at the Community level and in the respective member States. The report is a conceptual, methodological and practical tool for teachers, trainers and all those decision-makers responsible for the management and development of environmental education. The work has been compiled from national reports made by the representatives of the Ministries of Education and the Environment in each of the Members States.

Furthermore, a guide was produced in 1993 (add also the title of the guide and the reference) giving an overview of higher education centres dealing with subjects relating to the problems of the environment.

Input into the CSD Discussions on progress of Chapter 36 of AGENDA 21 (This paragraph should be the very last one of this section)

The European Union plays an important role in the agenda setting and direction of the discussions within the UN system. Last year the EU presented clear objectives on

¹ This is not completely correct: if we are talking about the whole EC, then we should take into consideration also SOCRATES, LEONARDO (DG XXII) and the EUROPEAN SOCIAL FUND (DG V), because in the framework of these programmes many initiatives concerning EE & T are included. Also in this case, adding a few lines on these programmes could be sufficient, in order to give a complete overview of what's the situation at the EU level. Otherwise – but this would not be entirely satisfactory – we should call the chapter "EC- DG XI initiatives in the field"

EE&T for CSD 6 and came up with concrete suggestions for further discussion on aspects for learning for sustainability such as: holistic approach, education for action, education for participation, integration, training educators, informal education, distance education et cetera.

As avenues for action the EU advocated among others the exploration of new partnerships, eco-labelling of schools, the creation of centres of excellence, in service training in companies. The preparation of the EU position in CSD remains an intergovernmental procedure out of the Commission competencies. n The Working group for EE&T should play a more important role in this respect

Financial support to pilot projects

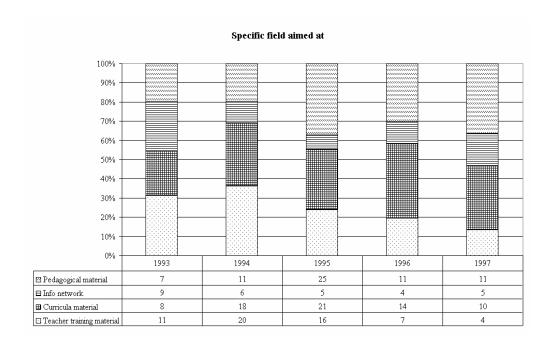
In order to strengthen the action taken by Member States , the Commission reserved a budget for co-financing of projects. Organisations involved in environmental education and vocational training could obtain Community funding to carry out projects in the following areas:

- The initial and on-going training of teachers.
- The design, testing and evaluation of educational materials with a European Dimension.
- The development of innovative curricula (with the accent of interdisciplinarity).
- The networking of key players and partners.

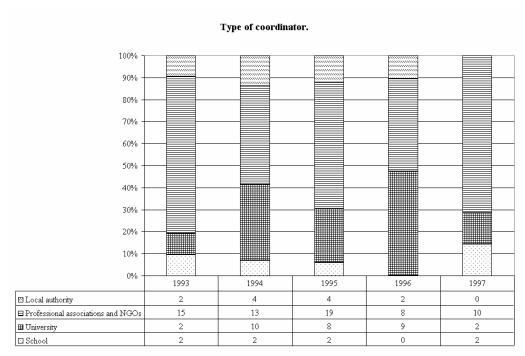
Between 1993 and 1997 the Community has co-financed over a hundred projects, and 6.4 millions ECU have been allocated. In the report *Environmental education and training: selected projects* (EC, 1999 – *it will be published this year*) a classification of the funded projects is made according to:

- the field aimed at
- the type of co-ordinator
- the sector of education
- environmental theme

Next graphs illustrate the results:

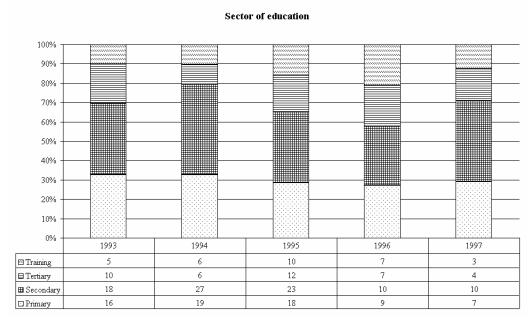


The field aimed at: the graph shows that most attention has been given to the development of pedagogical materials and curricula material. The networking of key players and partners is somewhat under-exposed.

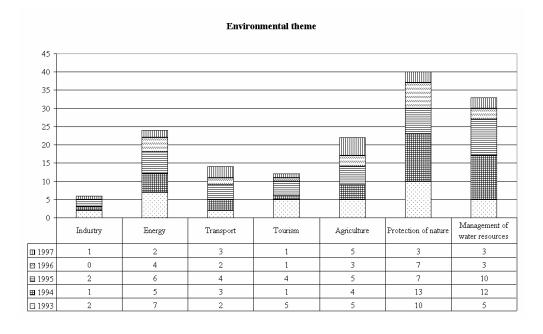


The type of co-ordinator: As far as the type of co-ordinators is concerned, the presence of professional or non-governmental organisations is particularly eye-catching, suggest-

ing, as it does, a very marked non-formal or informal component in environmental education and vocational training as currently found in Europe.



The sector of education: It is true that all educational sectors have been covered, but most attention was given to primary and secondary school. Even though the importance of vocational training is stressed in many EC-documents, the efforts in this field remain limited.



Environmental theme: The areas 'Protection of nature' and 'Management of water resources' got most attention in the projects. This shows that the traditional concept of environmental education is still dominant. The industry sector gets least attention, even

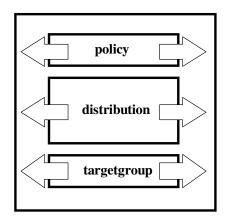
though this sector is of vital importance from the point of view of sustainability.

3 Trends in the professional discussion

3.1 The context

The scope of environmental policy itself has been broadening over the last decades. Environmental concerns have now been integrated in an increasing number of policy issues. At the one hand broader and more abstract container concepts have emerged, such as sustainability, biodiversity and quality of life. At the other hand more detailed concepts have emerged such as primary environmental care, life cycle analysis and product design. Environmental policy is now seen as a responsibility of a growing number of actors. Not only provincial and local authorities, but also other public authorities, e.g. in the field of water management, air traffic, ports, tourism etc. And outside the public sector environmental policy has become a normal concern of civic society, farmers organisations, women's organisations, churches and recently also of business corporations.

The distribution of environmental policy more and more takes place - due to the integration into a growing number of other policy issues - through new distribution channels. Departments of defence develop information campaigns on environmental friendly use of training areas for tank and troop manoeuvres. Local authorities have set up environmental communication departments. Local agenda 21 takes form in various ways. Provincial governments develop their own social instruments. NGO's are campaigning on a number of issues. Corporations are starting dialogues with inhabitants of adjacent neighbourhoods. Networks of communication consultants provide services and develop new communication techniques. Next to the legal and financial instruments, communication is becoming a fully fledged part of the triptych of policy instruments.



The target groups of environmental policy are growing in number. And they are being approached on a smaller scale and with more focus on their own situation and possibilities. Youth are approached through their own media, in their own language. Employers

are starting to communicate to motorists in a business like approach within the frame work of the company's mobility plan. In the country side farmer's wives are confronted on the 'point of sale' with the choice for a environmental friendly product. Tour operators are discovering more and more 'green' destinations to supply a growing market.

Amidst these more general trends, environmental education and training are changing too. Citizens are lifelong nourished in a 'communication permanente' via a broad range of social instruments. More and more citizens are becoming co-implementers of policies that can not any more be implemented by the government alone. Nor is it sufficient that they are only confronted with those issues during their time in school or in that period of their lives.

As the scope of environmental education is widening, the scope of environmental training gets more and more focussed. Primary environmental caremeans reorientation of curricula in the specific vocational training. This is always true for environmental carein all sectors of the economic life (agriculture, industry, transport, energy and tourism). More concretely, for instance, sustainable product design asks for reorientation of curricula in universities and vocational training. Concern for the quality of life asks for training in communication skills of and in social policies in business schools and other management training institutes. In the next paragraphs the current trends in education and training are described in some more detail, with a view to give a general overview of the most important aspects of these trends, not to give full insight in all the professional details of the discussion. Those can be found in the abundant literature.

3.2 Content of education: from nature to sustainability

The concept of 'environment' has changed over the years. First approaches to environmental problems concentrated solely on natural aspects: the pollution of water, air and soil and its effect on ecosystems, the distinction of species et cetera.

As knowledge of environmental problems progressed, and policies aimed at this area developed, a new approach evolved. The social, economic and cultural dimensions of 'the environment' were recognised. The introduction of the concept of sustainable development made the concept even more broad. Sustainable development links the concept of environment with aspects as globalisation, resource sharing, poverty and ethics. The following quote illustrates the complexity of the concept:

"Sustainability can never actually be attained, or at least cannot be envisioned by people because of the immense and fundamental changes in our society that it entails......The sustainability transition, therefore, is the process of coming to terms with sustainability in all its deeply rich ecological, social, ethical and economic dimensions. The transition is as much about new ways of knowing, of being differently human in a threatened but co-operating world, as it is about management and innovation of procedures and products." (O'Riordan, T, Voisey, H (1998) The Politics of Agenda 21 in Europe, Earthscan, London)

According to the report Environmental education in Europe (EC, 1997), there is con-

sensus among Member States about the changed meaning of the concept 'environment':

"This expanded concept of the environment which has shifted from being purely 'natural' to more 'humanistic', is accepted almost everywhere."

The implication of a different perception environmental problems, requires an interdisciplinary approach. The OECD formulates it as follows (Educating for a Sustainable future: A Trans Disciplinary Vision for Concerted Action, 1997):

"Reorienting education to sustainability requires recognising that traditional compartments and categories can no longer remain in isolation from each and that we must work increasingly at the interface of disciplines in order to address the complex problems of today's world."

3.3 Target groups: from pupils to adults in all sectors

Environmental education has been primarily targeted on young people and has used primarily the distribution channel of schools and the curricula of the formal education sector. The formal education sector and its support structure at first did not have the knowledge, motivation and capacity to initiate changes in curricula. Schools and teachers relied on extra curricula materials and activities from specialised NGO's (just NGO's? What about Cousteau et alii?). More and more this is now changing in several countries, as the formal education sector is beginning to take its own responsibility towards environmental education and learning for sustainability.

Nature and environmental issues are more and more integrated in the key concepts of curricula of various subjects in primary and secondary schools. Institutes for teacher training, curriculum development, production of central examinations and educational research have integrated or are in the process of integrating environment in their programmes. This changes the position of environmental education organisations and NGO's vis a vis the formal education sector. They are not any more the main providers of environmental education services and products. (slight changes are needed: see below).

At the same time we see that over the last decades other sectors than the formal education sector are perceived as problem owners in the field of environment and sustainable development. And we see new target groups emerge. Not only the target groups of environmental education become more diverse, also the community of educators is widened. As the programme statement of 'Education 21', promoted in the United Kingdom notes for instance, the community of educators include:

"Teachers, lecturers, curriculum developers, administrators, support staff, industrial trainers, county side rangers, environmental health and planning officers, education officers within NGO's, community educators, youth leaders, parent association members, media, representatives of learners in all contexts- and yet more."

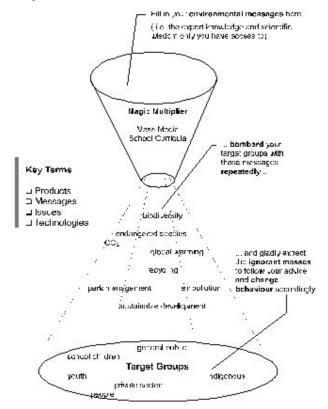
3.4 The dimensions of environmental education

When environmental education first originated some 25 years ago, it was mostly focused on disseminating factual knowledge (as was the general trend in education). The cognitive dimension was dominant, and the aim was to learn pupils a certain degree of knowledge.

In recent years, there has been a shift to learning by doing. The importance of the action dimension of environmental education is underlined. Target groups need to practise new forms of behaviour, to find practical alternatives in their own contexts. In many documents the term 'learning' and 'social learning' is now being used instead of the term education. The following quote illustrates the shift which is taking place:

'Learning in the classical sense, the transfer of knowledge, is no longer sufficient. It concerns social orientation, learning in social contexts, development of opinions, exploration of possibilities and working with uncertainties. Thus environmental education becomes strongly aimed at change. Learning is then to a large extent: identifying chances and limitations together. This is achieved by reflection on new possibilities and reflection on the profoundness of the available knowledge. This will give meaning to sustainability and perhaps even form and contents." (New and improved? Snapshots of the first two years of Extra-Impulse, NCDO, 1999, The Netherlands)

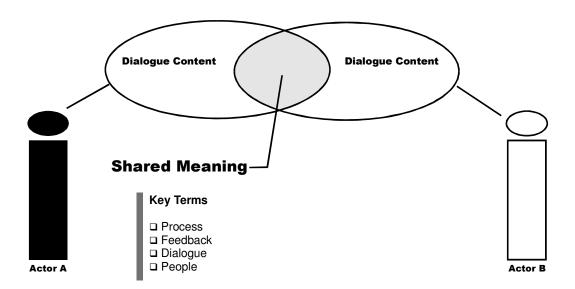
Traditional model of environmental education:



3.5 The methods

Following naturally from the above mentioned trends, views on educational method changed the past years. Before, education was mostly perceived as a top down process, focusing on delivering messages and products to target groups. The illustration on the left (Oepen, Report of Pan European Expert Meeting Soesterberg, the Netherlands, 1999) demonstrates the key elements of the vertical model of communication.

Experience however has proved these type of models of communication to be ineffective. Currently the horizontal model of education and communication is more widely accepted. This model stresses the importance of dialogue in order to create shared meaning. The focus is on process, feedback, dialogue and people instead on products, messages, issues and technologies. Communication is seen as a two-way process. The focus is more and more on participation of target groups in the process of sustainable development. The illustration below (Oepen, Report of Pan European Expert Meeting Soesterberg, the Netherlands, 1999) demonstrates the key elements of the horizontal model of communication:



3.6 Trends in Environmental Training

The environmental issues and the growing public concern about them in the sixties and seventies gave rise to several environmental sciences. These sciences have proved beyond doubt that finding solutions for environmental problems was the real challenge for society as a whole. That put environment on the agenda of governments. Managing environmental issues in society asked at first for legal frameworks. The formulation of environmental policies triggered off the need for training in environmental law. These days both governments and corporations use these specialised lawyers to formulate covenants, to reach agreements in litigations inside or outside court.

With the emergence of policies and a legal system dealing with environmental issues, governments also set up systems of management and control. This brought about the specialised institutes for research and measurement of various aspects of pollution. New job profiles meant retraining of existing specialists and new curricula in initial and further training as well as academic studies. Enforcement of environmental policies also meant training programmes for police and other public authorities. Not only to act when the law is broken, but more and more in a preventive way. Environment inspectors in the field of waste, water or air pollution are becoming this way more and more consultants. This again means new demands for their training.

Since the emergence of environmental policies and laws, industries and other parts of the productive sector of society are reorienting their business procedures. Primary environmental care is introduced, often integrated with the safety and health, or total quality management procedures. It means new demands and skills for employees. Companies supply this demands by in-company training for their personnel and through their branch organisations and links with the education system, especially institutes for vocational training.

Vocational training institutes which train future employees in the chemical, building or construction industries were among the first to integrate environmental issues and branch specific procedures of environmental care into their curricula. The characteristics of these training are that environment is not approached in its general sense like in environmental education. In environmental training the focus is basically on the branch specific knowledge, attitudes and skills.

(It should be also mentioned the need for specific training activities intended for technicians charged of the operation of environmental management facilities). Something like this: Environmental specialists at intermediate levels are increasingly needed to operate and control environmental facilities. Training providers (mainly public authorities) should assure the met of this need.

However, the introduction of the environment into the general training system as basic contents still remains to become general. This introduction would encourage the awareness-raising for the professional life as well as the acquisition of more specialised knowledge.

Product design, management and marketing are also more and more creating demands on environmental training. Here training seems to be more general in terms of learning for sustainable development and applying these principles to the core concepts of the curricula of educational institutes for design and marketing.

3.7 Conclusions drawn from current trends

Analysing the professional discussions, it becomes clear that the field of environmental education is changing rapidly. The perspective is broadening considering the content,

the target groups, the dimensions and the methods. Efforts in the field of environmental education were first concentrated at pupils in primary school, and later at pupils in secondary school. The importance of vocational and further training and adult education is now widely recognised. To realise the high ambitions of sustainable development though, formal education alone is not enough. Behavioural change of all actors in society is required (citizens, communities, institutions, media, advertising, industry, administrators, local authorities, et cetera). The environmental educator is not regarded anymore as a teacher disseminating knowledge about nature, but as a process manager guiding target groups towards sustainable development. The diagram below summarises the current shift in the field.

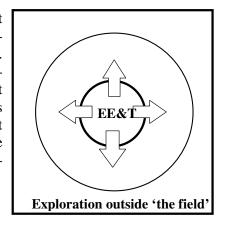
	Target groups			
Focus	Primary education/ Secondary education	Adult education / Vocational training	Citizens, communities, industry, NGO's,	
Nature	disseminating knowledge educational products, supply driven vertical communication			
Environment			learning by doing process management horizontal communication demand driven	
Sustainable Development				

Vision on the future

In the future more actors will be involved in environmental education and training. Not only NGO's and the formal education sector, but also commercial organisations, public administrations, industrial companies and corporations, trade unions, individually or in

some form of public-private partnerships. New forms of sponsoring will complement the governmental support to environmental education. A variety of initiatives for sustainable development will call for a varied and pluriform distribution structure. The next decades will show that learning for sustainability will integrate in all parts of society. Building a social infrastructure and facilitating its use will be a success factor. Governments will see it as their duty to develop supply and demand in this new market for 'learning for sustainability'. It will mean that environmental education and learning for sustainable development is not anymore primarily a concern only for ministries of environment and education, but for all government departments.

A pro-active approach for governments in the next century could mean an exploration of new distribution mechanisms for learning for sustainability. These could be found in the networks of the directorates of several ministries; new potential target groups, partnerships and providers; pull strategies which could introduce a certain form of market forces, new forms of dialogue which stimulates the integration of learning for sustainability into corporate management etc.



The policy priorities in the field of nature, environment, agriculture, economy, transport, and employment can be the starting point for such explorations. Such approach will lead to a further broadening of environmental education and learning for sustainability, but it will also undoubtedly support effective implementation of policies. The integration of aspects of learning for sustainability in some forms of marketing and management training can be seen as a first milestone on this new road for environmental education and training.

4 Opinions and perceptions on the current and future role of the Commission with regard to EE&T

While the previous chapters were primarily based on the analysis of literature, policy documents and (research) reports, this chapter gives insight in the results of a quick scan. In total, thirty experts, practitioners and members of the Working Party on EE&T were consulted. Respondents representing all member states participated in the quick scan. The key aspects the quick scan concentrated on, are:

- the achievements of the European Commission in the field of EE&T
- the strong and weak points of European Commission-policies and actions in the field of EE&T
- the opportunities and threats for EC-future actions in the field of EE&T
- the desirable role of the EC
- potential future actions

4.1 The achievements of the European Commission

Exchange of experience

The exchange of experience and the development of professional networks is most frequently mentioned as an achievement. The following quotes illustrate this view:

"The value lies mainly in the social exchange, not so much in the advancement of the profession in terms of quality and content. The EC contributes to the creation of networks and as a result a variety of EE&T-communities on European level."

"The stimulation of the exchange of experience enables Member States to learn from successes in other countries. The Summer University in Toulouse is a good example of valuable exchange."

Funding of projects

A second achievement which is underlined, is the funding of projects:

"The EC provides support for independently created and managed projects, as opposed to some international organisations, who promote exclusively their own initiatives."

"There is budget for education and training in Europe targeted to all groups of society to encourage creating a European nation. Within this portfolio of support, EE&T is supposed to be a key theme, and there are several environmental education training programs."

For "achievements remain invisible (please, find another expression...)

It is remarkable however, that a substantial number of respondents, can not name any achievements. This is caused by the fact that professionals in the field of EE&T who have no direct link to EU-activities, often do not get 'in touch' with EC-products and activities. As an effect, achievements remain invisible.

A third category of respondents is mainly sceptical about the EC-achievements in the field. The aim of exchanging expertise and development of networks is recognised, but efforts are so far insufficiently effective, according to these respondents:

"Networking is seen as an important task of the EC, but I experience a lack of structure to benefit from the experience and networks that already exists."

"The importance of education is underlined in many documents, but so far it remains mostly lip-service and good intentions. Results do not meet my expectations."

4.2 The strong and weak points of EC-policies and actions

Strong points

The respondents were asked to identify strong points of EC-policies and actions in the field of EE&T. The emphasis on networking and the exchange of experience is valued. International co-operation is necessary to develop the profession of EE&T. It also supports Member and non-Member States to accelerate progress, especially for 'laggards'.

"Co-operation between Member States inspires States to implement policies on EE&T and enables Members to gradually reach the same level in the field."

"The EC tends to support programmes and projects with 'additional value', for instance an international dimension, the use of information technology, potential for innovations and a focus on partnerships."

It is also mentioned that formal commitment of the EC to EE&T, supports representatives to influence policies:

"The need and importance of EE&T is stressed in several EC-documents. Quotes from these documents can be used influence policies and to convince decision-makers of the need to invest in EE&T."

Weak points

Most respondents underline intentions of the EC in the field of EE&T as stated in formal documents. The majority of the experts and practitioners is however somewhat disappointed in the achievements so far. This is due to several factors.

Required shift is not made

Firstly, the EC has not reacted adequately to new challenges for EE&T caused by the

changes in the professional field and society. The shift required -from formal education to non formal or informal education, from nature to sustainable development and from vertical to horizontal communication- has not yet been made on the European level.

"The focus so far has been mostly on classical environmental education targets: developing educational materials for schools. Innovative projects that result in the actual crossing of disciplinary borders or in experiential learning are still rare."

"The importance of vocational training is stressed in formal documents, but in practise this field has received far too little attention. There is still too much emphasis on general environmental education."

"Many projects are limited to formal education or teacher training. Judging these projects I have to conclude that most of them are still based on a very restricted view of environmental education. It makes me wonder to what extent innovations diffuse. In what sense are innovations in Member States really shared?"

"Environmental problems are still mainly approached from a technical point of view. Its not felt yet as a social, political and economic problem. A broader perspective is necessary."

These observations are supported by the analysis shown in chapter two of the EC-supported projects: so far most attention is given to the development of curricula and education materials. Nature protection and related subjects still get most attention in projects, which shows that traditional views of environmental education are still dominant in the field.

Exchange of experience and knowledge can be improved

A second weak point is that the current exchange of experience and knowledge is unsufficiently effective, according to a substantial number of respondents. Still only a limited number of experts and practitioners are familiar with the State of Affairs in Member States. Many respondents find successful methods, materials, projects and programmes difficult to access. As a consequence, the potential of Trans-boundary learning is not fully used. The following quotes illustrate the way the current situation is perceived:

"Existing networks and infrastructure are not used to a high extent. The transfer of competence is lacking because of this: only a small number of experts know the relevant projects which have been carried out in a certain field."

"Participation on European level is restricted to a relatively small number of 'insiders'. Information does not disseminate to the majority of EE&T-practitioners and professionals."

"Only directly involved parties learn from EC-projects. The European dimension is missing."

Furthermore, the representatives of Member States participating in the EC-network mostly occupy positions in the educational or environmental field. The network operates too isolated, according to some interviewees. The knowledge and experience does not disseminate sufficiently, neither in the EE&T-field, nor in fields which are linked to the subject. The broadened scope of EE&T in the framework of sustainable development demands participation in EE&T-networks of officials and experts of different departments, target groups and disciplines.

"Activities have hardly been related to other DG's. Involvement of stakeholders of other departments is lacking. The EE&T sector has operated isolated so far."

"There has been a lack of effort to involve other departments and as a result there is lack of integration of EE&T in other policies."

A third factor contributing to non-optimal exchange of experience, is the lack of infrastructure and the absence of an effective structure for communication and dialogue. Information about EE&T is difficult to access because it is fragmented: there is no central database or web site on the subject. Furthermore, the Working Party on EE&T is perceive d as 'too rigid' for dialogue and discussion.

"I am convinced that many interesting projects are carried out, but the problem is how information about such initiatives can easily be accessed."

"The intention of the Working Party is good, but there is too much one-way communication and too little dialogue."

Efforts to achieve integration should be intensified

A weak point strongly related to the above mentioned 'isolation' of the EE&T sector, is lack of integration. Due to the lack of participation of other departments, sectors and target groups in EE&T activities and networks, EE&T is insufficiently used as a policy instrument by other DG's.

"Each EU-department is supposed to integrate environmental issues in its policies, and use EE&T as an instrument to achieve policy targets, but so far there has been no attempt to accomplish this. For instance: the EU policy on biodiversity lacks attention for the role of EE&T."

"Attention for environmental education in relevant DG's is low: it remains lip service. The actual implementation of EE&T as a tool for policies in other sectors is hardly progressing."

Funding procedures insufficiently clear for 'outsiders'

A few interviewees have the opinion that funding procedures can be improved. The current conditions and criteria are not clear, so they say:

"I could never get a clear view of the way proposals are judged. What are the priorities, on the basis of which criteria are proposals selected? To my opinion, mostly the traditional field receives funding, which is contradictory to policy statements about the necessity of innovations."

"I experience the EC as a huge bureaucracy, and find it very difficult to find my way. I am confused about the tender procedures: how can you better your chances for funding?"

Lack of strategy and plan to achieve EE&T targets

A small number of respondents criticises the strategy on EE&T. It is stated that a well-thought out plan is missing. As a result, priorities are not clear and progress is slow, according to these respondents:

"Up to now activities are too much on a ad hoc basis. 'Hit or miss' projects are carried out without a clear long term vision in mind."

"There is still a strong focus on 'technical aspects'. The EC needs a clear strategy on how to really integrate EE&T as an policy measure in other sectors. Now attention is not focussed. As a consequence effects are minimal."

Lack of political back up

The EE&T sector is missing the political back up to convince other departments of the necessary role of EE&T as a policy instrument according to some respondents. They are disappointed in the potential to influence decision-makers of other departments.

"If only other DG's could be forced to co-operate, it would be much easier to make progress!"

4.3 The opportunities and threats for EC-future actions

Opportunities

Exploit European dimension: Stimulate Member States to invest in EE&T

It is important to identify the European dimension of EE&T. Co-operation can assist Member States to reach a certain minimum level in the field of EE&T. To accomplish this, the EC needs to assess the progress made in individual Member States, the progress of the profession of EE&T, and the minimum level which in a certain context is acceptable.

Based on these insights, the EC can develop guidelines, stimulate the diffusion of innovations, assist in removing obstacles and support laggards.

"EU policy sees education as a state responsibility, however it can reinforce, market, monitor, evaluate and set the agenda for progress on education for EE&T & sustainability."

"The EC can play a role in assessing the quality of EE&T in Member States, using contextual –not universal- indicators. On the basis of such assessments it is possible to decide where support is needed."

Benefit from current awareness of environmental problems

Another opportunity is the increased attention of the public for environmental problems. This creates favourable circumstances to integrate EE&T in other sectors.

"One can see an increasing concern of the public for the environment. Educational practitioners should ride this green wave of environmental awareness and exploit attention before it fades."

Develop EE&T as a respected and effective policy instrument for other DG's

In formal documents it emphasised again and again that EE&T is an indispensable instrument to achieve sustainable development. The instrument is needed to create and maintain public awareness of environmental problems.

"If the environment is part of the raison d'etre of Europe and sustainable development it could be argued that more needs to be done to help Europeans understand the impacts at home and abroad of consumption patterns and impacts on climate change, biodiversity and the social and economic development of developing countries. The EU needs to take responsibility for raising awareness of the European footprint on the world ecology."

"To reach sustainable development lifestyle changes are necessary. Changes can only be accomplished when solutions are congruent with the motives of the people involved."

Furthermore, EE&T is needed in all relevant sectors to facilitate target groups developing sustainable solutions. Target groups need to learn how to cope with environmental problems in their own context; therefore norms and practices need to be changed.

"The current stress on markets creates an opportunity for environmental education: target groups need information and training to solve environmental problems related to their operations."

"In the new Environmental Action Plan attention should be given to the role of environmental education in each policy area. It has to be clarified for each area how education supports achieving targets and realising desired change. When this is accomplished, environmental education will have a strong policy fundament." "Make environmental education important for others than the small 'inner circle' by demonstrating how environmental education can be an effective tool to achieve targets."

Use potential EC to build bridges, to connect people and to disseminate expertise

The majority of the respondents believes the EC has a lot of potential to create effective networks in the field of EE&T. The challenge is to involve key persons of the relevant sectors and disciplines, according to these interviewees. It is emphasised that an essential success factor is to find ways to connect existing networks.

"The EC has high potential to build bridges and to connect people who can contribute to the further development and integration of environmental education."

Threats

Confusion in the discussion

The scope of EE&T has broadened. There has been a shift from educating about nature to learning for sustainability. Many actors are now involved in implementing environmental policies, and EE&T has been recognised as an essential policy instrument for many sectors. As a consequence, target groups have become more diverse. A potential threat in the current situation is that policy-makers and target groups do not understand anymore what is EE&T means. One interviewee said:

"Increasing confusion is creeping into the system because of proliferating terms and their relationship to the established environment education. The term 'learning for sustainability' is used in very different ways, and has multiple meaning. This is a major threat for the effective implementation of environmental education: what people don't understand, is easily rejected or put aside."

"In many sectors 'technocrats' are responsible for policy development. Professionals with a 'technical' background, are often not aware of the potential of horizontal measures like environmental education to contribute to effective implementation. In order to convince key persons in other sectors, it must be very clear what environmental education is, and what it can accomplish."

The European Commission could contribute by bringing clarity in the confusion: defining terms in a clear, non-ambiguous way with much attention for practical implications.

Isolation and bureaucratic barriers

The European dimension of EE&T is not fully exploited so far, according to a substantial number of respondents. Results still tend to remain isolated: only the directly involved parties in EE&T-projects and –networks on European level benefit from new knowledge, experience and innovative methods. Bureaucracy is a potential barrier for the integration of EE&T and the developing of more encompassing networks.

"Bureaucratic obstacles can prevent the development of environmental education as a policy instrument for other sectors. It can be difficult to get access to other DG's: they have their own networks and culture. When integration fails, the current isolated position of environmental education will prevail."

Some of the representatives of the Working Party, experience bureaucracy as an obstacle for effective co-operation. The required formalities hinder the development of dialogue and discussion.

Too many priorities, too little choices

The potential of EE&T as a policy instrument is high. The ambitions are high as well. It will require an enormous effort and resources to achieve the targets formulated in formal EC documents. A number of respondents stress that it is necessary to be realistic in this respect: the required changes will take time and resources. Manpower and budgets are limited. In this context it is of vital importance to develop a well thought-out and balanced strategy to achieve aims. Choices have to be made, priorities have to be set.

"It will prove to be ineffective to integrate EE&T in all DG's at the same time. Energy has to be focussed, and successes can only be reached step by step."

"What we really need right now is a strategy, a plan, with a strong foundation and with commitment of key persons. I predict that the effect of ad hoc efforts will prove to be disappointing."

Conclusions

The next table summarises the strong and weak points, and opportunities and threats

Strong points	Weak points	
 Opportunity for networking Exchange of experience Stimulation of policy development Stimulation of professional development 	 Required shift is not made Method and procedure of exchange Lack of integration Funding procedures insufficient transparent Lack of strategy Lack of political backup 	
Opportunities	Threats	
 Exploit European dimension Stimulate Members to invest in EE&T Develop EE&T as a policy instrument Stimulate integration Use potential EC to create networks 	 Confusion in discussion Isolation and bureaucratic barriers Too many priorities, too little choices Insufficient resources 	

4.4 Desirable role of the EC and potential future actions

On the basis of an analysing of the strong and weak points, and opportunities and threats, potential future actions can be selected and the desirable role of the EC can be defined.

I Management of networks

Important future role of the EC is to manage relevant networks in the field of EE&T. Many professionals in many different fields are relevant for EE&T. At the moment a great number of efforts and achievements remain isolated. As a consequence, new insights often hardly diffuse. Expertise is mostly developed at local and national level; Trans-boundary learning often does not occur. The EC can stimulate the dissemination of knowledge and experience by connecting people and organisations.

The first step towards successful network management is to make an inventory of relevant departments, institutions and persons, divided in different fields of interest. Secondly, the EC needs to have an overview of existing relevant networks. Thirdly, a system of relation management could be developed. Existing networks, institutions, organisations and people have to be connected with adequate means. The respondents prefer interactive communication where dialogue and discussion can develop.

II Stimulation of innovations and of professional development

In several Member States innovative initiatives are taken in the field of EE&T. The EC can contribute to the diffusion of innovations by making successful innovative pilot projects visible for other States, institutions and professionals. The EC can be a platform where the State of the Art of EE&T is known, is stored in databases and is made accessible for relevant actors.

To accomplish this task, the EC needs an overview of the innovations in Member States in the field of EE&T. Knowledge and expertise should be made accessible. Publications, IT-solutions (web site, databases, CD ROM), and a regular newsletter are effective means, according to a substantial number of respondents.

To stimulate the advancement of the profession, the EC could support cutting edge projects, and put effort in the dissemination of results.

Interactive communication is of vital importance for the stimulation of professional development. The quick scan shows that the target group highly appreciates regular congresses, workshops and summer schools. Such meeting can contribute to shape the European dimension of sustainable development.

Another valuable suggestion of the respondents, is to strengthen the current Working Party withthe creation of smaller *ad hoc* groups charged of particular tasks. *The current number of participants is too large for effective interaction, and also the back ground*

and fields of interests of participants differ (this last paragraph should be changed in some way. The number of participants is high, because the Commission must necessarily invite two-three representatives per Member State, and this can not be changed. On the other hand, it should be said that so many participants, with so many different backgrounds can also assure a valuable plurality of experiences and of points of view, thus underlining that the high number is not only a shortcoming). ². These groups could work on well-defined areas and doing so contribute to the further advancement of the field in Europe.

III External integration of EE&T

Dominant current views on EE&T stress the need to stimulate the external integration of EE&T. EE&T should firstly be integrated in other subjects (curricula) and in vocational training. Secondly EE&T should be integrated in other policies. It can be used as an instrument to achieve sustainable development in other policy sectors and is thus of relevance for other DG's. Thirdly EE&T can assist institutions, businesses and public to contribute to sustainable development.

A first step towards integration of EE&T in other sectors, is to make an inventory of sectors and fields where EE&T could be of value, for instance: agriculture, tourism, mobility, biodiversity. Secondly, priorities have to be set for it is clear that achieving the difficult task of integration in all relevant sectors simultaneously would be an unrealistic and ineffective ambition. A third step should bethe integration of the environment among the priorities of education and training activities/programmes of the Community. Therefore relationships with relevant DG's have to be developed and managed.

Co-operation on a practical level is of vital importance for success. Formally, every-body agrees with the necessity of EE&T-integration, but in practice obstacles and barriers arise. The future challenge for EE&T is to show on a practical level how EE&T can be used as a policy instrument in other sectors, and prove the effectiveness of the instrument.

IV Establishing minimum standards

Based on insight in the state of the art in the field of EE&T, and on an overview of the state of affairs in Member States, minimum 'EE&T standards' can be developed. These standards (for instance concerning curricula, EE&T for businesses, , integration of EE&T in other policies) can be transformed into EC-guidelines used as a reference for judging achievements (assessment) and the development of strategies. By virtue of subsidiarity, the guidelines would not be obligatory, but will nevertheless stimulate politicians, state officials, institutions & businesses and professionals in Member States to reach a certain level in a certain area linked to EE&T. Assessment and benchmarking based on accepted criteria, have proven to be effective means to make progress. It will

² In the EC law, committees and subcommittees are specific bodies, most of times with specific tasks and powers. They fall within a well-defined category, and, using these terms in a broader sense could lead to serious misunderstandings.

contribute to develop a truly European dimension of EE&T.

Conclusions

In the next table the potential future role and activities are summarised:

Type of role	Potential activities		
Management of networks	Make an inventory of existing networks, relevant institutions and persons, divided in different fields of interest.		
	Develop a system of relation management.		
	Connect institutions and people: organise and facilitate meetings, workshops, congresses and bilateral contacts		
Stimulation of innovations &	Develop a complete overview of EE&T achievements in different Members States and in different fields of action.		
professional development	Create subcommittees of the Working Party concentrating on specific subjects and targets.		
	Make knowledge and experience accessible by publicity and IT-solutions (for instance through databases, CD ROM, internet sites).		
	Organise summer schools, workshops and congresses.		
	Publish a regular newsletter illustrating the state of the art.		
	Support (the dissemination of results of) cutting edge projects.		
External	Make an inventory of sectors relevant for EE&T.		
integration of EE&T	Develop relationships with other DG's and start co-operating on a practical level.		
	• Create EE&T-subcommittees in relevant programmes of other DG's.		
	Develop EE&T as policy instrument with practical use for other sectors.		
	Develop tools to integrate EE&T in curricula and in vocational training.		
Establishing minimum standards &	• Formulate EE&T standards based on an assessment of the state of affairs in Member States and on the state of the art of the profession.		
guidelines	Carry out activities to make these standards known and respected in Member States and relevant sectors in the EC as useful and important guidelines.		