

WP 4 - Human Capital Actions
Activity 4.1 - Training Preparation

Quality Guidelines for Education for Sustainable Development, Nature- and Landscape-Interpretation and Sustainability Communication in the Danube basin



1 Guidelines

The following 'Quality Guidelines for Education for Sustainable Development, Nature- and Landscape-Interpretation and Sustainability Communication along the Danube' are a result of the LENA project (Local Economy and Nature Conservation in the Danube Region), financed by the INTERREG Danube Transnational Program.

They are based on similar guidelines that the author, Christian Baumgartner, provided for the DANUBEPARK network in 2013. DANUBEPARK is an associated partner in the LENA project.

The guidelines should serve as common understanding and visionary quality statement that is the base for the development of the Danube Guide and Danube Guide Trainer curricula and the further implementation of the Danube Guide System. Furthermore, the project partners are encouraged to use and implement the guidelines within their own educational work - within and beyond the LENA project.

1. Preamble

LENA deals with synergies between Nature Conservation and Local Economy in the Danube Region therefore covering both the Danube and its tributaries. Therefore, water and water-influenced landscapes as well as interdependencies between societies and those landscapes are the important focuses in themes and experiences of the educational activities. Those focuses should be reflected both in content and methods.

There are manifold stakeholders that could provide environmental education activities in protected territories, such as park authorities, private companies, educational institutions, NGOs, etc.

They all have responsibility in regard to the quality and mode of implementation: Not only the content of the environmental education activities highlights the nature, environment and the necessity for protection, but also the way of its implementation reflects this philosophy. Therefore, any disturbance of nature in general or special species or negative impacts on the environment through educational activities have to be avoided. This means for example that also special VIP excursions do not lead into highly protected areas with prohibition to enter or no motorized excursion into highly protected areas or speedboat tours are offered. General principles of environmental protection, such as no littering, maximum sustainable mobility to/from the sites, i.e. a minimal footprint in general, but also personal safety of participants and other social aspects are self-evident parts of planning and implementation of any educational activity.

To have environmental education activities and education for sustainable development does not necessarily mean to operate a visitor centre or to print educational brochures, although such activities could undoubtedly be included in a wider education concept. There is a wide field of high qualitative activities. These comprise a wide variety of possible didactic methods from personalised nature interpretation and interactive out-door educational games without any infrastructure to high-tech, modern, interactive museum type centres for individual visits, both providing concrete learning impacts.

More important for environmental education than the question of infrastructure is its quality. This can be reached by adaptation of methods and content to the circumstances by the simple 'Knowing what to do, why and how!'

2. Content of the environmental education activities

Guiding, excursions and similar activities are forms of education. Education for sustainable development should provide both direct knowledge transfer and the opportunity for the visitors to gain new competences by dealing with subjects (inter)actively. The content can have a wide range and addresses and enables responsible behaviour of the individual visitors and contributes to the protection of nature. The particular context of the respective area to the overall Danube river system should be provided.

Whilst on the one hand basic information on flora, fauna and habitats is essential, on the other hand also complex relations and a holistic view onto the local situation are important. Therefore, education for sustainable development should be grounded in critical and innovative thinking. Societal questions of use, management and protection of nature, as well as the role and possibilities to influence each individual person, should be part of the content. Natural heritage and ecosystems also support economic development of the locals. In this way, the close context of nature and culture within overall living conditions in the respective region gives the frames for the education measures.

3. Mission Statement / Guiding Principles

Mission statements or guiding principles formulate the basic values, goals and instruments of a legal entity. Also, education should always follow a mission statement (guiding principles) of the organising company, association or institution. Such a document should be developed in a participatory process with all involved staff or (voluntary) team members. A mission statement for environmental education and education for sustainable development should usually start from the following points

- How do we define education for sustainable development?
- What are the aims of our educational activities? What do we want to reach? Whom do we want to reach?
- How do we want to plan and implement our educational activities?

From here all other relevant aspects, like target groups, methods, detailed content, more specific aims (see the next chapters) could be developed and fixed. Often this mission statement is part of the company's Management Plan and / or the Communication Strategy of the respective institution. The Mission Statement should be made transparent for all customers via websites, etc.

4. Target Groups

There are several target groups for environmental education. Often these education activities focus only on schools / students. Nevertheless, offers could and should also be prepared for other target groups such as families, retired, companies, cyclists, tourists, etc.

Defining special subgroups e.g. schools of the region vs. schools of the next larger cities, children and families with migration background, etc. would foster the creation of appropriate methods and timing to reach those groups and define specific educational aims for them.

Target groups will be different according to the geographical surrounding of the offer, its nearness to larger cities, number of tourists in the area, etc.

5. Marketing and Information

Marketing for educational offers and activities should make use of instruments (e.g. posters, website, Facebook and other social media, direct mailings, ...) appropriate for the envisaged target group(s).

Internet-based information should be disseminated both at the website of the providing company and also at the sites of institutional providers of environmental education or other services to the PA visitors (incl. PA administrations; local, regional and national tourism marketing sites, tourist centres, etc.). Dissemination channels should target not only sites or online fora frequently used by the direct target group members, but also non-online spots, that are intuitively used by some target groups, e.g. tourist info points at local, regional and national levels, local community centres, etc. These would certainly vary and be differently called and organised by country.

Furthermore, where information or visitor centres exist in the protected areas, it might be relevant to encourage them to provide information about educational services, as this is one of the most immediate places a tourist might ask for information when visiting the area.

Basic information on the educational offers (e.g. beginning, end, duration of the educational activity, meeting point, etc.) needs to be easy accessible for interested people and possible participants. Therefore, an access point for basic information and as a meeting point for participants should be set up easy to find, carefully placed (best with public transport access) and well signposted. The access point should provide a clear overview about the area and the activities for visitors.

Key factor of success for the local reputation of such educational offers are personal contacts of the company or guide to the local people, institutions and protected areas management units. The goals are cooperation and synergies, and not competition with administrated protected areas.

6. Methods

Educational activities should be didactically elaborated and mix different experience-oriented, hands-on, interactive methods, e.g. using riddles and tasks, comparison of different historic stages to the current situation, geo-referenced games, augmented reality expla-

nations, etc.. The didactical methods should take the envisaged target group (age, societal background, ...) into account.

The set of methods as well as the flexibility to adapt methods to the individual needs and preferences of the visitors should be laid down in the company's / associations / institutions mission statement (guiding principles) for education for sustainable development.

7. Qualification

The staff that designs or leads educational activities should have not only an overall (theoretical and/or practical) Danube experience and relevant content knowledge, but also education or training in pedagogy and didactics. This didactic know-how can under some circumstances also be gained externally (e.g. through external consulting when designing a new exhibition or offer for a specific target group).

Furthermore, guides need skills and knowledge of working in groups of mixed nationalities, ages, etc. or in groups of foreign tourists only (if this is the target group of the offer). This will require that there is capacity for work in a multicultural diverse environment, consider educational aspects vis-a-vis culturally different audiences, etc.

The LENA project provides a fundamental training for DANUBE guides and DANUBE guide trainers. The goal is to establish a Danube wide network of respectively trained persons. Formal requirements for guiding in general and in nature specifically as well as establishing businesses with touristic guidance offers are different from country to country and have to be fulfilled as a base for the further Danube Guide training.

8. Language

Published information should be available in the local language and at least in English, in the best case also in languages of the main foreign visitor groups. Any written information provided in a foreign language should be checked by a native speaker.

Excursions, guided tours and other activities that are not specially designed for locals (e.g. school classes) should be offered in the local language and at least in English, in the best case also in languages of the main foreign visitor groups.

9. Accessibility

The goal of education for sustainable development is that everyone can participate in the educational offers, including persons with special needs. This is, especially for out-door activities not always possible to full extent, but the following points of accessibility should be at least taken into consideration:

- Websites should be barrier free or at least barrier reduced as far as possible, as it is already set in laws in several countries for websites of public institutions.
- Accessibility of the indoor and outdoor activities and offers: e.g.
 - Buttons, monitors, etc. in a height that they are reachable for short persons or persons in wheelchairs

- Guiding systems and information also for blind people and people with visual impairment, e.g. by using braille, big letters and objects to be touched.
- At least a part of the nature experience and outdoor activities should be accessible for people with special needs (physically challenged, but also hearing-, vision-, etc. impaired).
- Written information should be provided wherever guidance, instructions, or information is given by audio-systems, so the relevant tools (videos, multimedia) can also be used by deaf people
- Accessibility of used building facilities: e.g. avoidance of stairs, doors of enough width for wheelchairs, washrooms for wheelchairs, etc.

Specific training in methods and didactics for special target groups including mentally challenged people is advisable for guides working with those target groups.

10. Public Transport & local mobility

In the best case, all activities are reachable by public transport. The provider of the offer should use appropriate means

- to provide information (e.g. when marketing the environmental education activities) about available public transport
- to link – if feasible – the timing of activities to time tables of public transport
- to make use of existing nearby bike routes and cooperate with bike rentals, etc.
- to motivate visitors and customers to use public transport, e.g. through price reduction or other incentives

Where public transport services are locally not currently available or are very few, information of local transport services (e.g. taxi service) should be provided to provide options to reach the next bus / train stop or the next bigger city. That information including options for carpooling / car sharing should be incorporated in all information material.

11. Evaluation

Companies / associations / institutions or even persons offering educational activities should have both a complaint management and regular monitoring and (self-)evaluation system in place. Methods and special studies could be developed together with experts, e.g. in cooperation with universities.

The regular evaluation should check

- The satisfaction of the visitors with content and methods of the educational offer, the involved staff, prior information and organization of the offer, etc.
- The change in shared perceptions and attitudes of the participants, based on the visit to the natural area and their participation in the educational services.

- The implementation of the Guiding Principles / Plan of Action – i.e. reaching the planned target groups, the planned education goals, etc.
- This evaluation should be based on appropriate, scientific methods and could be done with external experts, e.g. in cooperation with a university.

2 Checklists

This checklist could be on the one hand used for the overall field of educational activities in the Danube region, some parts of it could be used to analyse individual activities or offers – e.g. single excursions, workshops, nature trails, etc.

In this case responsible persons could evaluate the offer by going through the questions.

Some of the questions might not be applicable to the respective offer, but if the answer to a question is 'No', the provider could ask himself, if there is the option to change this fact to improve the quality of the educational offer.

In the training of Danube guides and Danube guide trainers the checklist will be used to explain, train and check quality of introduced and planned examples for education offers.

1. Content	YES	NO	n/a
Are the Danube region (or its tributaries), water and water related ecosystems and landscapes key topics of the educational activities?			
Are regional culture, history and human-nature relations (e.g. traditional and modern use of nature) topics of the educational activities?			
Are potential and existing conflicts in the use of nature, e.g. power plants, hunting, fishing, tourism, etc. - topics of the educational activities?			
Does the content go beyond simple information and knowledge and provides 'food for thoughts', possible solutions for problems and hints for personal behaviour of visitors?			

2. Mission Statement		YES	NO	n/a
Does the company / association / institution have a document (e.g. Masterplan, Strategy, ...) that provides a basis for the educational activities?				
If Yes	Are the target groups clearly defined?			
If Yes	Are the aims to be reached by educational activities clearly defined?			
If Yes	Are the methods that are used/preferred for the educational activities listed?			
If Yes	Does it contain information about (potential or existing) cooperation with other institutions?			
Is there a mission statement (or guiding principles) that provides a definition and understanding of environmental education?				

If Yes	Is the Mission Statement made transparent to the customers?			
--------	---	--	--	--

3. Target Groups		YES	NO	n/a
Are the target group(s) of the educational activities clearly defined?				
	Are 'children / schools' part of the target groups?			
	Are families part of the target groups?			
	Are 'domestic tourists' part of the target groups?			
	Are 'foreign tourists' part of the target groups?			
	Are 'cyclists' part of the target groups?			
	Are 'specialists (e.g. birdwatchers, ...)' part of the target groups?			
	Is the 'local population' part of the target groups?			
Are there differentiated programs (educational offers) for the above target groups that got a 'Yes'?				
Is the target group differentiation clearly visible in the information material (websites, brochures, etc.)?				

4. Marketing and Information		YES	NO	n/a
Do the marketing and information activities contain print classic marketing e.g. posters, brochures, ...?				
Does the communication strategy contain Web 1.0 marketing e.g. website, direct mailing, etc.?				
Do the marketing and information activities contain Web 2.0 marketing e.g. Facebook, other social media...?				
Do the marketing and information activities contain Web 3.0 marketing e.g. semantic web applications, etc. ...?				
Are the communication methods appropriate for the envisaged target group(s)?				
Is there an access point for basic information providing clear overview about the area and the activities for visitors?				
If Yes	Is this access point well signposted to be easily			

	found?			
If Yes	Could this access point be accessed by public transport?			

5. Methods		YES	NO	n/a
Is there any basic document (e.g. Mission Statement) providing theoretical thoughts about the methods used in environmental education (a 'didactic concept')?				
Do the educational offers use a mix of different methods used in activities / infrastructure that was designed by experts in environmental didactics?				
Are different methods specifically provided for different target groups?				
For guided out-door activities				
	Is the guide bringing touchable items (e.g. furs, skulls, ...) and uses nature itself (e.g. wood, stones, ...)?			
	Is the guide using unexpected tools (e.g. bird imitating whistles, ...)?			
	Is a part of the out-door activity simply funny for the participants?			
For non-guided out-door activities				
	Do the nature trails provide touchable items (e.g. wood, stones, fur, ...)?			
	Do the nature trails provide interactive items (observation binoculars, games, ...)?			

6. Qualifications		YES	NO	n/a
Is the person / are the persons offering the educational activities qualified?				
If Yes	Qualification as DANUBE Guide?			
If Yes	Qualification as ranger of an administrated Protected Area?			
If Yes	Qualification with other formal educations?			

If Yes	Specific qualification or experience to work with persons with special needs?			
Does the association / company / institution have selection criteria for the recruitment procedure for staff working in environmental education?				
If Yes	Do the selection criteria both contain content-wise knowledge (biodiversity, etc.) <u>and</u> methodological skills (pedagogics, interpretation, etc.)?			
Does the association / company / institution have individual development plans for the staff members?				
Does the association / company / institution / person have co-operations with regional institutions and/or associations (e.g. NGOs) being specialized in environmental education?				

7. Language		YES	NO	n/a
Is the website available in English?				
	In languages of the neighbouring countries?			
Is information material available in English?				
	In languages of the neighbouring countries?			
	Are the translations done or checked by professional translators / native speakers?			
Are excursions and out-door activities available in English?				
	In languages of the neighbouring countries?			
Is the inscription of information boards, access points and similar information available in English?				
	In languages of the neighbouring countries?			
Are language skills criteria for selecting staff working in the educational field ?				
Are (internal or external) language courses offered for staff members?				

8. Accessibility		YES	NO	n/a
Is the website barrier-free (according to international standards)?				
Are (some) excursions and out-door activities accessible with wheel-				

chairs and for mobility handicapped persons?				
If Yes	Is this target group specially addressed in brochures, websites and other information material?			
Are building facilities accessible with wheelchairs and for mobility handicapped persons?				
Is any information available in Braille?				
Was the accessibility of educational offers and facilities checked by an external specialised person or organisation - or has the association / company / institution a handicapped staff member who checked?				

9. Public Transport / Mobility	YES	NO	n/a
Is the meeting point of the educational offer accessible by public transport?			
Are the starting times coordinated with the time table of the public transport?			
Is information of public transport included in all information material?			
Is there a cooperation with local bike rental companies?			
Are there incentives to motivate customers to use public transport?			

10. Evaluation	YES	NO	n/a
Is there <u>regular and systematic</u> evaluation of the visitor's satisfaction?			
	Using questionnaires?		
	On-line feedback offered?		
Does the association / company / institution have differentiated evaluation methods for different target groups?			
Was the evaluation method developed with the help of an expert (e.g. cooperation with University)			
Does the association / company / institution provide evaluation tools available in English or/and other foreign languages?			
Does the association / company / institution have a written complaint management system in place?			

Does the association / company / institution evaluate regularly the fulfilment of the goals stated in the strategic documents (strategy, management plan, etc.)?			
Does the association / company / institution adapt the offers according to the analyses of the received feed-back and complaints?			

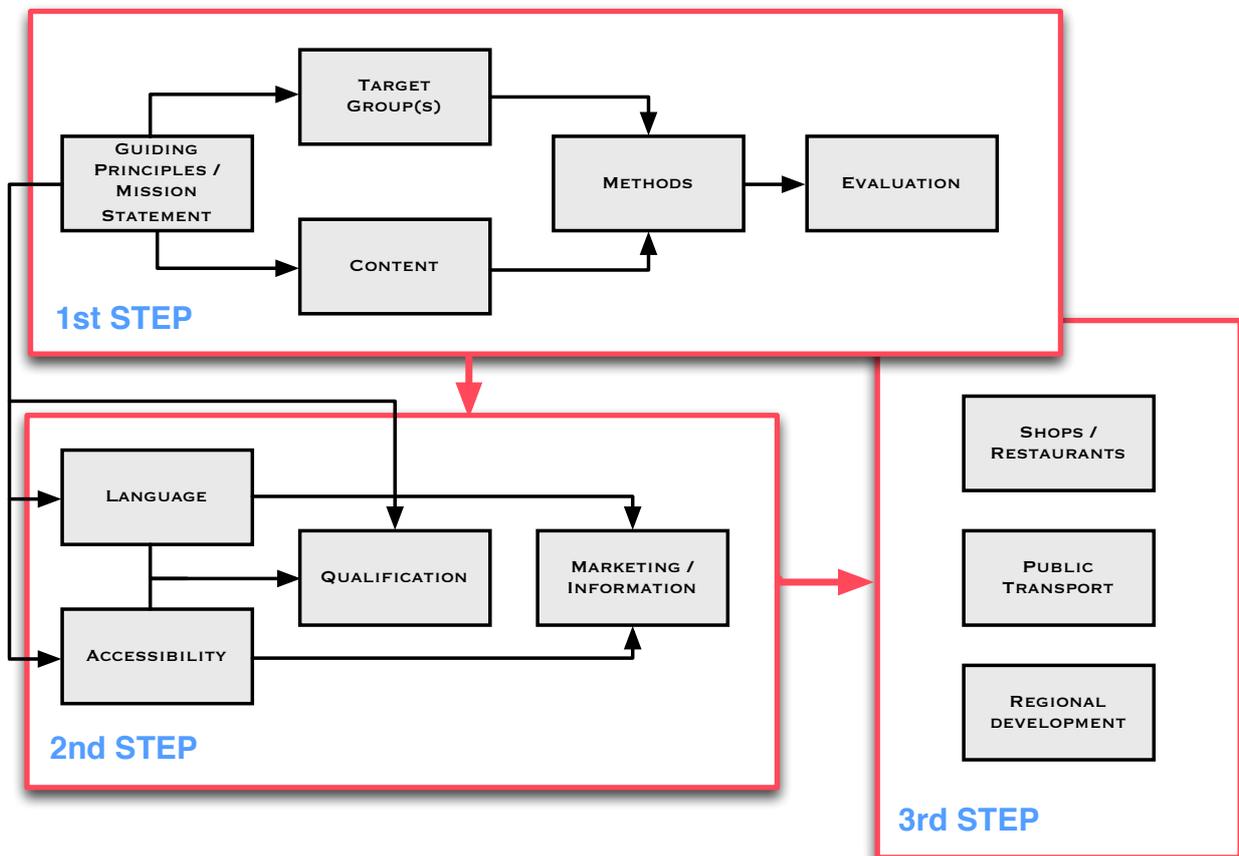
3 Priorities and logical step-by-step approach

The following illustration shows a practical step-by step approach when it comes to improvement and optimisation of existing educational offers. The different aspects correspond with the chapters in the Guidelines (pt. 1 in this document).

The 1st step shows the most important aspects in terms of quality of the offers. Both target groups and content should be reflected in the methods.

The 2nd step shows an advanced quality stage for educational offers. Aspects of language and accessibility need on the one hand special qualification but create on the other hand also specific characteristics of the offer that should be used in the marketing measures.

The 3rd step combines the relation of the offer itself with the region - it is not always within the possibilities of the providers to influence those aspects. Therefore, the use of local shops and restaurants as well as the contribution to regional development is wishful, but not a specific part of the quality guidelines.



4 Further readings

Baumgartner C. (2013): Environmental Education in Protected Areas along the Danube. Report of the assessment tour and quality guidelines for environmental education. Report for DANUBEPARKS,

http://www.danubeparks.org/files/1847_AssessmentTour_QGuidelines_Final.pdf

Biderman A., Bosak W. (1997) Environmental Education in Protected Areas as a Contribution to Heritage Conservation, Tourism and Sustainable Development. In: Nelson J.G., Serafin R. (eds) National Parks and Protected Areas. NATO ASI Series (Series G: Ecological Sciences), vol 40. Springer, Berlin, Heidelberg

Zorrilla-Pujana J., Rossi S. (2016): Environmental education indicators system for protected areas management. *Ecological Indicators*, Volume 67, August 2016, Pages 146-155

United Nations: Sustainable Development Goals:

<https://sustainabledevelopment.un.org/sdgs>

United Nations Educational, Scientific and Cultural Organization. Education for Sustainable development: <http://en.unesco.org/themes/education-sustainable-development>

The Global Action Programme (GAP) on Education for Sustainable Development:

<https://en.unesco.org/gap>