

# Environmental Issues on the Newspapers of HERAKLION - CRETE

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## Abstract

*The present work reports on the role of the local mass media towards environmental issues. For this purpose, we examined the content of three daily local newspapers of Heraklion, Crete with the larger numbers of circulation (Patris, Tolmi, and Mesogios) for the time period 20-5 to 13-6-2004. At first, the material was classified into four categories: "news", "reportage", "comment" and "article of opinion". Secondly, it was classified thematically into categories with reasonable criteria. Thirdly, we recorded the sources for these publications. The results showed that in total 261 publications were included. This is an important figure which indicates that newspapers may contribute substantially to the formation of social-ecological conscience, a basic component of sustainable development.*

**Keywords.** Behavior configuration, Environment, Environmental Education, Media, Sustainable development.

## 1. Introduction

The education for sustainability and for sustainable development constitutes a parameter of critical importance for the preparation of the individual to participate in a process of re-definition of existing course of societies and, consequentially, to the promotion of attitudes and behaviors that will contribute in the creation of a sustainable future. Important are, in this frame, the principles that were agreed in the Intergovernmental Conference of Tbilisi (UNESCO-UNEP, 1977) on the environmental education. Agenda 21 emphasizes the role of local societies in the base of ecumenical environmental questions, through the problems of local environment and their management. The role of local societies is decisive for the management of environmental questions and through the enactment of competences of local self-government and through the circumstantial expression of local societies on environmental questions in their region. The reference to the environmental problems was not presented simply and only, because of the deterioration of the conditions in the natural and in the manmade

environment, but mainly because they are included in a wider cultural context of nature's exploitation, in which new purposes and values are defined. This cultural context is not homogeneous and single precisely because it is a process that concerns the hegemony in the level of reason and action. There exist and rival different versions of nature and accordingly different versions of environment as social problem. Concretely for other the nature is considered as moral size, for other with terms nature, while for other as a new field social and political fights etc. The himself happens also with the significance risk this significance was not foreigner in previous seasons, minus however today meaning differently. While before it had the meaning of the auspicious or voluntary individual undertaking of enterprising danger, in the current season of later modernity, is deemed as an involuntary befalling damage of social total. For the most part, the interest for the nature and the environment today is emanation of endangerments that is hatched and the processes that take place in the frame of "society of risk". Precisely because exists a permanent almost sense of threat, the interest for the environment or more precisely for the environmental problems is maintained high in the researches of common opinion [2].

In the configuration of climate of management of local environmental questions is decisive and mediatory the role of Media. The Media allocate access in big departments of population, can influence the personal behaviors, attitudes and perceptions and they constitute the main source of information round the environmental issues [11]. However it will not be supposed, neither we decrease the importance neither we ignore the possibility of Media of shaping new attitudes of (mainly young persons) and of influencing at least up to a point the existing attitudes [3a]. With base more it is obvious that the Media are in place they are included in the process of Environmental Education, make that is also confirmed by the international conferences on this.

Fluctuations exist in the extent and in the accent that they give the Media in America and

Europe but also and other institutions of publicity in the environment. The projection of environmental issues are of course better than the decade the ' 70, when for first time ' was discussed the "human environment" in the world conference of UN in Stockholm and was publicised the report of her Club Rome for the limits of model of growth in the industrial states. Thus, one cannot see the environment as news means that beyond and except the process of social manufacture of reality via the Media [14].

In Greece, the Media began to deal systematically with the environment in the beginnings ' 80. In this helped, among others, his permanent henceforth installation clouds above Athens and the frequent arsons and other incidents of devalorisation of environment. Newspapers inaugurate ecological columns - or special insets, are published new magazines with specialized environmental issues, circulate books of proportional content and, naturally, the television cover each environmental news that are judged interesting by the persons in charge of program. However, official researches do not exist, worked out from the Academic Departments of Media. Nor official Journalistic Unions, that would record how the means handle the environmental issues, only individual and fragmentary recordings have become.

## 2. Study Purpose

In the present study, we will try to approach the role that possesses the environmental issues in the means of mass briefing, examining the case of three local daily newspapers of Heraklion. The significance environment him we approach in all her aspects and record anything it is reported as natural, social, structured, cultural and economic environment. More specifically, we will attempt to give answers in the following exploratory questions:

- ❖ How could be put on scale issues of environment from the daily local news papers.
- ❖ Contribute the relative publications with the content of messages in the change of attitudes and behaviors of common opinion in the direction of sustainable development.

## 3. Method

For the present study, we examined the content for each day of separately three daily local newspapers, Patris, Tolmi, and Mesogios. Then, we pinpointed and isolated relative issues with the wider significance of environment and other relevant significances. The period was

studied is accidental and completely sampling from 20/5/2004 until 13/6/2004. This material divided in four categories "news", "reportage", "comment" and "article of opinion" and the pages included recorded. In addition, it categorized according to the source of (institution) that it provided the relative issues. The material classified in thematically categories with reasonable criteria.

## 4. Results

With regard to the hierarchy – importance that gave the local press, the 261 total publications that we studied they divided as follows: news 138, reportage 70, comments 23 and articles of opinion 30. Analytically, Table 1 presents the centralized picture of publications.

**Table 1. Newspapers Publications per Publication Category**

Publications	Newspapers		
	Patris	Tolmi	Mesogios
News	37	41	60
Reportage	44	7	19
Comments	8	15	0
Article	19	7	4
Total	108	70	83
Percentage (%)	41,38	26,82	31,80

As it appears the bigger percentage of publications on three newspapers occupies also the news, follows the reportages and then the articles of opinion, with last the comments. Remarkable it is also that do not exist main articles in all the newspapers with environmental issue. However, the environmental information represents a very small percentage from the total of information that the Media offer. The big mass of environmental information confirms that offer in Greece mainly in national level. The over hierarchy is justified from that the small journalistic organisms, as the daily local newspapers of Heraklion, cover mainly the important issues of topicality (hard news) and cannot realize research in-depth, neither use a lot of sources, one and it should and should they cover a lot of news with limited personnel. In addition, they allocate limited economic resources and they do not allow in the journalists to deal with a subject for major interval while, is provided limited space for environmental issues and equivalents is decreased also the sources of pumping of news. While the environmental problems are, complex

and they need enough explanation with sufficient information and details. Even if such type cover it is useful, however, it presents the environmental problems surface and it leaves from outside ecological, political and social interactions that led to their appearance.

The environmental briefing however by the Media should not limit itself in the simple transmission of information round the environmental issues, but present in the public the real socio-economic and ecological side of environmental problems and the possible ways of action for their resolution. Thus, the citizens are in place they recognize the gravity of these problems and they mobilize in favor of them.

With regard to the small presence of comments and articles from journalists this is probably justified by the make that the journalists often do not know that would seek the right sources of knowledge for the issue that cover, what they will help they interpret and they appreciate the information that they have already. Still, because they are not all educated in environmental issues, they ignore main parameters of environmental issues so that they repeat the material of source, without evaluation [10]. In the particular point, it deserves is marked the insufficient or absence of environmental education or simple briefing on the environment and his problems from the different levels of study journalistic faculties.

With regard to the issues mentioned in Table 2, the daily local newspapers of Heraklion presented the issues relative to the environment, at the examined period. The publications divided in 20 categories of issues.

From Table 2, it appears that publications exist on many environmental issues from the anthropogenic environment up to news with reference on the urban environment and the quality of life. Generally exists an equivalent presentation of the thematic units between and the three newspapers but however and their fragmentary presentation thus the issues tends they are presented as self-existent incidents without past and future. On the contrary we remind however, that the leading undeniably make the Conference of Rio in 1992 "On the Environment and the Development", where the environment became first issue of international publicity for big time interval. Their analysis confirms the tendency that they had and they continue having the Media mentioning negatively events of daily life that transformed easily in news, if they include the element of unanticipated and satisfy the rhythms of

production of newspaper. On the contrary, a positive make of daily life, or is considered obvious by the means and consequently is downgraded as news, or from the things requires time for his concretization and consequently again loses his news value.

**Table 2. Publications Issues**

Items	Newspapers		
	Patris	Tolmi	Mesogios
Anthropogenic environment/culture	23	5	13
Urban environment	1	1	
Biological agriculture	2	1	1
Sustainable development	1		1
G.M.O.'s	1	2	5
Forests		1	2
Diet/Health/Starvation	16	8	7
Dangerous radioactivity wastes		4	1
Climate	2	1	2
Politics	2	3	4
Ecosystems	7	3	4
Fauna	11	8	9
Environmental protection	8	3	3
Pollution	3	5	
Solid/Liquid waste management	3	2	3
Technology/Media	4	4	7
Environmental friendly technologies	3	7	6
Aquatic resources		3	1
Flora	6	1	2
Environmental actions	15	9	12

In addition, it does not become report in the causes that cause this devalorisation of environment and is not disputed the existing model of growth. A photograph that we often met appear the local newspapers framed with a small comment of journalist (casuistic framework of news) [5] can activate in a given moment the citizen, but the configuration of such environmental conscience, that correspond in the needs of season, requires a overall approach of problem. It is also remarkable that there has been recorded action for the environment that has taken place from various institutions that provide informal environmental education. In addition, a collaboration of institutions recorded in the frame of concretization of these activities. From the analysis of issues daily local it results that it

should be given bigger accent in the confrontation of issues with regard to urban environment, forests, biological agriculture, renewable sources of energy, the management of all nature of waste with friendly methods to the environment and the rational management of aquatic resources. With regard to the sources of relative publications, these presented in Tables 3 and 4. At this categorization, we include in a category, publications that emanated from institutions of optional environmental education apart from the schools. In the other category, we only include publications that reported in activities that realized in the frame of programs of optional environmental education of schools.

**Table 3. Publications Sources**

Publication	Newspapers		
	Patris	Tolmi	Mesogios
News	34	40	57
Reportage	29	6	16
Comments	6	14	0
Article	18	7	4
Total	87	67	77
Percentage (%)	37,66	29,00	33,33

From informal environmental education sources (museums, local authority, media, and other sources)

From Table 3 it results that are appeared relatively enough publications from activities of institutions of optional environmental education. With regard to the categorization of publications, first they place possesses the news in all the newspapers, while it appears exists a differentiation between the newspapers with regard to the number of presented reportages and comments. The newspaper Patris at general acceptance because the bigger circulation in the prefecture Heraklion appears that it appears most publications and all the categories concerning the other newspapers.

**Table 4. Publications Sources**

Publication	Newspapers		
	Patris	Tolmi	Mesogios
News	3	1	3
Reportage	14	1	3
Comments	2	1	0
Article			0
Total	19	3	6
Percentage (%)	67,86	10,71	21,43

From informal environmental education sources (Primary and Secondary Education)

From Table 4, it results that they are appeared in relative publications a small number

of activities in the frame of programs of optional environmental education that is materialized in the schools. The newspaper Patris possesses the first place in number of publications and in particular covers the activities with relative reportages. It appears from a first regard that is required a narrower collaboration between school environment and journalistic organisms for bigger diffusion of environmental information that emanates from concretizations of programs of environmental education.

The sources that used were mainly institutional public and government owned institutions and presented in the Tables 5, 6, the 7. Scientific community it plays secondary role, as the private sector and the not-governmental organizations. From this categorization, we conclude that the journalists can more easily cover issues of more general interest despite concrete facts, which require knowledge but also include controversial sides. This indirectly emerges from the entire lack of articles of himself journalists but also minimal comments. The simple however diffusion of environmental information from Media do not constitute Environmental education, however when the information is transmitted with suitable way thus, so that it attributes real dimensions of environmental problem and it provides his possible ways of resolution, it strengthens the degree of environmental sensitization of public and is changed in mobilization for environmental action.

**Memorandum for tables 5, 6, 7.**

1. Central government
2. Local authorities (Municipalities, port-office, Prefecture, Region of Crete, etc.)
3. Schools
4. Church
5. Universities – Research Institutions
6. Museums
7. Professional Clubs, companies, e.g. Engineers, Economists, Hotels officers, etc.
8. Environmental organisations, native associations
9. Non-governmental organisations at national level, e.g. Greek Ornithology, Company for the Protection of Nature, etc.)
10. Non-governmental environmental organisations at international level, e.g. *Greenpeace*, *W.W.F.*, etc.
11. Scientific companies and unions for the protection of environment in local, national and international level e.g. Union of Greek Biologists, etc.

12. Media
13. E.U./U.N.
14. Political parties, politicians
15. Private individuals
16. Autonomous environmental groups for environmental protection.

**Table 5. Sources from Informal and Non-formal Environmental Education (Newspaper Patris)**

Source	Category			
	News	Reportage	Comment	Article
1				
2	1			
3	3	15	2	1
4	2	5	1	
5	5	3		
6	4	4		
7	5	4		1
8	4	6	1	1
9	1			
10		1		
11	3		1	1
12	5	1	3	
13	2			
14	2	1		2
15		4		4
16	3			
<b>Total</b>	<b>37</b>	<b>44</b>	<b>8</b>	<b>19</b>

**Table 6. Sources from Informal and Non-formal Environmental Education (Newspaper Tolmi)**

Source	Category			
	News	Reportage	Comment	Article
1			1	
2		1		
3	1	1	1	
4	1	1	1	
5	1	1	1	
6	5	1	1	
7	3			
8	3		1	
9	1			
10	3	1		
11	7	1		1
12	5		9	
13	3			
14	3			
15	2			6
16	3			
<b>Total</b>	<b>41</b>	<b>7</b>	<b>15</b>	<b>7</b>

**Table 7. Sources from Informal and Non-formal Environmental Education (Newspaper Mesogios)**

Source	Category			
	News	Reportage	Comment	Article
1	4	1		
2				
3	3	3		
4	3			
5	2			
6	14	5		
7	4	2		1
8	4	3		1
9	3			
10	4			
11	3	1		1
12	8	2		
13	1	1		
14	5	1		
15				1
16	2			
<b>Total</b>	<b>60</b>	<b>19</b>		<b>4</b>

## 5. Discussion

A critical question is if how much the cover of environmental questions in the issues of mass means influences also the attitudes and the representations of citizens on one side for the environment and thereafter, for individual special environmental questions. Despite the appeared force to have the Media in the configuration of attitudes, the change of solidified attitudes is particularly difficult. Their supposedly absolute force, as presented from behaviorism, is substantially a fable [3b]. Evident it is, that the cognitive theories of attitudes, according to which the change is question of creation of some cognitive no agreement, with the personal contacts with individuals that respects no one, present a more genuine picture of parameters that influences the change of attitudes [3b]. The effects of news reports in the public are an immense and difficult question, which is susceptible of multiple methodological approaches. Nevertheless, we will attempt his firstly approach with base the results of present study. For the export of completed conclusions it is required a big extent research where will be asked the opinions of citizens but also himself journalists for the local Media. According to a study of Centre of Environmental Information Studies [1], for the offer and the demand of environmental information in European level, is recorded between the other and the insufficiency

of actual model of transmission of environmental information, while are marked the basic characteristics and the negative elements in the way of diffusion and her distribution, in Europe. Klapper who is mentioned by Georgas [3b] leads in the conclusion that according to the results of various researches, that the means of mass communication simply strengthen the existing attitudes, opinions and behaviors of individuals. That is to say, that the individual is not careful the messages that are disagreeably, as it is forecasted by the theory of cognitive no agreement of Festinger, with his existing attitudes. On the contrary, the individual is careful particularly the according to his existing attitudes messages. Right environmental information does not mean essentially a simple increase of environmental news that Media diffuse, even if this increase strengthens the probability of providing information the public about the existence of such messages [15], [1]. The aid of flow of environmental news, even if useful, it does not fight the ideological base of problem, that is consolidated, among citizens, attitude is ignored the factor environment in the process of decision-making daily [15]. The real and essential environmental information becomes action when that the citizens are provided, through suitable methods, sufficient information thus, so that they are in place to shape a completed opinion and to decide for real action regarding environmental issues [1]. However despite the existence of increased environmental conscience, the inquiring data show that the environmental knowledge and the environmental conscience are men essential terms on the event of one friendly to the environment behavior, no, however, sufficient and unique prognostic indicators of such behavior [8]. From an international research [9] have resulted dissenting results. Thus, certain they have diagnosed powerful cross-correlations between the environmental issues of Media and the conscience of public round corresponding issues. At other analysts, however, such type cross-correlations not argued sufficiently.

Generally, they appear to be the following basic factors that affect, so that changes the attitudes and the representations of public for the various issues that are presented in the daily provision of Means:

- ❑ the sources of information
- ❑ the nature of presentation
- ❑ the frequency with which they present the same issue

- ❑ the affinity of issues with the daily life of citizens
- ❑ obvious the issues that are appeared
- ❑ the degree of environmental sensitization of journalist

The sources of environmental information determine largely her content, but mainly the objectivity and her correctness. The main sources of environmental information are the responsible public services and governmental institutions, the academic institutions as well as, the special scientists and the non-governmental environmental organizations. However, they are not the few times where the above sources come in opposition between them, with regard to the material that provides in the Media for a concrete environmental issue. For instance, for the opening up of new street through a forest, the public institutions will diffuse in the Media material in favor her application of work, while a not governmental environmental organization tries for opposite. Consequently, the objectivity and the correctness of environmental information can be evaluated from the degree whom's it accomplishes to incorporate and join the various opinions that are found in adversity, in each social environment and through an open process. Thus, all the sides of environmental problem appeared and no one of them not excluded or marginalized [1].

Important role in the environmental sensitization of public plays the transformation of environmental information in effective knowledge or differently from information on consumption in information on use [1]. The continuous negative correspondence and over simplification of environmental problems, without the least report on their likely ways of resolution, it removes the citizens from the environmental questions, after they feel unassisted towards them and decide him they ignore. From enough researches, it has been observed that are increased the probabilities changes the attitude of public for a issue, when this is presented by the means of communication with not ambiguous way, with dramatic style and persuasiveness [12]. Now, we would say that the environmental issues in the daily newspapers of Heraklion not presented general with ambiguous way, however no with dramatic style and their persuasiveness is satisfactory.

Nevertheless, the explicit way of presentation of issues is not enough from alone him in order to change the attitudes of public. To this direction, the contribution of factor of frequency is essential, with which deal the Means with the

particular issue. It is acceptable that the repeated issues, because the accumulation of information and the familiarization that creates, practices smaller effect in the transformation of attitudes. On the contrary, the issues that presented for first time and acquire exceptional character have bigger probabilities they change or they shape the attitudes of public. This happens because the small "cognitive mass" on which they had been shaped the initial attitudes of public, supplied now with new elements and enriched with knowledge, which dictated by the issues of Media. This news, enriched "cognitive mass" sweeps along with her line the attitudes of public, his changes, that is to say, to the "desirable" direction that engraved by the issues of Media. In the study of our local newspapers, on the minor interval that him we examined we even realized that existed and not repeated publications on the same issue. More specifically existed publication only on a time where it had as title the viable growth. This together and with other publications that emit the same message it is possible to lead to the configuration of behavior of certain citizens to this direction.

The citizens, independent from their educative level and their socio-economic situation, in their majority sensitized in a question that transmitted by the Media, when this question they believe that them it concerns immediately. A message of Media, that is considered that it is related with the needs of public, will constitute the reason in order that the public gives bigger attention in this and he seeks more information, despite when the message is more general and vague [11]. In the newspapers that we analyzed enough issues concern the everyday routine of citizens, potential however could be more.

From repeated studies, it realized that the abstract issues, because they are obscure, have smaller effects in the change of attitudes. On the contrary, as "concrete" is fixed in the relative bibliography a issue which becomes easily intelligible, finds, that is to say, immediately affinities and equivalences with preexisting cognitive forms of recipient, in order that easily and uncut it is included in the network of his knowledge. The issue, which concreted, requires small only intellectual treatment so that it registered in the long-lasting memory and it retained.

The degree of environmental sensitization of journalist depends on many factors, as ontological, his epistemological and value

admissions but also his cognitive interests. When, therefore, it is called to cover a issue the perceptions and the attitude that the journalist allocates towards him, little until very, deliberately or no, proportionally and with the degree of elasticity of each form of influences of (pressures) that accepts in his work, they influence the syntax of final text.

Logically the environmental sensitized journalist led to an environmental friendlier attitude than his part, in a disposal for mobilization of acquisition of dexterities and essential faculties for active attendance in the decision-making environmental. This reflected in the way of distribution of environmental information, where the journalist attributes or tries she attributes a completed picture of environmental problem, with his possible ways of resolution. When a journalist allocates a high degree of sensitization opposite to the environmental problems, in the frames of his work and concretely in the distribution of environmental information, he tries to present to the public a completed picture of environmental problem with its likely ways of resolution. So that to strengthen the environmental sensitization of public and to change the mobilization for environmental action. Moreover a environmental sensitized public has the possibility improves the quality of cover of environmental issues from the Media the relation of Media with the public is interdependent and influencing each other, that is to say, the Media they have the possibility of influencing the public, but also the public it can and influences the Media. Despite his all dependence from the means of briefing and the issues their, public seldom remains permanently passive. He is also active; the issues constitute meaning through their report in the news reports, as much as if this is vague and distant from the concerns of everyday routine. This rendered explicit for a long time, in the frame directed in the public of critical regard of media (audience-oriented criticism). This regard has many common points with the Pedagogic Faculty of dialectic of social interaction and growth, approach that finds, among others, right moment in the analysis of environmental issues, [7]. In a research of Swedish Media confirmed, many of the places of theoretical model of effects of daily provision [4] certified that in local, everyday, ecological problems the means of briefing and particularly the regional newspapers that in Sweden have big circulation, very little influence with their news reports the

public. The last one develops environmental conscience through his direct experience, as well as from the interpersonal communication. However, the issues of media very often determine the content of interpersonal communication for questions of public interest. When the public they are environmental sensitizing, requires an in detail and qualitatively better environmental briefing. This requirement becomes obvious with the increase of circulation of newspapers and magazines that fill the above requirements. However are today cultivated sufficiently by the local Media the idea of sustainable development by the present work but also at our personal opinion no and the causes are many. Typically, we report:

- The Media do not check sufficiently if the central authority legislates and applies the national and Community legislation on the questions of environment.
- The Media do not appear systematic programs of informal environmental education that the local self-government, the schools etc. plan and achieve
- In the local Media, systematic "champagnes" briefing do not become for the readers, so that they will make environmental friendly choices.
- The Media do not check sufficiently, if the industries, the tourism, the rural enterprises replace the old technologies with new "clean" ones, but are simply limited in the recording of consequences from each form pollution.
- In the Media, an environmental problem only recorded or its dramatic sides more stressed, despite the environmental problem itself, its generative causes and consequences.

Deductively the local Media with all the sources that he provides, it is possible under conditions they contribute substantially in the configuration of social - ecological conscience, basic component of sustainable development.

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