



SPECIAL  
SECRETARIAT  
FOR WATER



MINISTRY OF  
ENVIRONMENT  
& ENERGY



# 1<sup>st</sup> Update of River Basin Management Plans

## River Basin District of Eastern Central Greece (EL07)

### Summary



European Union  
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Development Fund



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**HELLENIC REPUBLIC**  
**MINISTRY OF ENVIRONMENT & ENERGY**  
**SPECIAL SECRETARIAT FOR WATER**

**DEVELOPMENT OF 1<sup>st</sup> UPDATE OF RIVER BASIN MANAGEMENT PLANS FOR THE 14 WATER DISTRICTS OF GREECE, IN ACCORDANCE WITH THE DIRECTIVE 2000/60/EC, THE LAW 3199/2003 AND THE P.D. 51/2007 - STUDY M3 “RIVER BASIN DISTRICT OF ATTICA (EL06) AND EASTERN CENTRAL GREECE (EL07)”**

**JOINT VENTURE: “1<sup>st</sup> UPDATE OF RIVER BASIN MANAGEMENT PLANS ATTICA (EL06) AND EASTERN CENTRAL GREECE (EL07)”**

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**RIVER BASIN DISTRICT OF EASTERN CENTRAL GREECE (EL07)**

**Summary of 1<sup>st</sup> Update of River Basin Management Plans – English (Deliverable 22b Study M3)**

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## **1<sup>st</sup> UPDATE OF RIVER BASIN MANAGEMENT PLANS**

### **RIVER BASIN DISTRICT OF EASTERN CENTRAL GREECE (EL07)**

#### **Summary**

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### ***Abbreviations***

<b>Abbreviation</b>	<b>Interpretation</b>
AR	At Risk
AWB	Artificial Water Body/bodies
EQR	Ecological Quality Ratio
GD	Guidance Document
GIG	Geographical Intercalibration Group (
GOLR	General Organization of Land Reclamation
GWB	Groundwater Body/bodies
HMWB	Heavily Modified Water Body/ bodies
LOLR	Local Organization of Land Reclamation
MEWSS	Municipal Enterprise for Water Supply and Sewerage
NR	Not at Risk
NWMN	National Water Monitoring Network
PAR	Probably At Risk
PNR	Probably Not at Risk
RB	River Basin
RBD	River Basin District
RBMP	River Basin Management Plan
SCI	Site of Community Importance
SPA	Special Protection Area
SWB	Surface Water Body/bodies
WB	Water body/bodies
WFD	Water Framework Directive
WISE	Water Information System of Europe





## 1. INTRODUCTION – 1<sup>st</sup> UPDATE OF RIVER BASIN MANAGEMENT PLANS

### 1.1 INTRODUCTION

By decision 391 / 08.04.2013 (Government Gazette B'1004) of the National Water Committee the 1<sup>st</sup> River Basin Management Plan of the River Basin District examined was approved.

The 1<sup>st</sup> Update has major changes and improvements from the 1<sup>st</sup> Management Plan:

- It is based on the use of data from the National Water Monitoring Network (NWMN), for the 2012-2015 period
- It is being drawn up at the same time as the Flood Risk Management Plans pursuant to Directive 2007/60 /EC and synergy of actions and a program of measures has being accomplished
- It is also being drawn up at the same time as the programs of measures for the achievement of the good environmental status of the marine waters of the country in accordance with the Directive 2008/56/EC and has achieved synergy of actions and of program of measures
- It takes into account the National Strategy for Adaptation to Climate Change and incorporates into the program of measures sub-actions of the National Strategy for Adaptation to Climate Change
- It takes into account the results of actions that have been implemented so far in the context of increasing knowledge of water status and the pressures they receive, as well as the actions implemented to fill in the gaps identified in the 1<sup>st</sup> Management Plan
- It takes into account the new requirements arising from the EU Directive 2000/60/EC Guidance Documents.
- It takes into account the results of the European Commission's Special Report on the Evaluation of Management Plans which was implemented as part of the European Parliament's briefing on the implementation of the Directive and is available on the EU's website

The 1<sup>st</sup> Update is being carried out simultaneously for the 14 River Basin Districts of the country and homogeneity has been achieved in the individual methodologies but also in the proposed programs of measures (basic and supplementary).

### 1.2 CONSULTATION PROCESS

The consultation process on the 1<sup>st</sup> Update of River Basin Management Plans lasted from 30/11/2015 till 15/12/2017 and included the following:

- **1<sup>st</sup> Phase:** In November 2015, the content of the foreseen activities for the 1<sup>st</sup> Update of the RBMP was posted on the website of the Ministry of Environment and Energy timetable tender documents for the site of the RBMP ([www.ypeka.gr](http://www.ypeka.gr)) as well as the detailed timetable of the consultation process.
- **2<sup>nd</sup> Phase:** In June 2016, data on the important issues of water resources management in each RBD were posted on the same website, containing briefly the results of the National Water Monitoring Network for the RBD, the main pressures, the identification of the competent authorities and stakeholders involved in the consultation. Also, in December 2016, the basic common methodologies for the designation and classification of water bodies status, assessment of pressures and impacts including hydromorphological pressures, the definition of Highly Modified Water Bodies and the identification of the exemptions of Article 4 of Directive 2000/60 / EC, were posted on the same website.

- **3<sup>rd</sup> Phase:** In June 2017 a draft of the 1st Update of RBMP was posted on a special website of the Special Secretariat (<http://wfdver.ypeka.gr>), as well as a questionnaire. This phase included the publication of the Strategic Environmental Impact Study.

**The consultation was completed in 15/12/2017.**

#### **1.2.1 Consultation results**

In total 102 persons participated in the consultation event, 11 participants intervened and 39 questionnaires were submitted. No questionnaires were sent through the website and one comment was posted on the website.

Main results of the consultation process:

- Satisfactory participation from the public administration sector
- Medium participation of citizens and NGOs
- High environmental sensitivity concerning water resources

The consultation process is deemed successful as it revealed all the problems that came up during the implementation of the first RBMP and contributed to the final shaping of the 1<sup>st</sup> Update of RBMP of Eastern Central Greece (EL07).

## 2. DIFFERENTIATIONS IN COMPARISON WITH THE 1<sup>st</sup> RBMP

### 2.1 NEW ANALYTICAL METHODOLOGIES FOR CRITICAL ASPECTS OF THE IMPLEMENTATION OF THE IMPLEMENTATION OF DIRECTIVE 2000/60/EC

For the 1<sup>st</sup> Update of RBMP of the country, new analytical methodologies were developed for critical aspects of the implementation of Directive 2000/60/EC. All the analytical methodologies are available on the website of the Special Secretariat for Water <http://wfdver.ypeka.gr/>:

- Analysis of anthropogenic pressures and their impacts on surface and underground water systems
- Determination and criteria for assessment of hydromorphological alterations
- Determination of Heavily modified (HMWB) and Artificial (AWB) Water Bodies
- Determination of the "exceptions" to the achievement of the environmental objectives of Directive 2000/60/EC:
  - Identification of the "exceptions" of paragraphs 4 to 6 of Article 4 of Directive 2000/60 / EC (4.4 - 4.6)
  - Identification of the "exceptions" of paragraph 7 of Article 4 of Directive 2000/60 / EC (4.7) on new modifications
- Assessment (designation classification) of surface water bodies status:
  - Assessment of the ecological and chemical status of river water bodies
  - Assessment of ecological and chemical status of lake water bodies
  - Assessment of the ecological and chemical status of coastal and transitional water bodies
- Assessment methodologies for individual BQEs for each surface water category that has been approved by the EU in the context of the intercalibration exercise at European level. These methodologies concern the following:
  - Analytical methodologies for the assessment of biological quality elements in rivers.
  - Analytical methodologies for the assessment of biological quality elements in lakes.
  - Analytical methodologies for assessing the biological quality elements in coastal and transitional waters.



## 2.2 MAIN DIFFERENTIATIONS IN COMPARISON WITH THE 1<sup>ST</sup> RBMP

Table 2-1: Main differentiations in comparison with the 1<sup>st</sup> RBMP

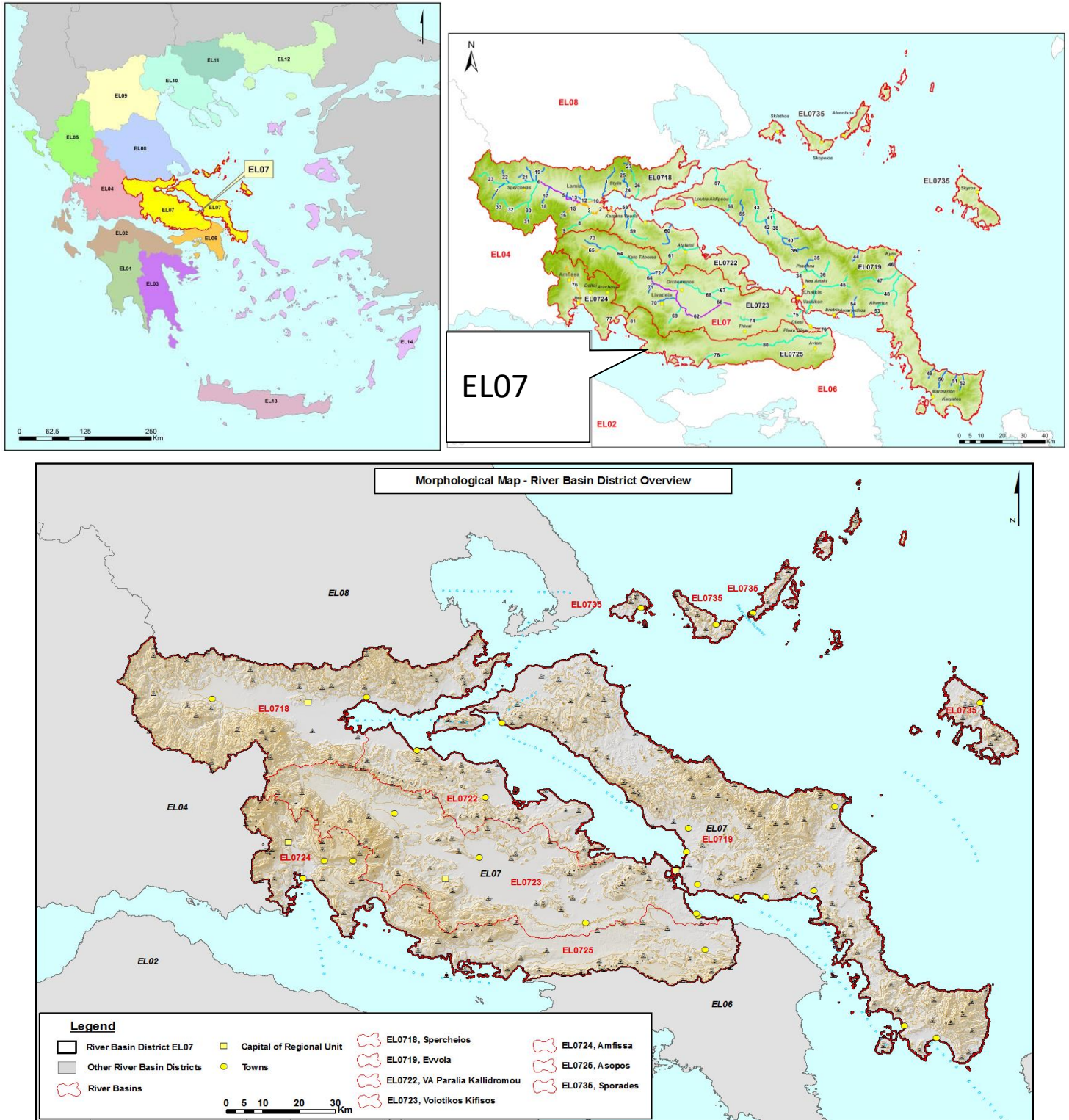
Content of 1 <sup>st</sup> Update of RBMP/ Activity	Differentiation in comparison with the 1 <sup>st</sup> RBMP
<b>COMPETENT AUTHORITIES</b>	The competent authorities are not differentiated in comparison with the 1 <sup>st</sup> RBMP. In the Update, the inventory of the competent authorities and stakeholders involved in the Water Management, as it derives from the existing institutional framework, is rationalized and it is presented in accordance with the requirements of the new EU Guidance Document (GD Reporting 2016).
<b>DESIGNATION OF SURFACE WATER BODIES - TYPOLOGY</b>	In the Update, new typology was developed for river and lake WB. Furthermore, the reservoirs are reported as River Heavily Modified WB but their assessment is done with elements and tools designated for lakes, as lakes is the category of natural WB they resemble the most. In accordance with the above the number of WB is revised. It is noted that during the Update, the prefix of the WB codes were reformulated from GR to EL, in order to be compatible with the EE databases.
<b>DESIGNATION OF GROUNDWATER BODIES</b>	The number of GWB is revised based of the results of the NWMN or/and special studies completed from the publication of the 1 <sup>st</sup> RBMP till today. It is noted that during the Update, the prefix of the WB codes were reformulated from GR to EL, in order to be compatible with the EE databases.
<b>HEAVILY MODIFIED WATER BODIES (HMWB) AND ARTIFICIAL WATER BODIES (AWB)</b>	The HMWB that were defined under the 1st RBMP are re-examined based on the new methodology and the data from the NWMN.
<b>PROTECTED AREAS</b>	The Registry of Protected Areas of the 1 <sup>st</sup> RBMP is revised based on: The new Natura 2000 areas proposed by the Ministry of Environment and Energy according with the provisions of the Bird (2009/147/EC) and Habitat (92/43/EEC) Directives. The monitoring results from the Bathing Waters and the provisions of the Bathing Waters Directive (2006/7/EC) Other directives on water protection with more strict objectives as the Drinking Water Directive (80/778/EEC, as revised by the Directive 98/83/EC), the Shellfish Directive (2006/113/EC), freshwater fish Directive (2006/44/EK), Nitrates Directive (91/676/EOK), Urban Waste Water Treatment Directive (91/271/EOK) etc New data that came up after the publication of the 1 <sup>st</sup> RBMP and the relevant EE Guidance Documents. Furthermore it is noted that in the framework of the Update the CORINE protected areas and Landscapes of Special Natural Beauty were not included in the Registry of Protected Areas.
<b>PRESSURES AND IMPACTS</b>	The analysis of pressures and impacts in the Update is done according to the new national methodology and data produced after the approval of the 1 <sup>st</sup> RBMP. The main differentiation is the new analytical method of assessment of hydromorphological pressures.

Content of 1 <sup>st</sup> Update of RBMP/ Activity	Differentiation in comparison with the 1 <sup>st</sup> RBMP
<b>CLASSIFICATION OF THE STATUS OF SURFACE WATER BODIES</b>	In the framework of the Update the classification of status of SWB is done according to the new national methodologies approved by the EU and based on the results of the NWMN. For the WB where no monitoring data is available, the classification of status was done by grouping based on their type and the analysis of pressures.
<b>CLASSIFICATION OF THE STATUS OF GROUNDWATER BODIES</b>	The classification of status of the GWB is not different from the 1 <sup>st</sup> RBMP. The classification is based on the new data from the NWMN.
<b>NATIONAL WATER MONITORING NETWORK</b>	The Update takes in consideration the results of the NWMN of the status of the national WB with important number of sampling for the period 2012-2015 for BQE, Physicochemical and chemical indicators and hydromorphological quality elements. It also includes monitoring of the chemical and quantitative status of the GWB.
<b>ECONOMIC ANALYSIS OF WATER USE</b>	For the economical analysis of water uses, the provisions of the new Joint Ministerial Decision οικ. 135275/22.05.17 on water pricing are taken in consideration.
<b>ENVIRONMENTAL OBJECTIVES – EXEMPTIONS</b>	In the framework of the Update, the environmental objectives and exemptions are set according to the new national methodologies, developed according to the EU guidance.
<b>PROGRAMME OF MEASURES</b>	The PoM of the 1 <sup>st</sup> Update is differentiated from the 1 <sup>st</sup> RBMP, following the new methodologies: Continuation/improvement of 1 <sup>st</sup> RBMP measures New measures for the achievement of the environmental objectives set Correlation of measures with significant pressures Correlation of measures with Basic Measure Types and implementation indicators set by the EU Synergies of PoM with the National Strategy on Climate Change Adaptation.

### 3. DESCRIPTION OF RIVER BASIN DISTRICTS– COMPETENT AUTHORITIES

#### 3.1 RIVER BASINS

The **Eastern Central Greece River Basin District (EL 07)** is one of the fourteen water districts, which the country was divided by law 1739/1987 (Government Gazette 201/A/1987).





The Eastern Central Greece River Basin District covers an area of 12.279 km<sup>2</sup>, and is composed of **Spercheios RB (EL0718)**, **Evvoia RB (EL0719)**, **NE Paralia Kallidromou RB (EL0722)**, **Voiotikos Kifisos RB (EL0723)**, **Amfissa RB (EL0724)**, **Asopos RB (EL0725)** and **Sporades RB (EL0735)**.

Table 3-2: Eastern Central Greece River Basins

River Basin (RB)	Area (km2)
Spercheios (EL0718)	2.315
Evvoia (EL0719)	3.681
NE Paralia Kallidromou (EL0722)	919
Voiotikos Kifisos (EL0723)	2.719
Amfissa (EL0724)	786
Asopos (EL0725)	1.362
Sporades (EL0735)	497
<b>Total</b>	<b>12.279</b>

### 3.2 COMPETENT AUTHORITIES

Law 3199/2003 (Government Gazette A' 280) on the Protection and Management of Water Bodies harmonises the National Law with the provisions of the Directive 2000/60/EC and defines the competent authorities for the protection and management of Water Bodies.

Designated competent authorities at national level:

- The **National Water Committee**
- The **National Water Council**
- The **Special Secretariat for Water**

Table 3-1: National competent authority ID

<b>Official Name</b>	<b>Special Secretariat for Water</b>
<b>Acronym</b>	S.S.W.
<b>Contact Information</b>	
<b>Address</b>	Amaliados 17
<b>Postal Code</b>	11523
<b>City</b>	Athens
<b>Country</b>	Greece
<b>Web-page</b>	<a href="http://www.ypeka.gr/">http://www.ypeka.gr/</a> <a href="http://wfdver.ypeka.gr/">http://wfdver.ypeka.gr/</a>
<b>Contact</b>	tel: 210 6475102, 213 1515410-1 e-mail: <a href="mailto:info.egy@prv.ypeka.gr">info.egy@prv.ypeka.gr</a>



Designated competent authorities at Decentralised Administration level:

- **Decentralised Administration Water Council**
- **Water Directorates of the Decentralised Administration**

Table 3-2: Decentralised Administration competent authorities ID

<b>Official Name</b>	<b>Water Directorate of Sterea Ellada of the Decentralised Administration</b>
<b>Acronym</b>	W.D.STE
<b>Contact Information</b>	
<b>Address</b>	Theodoratou & Velliou
<b>Postal Code</b>	35100
<b>City</b>	Lamia
<b>Country</b>	Greece
<b>Web-page</b>	<a href="http://www.apdthest.gov.gr">http://www.apdthest.gov.gr</a>
<b>Contact</b>	tel: 22310 44012, 22310 48044 fax: 22310 43007 e-mail: dydatonster@apdthest.gov.gr
<b>Official Name</b>	<b>Water Directorate of Thessalia of the Decentralised Administration</b>
<b>Acronym</b>	W.D.THE.
<b>Contact Information</b>	
<b>Address</b>	Farsalon 148
<b>Postal Code</b>	41335
<b>City</b>	Larisa
<b>Country</b>	Greece
<b>Web-page</b>	<a href="http://www.apdthest.gov.gr">http://www.apdthest.gov.gr</a>
<b>Contact</b>	tel: 2410 613720 2410 616189, 2410 617174 fax: : 2410 613932, 2410 234321 e-mail: dydatonthes@apdthest.gov.gr

The following table gives a snapshot of the role played by each competent authority on every water management and protection thematic.

Table 3-3: Main competences for every water protection and management thematic

Competent Authority	Role												
	Pressure and impact analysis	Economic analysis	Monitoring of surface water	Monitoring of groundwater	Assessment of status of surface water	Assessment of status of groundwater	Preparation of RBMP	Preparation of PoM	Implementation of measures	Public participation	Enforcement of regulations	Co-ordination of implementation	Reporting to the European Commission
Special Secretariat for Water of the Hellenic Ministry of Environment & Energy	M	M	M	M	M	M	M	M	M	M	M	M	M
Water Directorate of the Decentralised Administration	O	O	-	-	-	-	O	O	M	M	M	M	-
Hellenic Ministry of Foreign Affairs	-	-	-	-	-	-	-	-	O	-	M	-	-
Hellenic Ministry of Rural Development and Food	-	-	-	-	-	-	-	-	M	-	O	-	-
Hellenic Ministry of Infrastructure and Transport	-	-	-	-	-	-	-	-	M	-	O	-	-
Hellenic Ministry of Economy and Development	-	-	-	-	-	-	-	-	M	-	O	-	-
Hellenic Ministry of Health	-	-	-	-	-	-	-	-	M	-	O	-	-
Hellenic Ministry of Shipping and Island Policy	-	-	-	-	-	-	-	-	M	-	O	-	-
Hellenic Ministry of Interior	-	-	-	-	-	-	-	-	M	-	O	-	-
Municipalities	-	-	-	-	-	-	-	-	M	O	-	-	-
Regions	-	-	-	-	-	-	-	-	M	O	O	-	-
<b>M</b> Main role	<b>O</b> Other role	-	No role										

## 4. DESIGNATION AND CLASSIFICATION OF WATER BODIES

### 4.1 SURFACE WATER BODIES (SWB)

According to the 1<sup>st</sup> Update of RBMP in the River Basin District of Eastern Central Greece (EL07) **one hundred and four (104) surface water bodies**, are identified:

Table 4-1: Number of surface water bodies for each RB

Type of WB	RB							Total RBD
	RB EL0718	RB EL0719	RB EL0722	RB EL0723	RB EL0724	RB EL0725	RB EL0735	
<b>River WB</b>	33	24	4	14	2	4	0	81
<b>Reservoirs</b>	0	1	0	2	0	0	0	3
<b>Lake WB</b>	1	0	0	0	0	0	0	1
<b>Transitional WB</b>	3	7	1	1	2	2	3	19
<b>Coastal WB</b>	<b>37</b>	<b>32</b>	<b>5</b>	<b>17</b>	<b>4</b>	<b>6</b>	<b>3</b>	<b>104</b>

Table 4-2: River WB and the new typology, according to the European Decision 2013/480/EC and the MED GIG RB

No	WB Name	WB Code	HMW B/ AWB	Length (km)	Immediate Catchment Area (km <sup>2</sup> )	Upstream Catchment area (km <sup>2</sup> )	Mean Annual Flow (hm <sup>3</sup> )	WB Type
<b>Spercheios RB (EL0718)</b>								
1	DRISTELORREMA	EL0718R000100071N	NAT	16,48	95,9	95,9	14,7	R-M1
2	SPERCHEIOS P. (ALAMANA) 1	EL0718R000200049N	NAT	3,42	9,9	1431,8	603,0	R-M4
3	SPERCHEIOS P. (ALAMANA) 2	EL0718R000200050N	NAT	16,09	82,9	1421,9	601,0	R-M4
4	SPERCHEIOS P. (ALAMANA) 5	EL0718R000200058N	NAT	1,95	3,4	1225,6	531,0	R-M4
5	SPERCHEIOS P. (ALAMANA) 6	EL0718R000200061N	NAT	29,12	269,37	1161,94	510,0	R-M3
6	SPERCHEIOS P. (ALAMANA) 7	EL0718R000200064N	NAT	18,93	127,0	541,5	233,5	R-M2
7	SPERCHEIOS P. (ALAMANA) 9 – ROUSTIANITIS R.	EL0718R000200070N	NAT	9,47	50,2	50,2	30,0	R-M1
8	ASOPOS P. 1	EL0718R000202051N	NAT	15,77	89,0	113,4	38,6	R-M2
9	ASOPOS P. 2	EL0718R000202052N	NAT	3,05	24,4	24,4	7,9	R-M4
10	SPERCHEIOS P. (ALAMANA) 3	EL0718R000204053A	AWB	2,31	59,4	1444,8	607,0	R-M4
11	TAFROS LAMIAS 1	EL0718R000204054A	AWB	4,57	8,2	152,2	51,7	R-M2
12	XERIAS R.	EL0718R000204055N	NAT	12,54	90,0	90,0	20,2	R-M1
13	TAFROS LAMIAS 2	EL0718R000204056A	AWB	10,83	54,0	54,0	18,4	R-M1
14	SPERCHEIOS P. (ALAMANA) 4	EL0718R000204057A	AWB	4,95	7,7	1233,3	534,0	R-M4
15	GORGOPOTAMOS 1	EL0718R000206059N	NAT	8,56	20,0	60,2	96,0	R-M4
16	GORGOPOTAMOS 2	EL0718R000206060N	NAT	4,45	40,1	40,1	64,0	R-M1

No	WB Name	WB Code	HMW B/ AWB	Length (km)	Immediate Catchment Area (km <sup>2</sup> )	Upstream Catchment area (km <sup>2</sup> )	Mean Annual Flow (hm <sup>3</sup> )	WB Type
17	KRITHARORREMA 1	EL0718R000208062N	NAT	9,02	27,0	36,8	10,0	R-M1
18	KRITHARORREMA 2	EL0718R000208063N	NAT	2,94	9,9	9,9	4,2	R-M1
19	MARATHORREMA	EL0718R000210065N	NAT	9,22	27,9	27,9	9,5	R-M1
20	ARCHANIORREMA	EL0718R000212066N	NAT	9,01	40,7	40,7	13,9	R-M1
21	FYSINAS R.	EL0718R000214067N	NAT	8,94	59,2	59,2	20,3	R-M1
22	SPERCHEIOS P. (ALAMANA) 8 – VITOLIOTIS R.	EL0718R000216068N	NAT	7,46	49,4	49,4	16,9	R-M1
23	SPERCHEIOS P. (ALAMANA) 10	EL0718R000218069N	NAT	16,70	187,1	187,1	99,0	R-M2
24	SAPOUNORREMA 1	EL0718R000300072N	NAT	14,56	93,4	99,0	15,2	R-M1
25	SAPOUNORREMA 2	EL0718R000300073N	NAT	1,79	5,6	5,6	0,9	R-M1
26	REMATIA 1	EL0718R000500075N	NAT	14,89	62,4	103,0	30,0	R-M2
27	REMATIA 2	EL0718R000500076N	NAT	7,40	40,6	40,6	6,7	R-M1
28	LATZORREMA	EL0718R000700078N	NAT	4,65	70,6	70,6	12,1	R-M4
29	INAXOS P.	EL0718R000900079N	NAT	11,60	35,5	314,2	73,2	R-M2
30	KRANIORREMA 1	EL0718R000900080N	NAT	8,24	71,1	107,0	27,2	R-M2
31	KRANIORREMA 2	EL0718R000902081N	NAT	3,30	35,9	35,9	22,2	R-M1
32	VISTRITSA R. 1	EL0718R000904082N	NAT	20,52	129,0	171,7	43,5	R-M2
33	VISTRITSA R. 2	EL0718R000904083N	NAT	3,36	42,7	42,7	25,1	R-M1
<b>Evvoia RB (EL0719)</b>								
1	MESAPIOS R. 1	EL0719R000100009N	NAT	4,15	38,6	216,1	81,9	R-M2
2	MESAPIOS R. 2 – MAKRYMALIS R.	EL0719R000100010N	NAT	9,25	39,1	39,1	14,8	R-M1
3	MESAPIOS R. 3	EL0719R000100011N	NAT	20,53	138,4	138,4	52,4	R-M2
4	KIREFS R. 1 - VOUDOROS	EL0719R000200001N	NAT	3,84	42,2	440,5	171,5	R-M2
5	KIREFS R. 2	EL0719R000200002N	NAT	12,51	90,5	209,5	81,5	R-M2
6	KIREFS R. 4	EL0719R000200004N	NAT	20,45	79,6	79,6	31,0	R-M1
7	KIREFS R. 3 – GERORREMA R.	EL0719R000202003N	NAT	8,51	39,4	39,4	15,3	R-M1
8	NILEFS P. 1	EL0719R000204005N	NAT	4,11	8,5	188,9	73,5	R-M2
9	NILEFS P. 2 - MAKRYRREMA	EL0719R000204006N	NAT	8,14	48,0	48,0	73,5	R-M1
10	NILEFS P. 3	EL0719R000204007N	NAT	28,66	132,3	132,3	51,5	R-M2
11	LAMARIS R.	EL0719R000300012N	NAT	7,05	41,0	41,0	15,5	R-M1
12	LIDAS P. XERIAS	EL0719R000400008N	NAT	38,02	259,3	259,3	98	R-M2
13	MELAS R.	EL0719R000500013N	NAT	4,55	47,9	47,9	18,2	R-M1
14	MANIKIATIS R.	EL0719R000700014N	NAT	22,47	158,4	158,4	60	R-M2
15	CHONDROS R.	EL0719R000900015N	NAT	55,61	166,6	166,6	63,2	R-M2
16	GLAFKOS R.	EL0719R001100016N	NAT	6,27	41,3	41,3	13,9	R-M1
17	MEGALO REMA	EL0719R001300017N	NAT	10,30	69,6	69,6	23,3	R-M1
18	PORFYRAS R.	EL0719R001500018N	NAT	6,54	43,0	43,0	14,4	R-M1
19	EVVOIA	EL0719R001700019N	NAT	8,32	30,5	30,5	10,2	R-M1
20	KASTALIAS R.	EL0719R001900020N	NAT	8,69	110,1	110,1	41,8	R-M2

No	WB Name	WB Code	HMW B/ AWB	Length (km)	Immediate Catchment Area (km <sup>2</sup> )	Upstream Catchment area (km <sup>2</sup> )	Mean Annual Flow (hm <sup>3</sup> )	WB Type
21	SARANTAPOTAMOS	EL0719R002100021N	NAT	10,32	55,3	55,3	21,0	R-M1
22	SIPIAS	EL0719R002300022N	NAT	32,08	50,8	50,8	19,8	R-M1
23	DEMATA R.	EL0719R002500023N	NAT	10,79	171,1	171,1	66,6	R-M2
24	XIROPOTAMOS	EL0719R002700024N	NAT	15,21	138,5	138,5	54	R-M2
<b>NE Paralia Kallidromou RB(EL0722)</b>								
1	TRANI SOUDA	EL0722R000100045N	NAT	11,73	74,1	74,1	12,9	R-M1
2	PLATANIAS R.	EL0722R000300046N	NAT	20,24	115,7	115,7	20,0	R-M2
3	XERIAS R.	EL0722R000500047N	NAT	15,14	114,4	114,4	30,6	R-M2
4	ALARGINO R.	EL0722R000700048N	NAT	21,45	203,7	203,7	44,7	R-M2
<b>Voiotikos Kifisos RB (EL0723)</b>								
1	KIFISOS P. (VOIOTIKOS) 5	EL0723R000000031H	HMW B	37,81	360,0	1843,2	387	R-M3
2	KIFISOS P. (VOIOTIKOS) 4	EL0723R000000037N	NAT	16,84	75,9	1106,8	166,8	R-M3
3	KIFISOS P. (VOIOTIKOS) 3	EL0723R000000040N	NAT	36,95	589,5	935,3	82,6	R-M2
4	KIFISOS P. (VOIOTIKOS) 1 – KANIANITIS R.	EL0723R000000042N	NAT	11,06	246,8	246,8	36	R-M4
5	MELAS P. 3 (MAVROPOTAMOS)	EL0723R000002032A	AWB	7,98	14,27	167,4	33,5	R-M2
6	MELAS P. 2 (MAVROPOTAMOS)	EL0723R000002033H	HMW B	15,41	140,9	140,9	61,5	R-M2
7	MELAS P. 1 (MAVROPOTAMOS)	EL0723R000002034N	NAT	20,93	153,1	153,1	47,9	R-M2
8	PONTZA R.	EL0723R000004035N	NAT	10,45	116,7	116,7	17	R-M2
9	ERKYNA	EL0723R000006036N	NAT	10,68	92,3	92,3	13,5	R-M1
10	VATHYRREMA	EL0723R000008038N	NAT	6,23	44,8	44,8	6,5	R-M1
11	BOGDANORREMA	EL0723R000010039N	NAT	12,34	47,6	47,6	7	R-M1
12	KIFISOS P. (VOIOTIKOS) 2 – APOSTOLIAS R.	EL0723R000012041N	NAT	10,26	99,0	99,0	14,5	R-M1
13	KALAMITIS R.	EL0723R000014043N	NAT	14,71	310,6	310,6	55,0	R-M2
14	RITSONAS R.	EL0723R000100044N	NAT	9,02	147,1	147,1	16	R-M2
<b>Amfissa RB (EL0724)</b>								
1	SKITSA R.	EL0724R000100029N	NAT	22,56	459,3	459,3	67,5	R-M4
2	KATAFYGI R.	EL0724R000300030N	NAT	3,71	149,1	149,1	50,0	R-M4
<b>Asopos RB (EL0725)</b>								
1	LIVADOSTRAS R. (STRAVOPOTAMOS)	EL0725R000100027N	NAT	12,38	151,2	151,2	25,4	R-M2
2	ASOPOS P.(VOURIENIS) 1	EL0725R000200025N	NAT	27,73	371,3	721,1	58,8	R-M2
3	ASOPOS P.(VOURIENIS) 2	EL0725R000200026N	NAT	30,64	349,8	349,8	30,4	R-M2
4	KLEISOURAS R.	EL0725R000300028N	NAT	8,03	135,8	135,8	45,6	R-M4
<b>NAT: Natural WB, HMWB: Heavily Modified WB, AWB: Artificial WB</b>								

Table 4-3: Lake WB according to the new methodology per RB

No	WB Name	WB Code	HMWB/ AWB	Surface (km <sup>2</sup> )	Perimeter (km)	WB Type
<b>Evvoia RB (EL0719)</b>						
1	DYSTOS	EL0719L000000002N	NAT	5,07	11,03	GR-VSNL
<b>Voiotikos Kifisos RB (EL0723)</b>						
1	PARALIMNI	EL0723L000000001N	NAT	10,97	18,46	GR-SNL
2	YLIKI	EL0723L000000003N	NAT	19,59	50,38	GR-DNL
<b>NAT: Natural WB, HMWB: Heavily Modified WB, AWB: Artificial WB</b>						

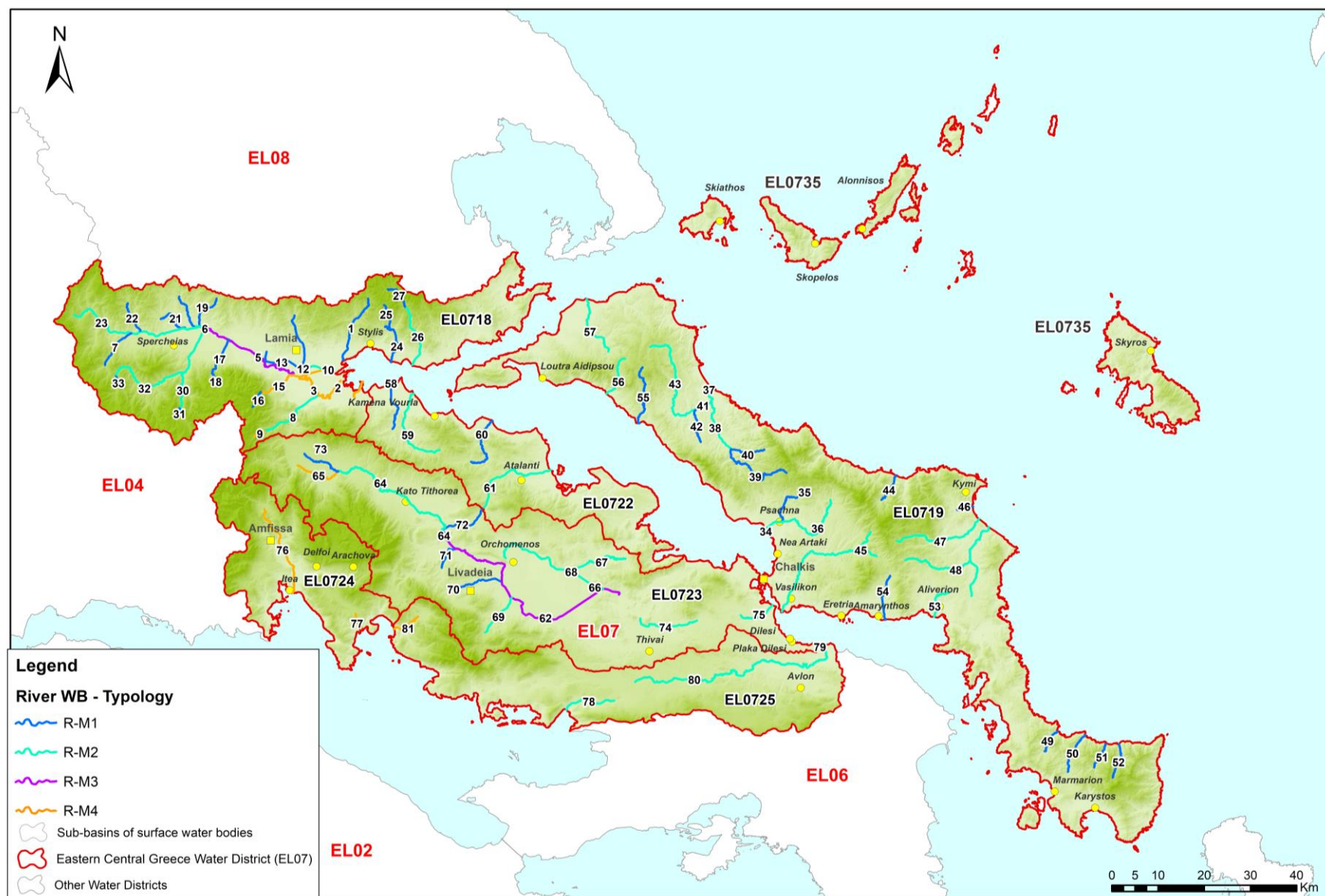
Table 4-4: Transitional WB per RB

No	WB Name	WB Code	HMWB/ AWB	Surface (km <sup>2</sup> )	Perimeter (km)	WB Type
<b>Spercheios RB (EL0718)</b>						
1	DELTA SPERCHEIOU	EL0718T0001N	NAT	18,46	19,98	TW2
<b>NAT: Natural WB, HMWB: Heavily Modified WB, AWB: Artificial WB</b>						
















































































Table 4-5: Coastal WB per RB

No	WB Name	WB Code	HMWB/ AWB	Surface (km <sup>2</sup> )	Perimeter (km)	WB Type
<b>Spercheios RB (EL0718)</b>						
1	ORMOS PTELEOU	EL0718C0004N	NAT	38,5	62,3	IIIE
2	DIAVLOS OREON	EL0718C0005N	NAT	165,7	119,1	IIIE
3	MALLIAKOS KOLPOS	EL0718C0007N	NAT	84,6	84,2	IIIE
<b>Evvoia RB (EL0719)</b>						
4	VOREIOS EVVOIKOS KOLPOS	EL0719C0006N	NAT	1138,8	381,9	IIIE
5	AN. AKTES EVVOIAS	EL0719C0008N	NAT	468,9	661,2	IIIE
6	NISIDA 1	EL0719C0009N	NAT	12,6	13,6	IIIE
7	NISIDA 2	EL0719C0010N	NAT	11,3	12,3	IIIE
8	NOTIOS EVVOIKOS - ALIVERI	EL0719C0013N	NAT	211,1	147,0	IIIE
9	AKTES KOLPOU PETALION - STYRA	EL0719C0014N	NAT	370,9	213,5	IIIE
10	KARYSTOS - N. EVVOIA	EL0719C0015N	NAT	105,2	155,6	IIIE
<b>NE Paralia Kallidromou RB(EL0722)</b>						
11	KOLPOS LARYMNAS	EL0722C0011N	NAT	2,9	11,8	IIIE
<b>Voiotikos Kifisos RB (EL0723)</b>						
12	KOLPOS AVLIDAS	EL0723C0012N	NAT	113,3	95,2	IIIE
<b>Amfissa RB (EL0724)</b>						
13	ORMOS ITEAS	EL0724C0016N	NAT	5,6	19,6	IIIE
14	ORMOS ANTIKYRAS	EL0724C0017N	NAT	15,1	22,2	IIIE
<b>Asopos RB (EL0725)</b>						
15	ORMOS DOMVRAINAS	EL0725C0018N	NAT	28,4	47,3	IIIE
16	KORINTHIAKOS KOLPOS - VOIOTIA	EL0725C0019N	NAT	859,6	293,2	IIIE
<b>Sporades RB (EL0735)</b>						
17	AKTES SKIATHOU	EL0735C0001N	NAT	106,5	141,4	IIIE
18	TSALASSA SPORADON	EL0735C0002N	NAT	2411,6	680,4	IIIE
19	AKTES SKYROU	EL0735C0003N	NAT	293,5	375,1	IIIE
<b>NAT: Natural WB, HMWB: Heavily Modified WB, AWB: Artificial WB</b>						

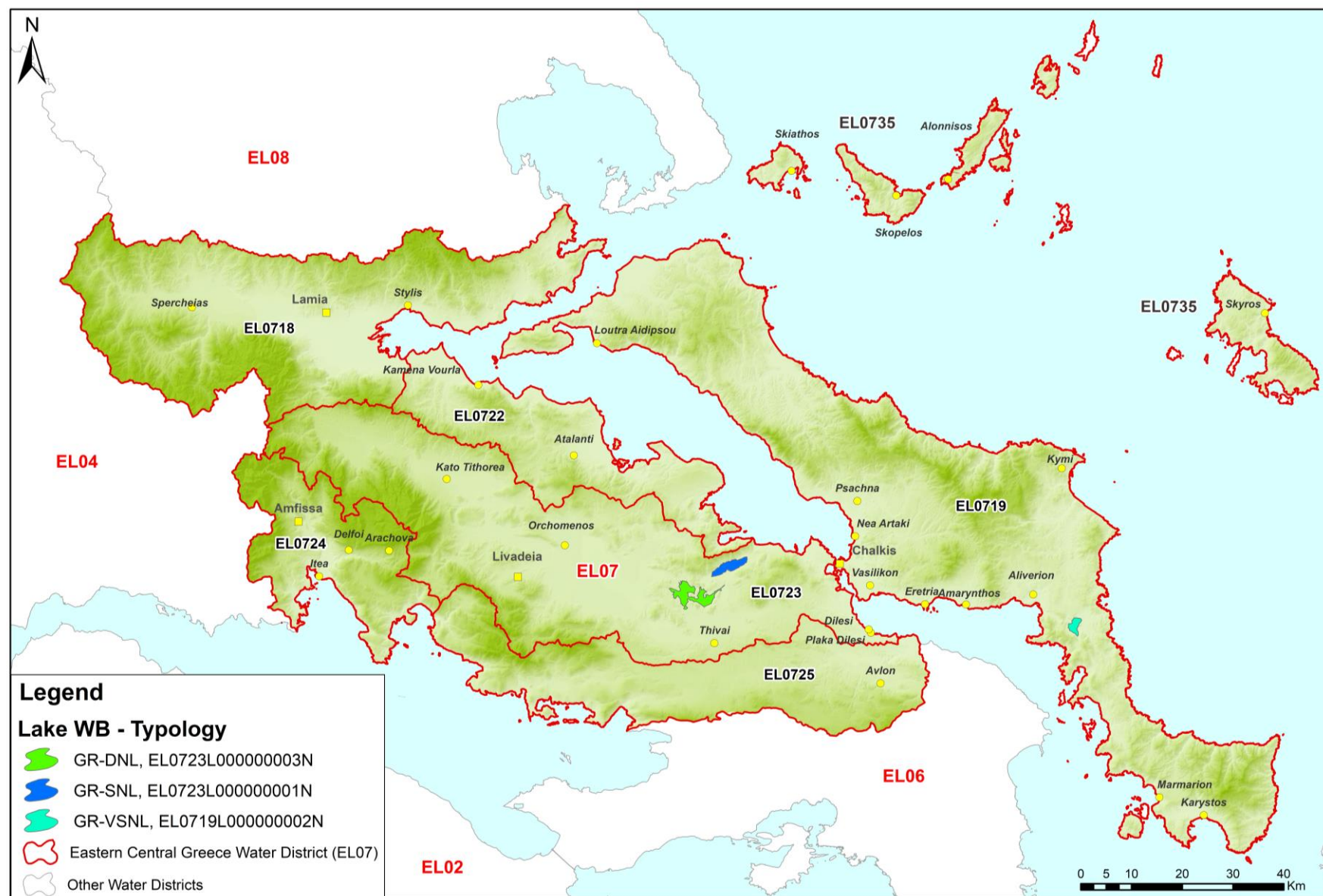




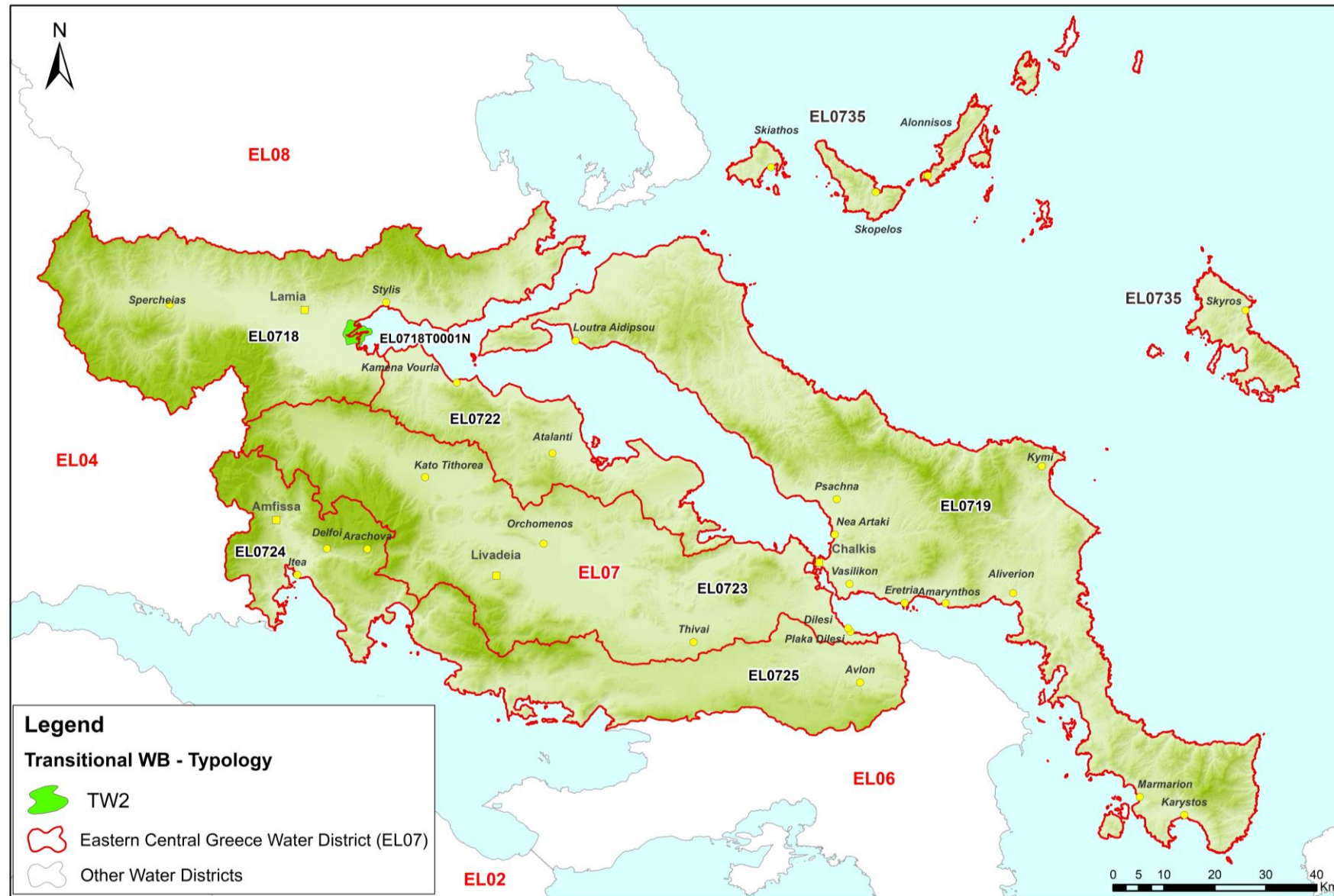
Map 1: Classification of River WB, according to the new typology of the 1<sup>st</sup> Update of RBMP

 R-M1, 7, EL0718R000200070N	 R-M1, 22, EL0718R000218088N	 R-M1, 44, EL0719R000300012N	 R-M1, 70, EL0723R000008038N
 R-M1, 1, EL0718R000100071N	 R-M1, 24, EL0718R000300072N	 R-M1, 46, EL0719R000500013N	 R-M1, 71, EL0723R000008038N
 R-M1, 12, EL0718R000204055N	 R-M1, 25, EL0718R000300073N	 R-M1, 49, EL0719R001100018N	 R-M1, 72, EL0723R000010039N
 R-M1, 13, EL0718R000204056A	 R-M1, 27, EL0718R000500076N	 R-M1, 50, EL0719R001300017N	 R-M1, 73, EL0723R000012041N
 R-M1, 16, EL0718R000208080N	 R-M1, 31, EL0718R000902081N	 R-M1, 51, EL0719R001500018N	 R-M2, 11, EL0718R000204054A
 R-M1, 17, EL0718R000208082N	 R-M1, 33, EL0718R000904083N	 R-M1, 52, EL0719R001700019N	 R-M2, 23, EL0718R000218089N
 R-M1, 18, EL0718R000208083N	 R-M1, 35, EL0719R000100010N	 R-M1, 54, EL0719R002100021N	 R-M2, 26, EL0718R000500075N
 R-M1, 19, EL0718R000210085N	 R-M1, 39, EL0719R000200004N	 R-M1, 55, EL0719R002300022N	 R-M2, 29, EL0718R000900079N
 R-M1, 20, EL0718R000212086N	 R-M1, 40, EL0719R000202003N	 R-M1, 58, EL0722R000100045N	 R-M2, 30, EL0718R000900080N
 R-M1, 21, EL0718R000214087N	 R-M1, 42, EL0719R000204008N	 R-M1, 60, EL0722R000500047N	 R-M2, 32, EL0718R000904082N
 R-M2, 34, EL0719R000100009N	 R-M2, 56, EL0719R002500023N	 R-M2, 74, EL0723R000014043N	 R-M4, 14, EL0718R000204057A
 R-M2, 36, EL0719R000100011N	 R-M2, 57, EL0719R002700024N	 R-M2, 75, EL0723R000100044N	 R-M4, 15, EL0718R000206059N
 R-M2, 37, EL0719R000200001N	 R-M2, 59, EL0722R000300046N	 R-M2, 78, EL0725R000100027N	 R-M4, 2, EL0718R000200049N
 R-M2, 38, EL0719R000200002N	 R-M2, 6, EL0718R000200064N	 R-M2, 79, EL0725R000200025N	 R-M4, 28, EL0718R000700078N
 R-M2, 41, EL0719R000204005N	 R-M2, 61, EL0722R000700048N	 R-M2, 8, EL0718R000202051N	 R-M4, 3, EL0718R000200050N
 R-M2, 43, EL0719R000204007N	 R-M2, 64, EL0723R000000040N	 R-M2, 80, EL0725R000200026N	 R-M4, 4, EL0718R000200058N
 R-M2, 45, EL0719R000400008N	 R-M2, 66, EL0723R000002032A	 R-M3, 5, EL0718R000200061N	 R-M4, 65, EL0723R000000042N
 R-M2, 47, EL0719R000700014N	 R-M2, 67, EL0723R000002033H	 R-M3, 62, EL0723R000000031H	 R-M4, 76, EL0724R000100029N
 R-M2, 48, EL0719R000900015N	 R-M2, 68, EL0723R000002034N	 R-M3, 63, EL0723R000000037N	 R-M4, 77, EL0724R000300030N
 R-M2, 53, EL0719R001900020N	 R-M2, 69, EL0723R000004035N	 R-M4, 10, EL0718R000204053A	 R-M4, 81, EL0725R000300028N
			 R-M4, 9, EL0718R000202052N



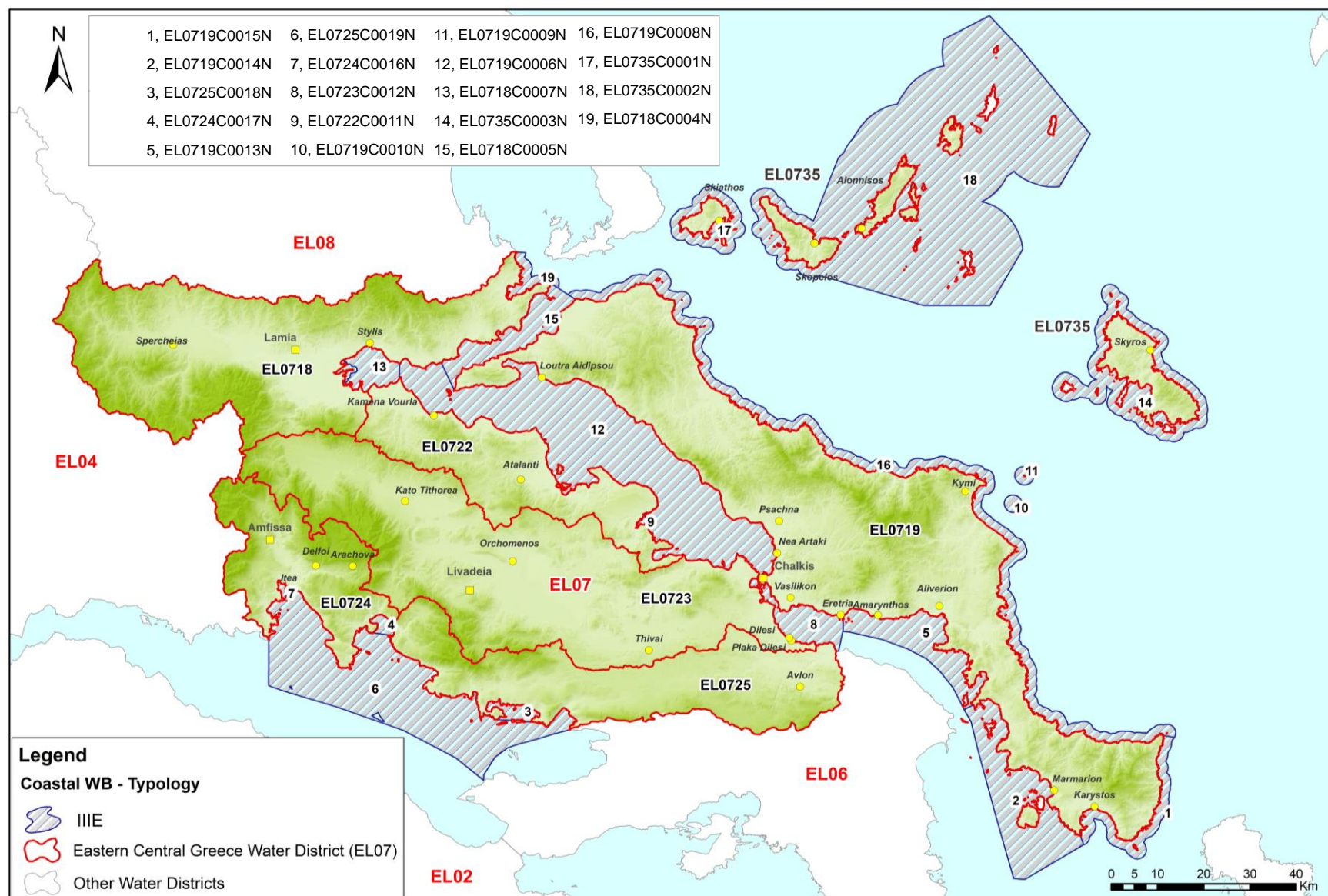


Map 2: Classification of lake WB, according to the new typology of the 1<sup>st</sup> Update of RBMP



Map 3: Classification of Transitional WB, according to the new typology of the 1<sup>st</sup> Update of RBMP





Map 4: Classification of Coastal WB, according to the new typology of the 1<sup>st</sup> Update of RBMP

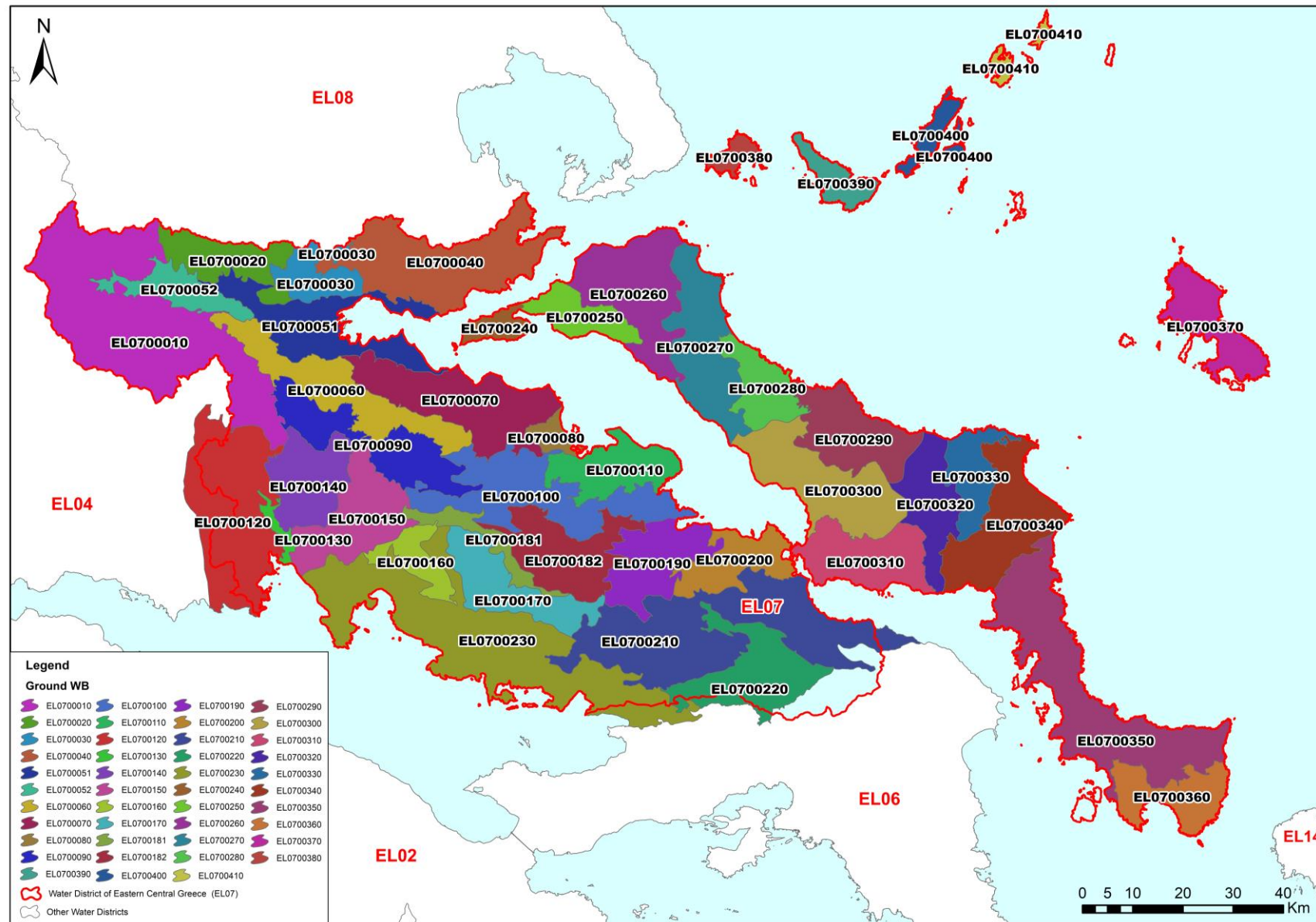
## 4.2 GROUNDWATER BODIES

Under the 1<sup>st</sup> Update of RBMP the originally identified GWBs were reviewed. The RBD of Eastern Central Greece (EL07) consists of **43 identified GWB's** that are presented on the table that follows.

Table 4-6: The GWB of the RBD

No	RB	GWB Name	GWB Code	Surface (km <sup>2</sup> )
1	EL 0718 EL 0724	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	EL0700010	944
2	EL 0718	ZILEUTOU-MOSCHOKARIAS	EL0700020	200
3	EL 0718	LAMIAS-STYLIDAS	EL0700030	128
4	EL 0718	PELASGIAS	EL0700040	505
5	EL 0718	SPERCHEIOU (A)	EL0700051	322
6	EL 0718	SPERCHEIOU (B)	EL0700052	140
7	EL 0718 EL 0722 EL 0723	YPATIS-KALLIDROMOU	EL0700060	340
8	EL 0722	KNIMIDAS	EL0700070	404
9	EL 0722	ATALANTIS	EL0700080	50
10	EL 0723	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	EL0700090	291
11	EL 0722 EL 0723	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	EL0700100	439
12	EL 0722 EL 0723	MALESINAS	EL0700110	219
13	EL 0724 EL 0723	GIONAS	EL0700120	553
14	EL 0724	AMFISSAS	EL0700130	30
15	EL 0723 EL 0724	GRAVIAS	EL0700140	235
16	EL 0723 EL 0724	PARNASOU	EL0700150	299
17	EL 0723 EL 0725	DISTOMOU	EL0700160	108
18	EL 0723 EL 0725	ELIKONA	EL0700170	256
19	EL 0723 EL 0725	KATO ROU VOIOTIKOU KYFISSOU (A)	EL0700181	91
20	EL 0723 EL 0725	KATO ROU VOIOTIKOU KYFISSOU (B)	EL0700182	297
21	EL 0723	YLIKIS-PARALIMNIS	EL0700190	248
22	EL 0723	YPATOU	EL0700200	194
23	EL 0723 EL 0725	THIVON-ASSOPOU-SCHIMATARIOU	EL0700210	772
24	EL 0725	SKOURTON-AG. THOMA	EL0700220	309
25	EL 0723 EL 0724 EL 0725	ANTIKIRAS-KITHAIRONA LICHADAS	EL0700230	900
26	EL 0719	LICHADAS	EL0700240	64
27	EL 0719	TELETHRIOU OROUS-EDIPSOU	EL0700250	139
28	EL 0719	ISTIAIAS-LIMNIS	EL0700260	378
29	EL 0719	VASILIKON-NILEA	EL0700270	346
30	EL 0719	MANTOUDIOU	EL0700280	165
31	EL 0719	DIRFYOS	EL0700290	284

No	RB	GWB Name	GWB Code	Surface (km <sup>2</sup> )
32	EL 0719	POLITIKON-PSACHNON	EL0700300	383
33	EL 0719	CHALKIDAS-ERETRIAS	EL0700310	269
34	EL 0719	VATHEIAS-XIROVOUNIOU	EL0700320	220
35	EL 0719	SETAS	EL0700330	157
36	EL 0719	KYMIS-ALIVERIOU	EL0700340	361
37	EL 0719	DYSTOU-NOTIAS EVOIAS	EL0700350	686
38	EL 0719	OCHIS	EL0700360	200
39	EL 0735	SKYROU	EL0700370	208
40	EL 0735	SKIATHOU	EL0700380	47
41	EL 0735	SKOPELOU	EL0700390	95
42	EL 0735	ALONISSOU	EL0700400	78
43	EL 0735	ISLANDS KYRA, PANAGIA, GIOURA	EL0700410	50



Map 5: Position and delimitation of the GWB



#### 4.3 HEAVILY MODIFIED WATER BODIES (HMWB) AND ARTIFICIAL WATER BODIES (AWB)

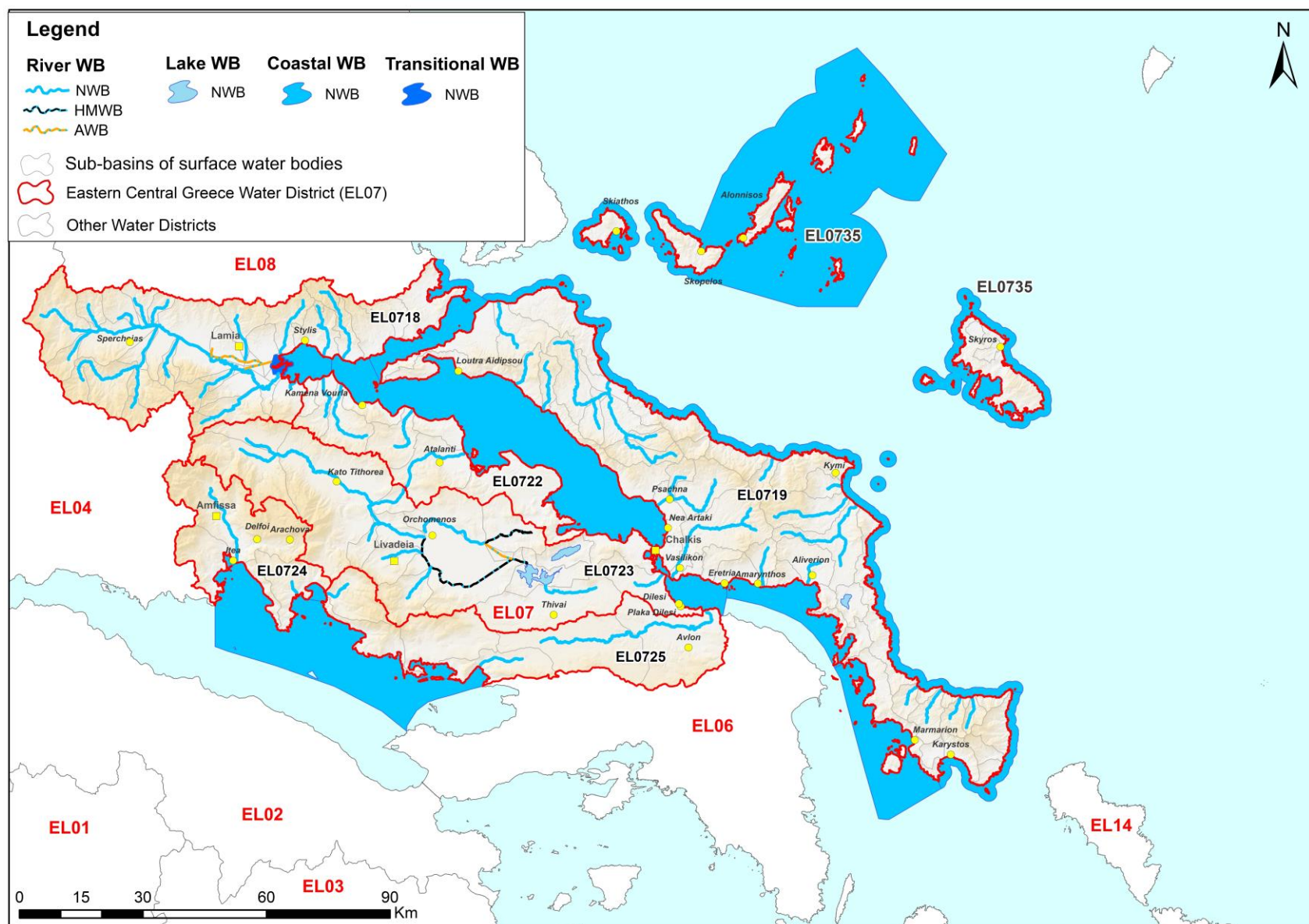
In Eastern Central Greece RBD (EL07) are identified two **(2) HMWB** and five **(5) AWB** from a total 104 SWB.

Table 4-7: River HMWB of the RBD Eastern Central Greece (EL07)

WB CODE	WB NAME	Type	Length (km)	Upstream Catchment area (km <sup>2</sup> )	Designated Water Use
<b>VOIOTIKOS KIFISOS RB (EL0723)</b>					
EL0723R000000031H	KIFISOS P. (VOIOTIKOS) 5	R-M3	37,81	360,0	Drainage, Irrigation
EL0723R000002033H	MELAS P. 2 (MAVROPOTAMOS)	R-M2	15,41	140,9	Drainage, Irrigation

Table 4-8: River AWB of the RBD Eastern Central Greece (EL07)

WB CODE	WB NAME	Type	Length (km)	Upstream Catchment area (km <sup>2</sup> )	Designated Water Use
<b>SPERCHEIOS RB (EL 0718)</b>					
EL0718R000204054A	TAFROS LAMIAS 1	R-M2	4,57	8,2	Flood protection, recipient of treated outflows
EL0718R000204056A	TAFROS LAMIAS 2	R-M1	10,83	54,0	Flood protection, recipient of treated outflows
EL0718R000204053A	SPERCHEIOS P. (ALAMANA) 3	R-M4	2,31	59,4	Flood protection, urbanization
EL0718R000204057A	SPERCHEIOS P. (ALAMANA) 4	R-M1	4,95	7,7	Flood protection, urbanization
<b>VOIOTIKOS KIFISOS RB (EL0723)</b>					
EL0723R000002032A	MELAS P. 3 (MAVROPOTAMOS)	R-M2	7,98	14,27	Drainage, Irrigation



Map 6: HMWB and AWB map of RBD of Eastern Central Greece (EL07)



#### 4.4 PROTECTED AREAS

In accordance with Directive 2000/60/EC, the member states shall ensure the establishment of a registry of all areas lying within each river basin district which have been designated as requiring special protection under specific Community legislation for the protection of their surface water and groundwater or for the conservation of habitats and species directly depending on water.

This registry is called Registry of Protected Areas (RPA) and according to the Appendix V of the Presidential Decree 51/2007, it includes the following type or areas:

- Water bodies designated for Drinking Water Abstraction:

Table 4-9: Areas of Abstraction of Drinking water

SWB				
No	Name	Code		
Spercheios RB (EL0718)				
1	GORGOPOTAMOS 1	EL0718R000206059N		
Voiotikos Kifisos RB (EL0723)				
1	YLIKI	EL0723L000000003N		
GWB				
No	Name	Code	Chemical status	Quantitative status
Spercheios RB (EL0718)				
1	LAMIAS-STYLIDAS	EL0700030	<div></div> GOOD	<div></div> GOOD
2	YPATIS-KALLIDROMOU	EL0700060	<div></div> GOOD	<div></div> GOOD
Evvoia RB (EL0719)				
1	ISTIAIAS-LIMNIS	EL0700260	<div></div> GOOD	<div></div> GOOD
2	DIRFYOS	EL0700290	<div></div> GOOD	<div></div> GOOD
3	KYMIS-ALIVERIOU	EL0700340	<div></div> GOOD	<div></div> GOOD
4	CHALKIDAS-ERETRIAS	EL0700310	<div></div> GOOD	<div></div> GOOD
5	OCHIS	EL0700360	<div></div> GOOD	<div></div> GOOD
NE Paralia Kallidromou RB(EL0722)				
1	KNIMIDAS	EL0700070	<div></div> GOOD	<div></div> GOOD
2	YPATIS-KALLIDROMOU	EL0700060	<div></div> GOOD	<div></div> GOOD
3	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	EL0700100	<div></div> GOOD	<div></div> GOOD
4	YLIKIS-PARALIMNIS	EL0700190	<div></div> GOOD	<div></div> GOOD
Voiotikos Kifisos RB (EL0723)				
1	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	EL0700100	<div></div> GOOD	<div></div> GOOD
2	PARNASOU	EL0700150	<div></div> GOOD	<div></div> GOOD
3	ELIKONA	EL0700170	<div></div> GOOD	<div></div> GOOD
4	YLIKIS-PARALIMNIS	EL0700190	<div></div> GOOD	<div></div> GOOD
5	YPATIS-KALLIDROMOU	EL0700060	<div></div> GOOD	<div></div> GOOD
6	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	EL0700090	<div></div> GOOD	<div></div> GOOD
Amfisa RB (EL0724)				
1	PARNASOU	EL0700150	<div></div> GOOD	<div></div> GOOD
Asopos RB (EL0725)				
1	VORIO-ANATOLIKIS PARNITHAS (A)	EL0600081	<div></div> GOOD	<div></div> GOOD
2	SKOURTON-AG. THOMA	EL0700220	<div></div> GOOD	<div></div> GOOD

- Water Bodies designated as Recreational waters including areas designated as Bathing Waters:

According to the list of Bathing Water Profiles of Greece (SSW, 2016), in Eastern Central Greece RBD (EL07), in 2016, 167 Bathing Water Sites have been designated in coastal WB. From the 2011 the following beaches were removed : GRBW079153083, GRBW079152065, GRBW079152064, GRBW079164145, GRBW079161078, GRBW079161075, GRBW079111111 and new were added : GRBW079150054, GRBW079161097, GRBW079164151 και GRBW079165028

- Urban Waste Water Treatment Directive Sensitive Areas and Nitrates Directive Nitrate Vulnerable Zones (NVZ):

Table 4-10: Nitrate Vulnerable Zones

NVZ Name	WB			
	WB Code	WB Name	WB Category	RB
<b>SPERCHEIOU FTHIOTIDAS EL0718NI03</b>	EL0718R000202052N	ASOPOS P. 2	River WB	EL0718
	EL0718R000902081N	KRANIORREMA 2	River WB	EL0718
	EL0718R000202051N	ASOPOS P. 1	River WB	EL0718
	EL0718R000206060N	GORGOPOTAMOS 2	River WB	EL0718
	EL0718R000700078N	LATZORREMA	River WB	EL0718
	EL0722R000100045N	TRANI SOUDA	River WB	EL0718
	EL0718R000200050N	SPERCHEIOS P. (ALAMANA) 2	River WB	EL0718
	EL0718R000206059N	GORGOPOTAMOS 1	River WB	EL0718
	EL0718R000208063N	KRITHARORREMA 2	River WB	EL0718
	EL0718R000200049N	SPERCHEIOS P. (ALAMANA) 1	River WB	EL0718
	EL0718R000900080N	KRANIORREMA 1	River WB	EL0718
	EL0718R000904083N	VISTRITSA R. 2	River WB	EL0718
	EL0718R000200058N	SPERCHEIOS P. (ALAMANA) 5	River WB	EL0718
	EL0718R000204057A	SPERCHEIOS P. (ALAMANA) 4	River WB	EL0718
	EL0718T0001N	DELTA SPERCHEIOU	Transitional WB	EL0718
	EL0718R000904082N	VISTRITSA R. 1	River WB	EL0718
	EL0718R000204054A	TAFROS LAMIAS 1	River WB	EL0718
	EL0718R000208062N	KRITHARORREMA 1	River WB	EL0718
	EL0718R000200070N	SPERCHEIOS P. (ALAMANA) 9 – ROUSTIANITIS R.	River WB	EL0718
	EL0718R000900079N	INAXOS P.	River WB	EL0718
	EL0718R000204053A	SPERCHEIOS P. (ALAMANA) 3	River WB	EL0718
	EL0718R000204056A	TAFROS LAMIAS 2	River WB	EL0718
	EL0718R000200064N	SPERCHEIOS P. (ALAMANA) 7	River WB	EL0718
	EL0718R000300072N	SAPOUNORREMA 1	River WB	EL0718
	EL0718R000204055N	XERIAS R.	River WB	EL0718
	EL0718R000200061N	SPERCHEIOS P. (ALAMANA) 6	River WB	EL0718
	EL0718R000210065N	MARATHORREMA	River WB	EL0718
	EL0718R000216068N	SPERCHEIOS P. (ALAMANA) 8 – VITOLIOTIS R.	River WB	EL0718
	EL0718R000214067N	FYSINAS R.	River WB	EL0718
	EL0718R000100071N	DRISTELORREMA	River WB	EL0718
	EL0718R000212066N	ARCHANIORREMA	River WB	EL0718
	EL0718R000218069N	SPERCHEIOS P. (ALAMANA) 10	River WB	EL0718
	EL0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GWB	EL0718
	EL0700070	KNIMIDAS	GWB	EL0718
	EL0700051	SPERCHEIOU (A)	GWB	EL0718
	EL0700060	YPATIS-KALLIDROMOU	GWB	EL0718
	EL0700030	LAMIAS-STYLIDAS	GWB	EL0718
	EL0700020	ZILEUTOU-MOSCHOKARIAS	GWB	EL0718
	EL0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GWB	EL0718

NVZ Name	WB			
	WB Code	WB Name	WB Category	RB
	EL0700040	PELASGIAS	GWB	EL0718
	EL0700052	SPERCHEIOU (B)	GWB	EL0718
ARTAKI EVVOIAS EL079NI05	EL0719R000400008N	LIDAS P. XERIAS	River WB	EL0719
	EL0719R000100009N	MESAPIOS R. 1	River WB	EL0719
	EL0719R000100010N	MESAPIOS R. 2 – MAKRYMALIS R.	River WB	EL0719
	EL0719R000100011N	MESAPIOS R. 3	River WB	EL0719
	EL0719R000200004N	KIREFS R. 4	River WB	EL0719
	EL0700300	POLITIKON-PSACHNON	GWB	EL0719
	EL0722R000700048N	ALARGINO R.	River WB	EL0722
ATALANTIS FTHIOTIDAS EL0722NI04	EL0700080	ATALANTIS	GWB	EL0722
	EL0700070	KNIMIDAS	GWB	EL0722
	EL0700100	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	GWB	EL0722
	EL0725R000100027N	LIVADOSTRAS R. (STRAVOPOTAMOS)	River WB	EL0725
ASOPOU VOIOTIAS BASIN EL0725NI02	EL0725R000200026N	ASOPOS P.(VOURIENIS) 2	River WB	EL0725
	EL0725R000200025N	ASOPOS P.(VOURIENIS) 1	River WB	EL0725
	EL0725R000300028N	KLEISOURAS R.	River WB	EL0725
	EL0700210	THIVON-ASSOPOU-SCHIMATARIOU	GWB	EL0725
	EL0700220	SKOURTON-AG. THOMA	GWB	EL0725
	EL0700230	ANTIKIRAS-KITHAIRONA LICHADAS	GWB	EL0725
	EL0700160	DISTOMOU	GWB	EL0725
	EL0600081	VORIO-ANATOLIKIS PARNITHAS (A)	GWB	EL0725
	EL0718R000200061N	SPERCHEIOS P. (ALAMANA) 6	River WB	EL0723
KOPAIDIKO PEDIO EL0723NI01	EL0718R000210065N	MARATHORREMA	River WB	EL0723
	EL0718R000216068N	SPERCHEIOS P. (ALAMANA) 8 – VITOLIOTIS R.	River WB	EL0723
	EL0718R000214067N	FYSINAS R.	River WB	EL0723
	EL0718R000100071N	DRISTELORREMA	River WB	EL0723
	EL0718R000212066N	ARCHANIORREMA	River WB	EL0723
	EL0718R000218069N	SPERCHEIOS P. (ALAMANA) 10	River WB	EL0723
	EL0718R000202052N	ASOPOS P. 2	River WB	EL0723
	EL0722R000300046N	PLATANIAS R.	River WB	EL0722
	EL0722R000500047N	XERIAS R.	River WB	EL0722
	EL0700070	KNIMIDAS	GWB	EL0722
	EL0700100	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	GWB	EL0722
	EL0700110	MALESINAS	GWB	EL0722
	EL0722R000700048N	ALARGINO R.	River WB	EL0722
	EL0723L000000001N	PARALIMNI	River WB	EL0723
	EL0723L000000003N	YLIKI	River WB	EL0723
	EL0723R0000000031H	KIFISOS P. (VOIOTIKOS) 5	River WB	EL0723
	EL0723R0000000037N	KIFISOS P. (VOIOTIKOS) 4	River WB	EL0723
	EL0723R0000000040N	KIFISOS P. (VOIOTIKOS) 3	River WB	EL0723
	EL0723R0000000042N	KIFISOS P. (VOIOTIKOS) 1 – KANIANITIS R.	River WB	EL0723
	EL0723R000002032A	MELAS P. 3 (MAVROPOTAMOS)	River WB	EL0723
	EL0723R000002033H	MELAS P. 2 (MAVROPOTAMOS)	River WB	EL0723
	EL0723R000002034N	MELAS P. 1 (MAVROPOTAMOS)	River WB	EL0723
	EL0723R000004035N	PONTZA R.	River WB	EL0723
	EL0723R000006036N	ERKYNA	River WB	EL0723
	EL0723R000008038N	VATHYRREMA	River WB	EL0723
	EL0723R000010039N	BOGDANORREMA	River WB	EL0723
	EL0723R000012041N	KIFISOS P. (VOIOTIKOS) 2 – APOSTOLIAS R.	River WB	EL0723
	EL0723R000014043N	KALAMITIS R.	River WB	EL0723
	EL0723R000100044N	RITSONAS R.	River WB	EL0723
	EL0724R000100029N	SKITSA R.	River WB	EL0724

NVZ Name	WB			
	WB Code	WB Name	WB Category	RB
	EL0724R000300030N	KATAFYGI R.	River WB	EL0723
	EL0725R000200025N	ASOPOS P.(VOURIENIS) 1	River WB	EL0723
	EL0725R000200026N	ASOPOS P.(VOURIENIS) 2	River WB	EL0723
	EL0725R000300028N	KLEISOURAS R.	River WB	EL0723
	EL0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GWB	EL0723
	EL0700060	YPATIS-KALLIDROMOU	GWB	EL0723
	EL0700070	KNIMIDAS	GWB	EL0723
	EL0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GWB	EL0723
	EL0700100	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	GWB	EL0723
	EL0700110	MALESINAS	GWB	EL0723
	EL0700120	GIONAS	GWB	EL0723
	EL0700140	GRAVIAS	GWB	EL0723
	EL0700150	PARNASOU	GWB	EL0723
	EL0700160	DISTOMOU	GWB	EL0723
	EL0700170	ELIKONA	GWB	EL0723
	EL0700181	KATO ROU VOIOTIKOU KYFISSOU (A)	GWB	EL0723
	EL0700182	KATO ROU VOIOTIKOU KYFISSOU (B)	GWB	EL0723
	EL0700190	YLIKIS-PARALIMNIS	GWB	EL0723
	EL0700200	YPATOU	GWB	EL0723
	EL0700120	GIONAS	GWB	EL0724
	EL0700140	GRAVIAS	GWB	EL0724
	EL0700150	PARNASOU	GWB	EL0724

Table 4-11: Urban Waste Water Treatment Directive Sensitive Areas

A/A	Sensitive Area Name -Code	WB Code	WB Name
1	Voiotikos Kifisos ELSARV14	EL0723R000000042N	KIFISOS P. (VOIOTIKOS) 1 – KANIANITIS R.
2		EL0723R000012041N	KIFISOS P. (VOIOTIKOS) 2 – APOSTOLIAS R.
3		EL0723R000000040N	KIFISOS P. (VOIOTIKOS) 3
4		EL0723R000000037N	KIFISOS P. (VOIOTIKOS) 4
5		EL0723R000000031H	KIFISOS P. (VOIOTIKOS) 5
6		EL0723R000008038N	VATHYRREMA
7		EL0723R000010039N	BOGDANORREMA
8	Erkyna River ELSARV15	EL0723R000006036N	ERKYNA
9	Melas River ELSARV16	EL0723R000002034N	MELAS P. 1 (MAVROPOTAMOS)
10		EL0723R000002033H	MELAS P. 2 (MAVROPOTAMOS)
11	Kalamitis ELSARV06	EL0723R000014043N	KALAMITIS R.

- Areas designated for Birds and Habitats protection including the Natura 2000 protected sites :  
The designation of natural protected areas is adaptable to the national specific conditions.

Table 4-12: Protected Natural areas per RB

Protected Area Type	Count of Protected Areas per RB						
	Spercheios RB (EL0718)	Evvoia RB (EL0719)	NE Paralia Kallidromou RB (EL0722)	Voiotikos Kifisos RB (EL0723)	Amfissa RB (EL0724)	Asopos RB (EL0725)	Sporades RB (EL0735)
Special Areas of Conservation - SAC	6	3	2	3	3	0	2
Special Protection Areas - SPA	4	5	0	2	3	0	2
SAC -SPA	0	0	0	0	0	1	1
Small Island Wetlands	0	23	0	0	0	0	8
<b>TOTAL</b>	<b>10</b>	<b>31</b>	<b>2</b>	<b>5</b>	<b>6</b>	<b>1</b>	<b>13</b>

Table 4-13: Correlation of NATURA 2000 protected sites and Small island wetlands with WB

No	WB Code	WB Name	WB Category	Protected Area Code	Protection Status
<b>Spercheios RB (EL0718)</b>					
1	EL0718T0001N	DELTA SPERCHEIOU	Transitional	GR2440002 GR2440005	SAC SPA
2	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	Coastal	GR2440002	SAC
3	EL0718C0007N	MALLIAKOS KOLPOS	Coastal	GR2440002 GR2440005	SAC SPA
4	EL0718R000500076N	REMATIA 2	River	GR1430006	SPA
5	EL0718R000500075N	REMATIA 1	River	GR1430006 GR2440002	SPA SAC
6	EL0718R000204055N	XERIAS R.	River	GR2440002	SAC
7	EL0718R000100071N	DRISTELORREMA	River	GR2440002 GR2440005	SAC SPA
8	EL0718R000204054A	TAFROS LAMIAS 1	River	GR2440002 GR2440005	SAC SPA
9	EL0718R000300072N	SAPOUNORREMA 1	River	GR2440002	SAC
10	EL0718R000208062N	KRITHARORREMA 1	River	GR2440002 GR2440004 GR2440005 GR2440007	SAC SAC SPA SPA
11	EL0718R000206059N	GORGOPOTAMOS 1	River	GR2440002 GR2440003 GR2440005 GR2440007	SAC SPA SPA SPA
12	EL0718R000214067N	FYSINAS R.	River	GR2440002 GR2440005	SAC
13	EL0718R000212066N	ARCHANIORREMA	River	GR2440002 GR2440005	SAC SPA
14	EL0718R000210065N	MARATHORREMA	River	GR2440002 GR2440005	SAC SPA
15	EL0718R000200050N	SPERCHEIOS P. (ALAMANA) 2	River	GR2440002 GR2440005	SAC SPA
16	EL0718R000200064N	SPERCHEIOS P. (ALAMANA) 7	River	GR2440002	SAC

No	WB Code	WB Name	WB Category	Protected Area Code	Protection Status
				GR2440005	SPA
17	EL0718R000900079N	INAXOS P.	River	GR2440002 GR2440005	SAC SPA
18	EL0718R000204056A	TAFROS LAMIAS 2	River	GR2440002	SAC
19	EL0718R000204057A	SPERCHEIOS P. (ALAMANA) 4	River	GR2440002 GR2440005	SAC SPA
20	EL0718R000204053A	SPERCHEIOS P. (ALAMANA) 3	River	GR2440002 GR2440005	SAC SPA
21	EL0718R000200049N	SPERCHEIOS P. (ALAMANA) 1	River	GR2440002 GR2440005	SAC SPA
22	EL0718R000700078N	LATZORREMA	River	GR2440002 GR2440005	SAC SPA
23	EL0718R000200061N	SPERCHEIOS P. (ALAMANA) 6	River	GR2440002 GR2440005	SAC SPA
24	EL0718R000202051N	ASOPOS P. 1	River	GR2440002 GR2440005 GR2440007	SAC SPA SPA
25	EL0718R000200058N	SPERCHEIOS P. (ALAMANA) 5	River	GR2440002 GR2440005	SAC SPA
26	EL0718R000206060N	GORGOPOTAMOS 2	River	GR2440003 GR2440004 GR2440007	SAC SAC SPA
27	EL0718R000208063N	KRITHARORREMA 2	River	GR2440004 GR2440007	SAC SPA
28	EL0700030	LAMIAS-STYLIDAS	GWB	GR1430006 GR2440002 GR2440005	SPA SAC SPA
29	EL0700040	PELASGIAS	GWB	GR1430006 GR2440002	SPA SAC
30	EL0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GWB	GR2430001 GR2440002 GR2440004 GR2440005 GR2440007 GR2450001 GR2450008	SAC SAC SAC SPA SPA SAC SPA
31	EL0700070	KNIMIDAS	GWB	GR2440002 GR2440006	SAC SAC
32	EL0700050	PELASGIAS	GWB	GR2440002 GR2440005 GR2440006 GR2440007	SAC SPA SAC SPA
33	EL0700060	YPATIS-KALLIDROMOU	GWB	GR2440002 GR2440003 GR2440004 GR2440005 GR2440006 GR2440007	SAC SAC SAC SPA SAC SPA
34	EL0700020	ZILEUTOU-MOSCHOKARIAS	GWB	GR2440002 GR2440005	SAC SPA
35	EL0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GWB	GR2440007	SPA

No	WB Code	WB Name	WB Category	Protected Area Code	Protection Status
36	EL0700120	GIONAS	GWB	GR2450008	SPA
<b>Evvoia RB (EL0719)</b>					
1	EL0719L000000002N	DYSTOS	Lake	GR2420008	SPA
2	EL0719C0008N	AN. AKTES EVVOIAS	Coastal	GR2420001 GR2420004 GR2420007 GR2420011 GR2420012	SAC SAC SPA SPA SPA
3	EL0719C0015N	KARYSTOS - N. EVVOIA	Coastal	GR2420001 GR2420012	SAC SPA
4	EL0718C0005N	DIAVLOS OREON	Coastal	GR2420004 GR2420007	SAC SPA
5	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	Coastal	GR2420010	SPA
6	EL0719C0009N	NISIDA 1	Coastal	GR2420011	SPA
7	EL0719R001500018N	PORFYRAS R.	River	GR2420001 GR2420012 ELY242EUB012	SAC SPA SIW
8	EL0719R001700019N	EVVOIA	River	GR2420001 GR2420012 ELY242EUB013	SAC SPA SIW
9	EL0719R002700024N	XIROPOTAMOS	River	GR2420004 GR2420007	SAC SAP
10	EL0719R000204006N	NILEFS P. 2 - MAKRYRREMA	River	GR2420010	SPA
11	EL0719R000300012N	LAMARIS R.	River	GR2420011	SPA
12	EL0719R000700014N	MANIKIATIS R.	River	GR2420011 ELY242EUB057	SPA SIW
13	EL0719R000200004N	KIREFS R. 4	River	GR2420011	SPA
14	EL0719R000100011N	MESAPIOS R. 3	River	GR2420011	SPA
15	EL0700360	OCHIS	GWB	GR2420001 GR2420012 ELY242EUB045 ELY242EUB059 ELY242EUB014 ELY242EUB055 ELY242EUB054	SAC SPA SPA SIW
16	EL0700350	DYSTOU-NOTIAS EVOIAS	GWB	GR2420001 GR2420008 GR2420012 ELY242EUB040 ELY242EUB041 ELY242EUB047 ELY242EUB036	SAC SPA SPA SPA SIW
17	EL0700320	VATHEIAS-XIROVOUNIOU	GWB	GR2420002 GR2420011	SAC SPA
18	EL0700290	DIRFYOS	GWB	GR2420002 GR2420011	SAC SPA
19	EL0700260	ISTIAIAS-LIMNIS	GWB	GR2420004 GR2420007	SAC SPA
20	EL0700300	POLITIKON-PSACHNON	GWB	GR2420010 GR2420011	SPA SPA



No	WB Code	WB Name	WB Category	Protected Area Code	Protection Status
21	EL0700280	MANTOUDIOU	GWB	GR2420010 GR2420011	SPA SPA
22	EL0700270	VASILIKON-NILEA	GWB	GR2420010	SPA
23	EL0700340	KYMIS-ALIVERIOU	GWB	GR2420011	SPA
24	EL0700330	SETAS	GWB	GR2420011	SPA
25	EL0700310	CHALKIDAS-ERETRIAS	GWB	ELY242EUB067	SIW
26	EL0700250	TELETHRIOU OROUS-EDIPSOU	GWB	ELY242EUB062 ELY242EUB051 ELY242EUB076 ELY242EUB071	SIW
27	EL0719R001300017N	MEGALO REMA	River	ELY242EUB043	SIW
28	EL0719R001100016N	GLAFKOS R.	River	ELY242EUB042	SIW
29	EL0719R000400008N	LIDAS P. XERIAS	River	ELY242EUB022	SIW
30	EL0719R000900015N	CHONDROS R.	River	ELY242EUB061	SIW
31	EL0719R002300022N	SIPIAS	River	ELY242EUB053	SIW
32	EL0719R002500023N	DEMATA R.	River	ELY242EUB056	SIW
<b>NE Paralia Kallidromou RB(EL0722)</b>					
1	EL0722R000100045N	TRANI SOUDA	River	GR2440002	SAC
2	EL0722R000300046N	PLATANIAS R.	River	GR2440002	SAC
3	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	Coastal	GR2440002	SAC
4	EL0718C0007N	MALLIAKOS KOLPOS	Coastal	GR2440002	SAC
5	EL0700050	PELASGIAS	GWB	GR2440002	SAC
6	EL0700060	YPATIS-KALLIDROMOU	GWB	GR2440002 GR2440006	SAC SAC
<b>Voiotikos Kifisos RB (EL0723)</b>					
1	EL0723L000000003N	YLIKI	Lake	GR2410001	SAC
2	EL0723L000000001N	PARALIMNI	Lake	GR2410001	SAC
3	EL0723R0000006036N	ERKYNA	River	GR2410001	SAC
4	EL0723R0000002034N	MELAS P. 1 (MAVROPOTAMOS)	River	GR2410001	SAC
5	EL0723R0000000031H	KIFISOS P. (VOIOTIKOS) 5	River	GR2410001	SAC
6	EL0723R0000000037N	KIFISOS P. (VOIOTIKOS) 4	River	GR2410001	SAC
7	EL0723R0000002032A	MELAS P. 3 (MAVROPOTAMOS)	River	GR2410001	SAC
8	EL0723R0000004035N	PONTZA R.	River	GR2410001	SAC
9	EL0723R0000014043N	KALAMITIS R.	River	GR2410001	SAC
10	EL0723R0000002033H	MELAS P. 2 (MAVROPOTAMOS)	River	GR2410001	SAC
11	EL0700210	THIVON-ASSOPOU- SCHIMATARIOU	GWB	GR2410001	SAC
12	EL0700170	ELIKONA	GWB	GR2410001	SAC
13	EL0700200	YPATOU	GWB	GR2410001	SAC
14	EL0700190	YLIKIS-PARALIMNIS	GWB	GR2410001	SAC
15	EL0700180	ELIKONA	GWB	GR2410001 GR2410002	SAC SPA



No	WB Code	WB Name	WB Category	Protected Area Code	Protection Status
16	EL0700100	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	GWB	GR2410001	SAC
17	EL0700230	ANTIKIRAS-KITHAIRONA LICHADAS	GWB	GR2410002	SPA
18	EL0700160	DISTOMOU	GWB	GR2410002	SPA
19	EL0700150	PARNASOU	GWB	GR2410002 GR2450005	SPA SAC
20	EL0700140	GRAVIAS	GWB	GR2410002 GR2450005	SPA SAC
21	EL0700120	GIONAS	GWB	GR2410002 GR2450002 GR2450007	SPA SAC SPA
22	EL0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GWB	GR2410002 GR2450005	SPA SAC
23	EL0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GWB	GR2410002 GR2450002 GR2450007	SPA SAC SPA
<b>Amfissa RB (EL0724)</b>					
1	EL0725C0019N	KORINTHIAKOS KOLPOS - VOIOTIA	Coastal	GR2450004 GR2450009	SAC SPA
2	EL0724C0016N	ORMOS ITEAS	Coastal	GR2450004 GR2450009	SAC SPA
3	EL0700120	GIONAS	GWB	GR2450004 GR2450009 GR2410002 GR2450002 GR2450007	SAC SPA SPA SAC SPA
4	EL0700130	AMFISSAS	GWB	GR2450004	SAC
5	EL0700230	ANTIKIRAS-KITHAIRONA LICHADAS	GWB	GR2410002	SPA
6	EL0700160	DISTOMOU	GWB	GR2410002	SPA
7	EL0700180	ELIKONA	GWB	GR2410002	SPA
8	EL0700150	PARNASOU	GWB	GR2410002 GR2450005	SPA SAC
9	EL0700140	GRAVIAS	GWB	GR2410002 GR2450005	SPA SAC
10	EL0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GWB	GR2410002 GR2450005	SPA SAC
11	EL0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GWB	GR2410002 GR2450002 GR2450007	SPA SAC SPA
<b>Asopos RB (EL0725)</b>					
SPA-SAC GR3000001 «OROS PARNITHA» located mostly on Attica RBD (EL06) and not correlated with the WB of Asopos RB					
<b>Sporades RB (EL0725)</b>					
1	EL0735C0002N	TSALASSA SPORADON	Coastal	GR1430004 GR1430005	SAC SPA
2	EL0735C0001N	AKTES SKIATHOU	Coastal	GR1430003	SAC
3	EL0735C0003N	AKTES SKYROU	Coastal	GR2420009 GR2420006	SPA SAC/SPA

No	WB Code	WB Name	WB Category	Protected Area Code	Protection Status
4	EL0700380	SKIATHOU	GWB	GR1430003	SAC
5	EL0700390	SKOPELOU	GWB	GR1430004	SAC
6	EL0700400	ALONISSOU	GWB	GR1430004	SAC
7	EL0700410	ISLANDS KYRA, PANAGIA, GIOURA	GWB	GR1430004 GR1430005	SAC SPA
8	EL0700370	SKYROU	GWB	GR2420006 GR2420009	SAC/SPA
9	EL0700370	SKYROU	GWB	ELY242SKR003 ELY242SKR009 ELY242SKR005 ELY242SKR006	SIW
10	EL0700380	SKIATHOU	GWB	ELY143SKI001 ELY143SKI008	SIW
11	EL0700390	SKOPELOU	GWB	ELY143SKO001 ELY143SKO002	SIW
<b>SIW:</b> Small Island Wetland					

- Areas designated for the protection of economically significant aquatic species:  
Fishfarms are located in 6 Coastal WB in Spercheios RB, Evvoia RB, NE Paralia Kallidromou RB and Asopos RB.

Table 4-14: WB where economically significant aquatic species are encountered

No	WB Code	WB Name	WB Category	Comments
1	EL0718C0005N	DIAVLOS OREON	Coastal	4 fishfarms
2	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	Coastal	2 fishfarms
3	EL0719C0014N	AKTES KOLPOU PETALION - STYRA	Coastal	3 fishfarms
4	EL0719C0013N	NOTIOS EVVOIKOS - ALIVERI	Coastal	14 fishfarms
5	EL0722C0011N	KOLPOS LARYMNAS	Coastal	2 fishfarms
6	EL0725C0019N	KORINTHIAKOS KOLPOS - VOIOTIA	Coastal	9 fishfarms

Furthermore, the following WB include Fishfarms Development Zones

Table 4-15: WB that include Fishfarms Development Zones

No	WB Code	WB Code	WB Category
1	EL0718C0005N	DIAVLOS OREON	Coastal
2	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	Coastal
3	EL0719C0014N	AKTES KOLPOU PETALION - STYRA	Coastal
4	EL0719C0013N	NOTIOS EVVOIKOS - ALIVERI	Coastal
5	EL0722C0011N	KOLPOS LARYMNAS	Coastal
6	EL0725C0019N	KORINTHIAKOS KOLPOS - VOIOTIA	Coastal

Finally, it is proposed to introduce to the Registry of Protected Areas the following WB.

*Table 4-16: Proposed new protection areas*

No	WB Code	WB Name	WB Category	Protected Area Code
1	EL0718C0005N	DIAVLOS OREON	Coastal	EL0718C0005NFI
2	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	Coastal	EL0719C0006NFI
3	EL0719C0014N	AKTES KOLPOU PETALION - STYRA	Coastal	EL0719C0014NFI
4	EL0719C0013N	NOTIOS EVVOIKOS - ALIVERI	Coastal	EL0719C0013NFI
5	EL0722C0011N	KOLPOS LARYMNAS	Coastal	EL0722C0011NFI
6	EL0725C0019N	KORINTHIAKOS KOLPOS - VOIOTIA	Coastal	EL0725C0019NFI



## **5. PRESSURES AND IMPACTS**

Anthropogenic pressures on the bodies of water include all human activities that influence or may influence the water bodies of the area where they are developed. These pressures are characterized as significant as long as they form the cause for the WBs to be in danger of non-achieving their environmental objectives, according to EC No 03 Guidance Document.

### **5.1 POINT SOURCES OF POLLUTION**

Point sources of pollution include all sources of nutrients (BOD, N, P). The list of these pressures includes:

- Waste Water Treatment Plants (WWTP)
- Discharges not connected to WWTP
- Hotels
- Industrial sites
- Livestock Farming
- Aquaculture – Fish farming
- Waste disposal sites
- Runoff from mining activities

From the above point sources of pollution derives the annual load of BOD, N and P produced.

*Table 5-1: Total annual loads of BOD, N and P that are produced from point sources of pollution in Spercheios RB (EL0718)*

point sources of pollution	BOD (tons/ year)	N (tons/ year)	P (tons/ year)
Industrial Units	0,67	1,51	0,07
Livestock facilities	12,61	3,27	0,30
Waste disposal sites	0,00	0,00	0,00
Sewage treatment plants	78,50	66,64	52,36
<b>TOTAL</b>	<b>91,78</b>	<b>71,42</b>	<b>52,73</b>

*Figure 5-1: Total annual loads of BOD, N and P for Spercheios RB (EL0718) that are produced from point sources of pollution*

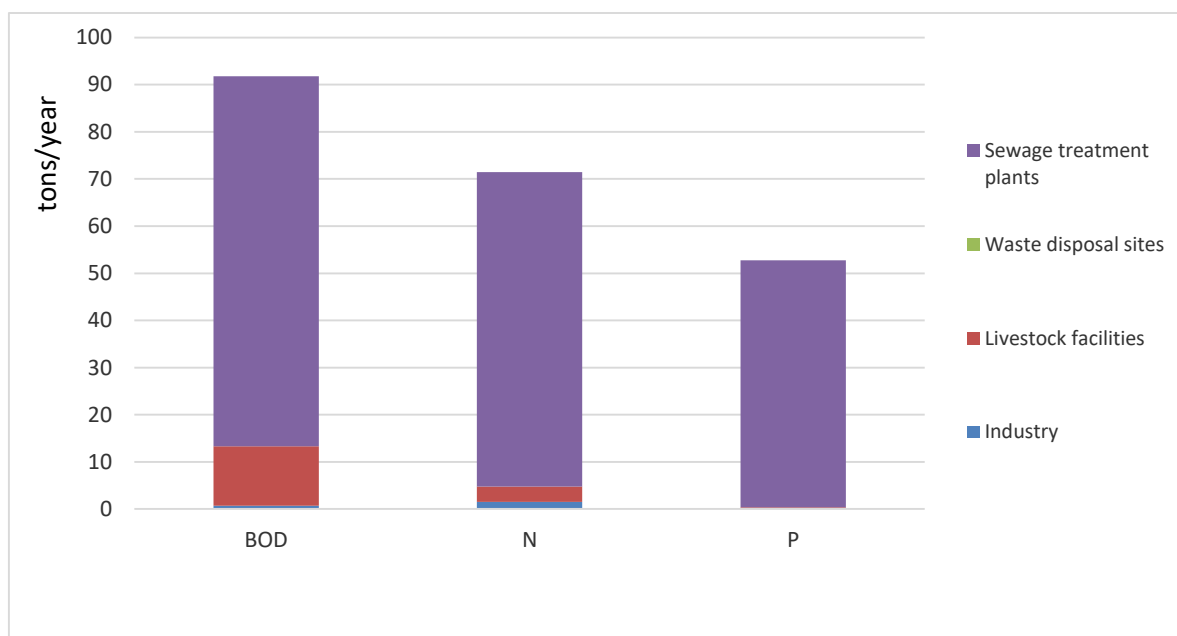




Table 5-2: Total annual loads of BOD, N and P that are produced from point sources of pollution in Evvoia RB (EL0719)

point sources of pollution	BOD (tons/ year)	N (tons/ year)	P (tons/ year)
Industrial Units	1,75	0,18	0,04
Livestock facilities	358,99	117,33	22,47
Waste disposal sites	19,94	138,48	0,66
Sewage treatment plants	28,11	31,17	6,22
<b>TOTAL</b>	<b>408,79</b>	<b>287,16</b>	<b>29,39</b>

Figure 5-2: Total annual loads of BOD, N and P for Evvoia RB (EL0719) that are produced from point sources of pollution

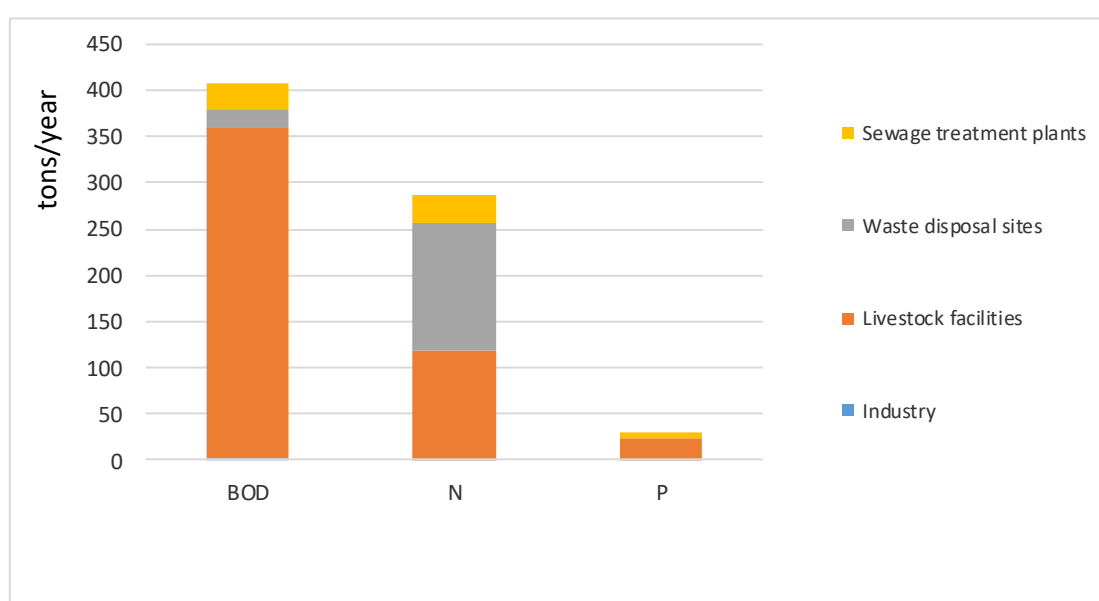


Table 5-3: Total annual loads of BOD, N and P that are produced from point sources of pollution in NE Paralia Kallidromou RB(EL0722)

point sources of pollution	BOD (tons/ year)	N (tons/ year)	P (tons/ year)
Industrial Units	0,78	0,17	0,16
Livestock facilities	13,48	3,37	0,25
Waste disposal sites	0,00	0,00	0,00
Sewage treatment plants	10,27	7,87	1,50
<b>TOTAL</b>	<b>24,53</b>	<b>11,41</b>	<b>1,91</b>

Figure 5-3: Total annual loads of BOD, N and P for NE Paralia Kallidromou RB(EL0722) that are produced from point sources of pollution

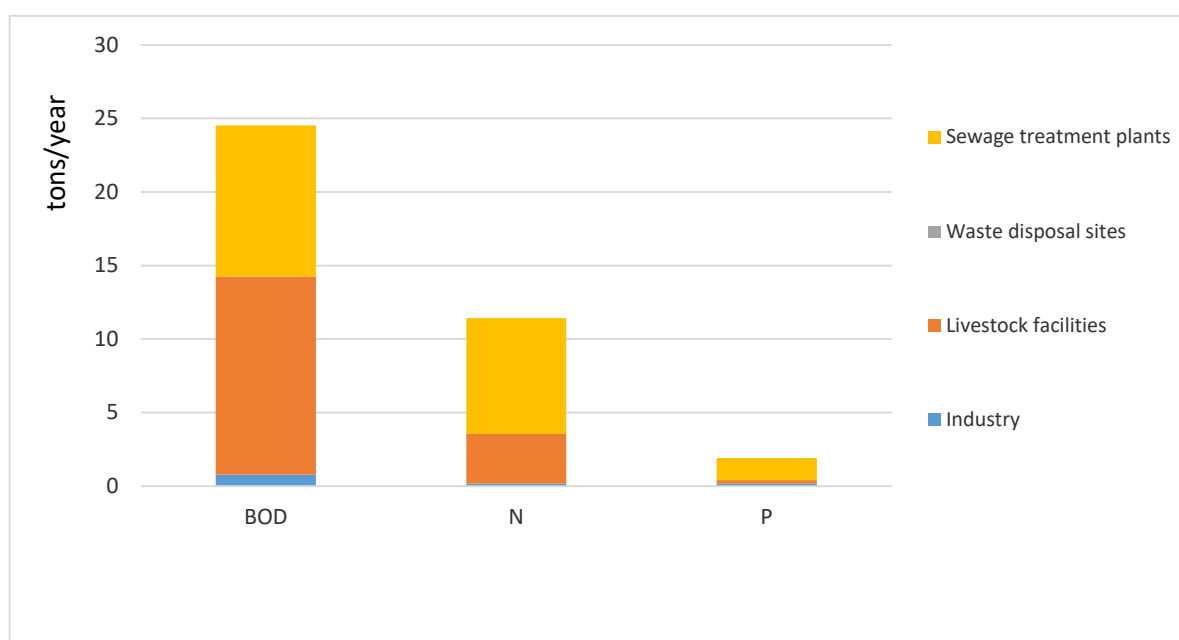


Table 5-4: Total annual loads of BOD, N and P that are produced from point sources of pollution in Voiotikos Kifisos RB (EL0723)

point sources of pollution	BOD (tons/ year)	N (tons/ year)	P (tons/ year)
Industrial Units	1,02	1,31	0,57
Livestock facilities	294,07	94,04	16,83
Waste disposal sites	42,30	293,76	1,41
Sewage treatment plants	35,62	4,49	0,90
<b>TOTAL</b>	<b>373,01</b>	<b>393,6</b>	<b>19,71</b>

Figure 5-4: Total annual loads of BOD, N and P for Voiotikos Kifisos RB (EL0723) that are produced from point sources of pollution

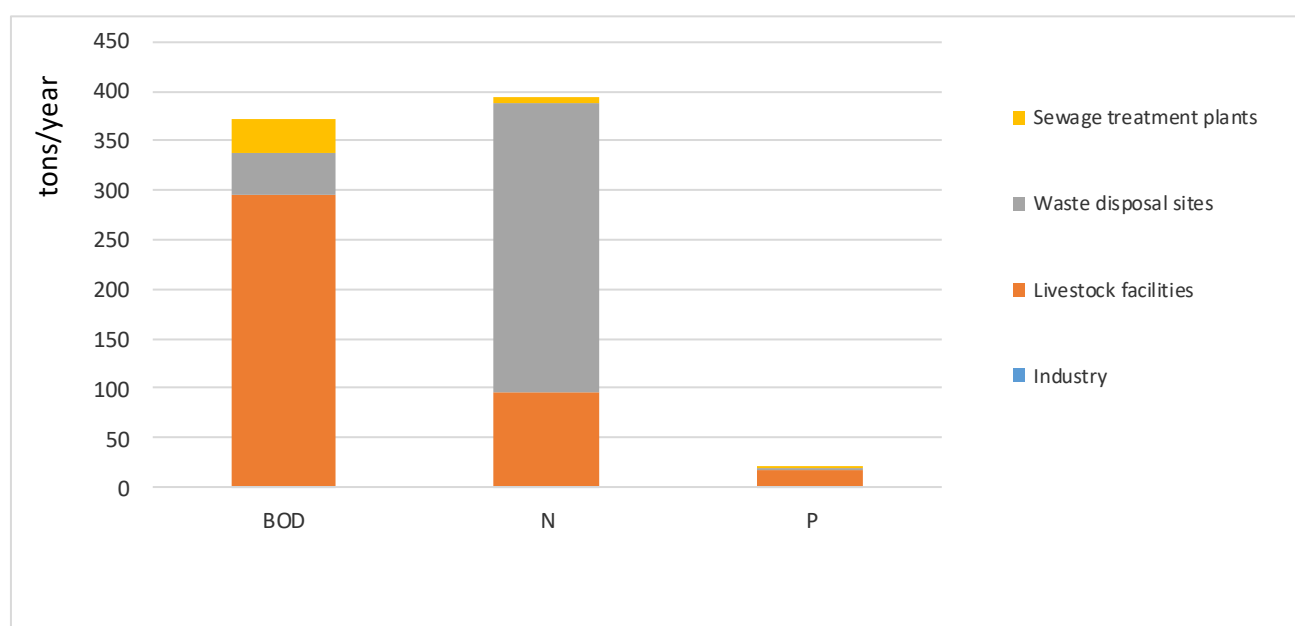


Table 5-5: Total annual loads of BOD, N and P that are produced from point sources of pollution in Amfissa RB (EL0724)

point sources of pollution	BOD (tons/ year)	N (tons/ year)	P (tons/ year)
Industrial Units	0,16	0,07	0,02
Livestock facilities	0,00	0,00	0,00
Waste disposal sites	0,00	0,00	0,00
Sewage treatment plants	47,92	35,75	6,85
<b>TOTAL</b>	<b>48,08</b>	<b>35,82</b>	<b>6,87</b>

Figure 5-5: Total annual loads of BOD, N and P for in Amfissa RB (EL0724) that are produced from point sources of pollution

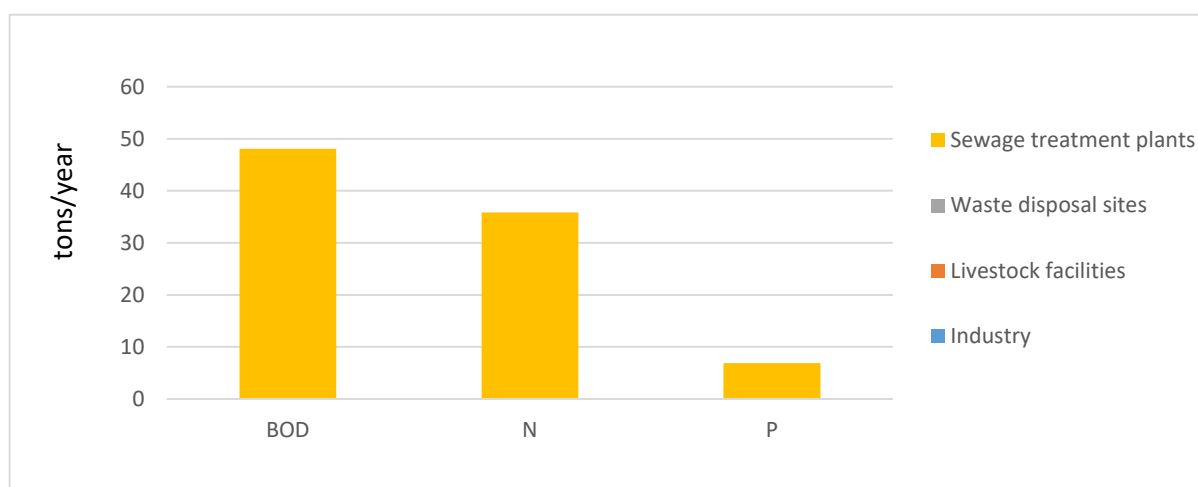


Table 5-6: Total annual loads of BOD, N and P that are produced from point sources of pollution in Asopos RB (EL0725)

point sources of pollution	BOD (tons/ year)	N (tons/ year)	P (tons/ year)
Industrial Units	0,85	4,03	0,62
Livestock facilities	128,91	42,59	8,15
Waste disposal sites	33,84	235,01	1,13
Sewage treatment plants	19,21	20,47	4,54
<b>TOTAL</b>	<b>182,81</b>	<b>302,1</b>	<b>14,44</b>

Figure 5-6: Total annual loads of BOD, N and P for Asopos RB (EL0725) that are produced from point sources of pollution

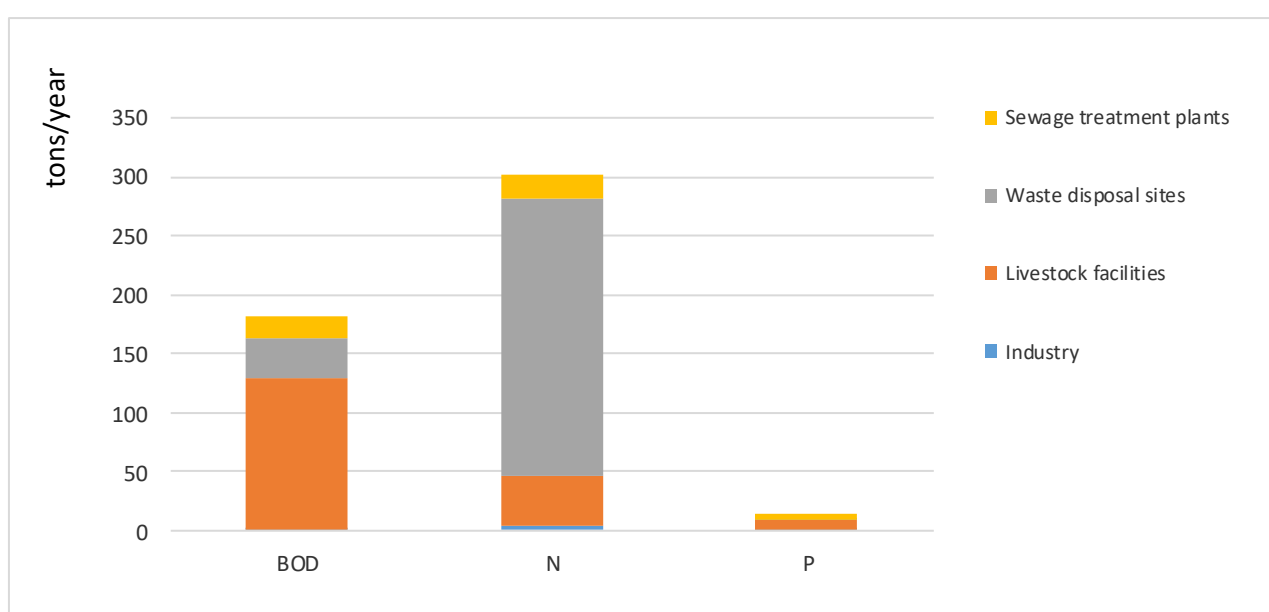
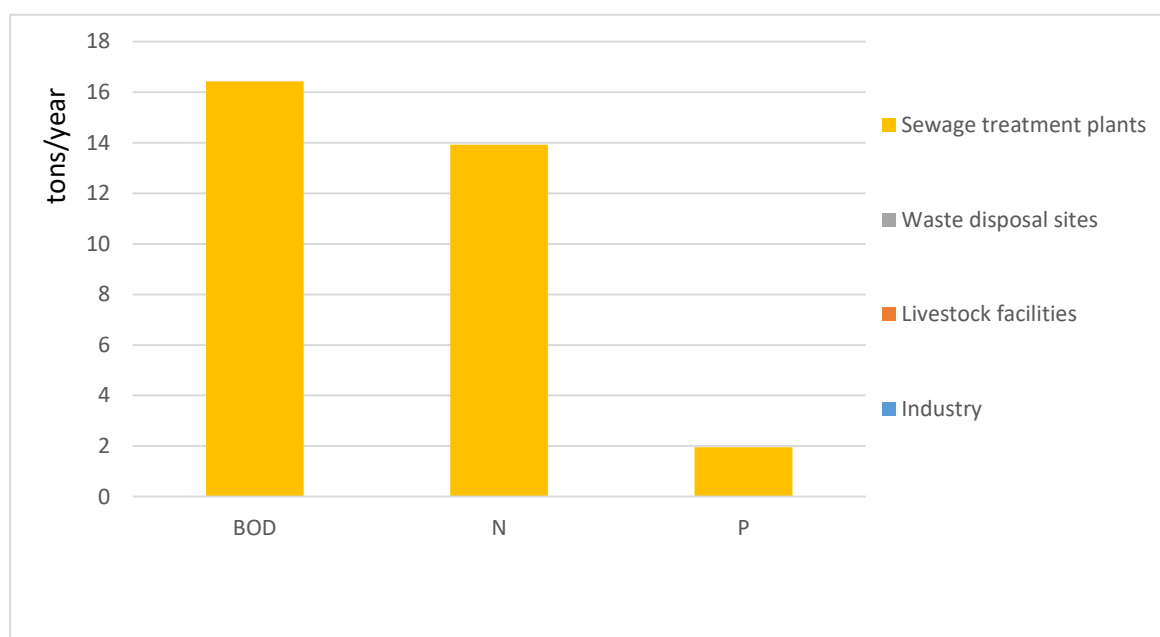


Table 5-7: Total annual loads of BOD, N and P that are produced from point sources of pollution in *Sporades RB (EL0735)*

point sources of pollution	BOD (tons/ year)	N (tons/ year)	P (tons/ year)
Industrial Units	0,015	0,00	0,00
Livestock facilities	0,00	0,00	0,00
Waste disposal sites	0,00	0,00	0,00
Sewage treatment plants	16,42	13,92	1,95
<b>TOTAL</b>	<b>16,43</b>	<b>13,92</b>	<b>1,95</b>

Figure 5-7: Total annual loads of BOD, N and P for *Sporades RB (EL0735)* that are produced from point sources of pollution





## 5.2 DIFFUSED SOURCES OF POLLUTION

Diffuse sources of pollution include all sources of nutrients (BOD, N, P). The list of these pressures includes:

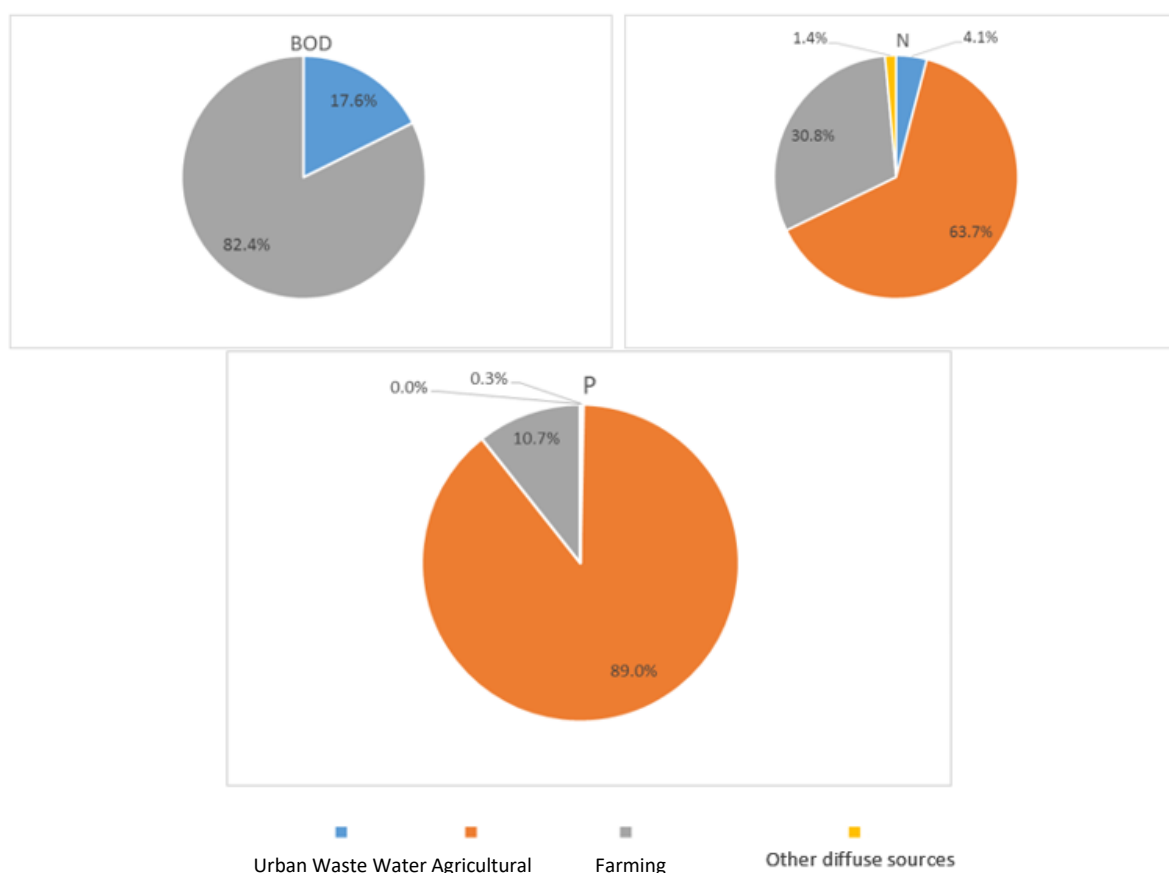
- Agriculture
- Discharges not connected to sewerage network
- Farming
- Other diffuse sources

From the above diffuse sources of pollution derives the annual load of BOD, N and P produced.

Table 5-8: Total annual loads of BOD, N and P that are produced from Diffuse sources of pollution in Spercheios RB (EL0718)

LAND-USE	Annual BOD (tons/year)	Annual N (tons/year)	Annual P (tons/year)
Urban waste water	77,7	22,2	0,6
Agricultural	0,0	347,8	170,3
Farming	363,2	167,9	20,4
Other sources	0,0	7,9	0,0
<b>Total</b>	<b>441</b>	<b>546</b>	<b>191</b>

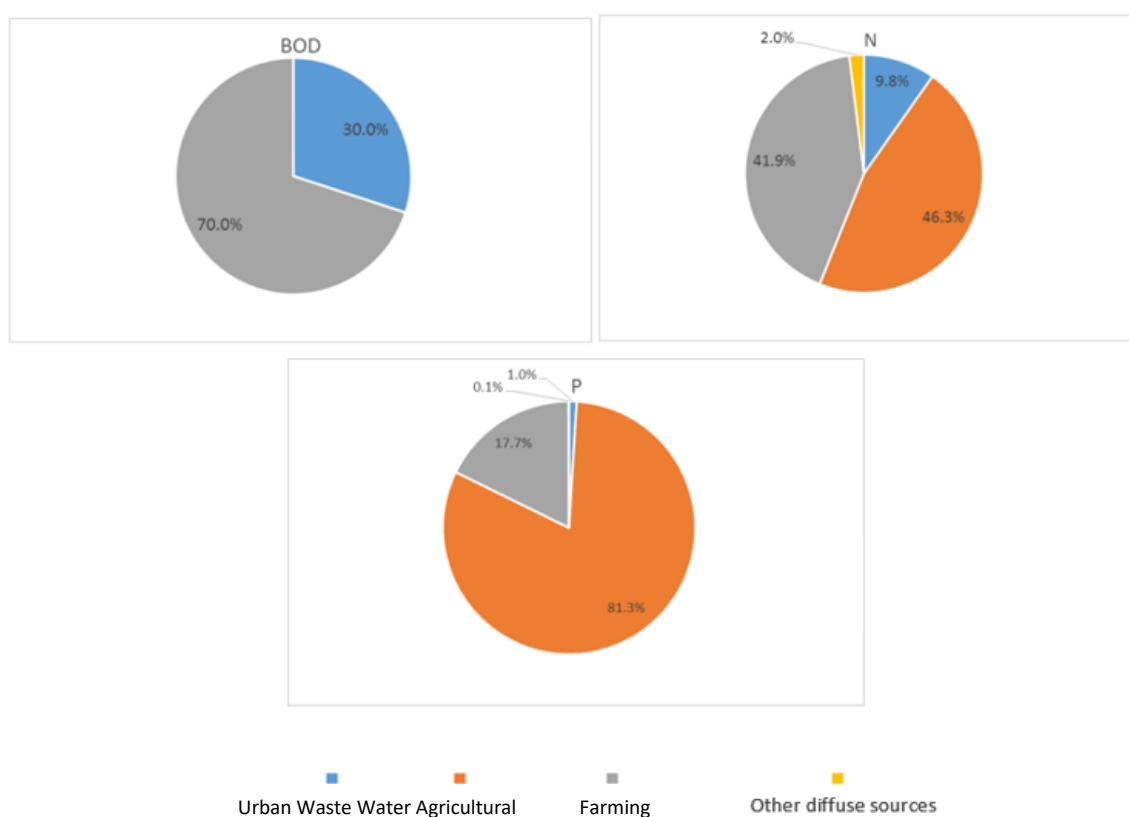
Figure 5-8: The annual distribution of BOD, N and P from Diffuse sources of pollution in Spercheios RB (EL0718)



**Table 5-9:** Total annual loads of BOD, N and P that are produced from Diffuse sources of pollution in Evvoia RB (EL0719)

LAND-USE	Annual BOD (tons/year)	Annual N (tons/year)	Annual P (tons/year)
Urban waste water	205,3	58,6	1,7
Agricultural	0,0	277,9	143,4
Farming	479	251,6	31,2
Other sources	0,0	11,9	0,1
<b>Total</b>	<b>684</b>	<b>600</b>	<b>176</b>

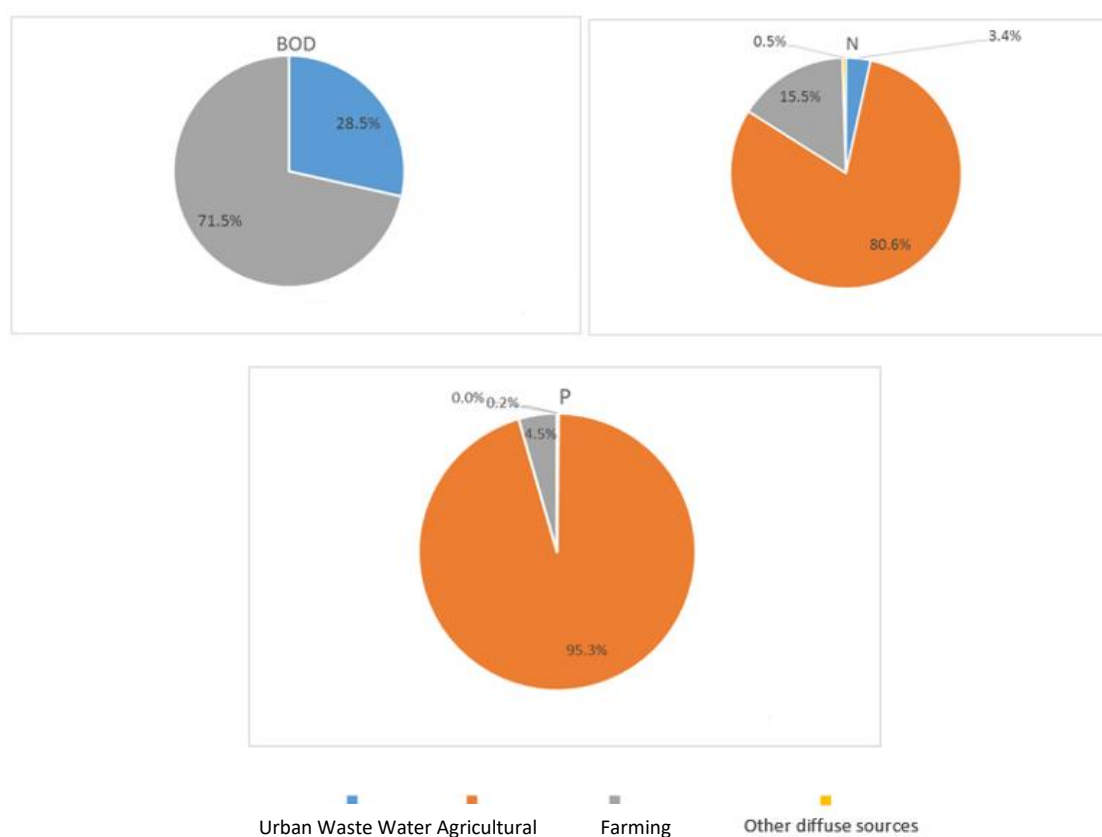
**Figure 5-9:** The annual distribution of BOD, N and P from Diffuse sources of pollution in Evvoia RB (EL0719)



**Table 5-10:** Total annual loads of BOD, N and P that are produced from Diffuse sources of pollution in NE Paralia Kallidromou RB (EL0722)

LAND-USE	Annual BOD (tons/year)	Annual N (tons/year)	Annual P (tons/year)
Urban waste water	41,6	11,9	0,3
Agricultural	0,0	279,7	140,5
Farming	104,3	53,8	6,6
Other sources	0,0	1,7	0,0
<b>Total</b>	<b>146</b>	<b>347</b>	<b>147</b>

**Figure 5-10:** The annual distribution of BOD, N and P from Diffuse sources of pollution in NE Paralia Kallidromou RB (EL0722)



**Table 5-11:** Total annual loads of BOD, N and P that are produced from Diffuse sources of pollution in Voiotikos Kifisos RB (EL0723)

LAND-USE	Annual BOD (tons/year)	Annual N (tons/year)	Annual P (tons/year)
Urban waste water	227,6	63,7	1,6
Agricultural	0,0	740,4	405,9
Farming	346,9	157,2	19,1
Other sources	0,0	5,5	0,1
<b>Total</b>	<b>575</b>	<b>967</b>	<b>427</b>

**Figure 5-11:** The annual distribution of BOD, N and P for RB Attica from Diffuse sources of pollution in Voiotikos Kifisos RB (EL0723)

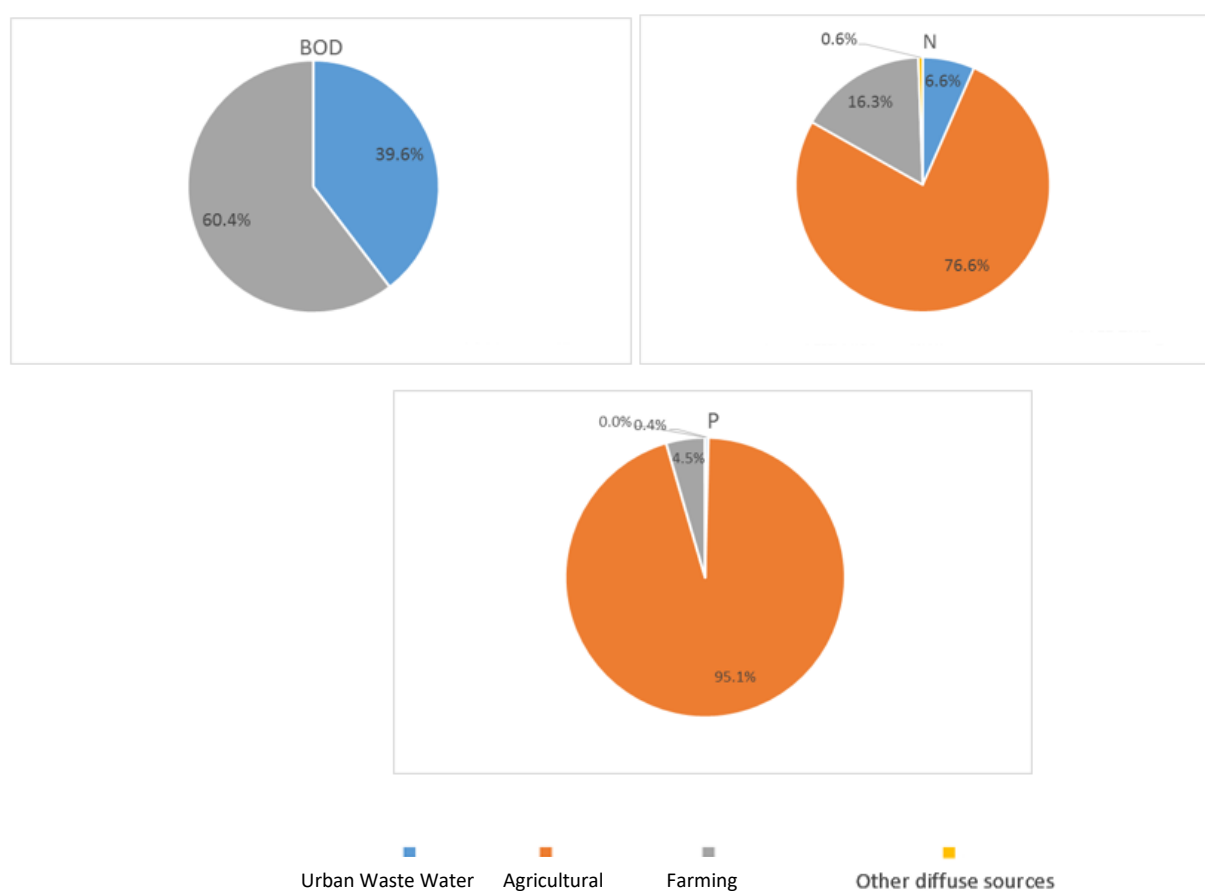
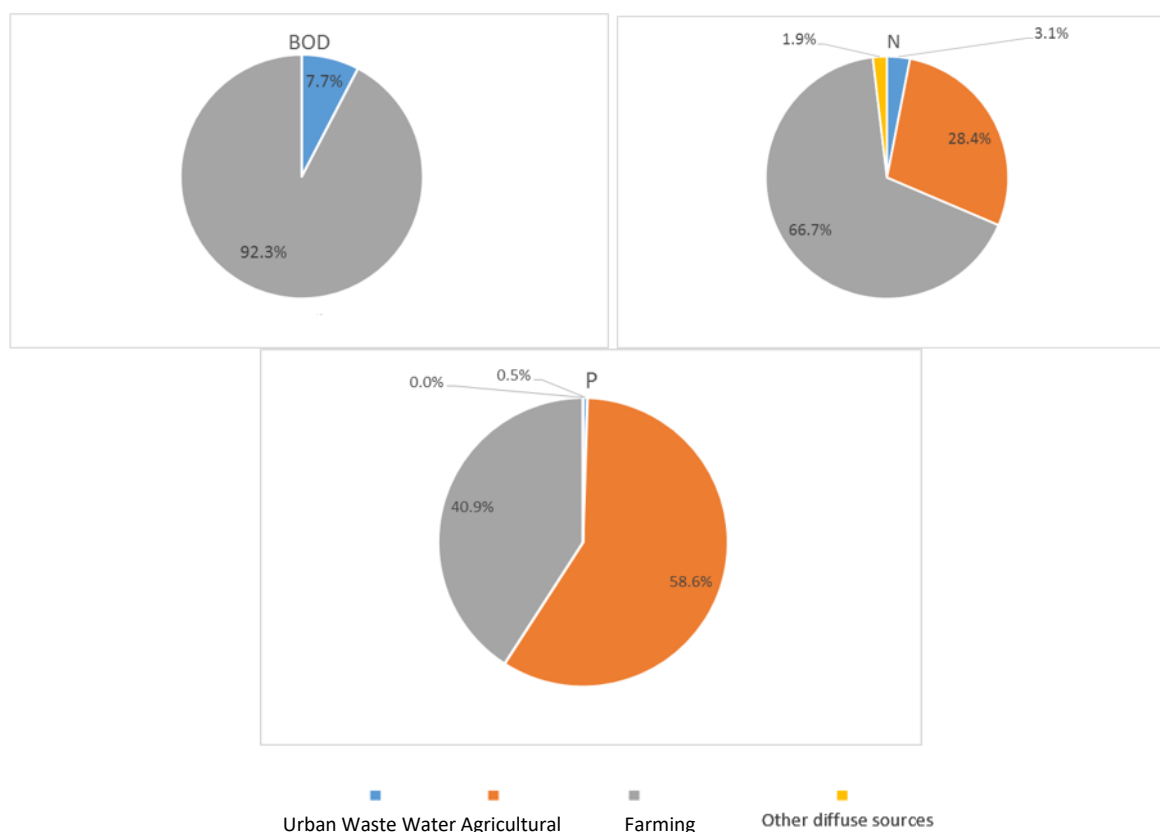


Table 5-12: Total annual loads of BOD, N and P that are produced from Diffuse sources of pollution in Amfissa RB (EL0724)

LAND-USE	Annual BOD (tons/year)	Annual N (tons/year)	Annual P (tons/year)
Urban waste water	10,9	3,1	0,1
Agricultural	0,0	28,8	11,9
Farming	131,2	67,7	8,3
Other sources	0,0	1,9	0,0
<b>Total</b>	<b>142</b>	<b>102</b>	<b>20</b>

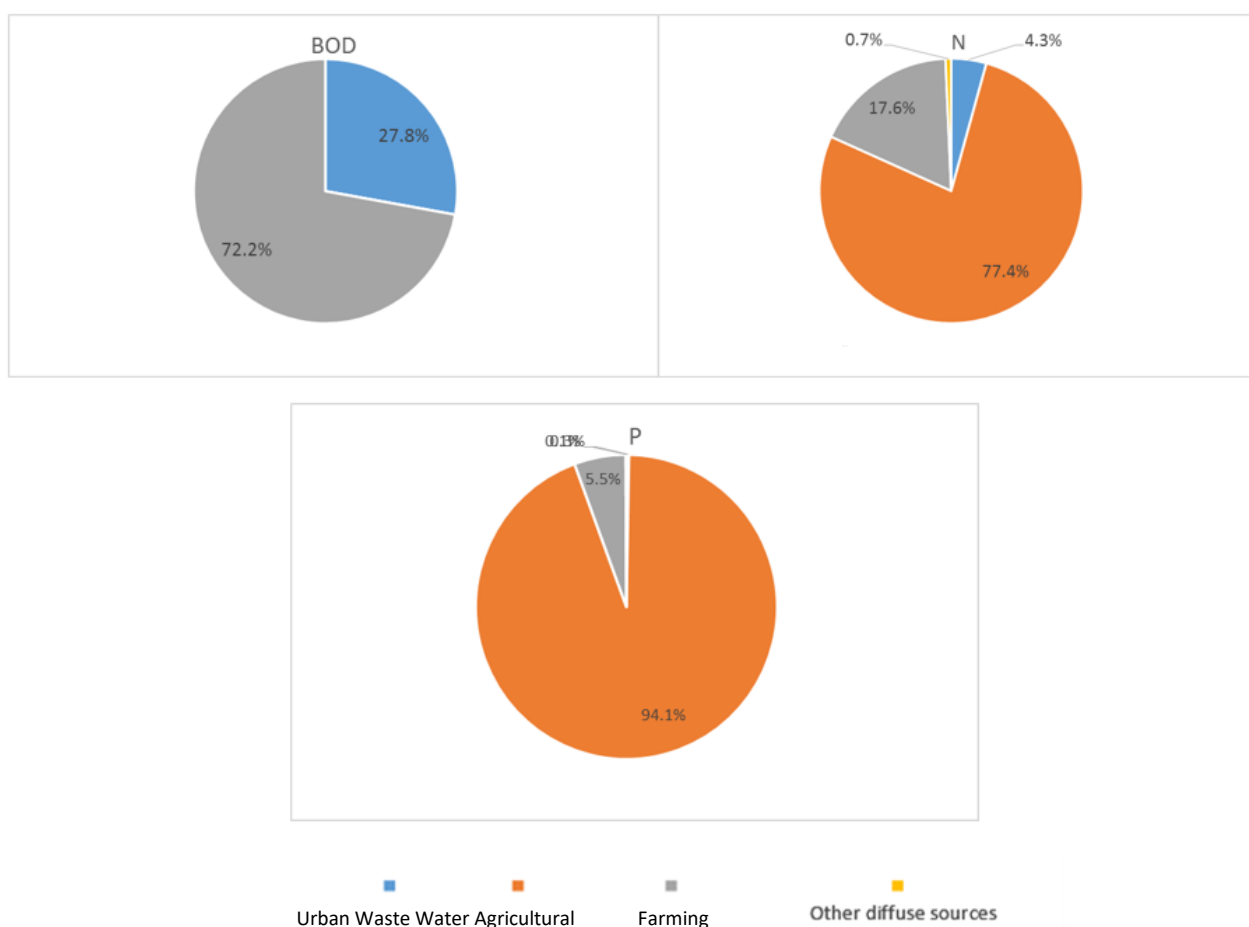
Figure 5-12: The annual distribution of BOD, N and P from Diffuse sources of pollution Amfissa RB (EL0724)



**Table 5-13:** Total annual loads of BOD, N and P that are produced from Diffuse sources of pollution in Asopos RB (EL0725)

LAND-USE	Annual BOD (tons/year)	Annual N (tons/year)	Annual P (tons/year)
Urban waste water	57,5	16,1	0,4
Agricultural	0,0	289,5	136,2
Farming	149	65,8	8,0
Other sources	0,0	2,6	0,1
<b>Total</b>	<b>207</b>	<b>374</b>	<b>145</b>

**Figure 5-13:** The annual distribution of BOD, N and P from Diffuse sources of pollution in Asopos RB (EL0725)

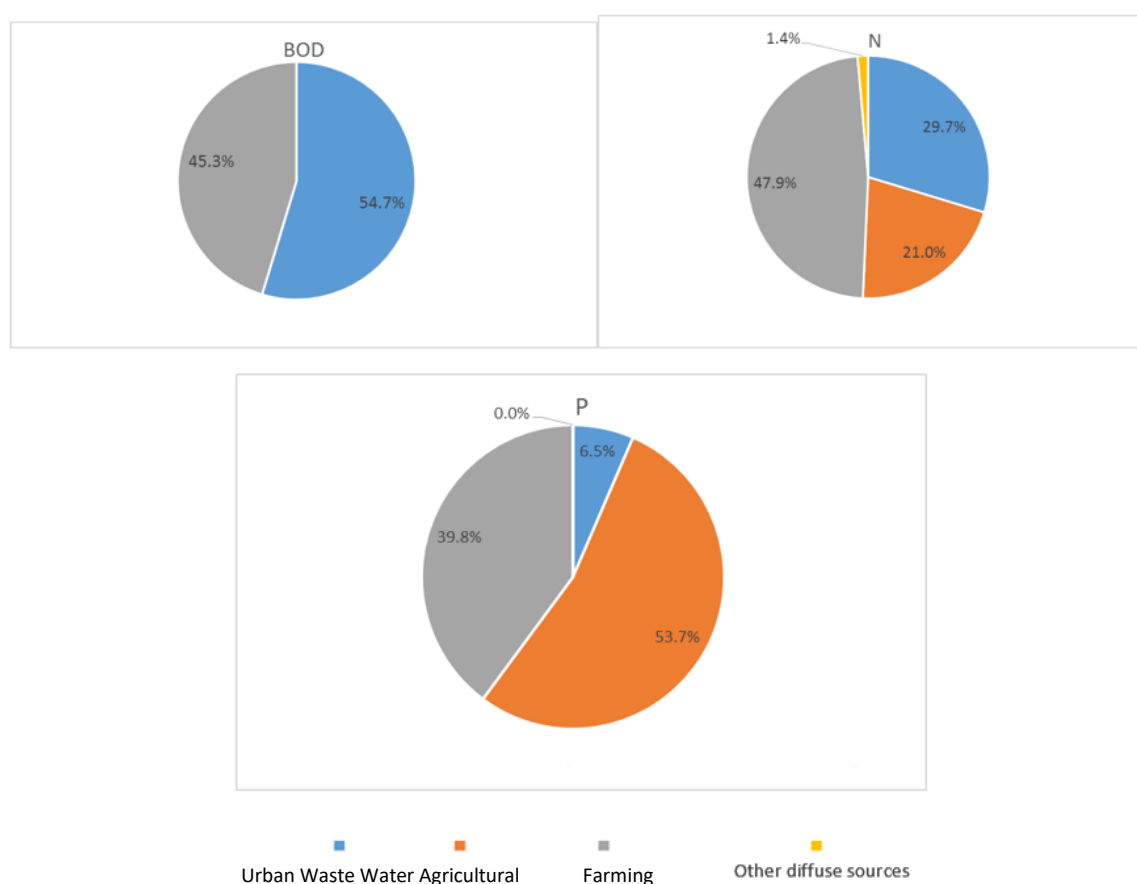




**Table 5-14:** Total annual loads of BOD, N and P that are produced from Diffuse sources of pollution in Sporades RB (EL0735)

LAND-USE	Annual BOD (tons/year)	Annual N (tons/year)	Annual P (tons/year)
Urban waste water	89,8	25,6	0,8
Agricultural	0,0	18,1	6,6
Farming	74,4	41,3	4,9
Other sources	0,0	1,2	0,0
<b>Total</b>	<b>164</b>	<b>86</b>	<b>12</b>

**Figure 5-14:** The annual distribution of BOD, N and P from Diffuse sources of pollution in Sporades RB (EL0735)



## 5.3 HYDROMORPHOLOGICAL PRESSURES

### 5.3.1 Pressures related to hydromorphology

The hydromorphological alterations, that led to the designation of HMWB and AWB are presented in paragraph 4.3.

Table 5-15: Hydro morphological alterations due to projects on SWB (HMWB-AWB) of Spercheios RB (EL0718)

REGIONAL UNIT	PROJECT	USE OF PROJECT	WB CODE	AREA (km <sup>2</sup> ) / LENGTH (km) HMWB-AWB	HMWB-AWB
FTHIOTIDA	TAFROS LAMIAS 2	Flood protection, Treated Wastewater recipient	EL0718R000204056A	10,83 km	AWB
FTHIOTIDA	TAFROS LAMIAS 1	Flood protection, Treated Wastewater recipient	EL0718R000204054A	4,57 km	AWB
FTHIOTIDA	SPERCHEIOS P. (ALAMANA) 3	Flood protection, Urbanization	EL0718R000204053A	5,12 km	AWB
FTHIOTIDA	SPERCHEIOS P. (ALAMANA) 4	Flood protection, Urbanization	EL0718R000204057A	4,95 km	AWB

Table 5-16: Hydro morphological alterations due to projects on SWB (HMWB-AWB) of Voiotikos Kifisos RB (EL0723)

REGIONAL UNIT	PROJECT	USE OF PROJECT	WB CODE	AREA (km <sup>2</sup> ) / LENGTH (km) HMWB-AWB	HMWB-AWB
VOIOTIA	MELAS P. 3 (MAVROPOTAMOS)	Drainage, irrigation	EL0723R000002032A	7,98 km	AWB
VOIOTIA	KIFISOS P. (VOIOTIKOS) 5	Drainage, irrigation	EL0723R000000031H	37,81 km	AWB
VOIOTIA	MELAS P. 2 (MAVROPOTAMOS)	Drainage, irrigation	EL0723R000002033H	15,41 km	AWB

### 5.3.2 Sand and gravel extraction

Sand extraction from WB can alter the geometry of river beds and cause hydromorphological alterations. The following table presents the sand and gravel extraction activities that were carried out in the RBD of Eastern Central Greece (EL 07) according to the available data.

REGIONAL UNIT	DECISION OF APPROVAL	LOCATION OF EXTRACTION	COORDINATES	AREA/QUANTITY OF EXTRACTION
Fthiotida	5859/Φ/ 2-11-2005 Central Greece Region	S. Voagrios lenght 1.650 m	North X=21.400 Ψ=4.900 South X=20.250 Ψ=1.100	60.000 m <sup>3</sup>
Fthiotida	TY.515/23-3-2005 Decision of Fthiotida Prefect	Latzorema	North X=11.350 Ψ=4.900 South X=11.220 Ψ=6.020	70.000 m <sup>3</sup>
		Liapatorema	North X=8.550 Ψ=3.000 South X=9.000 Ψ=4.000	
		Voagrios	North X=20.200 Ψ=1.050 South X=20.680 Ψ=3.000	

REGIONAL UNIT	DECISION OF APPROVAL	LOCATION OF EXTRACTION	COORDINATES	AREA/QUANTITY OF EXTRACTION
<b>Fthiotida</b>	1739/15195/10-2-2014, Decentralized Administration of Thessaly - Central Greece	Borrow pits Δ <sub>3</sub> , Δ <sub>4</sub> , Δ <sub>5</sub>	-	Δ <sub>3</sub> : 63.297 m <sup>3</sup> Δ <sub>4</sub> : 91.000 m <sup>3</sup> Δ <sub>5</sub> : 45.000 m <sup>3</sup>
<b>Fthiotida</b>	10183/98804/5-6-2014, Decentralized Administration of Thessaly - Central Greece	Borrow pits Δ <sub>1</sub> , Δ <sub>2</sub> , Δ <sub>3</sub>	-	Δ <sub>1</sub> : 39.000 m <sup>3</sup> Δ <sub>2</sub> : 81.700 m <sup>3</sup> Δ <sub>3</sub> : 87.803 m <sup>3</sup>
<b>Fokida</b>	Decision of Fokida's Prefect 469/13-05-2002	S. Plitou at «Kaliva Hrisou»	<b>GGRS 87:</b> X=365450 Y=4257455	600 m <sup>3</sup>
<b>Fokida</b>	Decision of Fokida's Prefect 221/02-06-2003	S. Plitou at «Kaliva Kalogeros»	<b>GGRS 87:</b> X=365380 Y=4257340	1.500 m <sup>3</sup>
<b>Fokida</b>	Decision of Fokida's Prefect 626/09-09-2004	Area of 1 km in Voiotikos Kifisos	<b>GGRS 87:</b> X=364525 Y=4284415	-
<b>Fokida</b>	Decision of Fokida's Prefect 1157/21-11- 2006	Area of 3 km in s. Kolovatianou	<b>GGRS 87:</b> X=362200 Y=4266285	90 m <sup>3</sup> pebbles diameter of 5 cm

## 5.4 WATER ABSTRACTIONS

The following table presents total water abstractions for all uses and activities, which are estimated totally **955.256.755 m<sup>3</sup>**.

Table 5-4. Total water abstractions for all uses and activities

Water abstractions (m3 / year)	BD code							RBD EL07
	EL0718	EL0719	EL22	EL0723	EL0724	EL0725	EL0735	
Water supply	14.461.266	27.542.203	4.548.335	17.090.711	3.873.611	6.126.399	2.400.260	<b>76.042.785</b>
Irrigation	182.383.223	108.477.007	107.775.962	350.675.449	21.219.101	68.180.078	852.955	<b>839.563.775</b>
Farming	971.985	4.336.513	545.999	1.915.354	298.445	2.187.833	250.194	<b>10.506.323</b>
Industry	3.697.833	3.669.723	529.738	13.096.090	234.740	7.914.999	750	<b>29.143.873</b>
Total	201.514.306	144.025.447	113.400.035	382.777.604	25.625.897	84.409.308	3.504.160	955.256.755

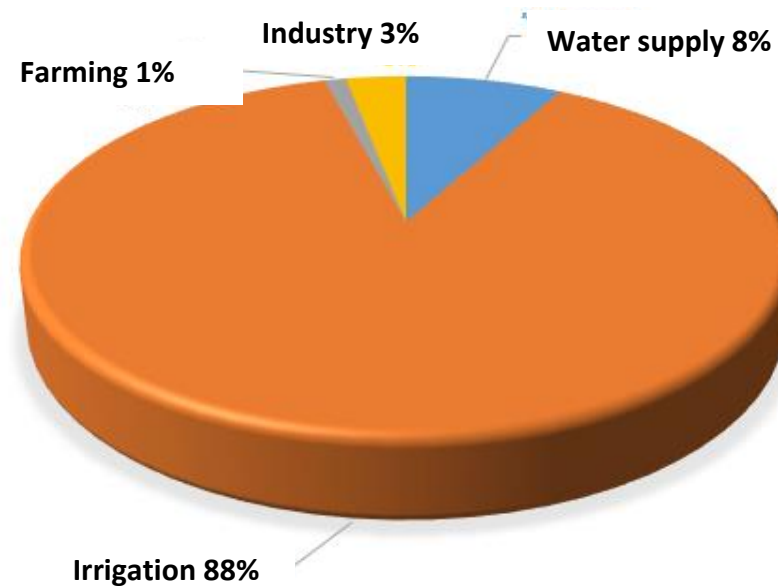


Figure 5-15. Water abstractions per use and activity

Table 5-17: Annual abstractions from SWB of Spercheios RB (EL0718)

WB CODE	WB NAME	WB TYPE	Annual Abstractions Quantity (hm <sup>3</sup> /year)	USE
EL0718R000200049N	SPERCHEIOS P. (ALAMANA) 1	R	38,61	IRRIGATION
EL0718R000200064N	SPERCHEIOS P. (ALAMANA) 7	R	4,10	WATER SUPPLY
EL0718R000900079N	INAXOS P.	R	8,03	IRRIGATION
EL0718R000206059N	GORGOPOTAMOS 1	R	6,18	WATER SUPPLY

Table 5-18: Annual abstractions from SWB of Evvoia RB (EL0719)

WB CODE	WB NAME	WB TYPE	Annual Abstractions Quantity (hm <sup>3</sup> /year)	USE
EL0719R000100009N	MESAPIO R. 1	R	1,26	IRRIGATION

Table 5-19: Annual abstractions from SWB of Voiotikos Kifisos RB (EL0723)

WB CODE	WB NAME	WB TYPE	Annual Abstractions Quantity (hm <sup>3</sup> /year)	USE
EL0723R000000031H	KIFISOS P. (VOIOTIKOS) 5	R	75,18	IRRIGATION
EL0723R000002034N	MELAS P. 1 (MAVROPOTAMOS)	R	42,7	IRRIGATION
EL0723L000000003N	YLIKI	L	42,25	IRRIGATION, ASOPOS REHABILITATION

Table 5-20: Annual abstractions from SWB of Amfissa RB (EL0724)






WB CODE	WB NAME	WB TYPE	Annual Abstractions Quantity (hm <sup>3</sup> /year)	USE
EL0724R000100029N	SKITSA R.	R	5,20	IRRIGATION

Table 5-21: Annual abstractions from SWB of Sporades RB (EL0735)

WB CODE	WB NAME	WB TYPE	Annual Abstractions Quantity (hm <sup>3</sup> /year)	USE
EL0735C0002N	THALASSA SPORADON	C	0,14	WATER SUPPLY (Desalination)

Overexploitation phenomena are observed in GWB: EL0700040, EL0700110, EL0700130, EL0700250 and EL0700320.

Table 5-22: Annual abstractions and overexploitation of GWB of RBD of Eastern Central Greece (EL07)

WB CODE	WB NAME	Annual Average Recharge (hm <sup>3</sup> )	Drinking water supply (hm <sup>3</sup> / year)	Irrigation (hm <sup>3</sup> /year)	Livestock (hm <sup>3</sup> /year)	Industry (hm <sup>3</sup> /year)	Annual Average Abstractions (hm <sup>3</sup> )	Quantitative status
EL0700040	PELASGIAS	35,0	1,57	44,94	0,11	0,19	46,78	 POOR
EL0700110	MALESINAS	15,0	0,97	26,12	0,08	0,15	27,28	 POOR
EL0700130	AMFISSAS	3,0	0,04	0,49	0,01	0,01	0,54	 POOR
EL0700250	TELETHRIOU OROUS- EDIPSOU	10,0	0,82	12,64	0,03	0,04	31,52	 POOR
EL0700320	VATHEIAS- XIROVOUNIOU	5,0	1,51	5,02	0,36	0,23	7,63	 POOR

## 5.5 OTHER PRESSURES

### *Runoff from mining and quarries*

In the Eastern Central Greece RBD (EL07) the mining activity is important and mainly concerns the maintains of Parnassos-Giona, Central Evvoia and Larimna-Akraifnio.

Table 5-23: Count of mining activities per RB in RBD of Eastern Central Greece (EL07)

RB	Count of mining activities
Spercheios (EL0718)	6
Evvoia (EL0719)	11
NE Paralia Kallidromou (EL0722)	0
Voiotikos Kifisos (EL0723)	55
Amfissa (EL0724)	42
Asopos (EL0725)	6
Sporades (EL0735)	0
<b>TOTAL</b>	<b>120</b>

### *Desalination units*

In Eastern Central Greece RBD there is one (1) Desalination unit at Alonnisos Municipality .

Table 5-24: Desalination units of Eastern Central Greece RBD (EL07)

RB	MUNICIPALITY	Coordinates GGRS 87		DESALINATION CAPACITY (m <sup>3</sup> /day)	RELATED COASTAL WB	COASTAL WB NAME
		X	Y			
SPORADES (EL0735)	ALONNISOS (GIALIA)	487001	4333850	1.400	EL0735C0002N	THALASSA SPORADON

### *Ports - Marinas - Navigation*

Table 5-25: Existing Ports and Marinas of Eastern Central Greece RBD (EL07)

PORT NAME	RELATED COASTAL	COASTAL NAME	RB
ERETRIA	EL0723C0012N	KOLPOS AVLIDAS	EL0719
CHALKIDA	EL0723C0012N	KOLPOS AVLIDAS	EL0719
NEA STIRA	EL0719C0014N	AKTES KOLPOU PETALION - STYRA	EL0719
MARMARI	EL0719C0014N	AKTES KOLPOU PETALION - STYRA	EL0719
LOUTRA AIDIPSOY	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	EL0719
KYMI	EL0719C0008N	AN. AKTES EVVOIAS	EL0719
KARYSTOS	EL0719C0015N	KARYSTOS - N. EVVOIA	EL0719
ALIVERI	EL0719C0013N	NOTIOS EVVOIKOS - ALIVERI	EL0719
MANTOUDI	EL0719C0008N	AN. AKTES EVVOIAS	EL0719
DIRFIS	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	EL0719
NEA ARTAKI	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	EL0719
AGIOS KONSTANTINOS	EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	EL0722
STILIDA	EL0718C0007N	MALLIAKOS KOLPOS	EL0718
SKYROS	EL0735C0003N	AKTES SKYROU	EL0735
SKOPELOS	EL0735C0002N	TSALASSA SPORADON	EL0735
SKIATHOS	EL0735C0001N	AKTES SKIATHOU	EL0735



PORT NAME	RELATED COASTAL	COASTAL NAME	RB
ALONISSOS	EL0735C0002N	TSALASSA SPORADON	EL0735

### Groundwater artificial recharge

The only case of pressure recorded due to groundwater artificial recharge in the RBD of Eastern Central Greece (EL07) , is an enrichment experiment that was carried out to investigate the possibilities of replenishing the alluvial aquifers of the THIVON-ASSOPOU-SCHIMATARIOU GWB (EL0700210). The experiment was carried out under the responsibility of the Ministry of Rural Development and Food.

## 5.6 TOTAL NUTRIENT LOADS

Figure 5-16: Total nutrient surface loads (BOD, N and P) produced by point, diffuse and other pollution sources in RBD per RB ((EL0718, EL0719, EL0722, EL0723, EL0724, EL0725 and EL0735)

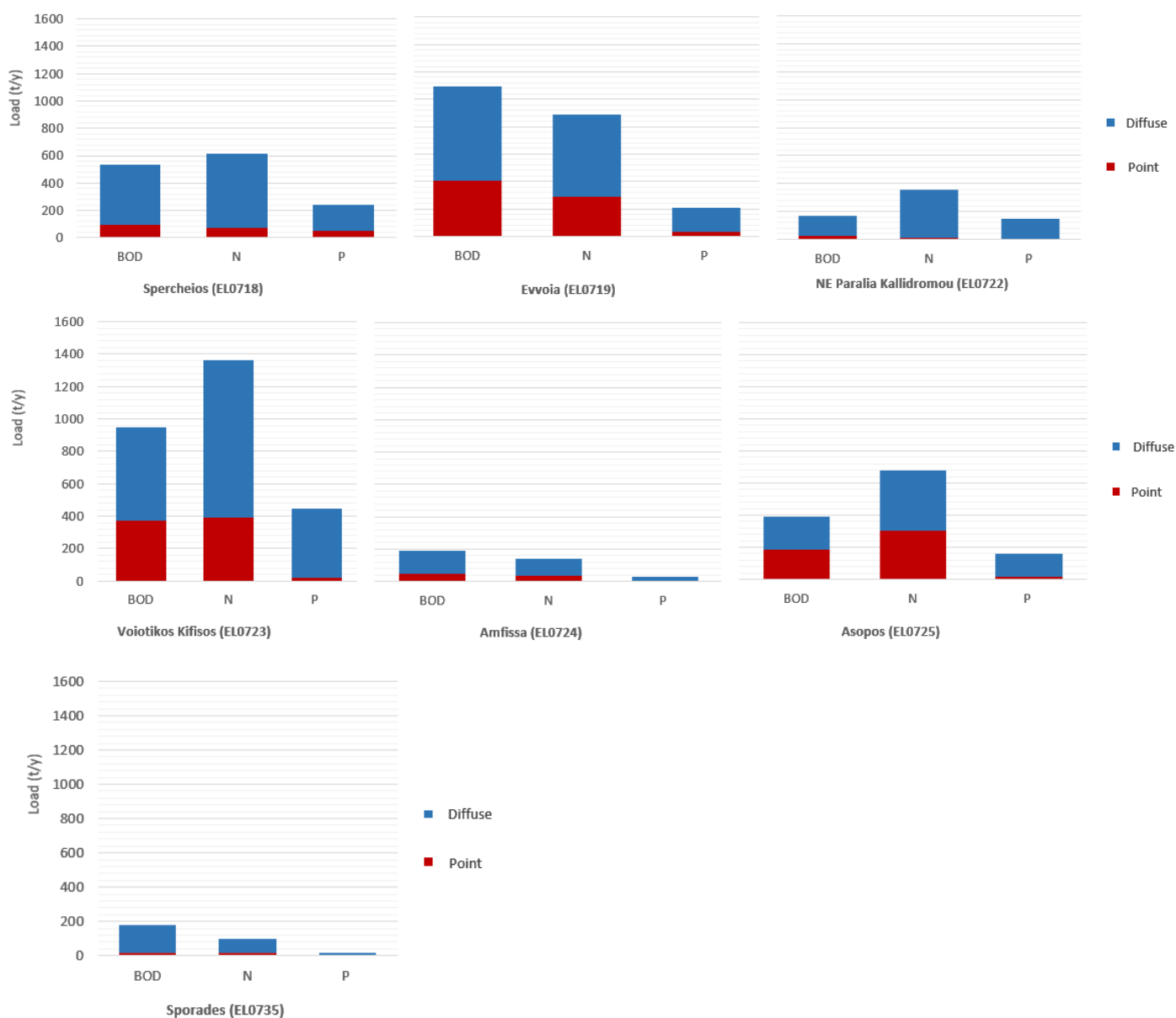


Table 5-26: Total annual nutrient surface loads (BOD, N and P) produced by all sources of pollution in Spercheios RB (EL0718)

POLLUTION SOURCE	BOD (t/y)	N (t/y)	P (t/y)
POINT	91,78	71,42	52,73
DIFFUSE	441,00	546,00	191,00
<b>TOTAL</b>	<b>532,78</b>	<b>617,42</b>	<b>243,73</b>

Table 5-27: Total annual nutrient surface loads (BOD, N and P) produced by all sources of pollution in Evvoia RB (EL0719)

POLLUTION SOURCE	BOD (t/y)	N (t/y)	P (t/y)
POINT	408,79	287,16	29,39
DIFFUSE	684,00	600,00	176,00
<b>TOTAL</b>	<b>1.092,79</b>	<b>887,16</b>	<b>205,39</b>

Table 5-28: Total annual nutrient surface loads (BOD, N and P) produced by all sources of pollution in NE Paralia Kallidromou RB(EL0722)

POLLUTION SOURCE	BOD (t/y)	N (t/y)	P (t/y)
POINT	24,53	11,41	1,91
DIFFUSE	146,00	347,00	147,00
<b>TOTAL</b>	<b>170,53</b>	<b>358,41</b>	<b>148,91</b>

Table 5-29: Total annual nutrient surface loads (BOD, N and P) produced by all sources of pollution in Voiotikos Kifisos RB (EL0723)

POLLUTION SOURCE	BOD (t/y)	N (t/y)	P (t/y)
POINT	373,01	393,6	19,71
DIFFUSE	575,00	967,00	427,00
<b>TOTAL</b>	<b>948,01</b>	<b>1.360,60</b>	<b>446,71</b>

Table 5-30: Total annual nutrient surface loads (BOD, N and P) produced by all sources of pollution in Amfissa RB (EL0724)

POLLUTION SOURCE	BOD (t/y)	N (t/y)	P (t/y)
POINT	48,08	35,82	6,87
DIFFUSE	142,00	102,00	20,00
<b>TOTAL</b>	<b>190,08</b>	<b>137,82</b>	<b>26,87</b>

Table 5-31: Total annual nutrient surface loads (BOD, N and P) produced by all sources of pollution in Asopos RB (EL0725)

POLLUTION SOURCE	BOD (t/y)	N (t/y)	P (t/y)
POINT	182,81	302,1	14,44
DIFFUSE	207,00	374,00	145,00
<b>TOTAL</b>	<b>389,81</b>	<b>676,10</b>	<b>159,44</b>

Table 5-32: Total annual nutrient surface loads (BOD, N and P) produced by all sources of pollution in Sporades RB (EL0735)

POLLUTION SOURCE	BOD (t/y)	N (t/y)	P (t/y)
POINT	16,43	13,92	1,95
DIFFUSE	164,00	86,00	12,00
<b>TOTAL</b>	<b>180,43</b>	<b>99,92</b>	<b>13,95</b>

## 5.7 IMPACTS ASSESSMENT

### 5.7.1 Impacts assessment on SWB

Pressures Impact assessment and WB designation is based on the likelihood of failing to meet the WFD environmental objectives, taking in consideration the following information:

- The magnitude of pressure from emissions and abstractions : High (H), Middle (M), Low (L)
- Available data and Monitoring program results
- Expert judgement, when no data is available

Table 5-33: Risk assessment of SWB failing to meet the WFD objectives in Spercheios RB (EL0718)–  
Number of WB

	Risk Assessment Categories								
	NR – Not at Risk		PNR - Probably not at Risk		PAR –Probably At Risk		AR- At Risk		Total
WB Type	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB
River WB	10	27,0%	0	0,0%	8	21,6%	15	40,6%	33
Lake and Reservoirs WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Transitional WB	1	2,7%	0	0,0%	0	0,0%	0	0,0%	1
Coastal WB	3	8,1%	0	0,0%	0	0,0%	0	0,0%	3
Total	14	37,8%	0	0%	8	21,6%	15	40,6%	37

Figure 5-17: Risk assessment of SWB failing to meet the WFD objectives in Spercheios RB (EL0718)

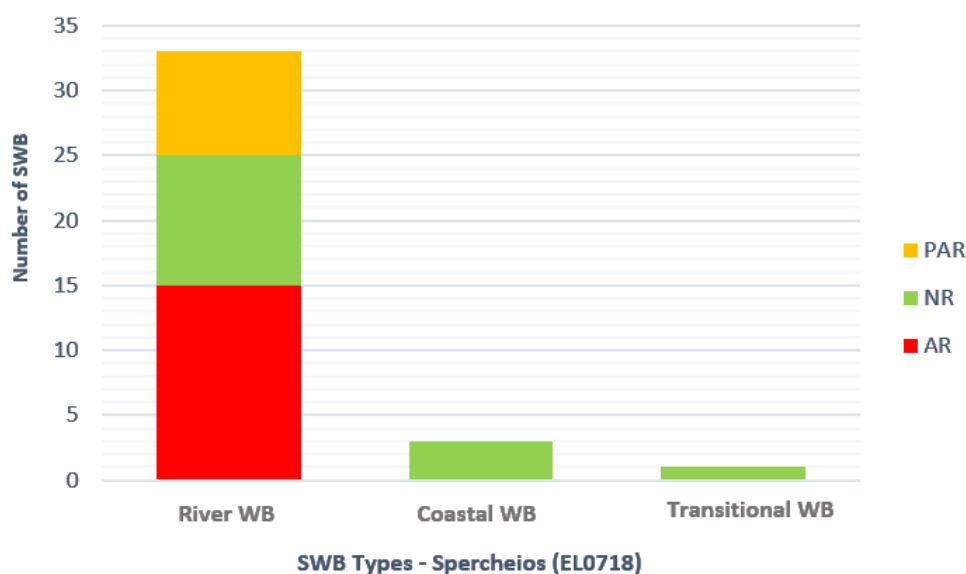


Table 5-34: Risk assessment of SWB failing to meet the WFD objectives in Evvoia RB (EL0719)–  
Number of WB

	Risk Assessment Categories								
	NR – Not at Risk		PNR - Probably not at Risk		PAR –Probably At Risk		AR- At Risk		Total
WB Type	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB
River WB	6	18,8%	3	9,4%	5	15,6%	10	31,3%	24
Lake and Reservoirs WB	0	0,0%	0	0,0%	1	3,1%	0	0,0%	1
Transitional WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Coastal WB	6	18,8%	1	3,1%	0	0,0%	0	0,0%	7
Total	12	37,5%	4	12,5	6	18,8%	10	31,3%	32

Figure 5-18: Risk assessment of SWB failing to meet the WFD objectives in Evvoia RB (EL0719)

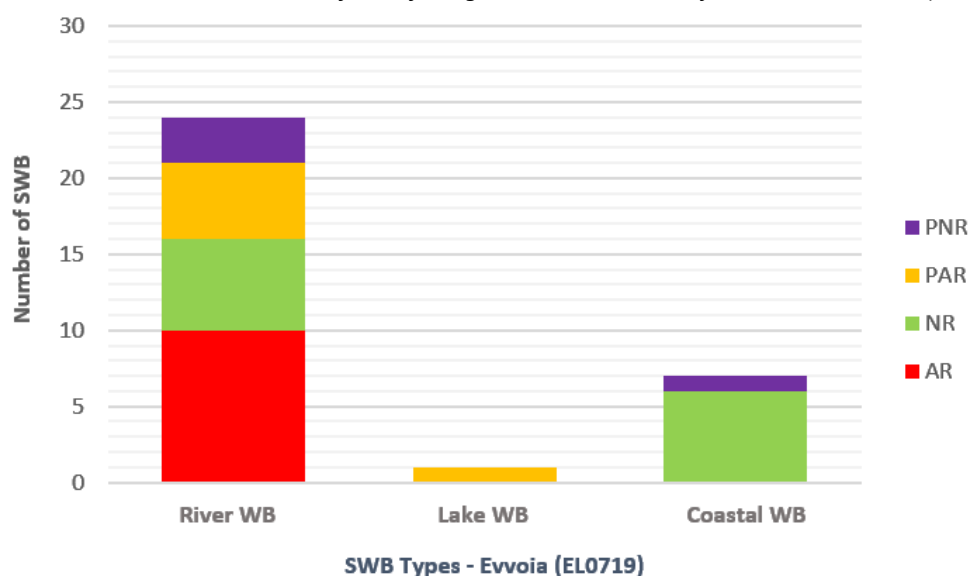
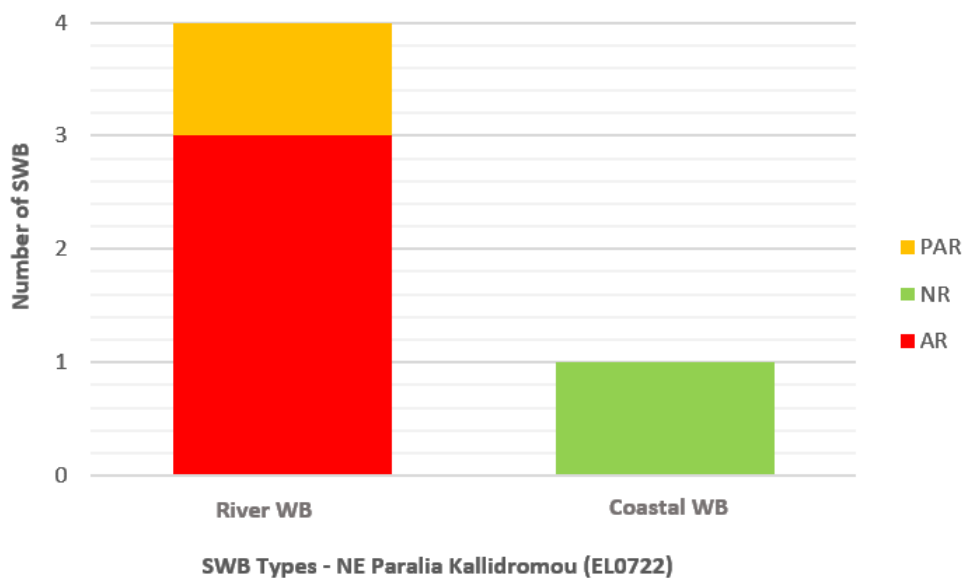


Table 5-35: Risk assessment of SWB failing to meet the WFD objectives in NE Paralia Kallidromou RB(EL0722)  
– Number of WB

	Risk Assessment Categories								
	NR – Not at Risk		PNR - Probably not at Risk		PAR –Probably At Risk		AR- At Risk		Total
WB Type	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB
River WB	0	0,0%	0	0,0%	1	20,0%	3	60,0%	4
Lake and Reservoirs WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Transitional WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Coastal WB	1	20,0%	0	0,0%	0	0,0%	0	0,0%	1
Total	1	20%	0	0,0%	1	20,0%	3	60,0%	5

Figure 5-19: Risk assessment of SWB failing to meet the WFD objectives in NE Paralia Kallidromou RB(EL0722)



**Table 5-36:** Risk assessment of SWB failing to meet the WFD objectives in Voiotikos Kifisos RB (EL0723)–  
Number of WB

	Risk Assessment Categories								
	NR – Not at Risk		PNR - Probably not at Risk		PAR –Probably At Risk		AR- At Risk		Total
WB Type	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB
River WB	1	5,9%	0	0,0%	1	5,9%	12	70,6%	14
Lake and Reservoirs WB	0	0,0%	0	0,0%	2	11,8%	0	0,0%	2
Transitional WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Coastal WB	1	5,9%	0	0,0%	0	0,0%	0	0,0%	1
Total	2	11,8%	0	0,0%	3	17,6%	12	70,6%	17

**Figure 5-20:** Risk assessment of SWB failing to meet the WFD objectives in Voiotikos Kifisos RB (EL0723)

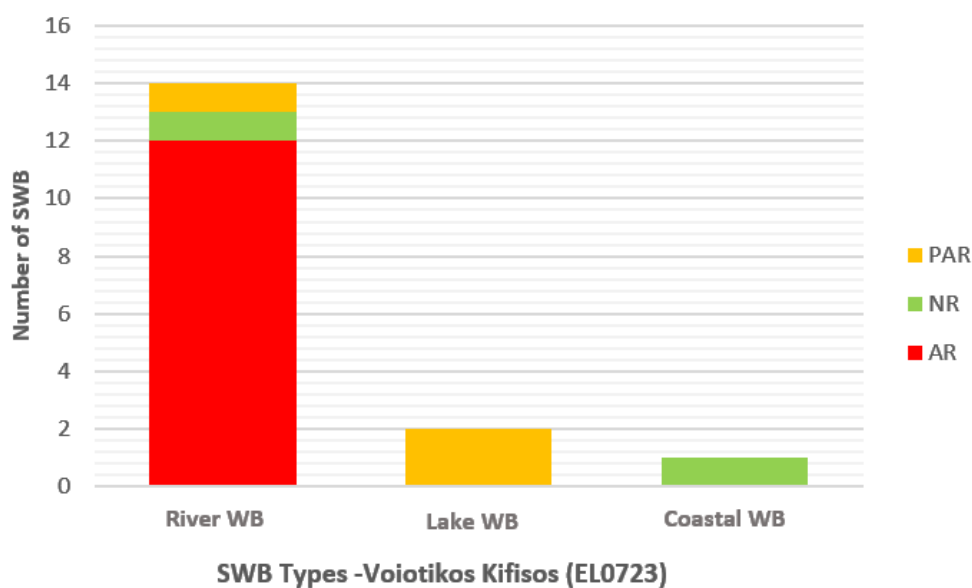


Table 5-37: Risk assessment of SWB failing to meet the WFD objectives in Amfissa RB (EL0724)–  
Number of WB

	Risk Assessment Categories								
	NR – Not at Risk		PNR - Probably not at Risk		PAR –Probably At Risk		AR- At Risk		Total
WB Type	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB
River WB	0	0,0%	0	0,0%	1	25,0%	1	25,0%	2
Lake and Reservoirs WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Transitional WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Coastal WB	1	25,0%	1	25,0%	0	0,0%	0	0,0%	2
Total	1	25,0%	1	25,0%	1	25,0%	1	25,0%	4

Figure 5-21: Risk assessment of SWB failing to meet the WFD objectives in Amfissa RB (EL0724)

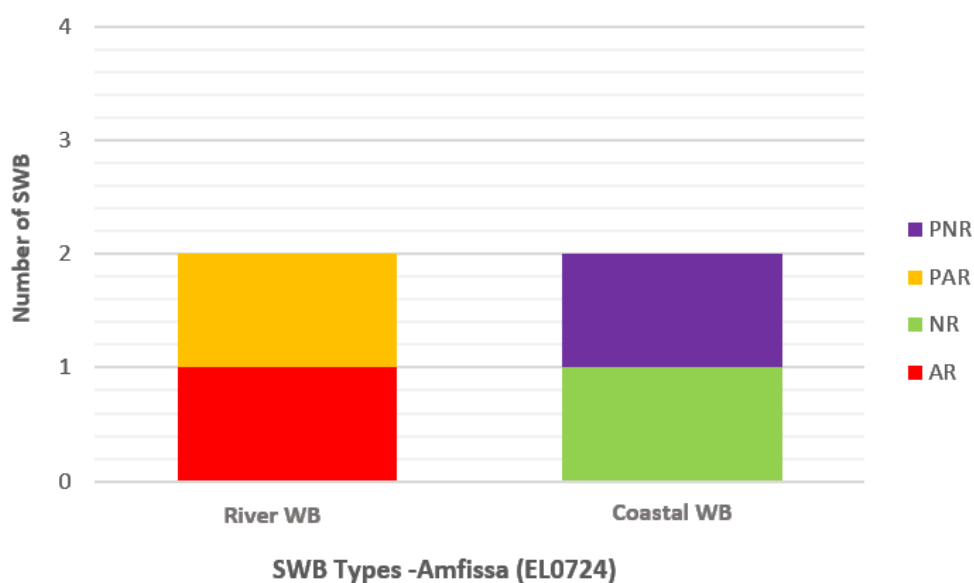




Table 5-38: Risk assessment of SWB failing to meet the WFD objectives in Asopos RB (EL0725)–  
Number of WB

	Risk Assessment Categories								
	NR – Not at Risk		PNR - Probably not at Risk		PAR –Probably At Risk		AR- At Risk		Total
WB Type	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB
River WB	0	0,0%	0	0,0%	1	16,7%	3	50,0%	4
Lake and Reservoirs WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Transitional WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Coastal WB	1	16,7%	1	16,7%	0	0,0%	0	0,0%	2
Total	1	16,7%	1	16,7%	1	16,7%	3	50,0%	6

Figure 5-22: Risk assessment of SWB failing to meet the WFD objectives in Asopos RB (EL0725)

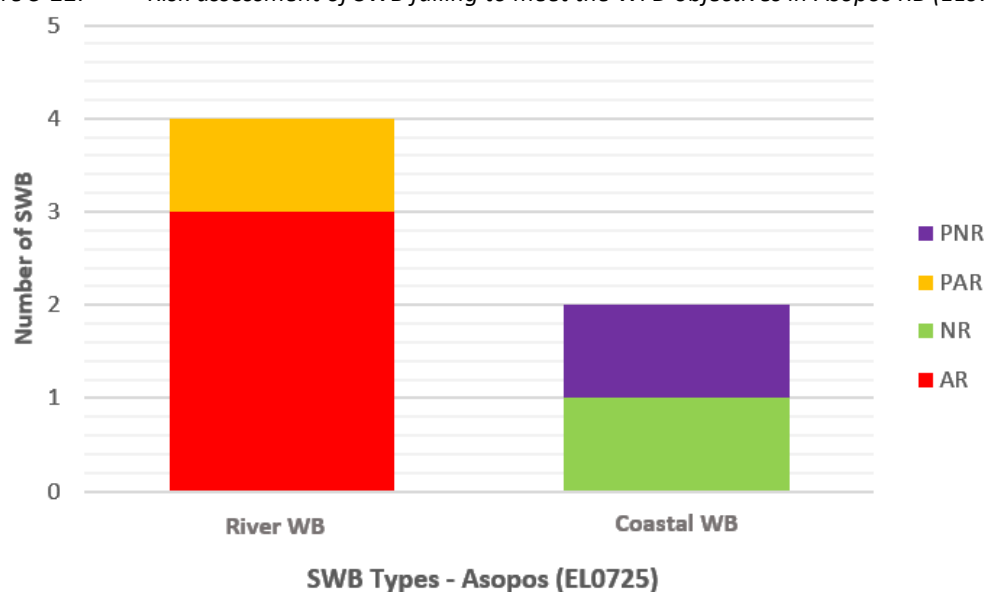
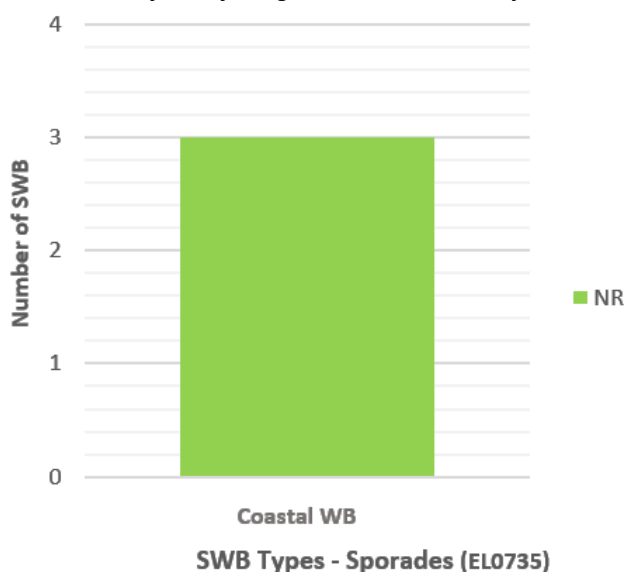


Table 5-39: Risk assessment of SWB failing to meet the WFD objectives in Sporades RB (EL0735)–  
Number of WB

	Risk Assessment Categories								
	NR – Not at Risk		PNR - Probably not at Risk		PAR –Probably At Risk		AR- At Risk		Total
WB Type	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB	Percentage of WB (%)	Number of WB
River WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Lake and Reservoirs WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Transitional WB	0	0,0%	0	0,0%	0	0,0%	0	0,0%	0
Coastal WB	3	100,0%	0	0,0%	0	0,0%	0	0,0%	3
Total	3	100,0%	0	0,0%	0	0,0%	0	0,0%	3

Figure 5-23: Risk assessment of SWB failing to meet the WFD objectives in Sporades RB (EL0735)


































































## 5.7.2 Impacts assessment on GWB

Table 5-40: Chemical and Quantitative status of GWB in Eastern Central Greece RBD (EL07)

No	WB CODE	WB NAME	Quantitative status	Decline water levels Trend	Chemical status	Quality Issues	Pollutant Trend
1	EL0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GOOD	-	GOOD		-
2	EL0700020	ZILEUTOU-MOSCHOKARIAS	GOOD	-	GOOD		-
3	EL0700030	LAMIAS-STYLIDAS	GOOD	NO	GOOD		NO
4	EL0700040	PELASGIAS	POOR	-	GOOD	overexploitation	-
5	EL0700051	SPERCHEIOU (A)	GOOD	NO	POOR	nitrate ( argiculture),	NO
6	EL0700052	SPERCHEIOU (B)	GOOD	NO	GOOD		NO
7	EL0700060	YPATIS-KALLIDROMOU	GOOD	YES	GOOD	Local salinization	NO
8	EL0700070	KNIMIDAS	GOOD	NO	GOOD	Local salinization	NO
9	EL0700080	ATALANTIS	GOOD	NO	GOOD	Local salinization	NO
10	EL0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GOOD	NO	GOOD	nitrate ( argiculture),	NO

Ministry of Environment & Energy, Special Secretariat For Water  
1<sup>st</sup> Update of River Basin Management Plans – River Basin District of Eastern Central Greece (EL 07)

No	WB CODE	WB NAME	Quantitative status	Decline water levels Trend	Chemical status	Quality Issues	Pollutant Trend
11	EL0700100	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	 GOOD	NO	 GOOD		NO
12	EL0700110	MALESINAS	 POOR	-	 GOOD	overexploitation, coastal zone salinization	-
13	EL0700120	GIONAS	 GOOD	-	 GOOD	Local salinization	-
14	EL0700130	AMFISSAS	 POOR	YES	 POOR	salinization, overexploitation, declining water level, heavy metals (industry)	NO
15	EL0700140	GRAVIAS	 GOOD	YES	 GOOD	declining water level	-
16	EL0700150	PARNASOU	 GOOD	NO	 GOOD	Local salinization	-
17	EL0700160	DISTOMOU	 GOOD	-	 GOOD		-
18	EL0700170	ELIKONA	 GOOD	NO	 GOOD		-
19	EL0700181	KATO ROU VOIOTIKOU KYFISSOU (A)	 GOOD	-	 POOR	nitrate ( argiculture),	-
20	EL0700182	KATO ROU VOIOTIKOU KYFISSOU (B)	 GOOD	-	 GOOD		-
21	EL0700190	YLIKIS-PARALIMNIS	 GOOD	NO	 GOOD		-
22	EL0700200	YPATOU	 GOOD	NO	 GOOD	Local salinization	NO
23	EL0700210	THIVON-ASSOPOU-SCHIMATARIOU	 GOOD	-	 POOR	nitrate ( argiculture),, heavy metals (industry)	NO
24	EL0700220	SKOURTON-AG. THOMA	 GOOD	NO	 GOOD	Local salinization	-
25	EL0700230	ANTIKIRAS-KITHAIRONA LICHADAS	 GOOD	-	 GOOD	Local salinization Industrial activity	-
26	EL0700240	LICHADAS	 GOOD	-	 GOOD	Local salinization	-
27	EL0700250	TELETHRIOU OROUS-EDIPSOU	 POOR	-	 GOOD	overexploitation	-
28	EL0700260	ISTIAIAS-LIMNIS	 GOOD	NO	 GOOD		-
29	EL0700270	VASILIKON-NILEA	 GOOD	-	 GOOD		-
30	EL0700280	MANTOUDIOU	 GOOD	NO	 GOOD		NO
31	EL0700290	DIRFYOS	 GOOD	NO	 GOOD		NO
32	EL0700300	POLITIKON-PSACHNON	 GOOD	NO	 POOR	nitrate ( argiculture),, sewage), heavy metals (industry)	NO
33	EL0700310	CHALKIDAS-ERETRIAS	 GOOD	YES	 GOOD	Local salinization	NO
34	EL0700320	VATHEIAS-XIROVOUNIOU	 POOR	-	 GOOD	Overexploitation	-
35	EL0700330	SETAS	 GOOD	-	 GOOD		NO
36	EL0700340	KYMIS-ALIVERIOU	 GOOD	-	 GOOD		-
37	EL0700350	DYSTOU-NOTIAS EVOIAS	 GOOD	-	 GOOD	Local salinization	-
38	EL0700360	OCHIS	 GOOD	-	 GOOD		NO
39	EL0700370	SKYROU	 GOOD	-	 GOOD	Local salinization	-
40	EL0700380	SKIATHOU	 GOOD	-	 GOOD	Local salinization	-
41	EL0700390	SKOPELOU	 GOOD	-	 GOOD	Local salinization	-
42	EL0700400	ALONISSOU	 GOOD	-	 GOOD	Local salinization	-
43	EL0700410	ISLANDS KYRA, PANAGIA, GIOURA	 GOOD	-	 GOOD	Salinization	-

## 6. STATUS OF WATER BODIES

### 6.1 SURFACE WATER BODIES (SWB)

Table 6-1: Status of River WB and progress from the 1<sup>st</sup> RBMP

WB CODE	WB NAME	ECOLOGICAL STATUS / POTENTIAL		CHEMICAL STATUS	
		1st RBMP	1 <sup>st</sup> Update of RBMP	1st RBMP	1 <sup>st</sup> Update of RBMP
SPERCHEIOS RB (EL0718)					
EL0718R000100071N	DRISTELORREMA	Good	Moderate	Good	Good
EL0718R000200049N	SPERCHEIOS P. (ALAMANA) 1	Poor	Moderate	Poor	Good
EL0718R000200050N	SPERCHEIOS P. (ALAMANA) 2	Poor	Moderate	Poor	Good
EL0718R000200058N	SPERCHEIOS P. (ALAMANA) 5	Poor	Moderate	Good	Unknown
EL0718R000200061N	SPERCHEIOS P. (ALAMANA) 6	Moderate	Good	Good	Good
EL0718R000200064N	SPERCHEIOS P. (ALAMANA) 7	Good	Moderate	Unknown	Unknown
EL0718R000202051N	ASOPOS P. 1	Poor	Bad	Unknown	Good
EL0718R000202052N	ASOPOS P. 2	Unknown	Good	Unknown	Good
EL0718R000204053A	SPERCHEIOS P. (ALAMANA) 3	Poor	Unknown	Unknown	Good
EL0718R000204054A	TAFROS LAMIAS 1	Bad	Unknown	Unknown	Unknown
EL0718R000204055N	XERIAS R.	Unknown	Good	Unknown	Good
EL0718R000204056A	TAFROS LAMIAS 2	Bad	Unknown	Unknown	Good
EL0718R000204057A	SPERCHEIOS P. (ALAMANA) 4	Moderate	Poor	Unknown	Good
EL0718R000208062N	KRITHARORREMA 1	Moderate	Good	Good	Good
EL0718R000208063N	KRITHARORREMA 2	Good	Moderate	Good	Good
EL0718R000300072N	SAPOUNORREMA 1	Unknown	Poor	Unknown	Good
EL0718R000300073N	SAPOUNORREMA 2	Unknown	Moderate	Unknown	Good
EL0718R000500075N	REMATIA 1	Moderate	Moderate	Unknown	Good
EL0718R000500076N	REMATIA 2	Unknown	Moderate	Unknown	Good
EL0718R000700078N	LATZORREMA	Moderate	Unknown	Unknown	Unknown
EL0718R000904082N	VISTRITSA R. 1	Good	High	Good	Good
EVVOIA RB (EL0719)					
EL0719R000100009N	MESAPIOS R. 1	Bad	Good	Unknown	Good
EL0719R000100010N	MESAPIOS R. 2 – MAKRYMALIS R.	Unknown	Moderate	Unknown	Good
EL0719R000100011N	MESAPIOS R. 3	Bad	Moderate	Unknown	Unknown
EL0719R000204007N	NILEFS P. 3	Good	Moderate	Unknown	Unknown
EL0719R000400008N	LIDAS P. XERIAS	Unknown	High	Unknown	Unknown
EL0719R000500013N	MELAS R.	Unknown	Good	Unknown	Good
EL0719R000700014N	MANIKIATIS R.	Good	Moderate	Unknown	Unknown
EL0719R000900015N	CHONDROS R.	Unknown	Moderate	Unknown	Good
EL0719R001300017N	MEGALO REMA	Good	Moderate	Unknown	Good
EL0719R001700019N	EVVOIA	High	Good	Good	Good
EL0719R002100021N	SARANTAPOTAMOS	Unknown	Moderate	Unknown	Good

WB CODE	WB NAME	ECOLOGICAL STATUS / POTENTIAL		CHEMICAL STATUS	
		1 <sup>st</sup> RBMP	1 <sup>st</sup> Update of RBMP	1 <sup>st</sup> RBMP	1 <sup>st</sup> Update of RBMP
EL0719R002500023N	DEMATA R.	Unknown	Moderate	Unknown	Unknown
EL0719R002700024N	XIROPOTAMOS	Good	Moderate	Good	Unknown
<b>NE PARALIA KALLIDROMOU RB (EL0722)</b>					
EL0722R000100045N	TRANI SOUDA	Good	Moderate	Unknown	Good
EL0722R000300046N	PLATANIAS R.	Unknown	Poor	Unknown	Good
EL0722R000500047N	XERIAS R.	Unknown	Moderate	Unknown	Unknown
EL0722R000700048N	ALARGINO R.	Moderate	Moderate	Unknown	Good
<b>VOIOTIKOS KIFISOS RB (EL0723)</b>					
EL0723R000000031H	KIFISOS P. (VOIOTIKOS) 5	Poor	Unknown	Poor	Unknown
EL0723R000000037N	KIFISOS P. (VOIOTIKOS) 4	Moderate	Good	Good	Good
EL0723R000000040N	KIFISOS P. (VOIOTIKOS) 3	Moderate	Good	Unknown	Unknown
EL0723R000000042N	KIFISOS P. (VOIOTIKOS) 1 – KANIANITIS R.	Good	Good	Unknown	Good
EL0723R000002032A	MELAS P. 3 (MAVROPOTAMOS)	Moderate	Unknown	Unknown	Good
EL0723R000002033H	MELAS P. 2 (MAVROPOTAMOS)	Moderate	Unknown	Unknown	Unknown
EL0723R000002034N	MELAS P. 1 (MAVROPOTAMOS)	Moderate	Good	Good	Good
EL0723R000004035N	PONTZA R.	Unknown	Moderate	Unknown	Unknown
EL0723R000006036N	ERKYNA	Poor	Poor	Good	Good
EL0723R000008038N	VATHYRREMA	Good	Moderate	Unknown	Good
EL0723R000010039N	BOGDANORREMA	Good	Moderate	Good	Good
EL0723R000012041N	KIFISOS P. (VOIOTIKOS) 2 – APOSTOLIAS R.	Good	Moderate	Unknown	Good
<b>AMFISSA RB (EL0724)</b>					
EL0724R000100029N	SKITSA R.	Poor	Unknown	Unknown	Unknown
EL0724R000300030N	KATAFYGI R.	Unknown	Moderate	Unknown	Unknown
<b>ASOPOS RB (EL0725)</b>					
EL0725R000100027N	LIVADOSTRAS R. (STRAVOPOTAMOS)	Unknown	Moderate	Unknown	Good
EL0725R000200025N	ASOPOS P.(VOURIENIS) 1	Bad	Poor	Good	Good
EL0725R000300028N	KLEISOURAS R.	Unknown	Moderate	Unknown	Good

Table 6-2: Status of lake WB and progress from the 1<sup>st</sup> RBMP

WB CODE	WB NAME	ECOLOGICAL STATUS / POTENTIAL		CHEMICAL STATUS	
		1 <sup>st</sup> RBMP	1 <sup>st</sup> Update of RBMP	1 <sup>st</sup> RBMP	1 <sup>st</sup> Update of RBMP
EL0719L000000002N	DYSTOS	Unknown	Unknown	Unknown	Good
EL0723L000000001N	PARALIMNI	Unknown	Good	Good	Good

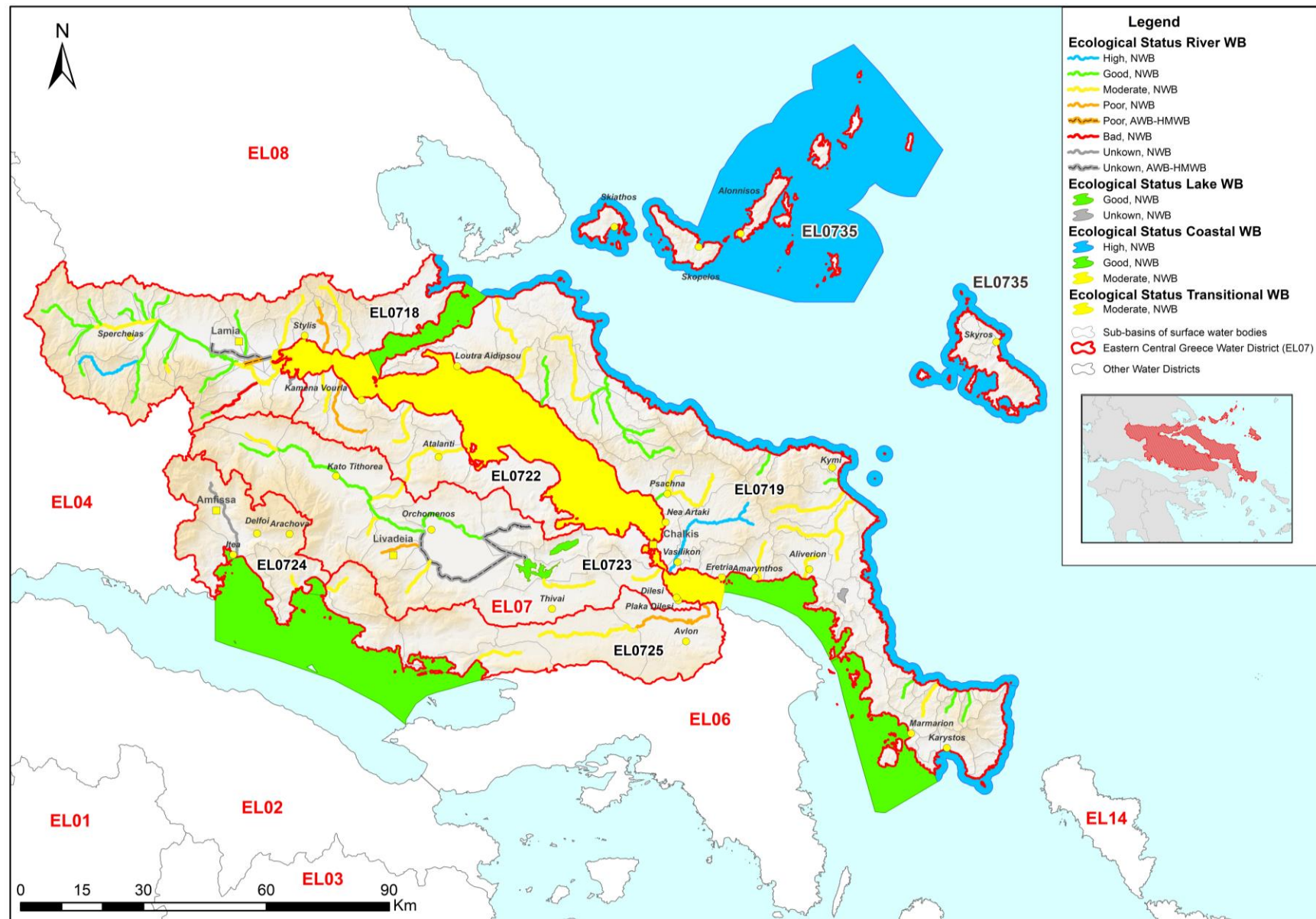
Table 6-3: Status of Transitional WB and progress from the 1<sup>st</sup> RBMP

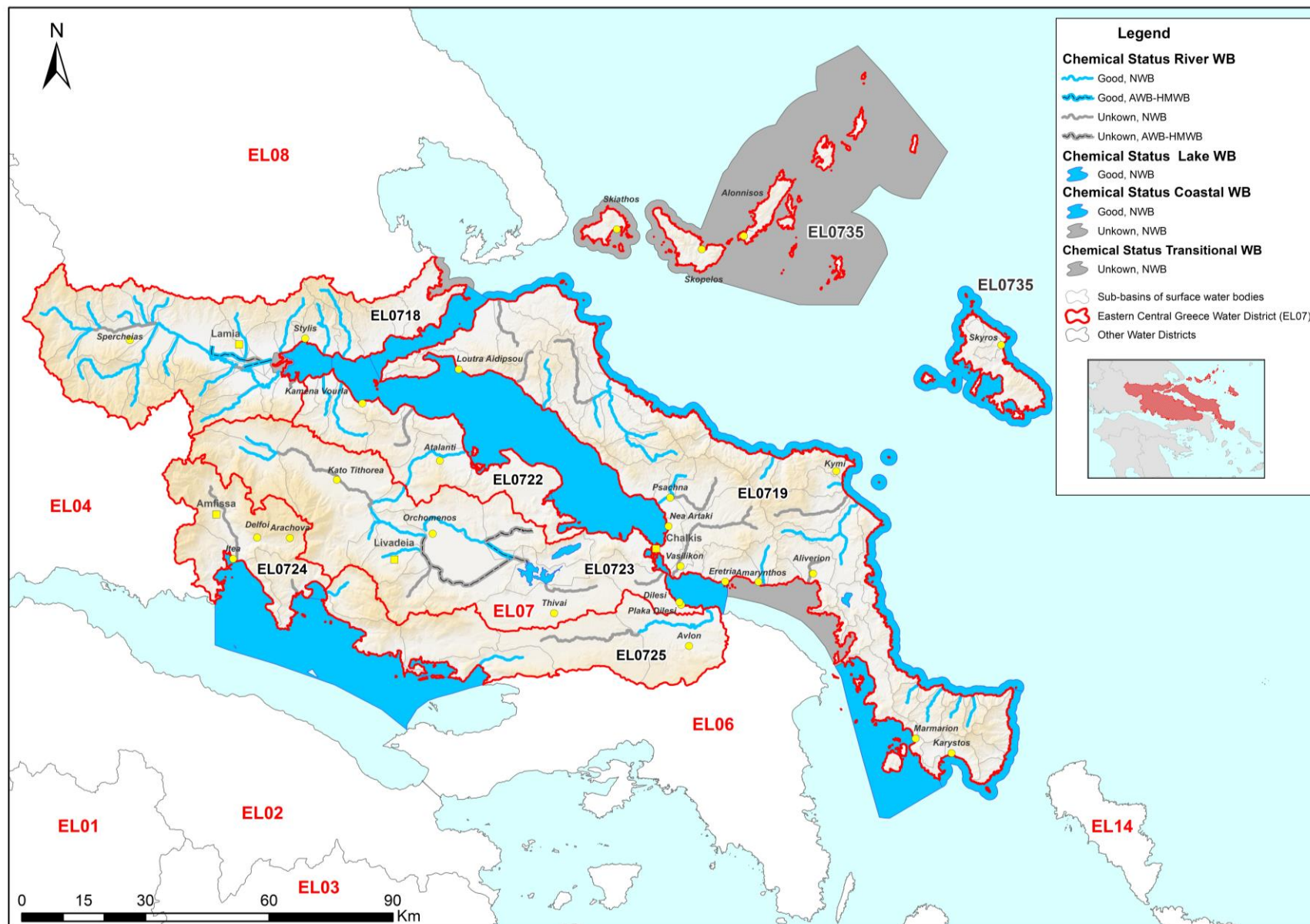
WB CODE	WB NAME	ECOLOGICAL STATUS / POTENTIAL		CHEMICAL STATUS	
		1 <sup>st</sup> RBMP	1 <sup>st</sup> Update of RBMP	1 <sup>st</sup> RBMP	1 <sup>st</sup> Update of RBMP
EL0718T0001N	DELTA SPERCHEIOU	Moderate	Moderate	Unknown	Unknown

Table 6-4: Status of Coastal WB and progress from the 1<sup>st</sup> RBMP

WB CODE	WB NAME	ECOLOGICAL STATUS / POTENTIAL		CHEMICAL STATUS	
		1st RBMP	1 <sup>st</sup> Update of RBMP	1st RBMP	1 <sup>st</sup> Update of RBMP
SPERCHEIOS RB (EL0718)					
EL0718C0005N	DIAVLOS OREON	High	Good	Unknown	Good
EL0718C0007N	MALLIAKOS KOLPOS	Moderate	Moderate	Unknown	Good
EVVOIA RB (EL0719)					
EL0719C0006N	VOREIOS EVVOIKOS KOLPOS	Moderate	Moderate	Unknown	Good
EL0719C0008N	AN. AKTES EVVOIAS	Good	High	Unknown	Good
EL0719C0009N	NISIDA 1	High	High	Unknown	Good
EL0719C0010N	NISIDA 2	High	High	Unknown	Good
EL0719C0014N	AKTES KOLPOU PETALION - STYRA	Good	Good	Unknown	Good
EL0719C0015N	KARYSTOS - N. EVVOIA	High	High	Unknown	Good
NE PARALIA KALLIDROMOU RB (EL0722)					
EL0722C0011N	KOLPOS LARYMNAS	Poor	Moderate	Unknown	Good
VOIOTIKOS KIFISOS RB (EL0723)					
EL0723C0012N	KOLPOS AVLIDAS	Moderate	Moderate	Unknown	Good
AMFISSA RB (EL0724)					
EL0724C0016N	ORMOS ITEAS	Moderate	Good	Unknown	Good
EL0724C0017N	ORMOS ANTIKYRAS	Moderate	Good	Unknown	Good
ASOPOS RB (EL0725)					
EL0725C0018N	ORMOS DOMVRINAS	Good	Good	Unknown	Good
EL0725C0019N	KORINTHIAKOS KOLPOS - VOIOTIA	Good	Good	Unknown	Good
SPORADES RB (EL0735)					
EL0735C0003N	AKTES SKYROU	High	High	Unknown	Good

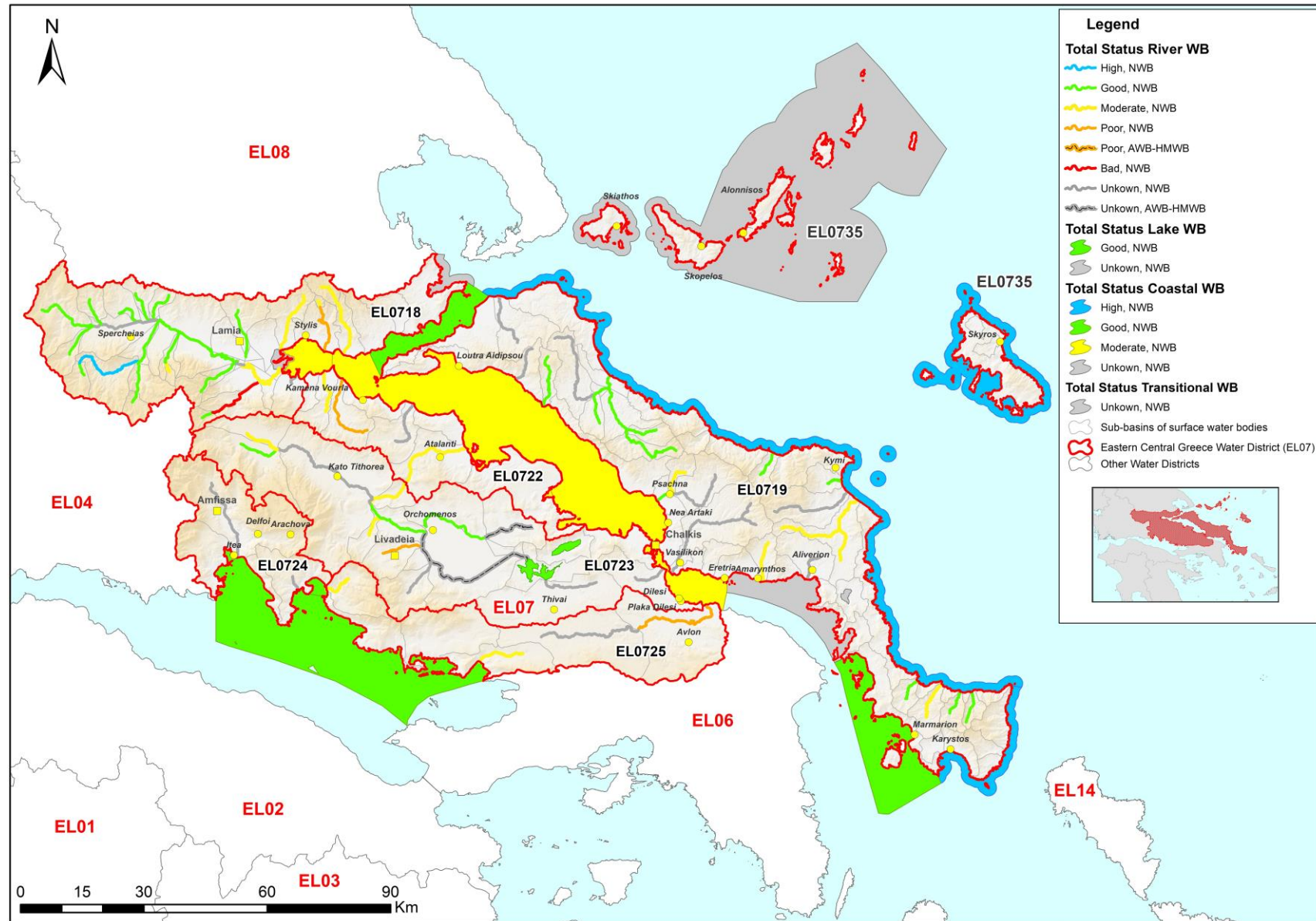






Map 8: Chemical status of SWB of the RBD of Eastern Central Greece (EL07)





Map 9: Total status of SWB of the RBD of Eastern Central Greece (EL07)

## 6.2 GROUNDWATER BODIES (GWB)

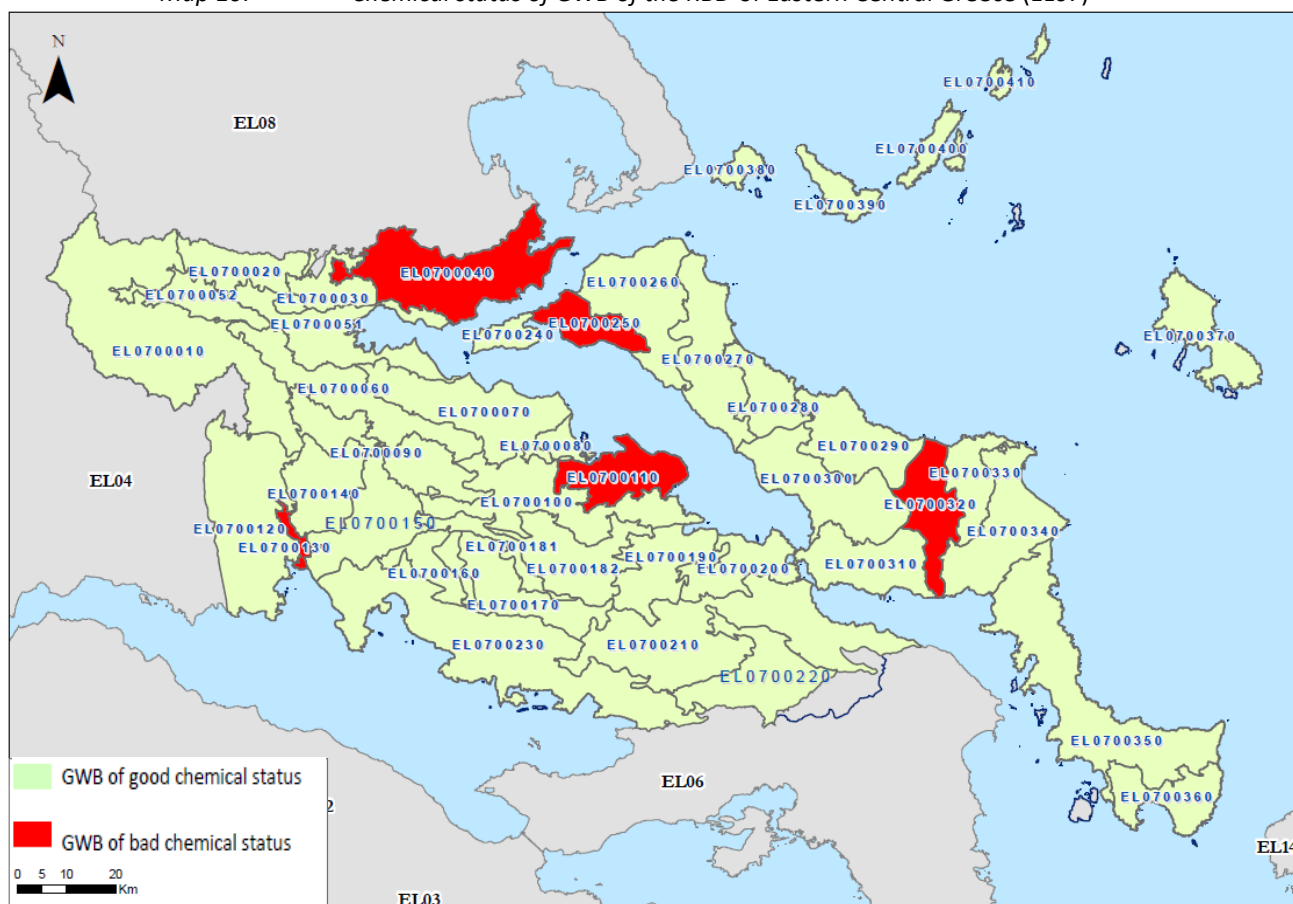
Table 6-5: Status of GWB and progress from the 1st RBMP

1 <sup>st</sup> RBMP				1 <sup>st</sup> Update of RBMP			
GWB Code	GWB Name	Status		GWB Code	GWB Name	Status	
		Chemical	Quantitative			Chemical	Quantitative
GR0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GOOD	GOOD	EL0700010	ANATOLIKOU TIMFRISTOU-VISTRITSAS-IT IS	GOOD	GOOD
GR0700020	ZILEUTOU-MOSCHOKARIAS	GOOD	GOOD	EL0700020	ZILEUTOU-MOSCHOKARIAS	GOOD	GOOD
GR0700030	LAMIAS-STYLIDAS	GOOD	POOR	EL0700030	LAMIAS-STYLIDAS	GOOD	GOOD
GR0700040	PELASGIAS	GOOD	GOOD	EL0700040	PELASGIAS	GOOD	POOR
GR0700050	SPERCHEIOU	POOR	POOR	EL0700051	SPERCHEIOU (A)	POOR	GOOD
				EL0700052	SPERCHEIOU (B)	GOOD	GOOD
GR0700060	YPATIS-KALLIDROMOU	GOOD	GOOD	EL0700060	YPATIS-KALLIDROMOU	GOOD	GOOD
GR0700070	KNIMIDAS	GOOD	GOOD	EL0700070	KNIMIDAS	GOOD	GOOD
GR0700080	ATALANTIS	POOR	POOR	EL0700080	ATALANTIS	GOOD	GOOD
GR0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GOOD	GOOD	EL0700090	ANO KAI MESO ROU VOIOTIKOU KYFISSOU	GOOD	GOOD
GR0700100	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	GOOD	GOOD	EL0700100	KALAPODIOU-KASTROU-ORCHOMENOU-VASILIKON	GOOD	GOOD
GR0700110	MALESINAS	GOOD	POOR	EL0700110	MALESINAS	GOOD	POOR
GR0700120	GIONAS	GOOD	GOOD	EL0700120	GIONAS	GOOD	GOOD
GR0700130	AMFISSAS	POOR	POOR	EL0700130	AMFISSAS	POOR	POOR
GR0700140	GRAVIAS	GOOD	GOOD	EL0700140	GRAVIAS	GOOD	GOOD
GR0700150	PARNASOU	GOOD	GOOD	EL0700150	PARNASOU	GOOD	GOOD
GR0700160	DISTOMOU	GOOD	GOOD	EL0700160	DISTOMOU	GOOD	GOOD
GR0700170	ELIKONA	GOOD	GOOD	EL0700170	ELIKONA	GOOD	GOOD
GR0700180	KATO ROU VOIOTIKOU KYFISSOU	POOR	GOOD	EL0700181	KATO ROU VOIOTIKOU KYFISSOU (A)	POOR	GOOD
				EL0700182	KATO ROU VOIOTIKOU KYFISSOU (B)	GOOD	GOOD
GR0700190	YLIKIS-PARALIMNIS	GOOD	GOOD	EL0700190	YLIKIS-PARALIMNIS	GOOD	GOOD
GR0700200	YPATOU	GOOD	GOOD	EL0700200	YPATOU	GOOD	GOOD
GR0700210	THIVON-ASSOPOU-SCHIMATARIOU	POOR	GOOD	EL0700210	THIVON-ASSOPOU-SCHIMATARIOU	POOR	GOOD
GR0700220	SKOURTON-AG. THOMA	GOOD	GOOD	EL0700220	SKOURTON-AG. THOMA	GOOD	GOOD
GR0700230	ANTIKIRAS-KITHAIRONA LICHADAS	GOOD	GOOD	EL0700230	ANTIKIRAS-KITHAIRONA LICHADAS	GOOD	GOOD
GR0700240	LICHADAS	GOOD	GOOD	EL0700240	LICHADAS	GOOD	GOOD
GR0700250	TELETHRIOU OROUS-EDIPSOU	GOOD	GOOD	EL0700250	TELETHRIOU OROUS-EDIPSOU	GOOD	POOR
GR0700260	ISTIAIAS-LIMNIS	GOOD	GOOD	EL0700260	ISTIAIAS-LIMNIS	GOOD	GOOD
GR0700270	VASILIKON-NILEA	GOOD	GOOD	EL0700270	VASILIKON-NILEA	GOOD	GOOD
GR0700280	MANTOUDIOU	GOOD	GOOD	EL0700280	MANTOUDIOU	GOOD	GOOD
GR0700290	DIRFYOS	GOOD	GOOD	EL0700290	DIRFYOS	GOOD	GOOD
GR0700300	POLITIKON-PSACHNON	POOR	GOOD	EL0700300	POLITIKON-PSACHNON	POOR	GOOD

1 <sup>st</sup> RBMP				1 <sup>st</sup> Update of RBMP			
GWB Code	GWB Name	Status		GWB Code	GWB Name	Status	
		Chemical	Quantitative			Chemical	Quantitative
GR0700310	CHALKIDAS-ERETRIAS	GOOD	GOOD	EL0700310	CHALKIDAS-ERETRIAS	GOOD	GOOD
GR0700320	VATHEIAS-XIROVOUNIOU	GOOD	GOOD	EL0700320	VATHEIAS-XIROVOUNIOU	GOOD	POOR
GR0700330	SETAS	GOOD	GOOD	EL0700330	SETAS	GOOD	GOOD
GR0700340	KYMIS-ALIVERIOU	GOOD	GOOD	EL0700340	KYMIS-ALIVERIOU	GOOD	GOOD
GR0700350	DYSTOU-NOTIAS EVOIAS	GOOD	GOOD	EL0700350	DYSTOU-NOTIAS EVOIAS	GOOD	GOOD
GR0700360	OCHIS	GOOD	GOOD	EL0700360	OCHIS	GOOD	GOOD
GR0700370	VORIAS SKYROU	GOOD	GOOD	EL0700370	SKYROU	GOOD	GOOD
GR0700380	NOTIAS SKYROU	GOOD	GOOD				
GR0700390	VORIAS SKIATHOU	GOOD	GOOD	EL0700380	SKIATHOU	GOOD	GOOD
GR0700400	NOTIAS SKIATHOU	GOOD	GOOD				
GR0700410	GLOSSAS SKOPELOU	GOOD	GOOD	EL0700390	SKOPELOU	GOOD	GOOD
GR0700420	ELIOU SKOPELOU	GOOD	GOOD				
GR0700430	ALONISSOU	GOOD	GOOD	EL0700400	ALONISSOU	GOOD	GOOD
GR0700440	NISOU PERISTERAS	GOOD	GOOD				
GR0700450	ISLAND KYRA PANAGIA	GOOD	GOOD	EL07004140	ISLANDS KYRA, PANAGIA, GIOURA	GOOD	GOOD
GR0700460	ISLAND GIOURA	GOOD	GOOD				



Map 10: Chemical status of GWB of the RBD of Eastern Central Greece (EL07)



Map 11: Quantitative status of GWB of the RBD of Eastern Central Greece (EL07)



## 7. ECONOMIC ANALYSIS OF WATER USE

### 7.1 FINANCIAL COST OF WATER SERVICES

#### 7.1.1 Water services for water supply and waste collection and treatment facilities

Table 7-1: Water / Sewerage service providers in the RB's of the Eastern Central Greece RBD (EL07)

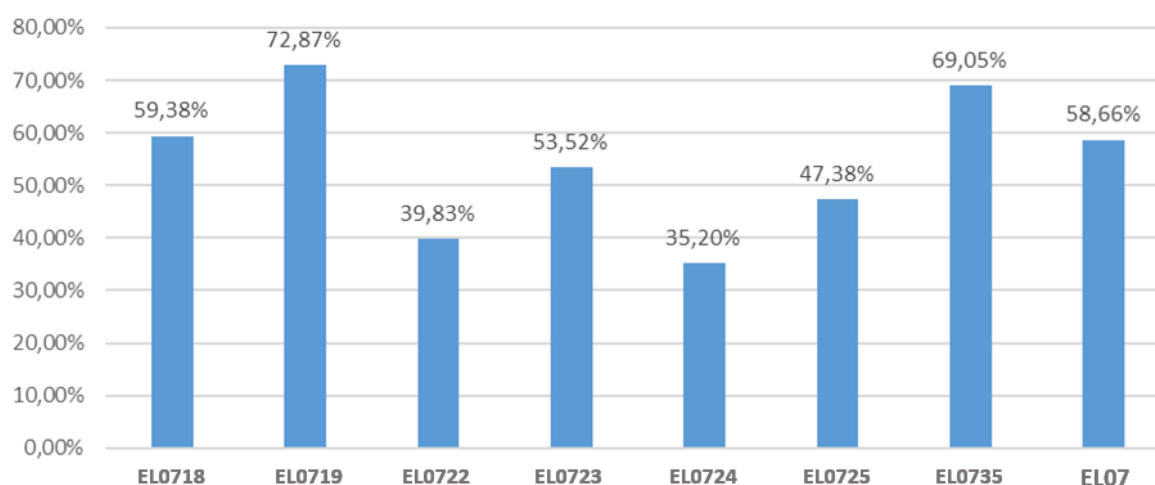
RB	PROVIDER
SPERCHEIOS (EL0718)	DEYA Almiros
	DEYA Lamia
	Municipality Makrakomi
	Municipality Molou Ag Konstantinou
	Municipality Stilida
	Municipality Delfoi
EVVOIA (EL0719)	DEYA Eretria
	DEYA Halkideon
	DEYA Kymis - Aliveri
	DEYA Mantoudiou – Limnis – Ag. Annas
	Municipality Dirfion – Messapion
	Municipality Karystou
	Municipality Istieas – Aidipsou
NE PARALIA KALLIDROMOU (EL0722)	DEYA Chalkideon
	Municipality Orchomenou
	Municipality Amfikleias
	Municipality Molos Ag Konstantinos
	Municipality Lokron
VOIOTIKOS KIFISOS (EL0723)	DEYA Thivas
	DEYA Levadeon
	DEYA Chalkideon
	Municipality Aliartou Thespieon
	Municipality Amfiklias Elatias
	Municipality Distomou Arahovas – Antikyrras
	Municipality Tanagras
	Municipality Orchomenou
	Municipality Lokron
	Municipality Delfon
AMFISSA (EL0724)	Municipality Distomou Arahovas – Antikyrras
	Municipality Delfon
ASOPOS (EL0725)	DEYA Thivas
	DEYA Levadeon
	Municipality Tanagras
	Municipality Aliartou Thespieon
	Municipality Mandras-Idilias
	Municipality Distomou Arahovas – Antikyrras
	Municipality Oropou
SPORADES (EL0735)	DEYA Skiathou
	DEYA Skopelou
	Municipality Skyrou
	Municipality Alonnisou



Table 7-2: Financial Cost Recovery for Water Supply

RB	Total Financial Cost (€)	Average Financial Cost (€/m <sup>3</sup> )	Total Revenues (€)	Average Revenues (€/m <sup>3</sup> )	Financial Cost Recovery
Spercheios (EL0718)	9.991.852	1,09	5.932.869	0,64	59,38%
Evvoia (EL0719)	20.717.839	0,92	15.097.784	0,67	72,87%
NE Paralia Kallidromou (EL0722)	3.452.576	0,94	1.375.043	0,38	39,83%
Voiotikos Kifisos (EL0723)	18.117.459	1,09	9.695.711	0,58	53,52%
Amfissa (EL0724)	3.447.148	1,17	1.213.375	0,41	35,20%
Asopos (EL0725)	8.781.742	1,10	4.160.591	0,52	47,38%
Sporades (EL0735)	3.506.574	2,98	2.421.189	2,06	69,05%
<b>Total RBD EL07</b>	<b>68.015.190</b>	<b>1,06</b>	<b>39.896.562</b>	<b>0,62</b>	<b>58,66%</b>

Figure 7-1: Financial Cost Recovery for Water Supply



### 7.1.2 Water services for irrigation/ rural use

Table 7-3: Water service providers for irrigation/ rural use

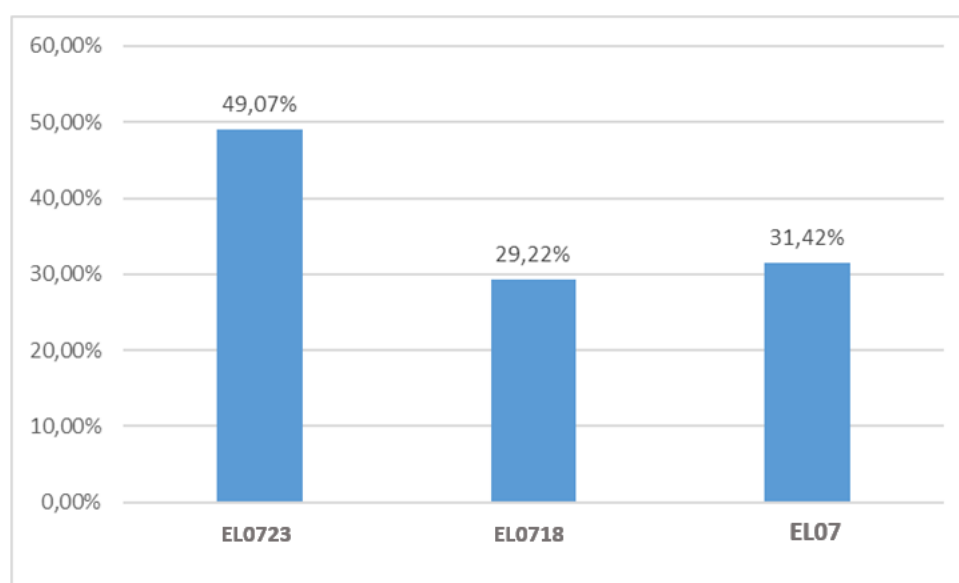
RB	PROVIDER
Voiotikos Kifisos (EL0723)	TOEB Livadia – Lafistiou
	TOEB Karamousas Heronias
	TOEB Tsotras – Trizinikos (Chrissou)
	TOEB Gravias
	ex. Kopaida Organization
	Municipality Levadeon
	Municipality Amfiklias Elatias
	Municipality Lokron
	Municipality Orchomenou
NE Paralia Kallidromou (EL0722)	TOEB Skripous - Orchomenou
	ex. Kopaida Organization
	Municipality Lokron
	Municipality Amfiklias Elatias
Evvoia (EL0719)	TOEB Istieas
	TOEB Madoudiou
	TOEB Psachnon
	Municipality Dirfion – Messapion
Asopos (EL0725)	ex. Kopaida Organization

RB	PROVIDER
Spercheios (EL0718)	TOEB Anthilis
	TOEB Fakitsas
	TOEB Meg Vrisi – Roditsas – Avlakiou
	TOEB Damastas
	TOEB Thermopilon
	TOEB Mexiaton
	TOEB Moschohoriou
	TOEB Sikas
	TOEB Frantzi
	TOEB Amouriou – Lianokladiou – Zileftoy
	TOEB Vistrizas
	Municipality Stilidas
Amfissa (EL0724)	TOEB Amfissas
	TOEB Tsotras – Trizinikos (Chrissou)
	TOEB Gravias

Table 7-4: Financial Cost Recovery for irrigation/ rural use

RB	Total Financial Cost (€)	Average Financial Cost (€/m <sup>3</sup> )	Total Revenues (€)	Average Revenues (€/m <sup>3</sup> )	Financial Cost Recovery
EL0723 (Voiotikos Kifisos RB)	198.469	0,084	97.383	0,041	49,07%
EL0718 (Spercheios RB)	1.591.325	0,045	465.016	0,013	29,22%
<b>Total RBD EL07</b>	<b>1.789.794</b>	<b>0,048</b>	<b>562.399</b>	<b>0,015</b>	<b>31,42%</b>

Figure 7-2: Financial Cost Recovery for irrigation/ rural use



### 7.1.3 Water supply services for industrial use

In EL07, the industrial use is covered by the water supply providers from the (general/urban) water supply, and the corresponding financial cost is incorporated into the water supply services. Respectively, the cost recovery of water services for industrial use is not differentiated from the cost recovery from the (general/urban) water supply services.



## 7.2 ENVIRONMENTAL AND RESOURCE COST

### 7.2.1 Environmental Cost

The environmental costs at RBD and RB level are € **675,520**. The annual unit environmental cost at per RB is shown in the following table.

Table 7-5: Distribution of Environmental Cost per Water Use

Environmental cost	Drinking water supply	Irrigation	livestock breeding	Industry	Total
<b>RB Spercheios (EL0718)</b>					
Total costs for all years of measures implementation (€)	7.778	98.092	523	1.989	<b>108.381</b>
Annual cost per use (€)	1.944	24.523	131	497	<b>27.095</b>
Participation use (%) in total annual cost	7,2%	90,5%	0,5%	1,8%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00013	0,00013	0,00013	0,00013	<b>0,00013</b>
<b>RB Evvoia (EL0719)</b>					
Total costs for all years of measures implementation (€)	15.651	61.642	2.464	2.085	<b>81.843</b>
Annual cost per use (€)	3.913	15.411	616	521	<b>20.461</b>
Participation use (%) in total annual cost	19,1%	75,3%	3,0%	2,5%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00014	0,00014	0,00014	0,00014	<b>0,00014</b>
<b>RB NE Paralia Kallidromou (EL0722)</b>					
Total costs for all years of measures implementation (€)	1.064	25.222	128	124	<b>26.538</b>
Annual cost per use (€)	266	6.306	32	31	<b>6.635</b>
Participation use (%) in total annual cost	4,0%	95,0%	0,5%	0,5%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00006	0,00006	0,00006	0,00006	<b>0,00006</b>
<b>RB Voiotikos Kifisos (EL0723)</b>					
Total costs for all years of measures implementation (€)	3.180	65.254	356	2.437	<b>71.227</b>
Annual cost per use (€)	795	16.313	89	609	<b>17.807</b>
Participation use (%) in total annual cost	4,5%	91,6%	0,5%	3,4%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00005	0,00005	0,00005	0,00005	<b>0,00005</b>
<b>RB Amfissa (EL0724)</b>					
Total costs for all years of measures implementation (€)	10.302	56.431	794	624	<b>68.150</b>
Annual cost per use (€)	2.575	14.108	198	156	<b>17.038</b>
Participation use (%) in total annual cost	15,1%	82,8%	1,2%	0,9%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00066	0,00066	0,00066	0,00066	<b>0,00066</b>
<b>RB Asopos (EL0725)</b>					
Total costs for all years of measures implementation (€)	9.346	104.008	3.338	192.074	<b>308.766</b>
Annual cost per use (€)	2.336	26.002	834	48.019	<b>77.191</b>
Participation use (%) in total annual cost	3,0%	33,7%	1,1%	62,2%	<b>100,0%</b>

Environmental cost	Drinking water supply	Irrigation	livestock breeding	Industry	Total
Annual unity cost per use (€/m <sup>3</sup> )	0,00038	0,00038	0,00038	0,00607	<b>0,00091</b>
<b>RB Sporades (EL0735)</b>					
Total costs for all years of measures implementation (€)	7.271	2.584	758	2	<b>10.615</b>
Annual cost per use (€)	1.818	646	189	1	<b>2.654</b>
Participation use (%) in total annual cost	68,5%	24,3%	7,1%	0,0%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00076	0,00076	0,00076	0,00076	<b>0,00076</b>

With the exception of Sporades RB and Asopos RB, in the other, the environmental costs are much higher in irrigation than drinking water supply. In RB Sporades the costs are mainly for the drinking water supply, while at RB Asopos the Industry.

## 7.2.2 Resource cost

Resource cost at RBD level is **537.675 €**. The annual unit environmental cost at per RB is shown in the following table.

Table 7-6: Distribution of Resource Costs per Water Uses

Resource cost	Households/Water Supply	Irrigation/Agriculture	Livestock breeding	Industry	Total
<b>RB Spercheios (EL0718)</b>					
Total costs for all years of PoM implementation (€)	541	6.820	36	138	<b>7.535</b>
Annual cost per use (€)	135	1.705	9	35	<b>1.884</b>
Participation use (%) in total annual cost	7,2%	90,5%	0,5%	1,8%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00001	0,00001	0,00001	0,00001	<b>0,00001</b>
<b>RB Evvoia (EL0719)</b>					
Total costs for all years of PoM implementation (€)	2.882	179.623	7.181	384	<b>190.070</b>
Annual cost per use (€)	720	44.906	1.795	96	<b>47.517</b>
Participation use (%) in total annual cost	1,5%	94,5%	3,8%	0,2%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00003	0,00041	0,00041	0,00003	<b>0,00033</b>
<b>RB NE Paralia Kallidromou (EL0722)</b>					
Total costs for all years of PoM implementation (€)	302	7.161	36	35	<b>7.535</b>
Annual cost per use (€)	76	1.790	9	9	<b>1.884</b>
Participation use (%) in total annual cost	4,0%	95,0%	0,5%	0,5%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00002	0,00002	0,00002	0,00002	<b>0,00002</b>
<b>RB Voiotikos Kifisos (EL0723)</b>					
Total costs for all years of PoM implementation (€)	0	74.593	407	0	<b>75.000</b>
Annual cost per use (€)	0	18.648	102	0	<b>18.750</b>
Participation use (%) in total annual cost	0,0%	99,5%	0,5%	0,0%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00000	0,00005	0,00005	0,00000	<b>0,00005</b>

Resource cost	Households/Water Supply	Irrigation/Agriculture	Livestock breeding	Industry	Total
<b>RB Amfissa (EL0724)</b>					
Total costs for all years of PoM implementation (€)	1.139	178.812	2.515	69	<b>182.535</b>
Annual cost per use (€)	285	44.703	629	17	<b>45.634</b>
Participation use (%) in total annual cost	0,6%	98,0%	1,4%	0,0%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00007	0,00211	0,00211	0,00007	<b>0,00178</b>
<b>RB Asopos (EL0725)</b>					
Total costs for all years of PoM implementation (€)	0	0	0	0	<b>0</b>
Annual cost per use (€)	0	0	0	0	<b>0</b>
Participation use (%) in total annual cost	0	0	0	0	<b>0</b>
Annual unity cost per use (€/m <sup>3</sup> )	0	0	0	0	<b>0</b>
<b>RB Sporades (EL0735)</b>					
Total costs for all years of PoM implementation (€)	0	57.990	17.010	0	<b>75.000</b>
Annual cost per use (€)	0	14.498	4.252	0	<b>18.750</b>
Participation use (%) in total annual cost	0,0%	77,3%	22,7%	0,0%	<b>100,0%</b>
Annual unity cost per use (€/m <sup>3</sup> )	0,00000	0,01700	0,01700	0,00000	<b>0,00535</b>

In all RBs the Resource cost is due mostly to the Irrigation.

## 8. ENVIRONMENTAL OBJECTIVES – EXEMPTIONS

The environmental objectives set for the 104 SWBs of the RBD until 2021 are presented in the following table:

Table 8-1: SWB Environmental objectives by 2021

Environmental Objective	Count of SWB
Maintain good / high ecological status/potential	52
Maintain good chemical status	78
Achieve good ecological status	43
Achieve good chemical status	0
Identify ecological status/potential	9
Determine the chemical status	26
Exemption Article 4.4 (Deadline extension)	58
Exemption Article 4.5 (Less strict environmental objectives)	0
Exemption Article 4.6 (Temporary deterioration)	0
Exemption Article 4.7 (New modifications)	0

The environmental objectives set for the 43 GWB of the RBD by 2021 are presented in the following table:

Table 8-2: Environmental objectives of GWB by 2021

Environmental Objective	Count of GWB
Maintain good quantitative status	34 and 4 Subsystems
Maintain good chemical status	36 and 2 Subsystems
Achieve good quantitative status	5
Achieve good chemical status	3 and 2 Subsystems
Exemption Article 4.4 (Deadline extension)	7 and 2 Subsystems
Exemption Article 4.5 (Less strict environmental objectives)	0
Exemption Article 4.6 (Temporary deterioration)	0
Exemption Article 4.7 (New modifications)	0

### 8.1 DEADLINE EXTENSION (ARTICLE 4.4 DIRECTIVE 2000/60/EC)

Table 8-3: WB exemptions 2021

	EXEMPTIONS		Count of WB
	CATEGORY	SUB-CATEGORY	
SWB Ecological status	Article 4.4 (Deadline extension)	It takes longer to fix the problem than there is time available	1 River HMWB, 37 River WB, 1 Transitional and 4 Coastal WB
SWB Ecological status	Article 4.4 (Deadline extension)	There is no information on the cause of the problem so the solution cannot be identified	6 River HMWB, 2 River WB and 1 lake WB
SWB Chemical status	Article 4.4 (Deadline extension)	There is no information on the cause of the problem so the solution cannot be identified	3 River HMWB, 18 River WB, 1 Transitional and 4 Coastal WB
GWB Quantitative Status	Article 4.4 (Deadline extension)	It takes longer to fix the problem than there is time available	5 GWB
GWB Chemical Status	Article 4.4 (Deadline extension)	It takes longer to fix the problem than there is time available	3 GWB and 2 Subsystem

## **8.2 LESS STRICT ENVIRONMENTAL OBJECTIVES (ARTICLE 4.5 DIRECTIVE 2000/60/EC)**

In the present Update of RBMP, no less strict environmental objectives are set for any GWB or SWB. This exemption category will be reviewed in the next Update of RBMP, taking into consideration the new monitoring data and after evaluating technically feasible measures.

## **8.3 TEMPORARY DETERIORATION (ARTICLE 4.6 DIRECTIVE 2000/60/EC)**

In the present Update of RBMP, no temporary deterioration is foreseeing for any GWB or SWB. This exemption category will be reviewed in the next Update of RBMP, taking into consideration the new monitoring data and after evaluating technically feasible measures.

## **8.4 NEW MODIFICATIONS (ARTICLE 4.7 DIRECTIVE 2000/60/EC)**

The 1<sup>st</sup> Update of RBMP defines the procedure for considering the potential inclusion in Article 4.7 of Directive 2000/60 / EC of water bodies affected by programmed projects.

For this purpose a specific analytical methodology has been developed, which is available on the relevant website of the Special Secretariat of Water <http://wfdver.ypeka.gr/>. The implementation procedure of Article 4.7 is set out in detail, is in force since the adoption of this Management Plan and concerns planned projects for which no environmental permit dossier has been filed or in cases where according to the existing legislation there is no requirement for approval of environmental terms, a request for authorization to build, install or operate has not been filed by the competent body, as appropriate.

## 9. PROGRAMME OF MEASURES

The Programme of Measures is part of the Management Plan and is the "mechanism" for achieving the environmental objectives set. Especially the implementation of the Programme Measure should ensure:

- the prevention of deterioration, the improvement and the remediation of surface water bodies, the achievement of "Good" ecological and chemical status, and the mitigation of the pollution through the discharge and the emission of hazardous substances.
- the protection, the improvement and the remediation of groundwater water bodies, the prevention of their pollution and the deterioration of their water status in order to balance between abstraction and discharge.
- the conservation of Protected Areas

The measures are divided into **Basic** and **Supplementary**.

The **Basic Measures**, according to par. 3 of Article 11 of the WFD are the minimum requirements that should be met and include:

- Measures for the implementation of EU and national legislation on water protection (**Group I**).
- Other basic measures (**Group II**). These basic measures are related to the basic principles of EU and national legislation on water management and relate to the horizontal implementation of actions in groups, usually, water bodies, with a view to achieving or maintaining good status in water.

The **Supplementary Measures** are the measures established and implemented in addition to the Basic Measures, in order to achieve the objectives set in accordance with Article 4 of Directive 2000/60 / EC. Member States may adopt further supplementary measures with a view to additional protection or improvement of the waters covered by the Directive.

### 9.1 PROGRESS OF IMPLEMENTATION OF THE 1<sup>ST</sup> RBMP POM

The PoM of the 1<sup>st</sup> RBMP included 37 Basic Measures.

Table 9-1: Number of Basic Measures of 1<sup>st</sup> RBMP per category of Actions

Actions concerning measures	Count of measures
Administrative acts	17
Constructions	2
Studies	5
Measures relating to administrative acts but requiring specific studies or surveys	12
Measures relating to Services / advisory actions	1
<b>Total</b>	<b>37</b>

Table 9-2: Progress of the implementation of the Basic Measures of the Program of Measures of the 1<sup>st</sup> RBMP

Category of Measures	Total number of measures	Number of measures already implemented	Number of measures in progress / under construction	Number of measures not started
Measures deemed appropriate for the purposes of Article 9 (cost recovery)	1	1	-	-
Measures to promote an efficient and sustainable water use in order to avoid compromising the achievement of the objectives specified in Article 4	6	3	3	-

Category of Measures	Total number of measures	Number of measures already implemented	Number of measures in progress / under construction	Number of measures not started
Measures to meet the requirements of Article 7 (drinking water)	7	1	6	-
Measures for the controls over the abstraction of surface water and groundwater	6	4	2	-
Measures for the controls of artificial recharge of GWB	3		3	-
Measures for point source discharges	9	4	5	-
Measures for diffuse sources liable to cause pollution	2	1	1	-
Measures for any other significant adverse impacts on the status of water	1	-	1	-
Measures for the prevention of accidental pollution incidents / extreme weather events	2	2	-	-
<b>Total</b>	<b>37</b>	<b>16</b>	<b>21</b>	<b>-</b>

In addition to the above basic measures, the program of measures of the 1<sup>st</sup> RBMP included 37 supplementary measures, covering 12 categories of measures of Directive 2000/60/EC.

Table 9-3: Progress of the implementation of the Supplementary Measures of the Program of Measures of the 1<sup>st</sup> RBMP

Category of Measures	Total number of measures	Number of measures already implemented	Number of measures in progress / under construction	Number of measures not started
Administrative measures	1	-	1	-
Negotiated environmental agreements	3	3	-	-
Emission controls	7	2	5	-
Codes of good practice	1	-	1	-
Demand management measures	2	-	2	-
Efficiency and reuse measures	1	-	1	-
Other relevant measures	2	-	2	-
Abstraction controls	4	1	3	-
Artificial recharge of aquifers	3	-	3	-
Construction projects	8	1	7	-
Educational projects	4	-	4	-
Recreation and restoration of wetlands areas	1	-	1	-
<b>Total</b>	<b>37</b>	<b>7</b>	<b>30</b>	<b>-</b>

## 9.2 PRORGAMME OF BASIC AND SUPPLEMENTARY MEASURES

### 9.2.1 Actions implementing EU Directives (Group I Basic Measures)

The planned actions for the implementation of EU Directives and National legislation for the protection of WB are presented in the following table.

Table 9-4: Actions for the implementation of EU Directives

DIRECTIVE	PLANNED ACTIONS	IMPLEMENTING BODIES
<b>Bathing water Directive (2006/7/ EC)</b>	<ul style="list-style-type: none"> <li>Continue to monitor the quality of bathing water in accordance with Directive 2006/7 / EC.</li> </ul>	Special Secretariat for Water, Directorate of Water of the Decentralized Administration
	<ul style="list-style-type: none"> <li>Updating the Greek Bathing Water Profiles Registry</li> </ul>	
<b>Habitats Directive (92/43/EEC)</b> <b>Birds Directive (2009/147/ EC)</b>	<ul style="list-style-type: none"> <li>Setting /Approval Management Plans for protected areas of Natura 2000 network relating with water management issues</li> </ul>	Ministry of Environment and Energy, Protected Areas Management Bodies
	<ul style="list-style-type: none"> <li>Monitoring/Assessment of the conservation status of habitats and species directly depending on water in Natura 2000 areas.</li> </ul>	
<b>Drinking water (Directives 98/83/ EC, 2015/1787/ EC)</b>	<ul style="list-style-type: none"> <li>Monitoring of the implementation of the Directive</li> </ul>	Ministry of Health
<b>Environmental Impact Assessment Directives (2011/92/EC, 2014/52/EC)</b>	<p>Amendment of the Ministerial Decision 170225/2014 – (Specifications for the contents of environmental permitting dossiers for projects and activities of category A) so that for certain categories of projects, which should be first specified, to make the following mandatory:</p> <ul style="list-style-type: none"> <li>Emissions of pollutants by category,</li> <li>Calculation of pollution impacts in WB defined in the Management Plans and</li> <li>Comparing these concentrations with the Environmental Quality Standards.</li> <li>Establishment of a monitoring program and notification of results to the relevant Water Directorate.</li> </ul>	Ministry of Environment and Energy
<b>Industrial Emissions Directive IED, (2010/75/EC)</b>	<ul style="list-style-type: none"> <li>Keeping registration and records of installations that are in line with the provisions of the Directive</li> </ul>	Decentralized administration
<b>Nitrates Directive (91/676/ EC)</b>	<ul style="list-style-type: none"> <li>Implementation of New Action Plans. The drafting of New Action Plans in all the vulnerable zones of the country has been entrusted by the Ministry of Rural Development and Food to the Agricultural University of Athens and is under preparation.</li> </ul>	Ministry of Rural Development and Food
	<ul style="list-style-type: none"> <li>Systematic monitoring of nitrate levels in WBs that are or may be subject to nitrate pollution.</li> </ul>	Special Secretariat for Water, Ministry of Rural Development and Food
<b>Plant Protection Products (Directive 2009/128/EK, Regulation (EU) No. 1107/2009, Regulation (EU) No. 652/2014)</b>	<ul style="list-style-type: none"> <li>Rational use of plant protection products</li> </ul>	Ministry of Rural Development and Food



DIRECTIVE	PLANNED ACTIONS	IMPLEMENTING BODIES
<b>Major Accidents (Seveso) Directive (2012/18/EC)</b>	<ul style="list-style-type: none"> <li>Keeping registration and records of installations that are in line with the provisions of the Directive</li> </ul>	Decentralized administration
<b>Sewage sludge Directive (86/278/EEC)</b>	<ul style="list-style-type: none"> <li>Setting up a Joint Ministerial Decision, on Measures, Conditions and Procedures for the Use of Sludge from Domestic and Urban Wastewater Treatment and Certain Wastewater, in compliance with the provisions of Directive 86/278 / EEC and in replacement of Joint Ministerial Decision 80568/4225 / 1991 and promotion of actions related to the safe disposal of treated sludge.</li> </ul>	Ministry of Environment and Energy
<b>Urban Waste Water Treatment Directive (91/271/EC, 98/15/ EC)</b>	<ul style="list-style-type: none"> <li>Completion of sewerage and waste water treatment projects of the settlements that concerns the provisions of the Directive (covering all agglomerations with a population greater than 2,000 p.e.).</li> </ul>	Region, MEWSS, Municipalities
	<ul style="list-style-type: none"> <li>Strengthening actions to control the effective operation of existing wastewater treatment and drainage projects.</li> </ul>	Region

## 9.2.2 Basic Measures of other categories (Group II Basic Measures)

Table 9-5: Basic measures of other categories

CODE - NAME OF MEASURE	CATEGORY	1 <sup>st</sup> RBMP	IMPLEMENTING BODIES
<b>M07B0201</b> Upgrading of the organizational function of organizations of land reclamation for the compliance with the financial and other data in order to meet the requirements of the Joint Ministerial Decision 132275/19.05.2017 (Government Gazette 1751 B'/22.05.2017) of the National Water Committee, which deals with pricing and costing rules for water supply services	Measures to implement the cost recovery principle (Art. 9)	NEW MEASURE	Organization of Land reclamation (Local, General) / Region / Ministry of Environment & Energy (Special Secretariat for Water) /Ministry of Rural Development & Food
<b>M07B0202</b> Upgrade of the organizational function of MEWSS for the compliance with the financial and other data in order to meet the requirements of the Joint Ministerial Decision 132275/19.05.2017 (Government Gazette 1751 B'/22.05.2017) of the National Water Committee, which deals with pricing and costing rules for water supply services.	Measures to implement the cost recovery principle (Art. 9)	NEW MEASURE	MEWSS / Ministry of Environment & Energy (Special Secretariat for Water) / Ministry of Interior
<b>M07B0203</b> Upgrading of the organizational function of the Local Government Organizations for the compliance with the financial and other data in order to meet the requirements of the Joint Ministerial Decision 132275/19.05.2017 (Government Gazette 1751 B'/22.05.2017) of the National Water Committee, which deals with pricing and costing rules for water supply services.	Measures to implement the cost recovery principle (Art. 9)	NEW MEASURE	Local Government Organizations / Ministry of Environment & Energy (Special Secretariat for Water) / Ministry of Interior

CODE - NAME OF MEASURE	CATEGORY	1 <sup>st</sup> RBMP	IMPLEMENTING BODIES
<b>M07B0204</b> Training and expertise of all the stakeholders (Decentralized Administrations, Regions, MEWSS, LOLR, Local Government Organizations of the Joint Ministerial Decision 132275/19.05.2017 (Government Gazette 1751 B'/22.05.2017) of the National Water Committee, which deals with pricing and costing rules for water supply services.	Measures to implement the cost recovery principle (Art. 9)	NEW MEASURE	Ministry of Environment & Energy (Special Secretariat for Water)
<b>M07B0301</b> Preparation / Update of the Water Supply Masterplan	Measures to promote an efficient and sustainable water use (Art. 4)	YES	MEWSS / Municipalities / Water suppliers / Decentralized Administration (Water Directorate)
<b>M07B0302</b> Actions for the reinforcement, rehabilitation, modernization of water supply networks and leakage control	Measures to promote an efficient and sustainable water use (Art. 4)	YES	Municipalities / MEWSS / Drinking water providers / Region / Decentralized Administration (Water Directorate)
<b>M07B0303</b> Increase the efficiency of water use in land reclamation infrastructures	Measures to promote an efficient and sustainable water use (Art. 4)	YES	Ministry of Rural Development and Food, Regions
<b>M07B0304</b> Investments for saving water in agriculture	Measures to promote an efficient and sustainable water use (Art. 4)	YES	Individuals / Irrigation water providers / Ministry of Rural Development and Food / Regions
<b>M07B0305</b> Determination of maximum irrigation requirements for crops for private water abstractions	Measures to promote an efficient and sustainable water use (Art. 4)	YES	Decentralized Administration (Water Directorate), Regional directorate of Rural Economy and Veterinary Medicine
<b>M07B0306</b> Strengthening loss reduction actions on collective irrigation networks	Measures to promote an efficient and sustainable water use (Art. 4)	NEW MEASURE	GOLR/LOLR/ Collective Irrigation Networks, Region
<b>M07B0307</b> Preparation of manual of technical specifications for application of water reuse methods	Measures to promote an efficient and sustainable water use (Art. 4)	YES	Ministry of Environment & Energy (Special Secretariat for Water)
<b>M07B0308</b> Update of the existing Strategic Plan to Address Water Scarcity and Drought	Measures to promote an efficient and sustainable water use (Art. 4)	NEW MEASURE	Decentralized Administration (Water Directorate), Ministry of Environment & Energy (Special Secretariat for Water)

CODE - NAME OF MEASURE	CATEGORY	1 <sup>st</sup> RBMP	IMPLEMENTING BODIES
<b>M07B0401</b> Definition and delimitation of zones and / or measures for the protection of water abstraction points, intended for human consumption from groundwater bodies	Measures to meet the requirements of Article 7 (drinking water)	YES	Decentralized Administration (Water Directorate) and Drinking water providers (MEWSS, Municipalities etc.) EYDAP
<b>M07B0402</b> Protection of GWBs included in the registry of protected areas for human consumption and establishment of an institutional framework of protection	Measures to meet the requirements of Article 7 (drinking water)	YES	Decentralized Administration (Water Directorate)
<b>M07B0403</b> Surface water projects for water supply protection	Measures to meet the requirements of Article 7 (drinking water)	YES	Municipalities / MEWSS / Water providers / Decentralized Administration (Water Directorate)
<b>M07B0404</b> Implementation of Water Safety Plans	Measures to meet the requirements of Article 7 (drinking water)	YES	EYDAP, MEWSS, Municipalities, Drinking water providers, Decentralized Administration (Water Directorate)
<b>M07B0501</b> Restrictions, terms and conditions for the construction of groundwater abstraction projects (drilling, wells, etc.) for new uses, as well as extension of existing water use permits to: (a) area of GWBs in Poor quantitative status (b) the protection zone II of the abstractions serving the water supply networks that operated by Municipalities, Municipal Syndicates, MEWSS, Inter-MEWSS and drinking water companies , (c) zones of collective irrigation networks (d) coastal GWB with extensive or local salinization problems, regardless of their origin	Measures to control surface and groundwater abstractions	YES	Decentralized Administration (Water Directorate)
<b>M07B0502</b> Annual online registration of surface and groundwater abstractions	Measures to control surface and groundwater abstractions	YES	Ministry of Environment & Energy (Special Secretariat for Water), Decentralized Administration (Water Directorate), Regions
<b>M07B0601</b> Investigation of the conditions for application of artificial underground aquifer enrichment as a mean of quantitative enhancement and quality protection of GWBs, with a priority for GWBs with poor condition and/or salinization issues.	Measures to control the artificial recharge of groundwater aquifers	YES	Region, Municipalities, Decentralized Administration (Water Directorate)
<b>M07B0602</b> Establishment of a National Register of Waste Disposal Sites (Joint Ministerial Decision 145116/2011 (Government Gazette 354B)	Measures to control the artificial recharge of groundwater aquifers	YES	Ministry of Environment & Energy (Special Secretariat for Water), Decentralized Administration (Water Directorate)
<b>M07B0701</b> Strengthening environmental inspections and controls	Measures for point source pollution	YES	Region
<b>M07B0702</b> Modernization of national legislation on waste and industrial waste management	Measures for point source pollution	YES	Ministry of Environment & Energy (Special Secretariat for Water), Ministry of health

CODE - NAME OF MEASURE	CATEGORY	1 <sup>st</sup> RBMP	IMPLEMENTING BODIES
<b>M07B0703</b> Program of exploratory monitoring of the quality of groundwater bodies and surface water bodies in the areas of existing Landfills	Measures for point source pollution	NEW MEASURE	Landfill Operators, National Monitoring Network coordinated by the Water Directorate
<b>M07B0704</b> Conditions for the licensing of new / extension of existing aquaculture units	Measures for point source pollution	YES	Ministry of Environment & Energy, Decentralized Administration, Region
<b>M07B0705</b> Preparation of rules for sinkholes protection	Measures for point and diffuse source of pollution	YES	Decentralized Administration (Water Directorate)
<b>M07B0801</b> Biological agriculture	Measures for diffuse source pollution	NEW MEASURE	Ministry of Rural Development and Food (Directorate of Quality Systems, Organic Production and Geographical Indications)
<b>M07B0802</b> Modernization of the institutional framework for sludge management by municipal waste water treatment plants with emphasis on widening the scope and updating the quality characteristics of the applicable sludge	Measures for diffuse source pollution	YES	Ministry of Environment & Energy (Environmental Certification Directorate), Ministry of Rural Development and Food
<b>M07B0803</b> Reduce diffuse pollution from agriculture in the Nitrate Vulnerable Zones of the Directive 91/676/EEC	Measures for diffuse source pollution	YES	Ministry of Rural Development and Food, Regions
<b>M07B0902</b> Determination of minimum natural lakes waterlevel, determination of maximum waterlevel fluctuation of reservoirs	Measures for any other significant adverse impacts on the status of water, in particular concerning hydromorphological alterations of SWB	NEW MEASURE	Managing Authority, Region, Protected Areas Management Bodies, Decentralized Administration (Water Directorate)
<b>M07B0903</b> Development of national methodology and specifications for the determination of ecological flows of river water bodies	Measures for any other significant adverse impacts on the status of water, in particular concerning hydromorphological alterations of SWB	YES	Ministry of Environment & Energy (Special Secretariat for Water)
<b>M07B0904</b> Special Measures to Achieve Good Ecological Potential in Heavily Modified Water Bodies (HMWB)	Measures for any other significant adverse impacts on the status of water, in particular concerning hydromorphological alterations of SWB	NEW MEASURE	Ministry of Environment & Energy (Special Secretariat for Water), Decentralized Administration (Water Directorate), Region

CODE - NAME OF MEASURE	CATEGORY	1 <sup>st</sup> RBMP	IMPLEMENTING BODIES
<b>M07B0905</b> Determination of selected areas for river sediment deposits removal to meet the needs of technical projects	Measures for any other significant adverse impacts on the status of water, in particular concerning hydromorphological alterations of SWB	YES	Region, Decentralized Administration (Water Directorate), Municipalities
<b>M07B0906</b> Monitoring, recording and rehabilitation of coastal erosion	Measures for any other significant adverse impacts on the status of water, in particular concerning hydromorphological alterations of SWB	NEW MEASURE	Ministry of Infrastructure, and Transport, Ministry of Navigation, Region, Decentralized Administration (Water Directorate), Municipalities
<b>M07B1101</b> Compilation of pollution sources register (emissions, discharges and leaks)	Measures for Priority Substances and other pollutants	YES	Ministry of Environment & Energy (Special Secretariat for Water)
<b>M07B1102</b> Establishment / setting of emission limits in RBs for priority substances and other pollutants of the Joint Ministerial Decision 51354/2641 / E103 / 2010 as in force, as well as for Physico Chemical parameters in relation to the quality objectives set out in the Management Plans	Measures for Priority Substances and other pollutants	YES	Decentralized Administration (Water Directorate), Ministry of Environment & Energy (Special Secretariat for Water)

### 9.2.3 Supplementary measures

The program of measures of the RBD of Eastern Central Greece (EL 07) includes 18 supplementary measures, which are presented in the following table.

Table 9-6: Supplementary measures

CODE & NAME OF MEASURE	CATEGORY	CONNECTION WITH THE 1 <sup>st</sup> RBMP.	AFFECTED WB	IMPLEMENTING BODIES	IMPLEMENTATION COST (€)
<b>M07Σ0201</b> Development of a Monitoring Programme for the implementation of the PoM of the RBMP in the RBD and provision of supporting services for the implementation of the PoM..	Administrative measures	New measure	Horizontal	Decentralized Administration (Water Directorate)	650.000
<b>M07Σ0204</b> Control and management of artesian wells	Administrative measures	New measure	All GWB	Owner of the abstraction project,, Decentralized Administration (Water Directorate)	0
<b>M07Σ0207</b> R. Asopos delimitation	Other measures	Continuation of measure RBD07_SM 02_093	EL0725R000200025N, EL0725R000200026N, EL0700210	Region	99.220
<b>M07Σ0501</b> Industrial Waste Water Management in Asopos RB	Emission control	Continuation of measure RBD07_SM 05_097	EL0725R000200025N, EL0725R000200026N, EL0725R000100027N, EL0725R000300028N, EL0700210	Association of Industries of Central Greece, private individuals, Municipals, Ministry of Environment & Energy	2.500.000
<b>M07Σ0502</b> Investigation of implementation of immediate actions for managing the pressure of industries in Asopos RB	Emission control	Continuation of measure RBD07_SM 05_098	EL0725R000200025, EL0725R000200026, EL0725R000100027, EL0725R000300028, EL0700210	Ministry of Environment & Energy	30.000

CODE & NAME OF MEASURE	CATEGORY	CONNECTION WITH THE 1 <sup>st</sup> RBMP.	AFFECTED WB	IMPLEMENTING BODIES	IMPLEMENTATION COST (€)
<b>M07Σ0503</b> Investigation and pollution control actions of r. Asopos	Emission control	New measure	EL0725R000200025N, EL0725R000200026N, EL0725R000100027N, EL0725R000300028N, EL0700210	Region of Central Greece, Region Boeotia, Municipality of Tanagra, KEPPE, N.C.S.R. DEMOKRITOS, Medical School – University of Athens, Association of Industries of Central Greece, Voiotikos Chamber, Environmental Organization.	1.009.478
<b>M07Σ0504</b> Emission controls at the outlets of stormwater culverts and other point sources of pollution that result in surface water bodies	Emission control	The measure is related RBD07_SM 18_128 and RBD07_SM 18_129	EL0718R000100071N, EL0718R000200050N, EL0718R000200064N, EL0718R000202051N, EL0718R000204053A, EL0718R000204054A, EL0718R000204056A, EL0718R000204057A, EL0718R000300072N, EL0718R000500075N, EL0718R000700078N, EL0719R000100010N, EL0719R000100011N, EL0719R000204007N, EL0719R000400008N, EL0719R001900020N, EL0719R002100021N, EL0719R002500023N, EL0719R002700024N, EL0722R000100045N, EL0722R000300046N, EL0722R000500047N, EL0722R000700048N, EL0723R000000031H, EL0723R000000040N, EL0723R000002033H, EL0723R000004035N, EL0723R000006036N, EL0723R000014043N, EL0723R000100044N,	Ministry of Environment & Energy (Special Secretariat for Water), Region	100.000



CODE & NAME OF MEASURE	CATEGORY	CONNECTION WITH THE 1 <sup>st</sup> RBMP.	AFFECTED WB	IMPLEMENTING BODIES	IMPLEMENTATION COST (€)
			EL0724R000100029N, EL0724R000300030N, EL0725R000200025N, EL0725R000200026N, EL0725R000300028N, EL0718T0001N		
<b>M07Σ0505</b> Investments in agro-livestock farms, aiming at improving environmental performance.	Emission control	New measure	Horizontal	Ministry of Rural Development and Food, Region, DAOK PE.	460.000
<b>M07Σ0506</b> Investigations on compliance with the limits of disposal from industrial, processing and livestock-poultry units within the basin, at least twice a year	Emission control	New measure	EL0719R000400008N, EL0723R000100044N, EL0723R000014043N, EL0725R000200025N, EL0725R000200026N, EL0722R000700048N, EL0723R000006036N, EL0718R000204056A, EL0718R000204055N, EL0718R000200061N, EL0724R000100029N, EL0719R000100011N, EL0719R0002700024N, EL0722R000300046N	Decentralized Administration (Water Directorate), Region	0
<b>M07Σ0801</b> Determination and delimitation of GWB areas which are of poor quality due to salinization or have local salinization problems).	Abstractions Control	Continuation of measure RBD07_SM 08_107	EL0700130,EL0700210, EL0700220,EL0700370, EL0700380,EL0700390, EL0700400	Decentralized Administration (Water Directorate)	350.000
<b>M07Σ0802</b> Systematic monitoring of quality status of licensed water abstractions in GWB with high natural background (e.g. chlorides)	Abstractions Control	New measure	EL0700130, EL0700210, EL0700220, EL0700390	Decentralized Administration (Water Directorate), Region	0
<b>M07Σ1001</b> Preparation of reuse of wastewater treatment studies for all existing tertiary treatment waste water treatment plants	Efficiency and reuse measures	The measure is related to the RBD07_SM 10_112 and RBD07_SM 11_121	EL0700120, EL0700150, EL0700220, EL0700300, EL0700310, EL0700390,	Owner of the project, Decentralized Administration (Water Directorate), Rural Development Directorates, Municipalities.	500.000
<b>M07Σ1501</b> Professional training of agro-farmers for the protection of water bodies	Educational measures	The measure is related to the RBD07_SM 15_127	Horizontal	EYD/PAA Special Management Service of the Rural Development Program of Ministry of Rural Development and Food, Region. ELGO DIMITRA	235.000
<b>M07Σ1502</b>	Educational	The	Horizontal	MEWSS /	50.000



CODE & NAME OF MEASURE	CATEGORY	CONNECTION WITH THE 1 <sup>st</sup> RBMP.	AFFECTED WB	IMPLEMENTING BODIES	IMPLEMENTATION COST (€)
Informing and raising public awareness of water issues	measures	measure is related to the RBD07_SM 15_124 and RBD07_SM 15_126		Municipalities , Decentralized Administration (Water Directorate)	
<b>M07Σ1503</b> Strengthening environmental program actions in Primary Education	Educational measures	The measure is related to the RBD07_SM 15_125	Horizontal	Ministry of Environment & Energy (Special Secretariat for Water), Decentralized Administration (Water Directorate)	50.000
<b>M07Σ1601</b> Pilot measures to apply precision agriculture	Research, development & demonstration programmes	New measure	Horizontal	Ministry of Rural Development and Food, Region - EYD/PAA, Region	405.000
<b>M07Σ1602</b> Consultancy services for agriculture exploitation management	Research, development & demonstration programmes	New measure	Horizontal	ELGO DIMITRA» EYD/PAA	625.600
<b>M07Σ1701</b> Exploratory Monitoring of SWB and GWB whose density and spatial distribution of the National Monitoring Network is insufficient	Other measures	New measure	EL0718R000200058N, EL0718R000200064N, EL0718R000204053A, EL0718R000204054, EL0718R000204056A, EL0718R000700078N, EL0719R000100011N, EL0719R000204007N, EL0719R000400008N, EL0719R000700014N, EL0719R001900020N, EL0719R002500023N, EL0719R002700024N, EL0722R000500047N, EL0723R000000031H, EL0723R000000040N, EL0723R000002032A, EL0723R000002033H, EL0723R000004035N, EL0723R000014043N, EL0723R000100044N, EL0724R000100029, EL0724R000300030, EL0725R000200026,	Decentralized Administration (Water Directorate of Attica), Ministry of Environment & Energy (Special Secretariat for Water)	1.200.000

CODE & NAME OF MEASURE	CATEGORY	CONNECTION WITH THE 1 <sup>st</sup> RBMP.	AFFECTED WB	IMPLEMENTING BODIES	IMPLEMENTATION COST (€)
			EL0719L000000002N, EL0718T0001N, EL0718C0004N, EL0719C0013N, EL0735C0001N, EL0735C0002N, EL0700010,EL0700020, EL0700040,EL0700110, EL0700120,EL0700230, EL0700240,EL0700250, EL0700270,EL0700320, EL0700330,EL0700340, EL0700370,EL0700380, EL0700390, EL0700400		



## 10. NEXT STEPS

The objective of the 1<sup>st</sup> Update of the River Basin Management Plan is to prevent further deterioration, to protect and improve the status of inland surface, transitional, coastal and groundwater, as well as directly dependent terrestrial ecosystems and wetlands. In order to achieve this goal, the implementation of the Programme of Basic and Supplementary Measures is necessary.

The PoM is designed in such a way that the priority of each intervention is clearly defined according to its cost, its effectiveness, the importance of the WB being implemented and the necessary time of preparation.

All elements of the PoM are important, but some planning and prioritization is needed in order to monitor the progress of implementation of the PoM and identify where corrective interventions are required when deviations from targets are identified. Crucial issues that define the implementation level of the PoM are:

- The coordination of implementing bodies and the good communication with other interested parties
- The evaluation of the monitoring network results and its adaptation where necessary

With the responsibility of the Water Directorate of the Decentralized Administration an **Action Plan for the implementation of the 1<sup>st</sup> Update of the RBMP** of the RBD is being prepared.

The main axis of the Action plan is:

- Monitoring plans
- Securing adequate quantity and quality drinking water according to the law
- Irrigation water
- Protected areas
- Enhancement of environmental inspections and controls
- Other measures of the PoM

To this end, the Regional Working Group for the Implementation of the PoM of the RBMP of the RBD of the Country, which was established during the implementation of the 1<sup>st</sup> RBMP, is required to prepare the above Action Plan.



## 11. STATISTICAL DATA EASTERN CENTRAL GREECE RBD (EL07)

The following Tables present aggregated statistical data for the Eastern Central Greece RBD (EL07)

Table Σ- 1: Categories of WB per RB of Eastern Central Greece RBD (EL07)

WB Categories	RB SPERCHEIOS (EL0718)	RB EVVOIA (EL0719)	RB NE PARALIA KALLIDROMOU (EL0722)	RB VOIOTIKOS KIFISOS (EL0723)	RB AMFISSA (EL0724)	RB ASOPOS (EL0725)	RB SPORADES (EL0735)	TOTAL RB
River WB	33	24	4	14	2	4	0	81
Lake WB	0	1	0	2	0	0	0	3
Transitional WB	1	0	0	0	0	0	0	1
Coastal WB	3	7	1	1	2	2	3	19
TOTAL OF SWB	37	32	5	17	4	6	3	104
Groundwater WB	6	13	2	10	2	3	5	41
<b>TOTAL WB</b>	43	45	7	27	6	9	8	145
Heavily modified water bodies (HMWB) and artificial Water bodies (AWB)	4	0	0	4	0	0	0	8
WB Connected with protected areas	37	15	3	15	3	6	3	82

Table Σ- 2: Typology of SWB per RB of Eastern Central Greece RBD (EL07)

TYPOLOGY OF SWB	RB SPERCHEIOS (EL0718)	RB EVVOIA (EL0719)	RB NE PARALIA KALLIDROMOU (EL0722)	RB VOIOTIKOS KIFISOS (EL0723)	RB AMFISSA (EL0724)	RB ASOPOS (EL0725)	RB SPORADES (EL0735)	TOTAL RB
<b>River WB</b>								
Type R-M1	16	12	1	4	0	0	0	33
Type R-M2	8	12	3	7	0	3	0	33
Type R-M3	1	0	0	2	0	0	0	3
Type R-M4	8	0	0	1	2	1	0	12
Type R-M5	0	0	0	0	0	0	0	0
Type R-L2	0	0	0	0	0	0	0	0
<b>Reservoirs</b>								
Type L-M5/7								
Type L-M8								
Type GR-SR								
<b>Lake WB</b>								
Type GR-DNL	0	0	0	1	0	0	0	1
Type GR-SNL	0	0	0	1	0	0	0	1
Type GR-VSNL	0	1	0	0	0	0	0	1
<b>Transitional WB</b>								
Type TW 1	0	0	0	0	0	0	0	0
Type TW 2	1	0	0	0	0	0	0	1
<b>Coastal WB</b>								
Type IIE	3	7	1	1	2	2	3	19

Table Σ- 3: Assessment (classification) results of SWBs status per RB in RBD of Eastern Central Greece (EL07)

STATUS/POTENTIAL			RB SPERCHEIOS (EL0718)				RB EVVOIA (EL0719)				RB NE PARALIA KALLIDROMOU (EL0722)							
			Number	% of Number	Length (km)	% of Length	Number	% of Number	Length (km)	% of Length	Number	% of Number	Length (km)	% of Length				
RIVER WB																		
TOTAL RIVER WB	ECOLOGICAL	High	1	3,0	20,5	6,5	1	4,2	38,0	10,7	0	0,0	0	0,0				
		Good	16	48,5	154	48,7	13	54,2	126,5	35,5	0	0,0	0	0,0				
		Moderate	9	27,3	83,9	26,5	10	41,7	191,8	53,8	3	75,0	48,3	70,4				
		Poor	2	6,1	19,5	6,2	0	0	0	0,0	1	25,0	20,2	29,4				
		Bad	1	3,0	15,8	5,0	0	0	0	0,0	0	0	0	0				
		Unknown	4	12,1	22,4	7,1	0	0	0	0,0	0	0	0	0				
	CHEMICAL	Good	29	87,9	286,0	90,5	17	70,8	212,0	59,5	3	75,0	53,4	77,8				
		Poor	0	0	0	0	0	0	0	0	0	0	0	0				
		Unknown	4	12,1	30,1	9,5	7	29,2	144,4	40,5	1	25,0	15,1	22,0				
STATUS/POTENTIAL			RB VOIOTIKOS KIFISOS (EL0723)				RB AMFISSA (EL0724)				RB ASOPOS (EL0725)				Total RBD			
			Number	% of Number	Length (km)	% of Length	Number	% of Number	Length (km)	% of Length	Number	% of Number	Length (km)	% of Length	Number	% of Number	Length (km)	% of Length
RIVER WB																		
TOTAL RIVER WB	ECOLOGICAL	High	0	0,0	0	0,0	0	0	0	0,0	0	0,0	0	0,0	2	2,5	58,5	2,7
		Good	4	28,6	85,8	38,9	0	0	0	0,0	0	0,0	0	0,0	33	41,8	366,3	17,2
		Moderate	6	42,9	63,0	28,6	1	50	3,7	14,1	3	75,0	51,0	64,7	31	39,2	441,7	20,7
		Poor	1	7,1	10,7	4,9	0	0	0	0,0	1	25,0	27,7	35,2	5	6,3	78,1	3,7
		Bad	0	0	0	0	0	0	0	0,0	0	0	0	0	1	1,3	15,8	0,7
		Unknown	3	21,4	61,2	27,7	1	50	22,6	85,9	0	0	0	0	7	8,9	106,2	5,0
	CHEMICAL	Good	8	57,1	96,3	43,7	0	0	0	0	3	75,0	48,1	61,0	60	75,9	695,8	32,6
		Poor	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
		Unknown	6	42,9	124,3	56,3	2	100	26,3	100,0	1	25,0	30,6	38,8	19	24,1	370,8	17,4



STATUS/POTENTIAL			RB SPERCHEIOS (EL0718)				RB EVVOIA (EL0719)				RB VOIOTIKOS KIFISOS (EL0723)				Total RBD			
			Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area
LAKE WB																		
TOTAL LAKE WB	ECOLOGICAL	High					0	0	0	0	0	0	0	0	0	0	0	0
		Good					0	0	0	0	2	100	30,6	100	2	66,7	30,6	85,7
		Moderate					0	0	0	0	0	0	0	0	0	0	0	0
		Poor					0	0	0	0	0	0	0	0	0	0	0	0
		Bad					0	0	0	0	0	0	0	0	0	0	0	0
		Unknown					1	100	5,1	100	0	0	0	0	1	33,3	5,1	14,3
	CHEMICAL	Good					1	100	5,1	100	2	100	30,6	100	3	100	35,7	100
		Poor					0	0	0	0	0	0	0	0	0	0	0	0
		Unknown					0	0	0	0	0	0	0	0	0	0	0	0
TRANSITIONAL WB																		
TOTAL TRANSITIONAL WB	ECOLOGICAL	High	0	0	0	0									0	0	0	0
		Good	0	0	0	0									0	0	0	0
		Moderate	1	100	18,4	100									1	100	18,4	100
		Poor	0	0	0	0									0	0	0	0
		Bad	0	0	0	0									0	0	0	0
		Unknown	0	0	0	0									0	0	0	0
	CHEMICAL	Good	0	0	0	0									0	0	0	0
		Poor	0	0	0	0									0	0	0	0
		Unknown	1	100	18,4	100									1	100	18,4	100

STATUS/POTENTIAL			RB SPERCHEIOS (EL0718)				RB EVVOIA (EL0719)				RB NE PARALIA KALLIDROMOU (EL0722)				RB VOIOTIKOS KIFISOS (EL0723)			
			Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area
COASTAL WB																		
TOTAL COASTAL WB	ECOLOGICAL	High	1	33,3	38,5	13,3	4	57,1	598,1	25,8	0	0	0	0	0	0	0	0
		Good	1	33,3	165,7	57,4	2	28,6	582	25,1	0	0	0	0	0	0	0	0
		Moderate	1	33,3	84,6	29,3	1	14,3	1.138,8	49,1	1	100	2,9	100	1	100	113,3	100
		Poor	0	0	0	0	0	0,0	0	0	0	0	0	0	0	0	0	0
		Bad	0	0	0	0	0	0,0	0	0	0	0	0	0	0	0	0	0
		Unknown	0	0	0	0	0	0,0	0	0	0	0	0	0	0	0	0	0
	CHEMICAL	Good	2	66,7	250,3	86,7	6	85,7	2.107,8	90,1	1	100	2,9	100	1	100	113,3	100
		Poor	0	0	0	0	0	0,0	0	0	0	0	0	0	0	0	0	0
		Unknown	1	33,3	38,5	13,3	1	14,3	211,1	9,1	0	0	0	0	0	0	0	0
STATUS/POTENTIAL			RB AMFISSA (EL0724)				RB ASOPOS (EL0725)				RB SPORADES (EL0735)				Total RBD			
			Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area	Number	% of Number	Area (km²)	% Area
COASTAL WB																		
TOTAL COASTAL WB	ECOLOGICAL	High	0	0	0	0	0	0	0	0	3	100	2.811,6	100	8	21,1	3.448,2	26,8
		Good	2	100	20,6	100	2	100	888,0	100	0	0	0	0	7	18,4	1.656,3	12,9
		Moderate	0	0	0	0	0	0	0	0	0	0	0	0	4	10,5	1.339,6	10,4
		Poor	0	0	0	0	0	0	0	0	0	0	0	0	0	0,0	0	0
		Bad	0	0	0	0	0	0	0	0	0	0	0	0	0	0,0	0	0
		Unknown	0	0	0	0	0	0	0	0	0	0	0	0	0	0,0	0	0
	CHEMICAL	Good	2	100	20,6	100	2	100	888,0	100	1	33,3	293,5	10,5	15	39,5	3.676,4	28,5
		Poor	0	0	0	0	0	0	0	0	0	0	0	0	0	0,0	0	0
		Unknown	0	0	0	0	0	0	0	0	2	66,7	2518,1	89,5	4	10,5	2.767,7	21,5

Table Σ- 4: Assessment (classification) results of GWBs status per RB in RBD of Eastern Central Greece (EL07)

GWBs			RB SPERCHEIOS (EL0718)				RB EVVOIA (EL0719)				RB NE PARALIA KALLIDROMOY (EL0722)				RB VOIOTIKOS KIFISOS (EL0723)			
STATUS/POTENTIAL			Number	% of Number	Area (km <sup>2</sup> )	% Area	Number	% of Number	Area (km <sup>2</sup> )	% Area	Number	% of Number	Area (km <sup>2</sup> )	% Area	Number	% of Number	Area (km <sup>2</sup> )	% Area
TOTAL GWBs	CHEMICAL	Good	5 & 1 SubGWB	85,71	2.257	87,52	12	92,31	3.269	89,51	2	100	454	100	9 & 1 SubGWB	90,91	2.583	96,60
		Poor	1 SubGWB	14,29	322	12,48	1	7,69	383	10,48	0	0	0	0	1 SubGWB	9,09	91	3,40
		Unknown																
	QUANTITATIVE	Good	5 & 1 SubGWB	85,71	2.074	80,42	11	84,62	3.293	90,17	2	100	454	100	9	90,91	2.455	91,81
		Poor	1	14,29	505	19,58	2	15,38	359	9,83	0	0	0	0	1 SubGWB	9,09	219	8,19
		Unknown																

STATUS/POTENTIAL			RB AMFISSA (EL0724)				RB ASOPOS (EL0725)				RB SPORADES (EL0735)				TOTAL RB			
			Number	% of Number	Area (km <sup>2</sup> )	% Area	Number	% of Number	Area (km <sup>2</sup> )	% Area	Number	% of Number	Area (km <sup>2</sup> )	% Area	Number	% of Number	Area (km <sup>2</sup> )	% Area
TOTAL GWBs	CHEMICAL	Good	1	50	553	94,85	2	66,66	1151	59,85	5	100	478	100	36 & 2 SubGWB	88,37	10.745	87,05
		Poor	1	50	30	5,15	1	33,33	772	40,15	0	0	0	0	3 & 2 SubGWB	11,63	1.598	12,95
		Unknown																
	QUANTITATIVE	Good	1	50	553	94,85	3	100	1923	100	5	100	478	100	36 & 1 SubGWB	86,05	11.230	90,98
		Poor	1	50	30	5,15	0	0	0	0	0	0	0	0	3 & 1 SubGWB	13,95	1.113	9,02
		Unknown																