



PROJECT:

EastMed Pipeline Project



Document Title:	EastMed Greek Section – Environmental and Social Impact Assessment
Document Subtitle	Chapter 1 – Introduction
Project Document No:	PERM-GREE-ESIA-0001_0_ESIA

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	
		REV. :	00
		PAGE :	2 OF 25

Document details	
Document title	EastMed Greek Section – Environmental and Social Impact Assessment
Document subtitle	Chapter 1 – Introduction
Company	IGI Poseidon
Author	ASPROFOS, ERM
Project	EastMed Pipeline Project
Project Document No.	PERM-GREE-ESIA-0001_0_ESIA
Date	03/06/2022
Version	00

Document history					
Revision	Author	Reviewed by	Approved by	Date	Status
00	ASPROFOS	ERM	IGI POSEIDON	03/06/2022	For submission to Authorities



	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA- 0001_0_ESIA	
		REV. :	00
	PAGE :	3 OF 25	

Table of Contents




1	INTRODUCTION	5
1.1	Project Title and Background.....	5
1.2	Type and Size of the Project	6
1.2.1	EastMed Pipeline Project	6
1.2.2	EastMed Pipeline Project in Greece	9
1.3	Geographical Project Location and Administrative Jurisdiction.....	12
1.3.1	Location.....	12
1.3.2	Administrative Jurisdiction	14
1.3.3	Geographical Coordinates	18
1.4	Project Classification.....	19
1.5	Project Owner.....	21
1.6	Project’s Environmental Consultant	22
	ANNEX 1 - SUPPORTING MATERIALS FOR CHAPTER 1.....	25
	ANNEX 1 A LEGISLATIVE AND REGULATORY FRAMEWORK.....	25
	ANNEX 1 B Study Team Members and Key Qualifications	25

List of Figures

Figure 1-1	Overview of the EastMed-Poseidon Pipeline Project.....	8
Figure 1-2	Project Location in Greece.	17



List of Tables

Table 1-1	Overview of EastMed Greek Sections.	9
Table 1-2	Administrative Jurisdiction of the Project.	15
Table 1-3	Coordinates of the Sections and Major Components of the Project in Greece	18
Table 1-4	EastMed Classification in Compliance with MD 170225/2014.....	19
Table 1-5	EBRD Performance Requirements.....	20
Table 1-6	Contact Information of Project Owner	21
Table 1-7	Contact Details of ERM Italy	23
Table 1-8	Contact details of ASPROFOS Environmental Consultant.....	23

	EASTMED PIPELINE PROJECT	 	
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA- 0001_0_ESIA	
		REV. :	00
		PAGE :	4 OF 25

Abbreviations

See Document Map.

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00
		PAGE :	5 OF 25

1 INTRODUCTION

1.1 Project Title and Background

This study concerns the **Environmental and Social Impact Assessment (ESIA)** for the construction, operation and decommissioning of the **Greek Section of the EastMed Pipeline Project** (EastMed or the Project) according to Art. 2 of L. 4014/2011 (HGG A'209/2011). This study also covers the provisions of Articles 5(1) and 5(2) of the EIA Directive (Directive 2011/92/EU as amended by 2014/52/EU). Apart from the national standards, as defined by relevant applicable legislation (see ANNEX 1 A), the ESIA has been performed in compliance with applicable international standards, as embodied in the European Bank for Reconstruction and Development (EBRD) Performance Requirements (PR1-10).

The Project, being developed by IGI Poseidon S.A. (see Section 1.5 for Project Owner details), has followed the voluntary procedure of the Preliminary Identification of Environmental Requirements (PIER) according to Art. 2 of L. 4014/2011 (HGG A'209/2011) which corresponds to the Scoping phase of Articles 5(1) and 5(2) of the EIA Directive (Directive 2011/92/EU as amended by 2014/52/EU). The PIER was uploaded on the Electronic Environmental Register on 29/07/2021 and its hardcopy was submitted on 30/07/2021 (Ref. 72913/4764) whilst the Scoping Opinion was issued on 09/05/2022 with Ref. No 72923/4764 (see ANNEX 4 A).



EastMed has been catalogued since 2013 as an EU *Project of Common Interest* (PCI) and, according to L. 4685/2020, of National Importance and Public Interest for Greece.

The EastMed Pipeline Project jointly with the Poseidon Pipeline Project (PPP) (EastMed-Poseidon Pipeline Project) allows the delivery to Europe of additional diversified new energy sources from the Levantine Basin currently not reaching any region of European markets.

Overall, it is an efficient interconnection between eastern Mediterranean sources and European energy markets, through Cyprus, Greece and Italy as well as with other markets in south-eastern (SE) Europe.

With a length of about 2,000 km, including an offshore section of more than 1,400 km (approximately 840 km in Greek waters), EastMed Pipeline Project links Israel, Cyprus and Greece via Crete, before traversing approximately 540 km through the Greek mainland to its final 210 km stretch along the Ionian coast to reach Italy via the offshore section of the Poseidon Pipeline.

The EastMed-Poseidon Pipeline Project provides Europe with a new energy corridor, through a dedicated connection via a completely new route, integrating markets along the way and enhancing diversification of energy supply. It will contribute to European energy security of supply by enhancing

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	
		REV. :	00
		PAGE :	6 OF 25

diversification of sources and routes and supporting European (domestic) production in face of the decline of the continent’s traditional indigenous sources through new gas sources currently not reaching any part of the European markets.

In recognition of their notable significance and contribution towards achieving EU energy targets and in compliance with the criteria of Regulation 347/2013, the EastMed Pipeline Project and Poseidon Pipeline Project have been catalogued as EU *Projects of Common Interest* (PCI) since 2013 particularly to ensure security and diversification of energy supply and pursue market integration and competition to Europe.

As a PCI, the EastMed Pipeline Project benefits from fast-track procedures provided by EU Regulation 347/2013.

The Project’s development activities are also supported with co-funding from the EU’s Connecting Europe Facility (CEF) program.



Apart from the EU, the development of the EastMed Pipeline Project is also supported by the countries concerned. On January 2nd, 2020, the governments of Greece, Cyprus and Israel signed an Intergovernmental Agreement (IGA) confirming the recognition by the Parties of the strategic importance of the EastMed Pipeline Project. To ensure the pipeline’s timely realisation and its viable operation, the IGA provides for cooperation via an intergovernmental joint committee to facilitate its development in accordance with the highest environmental standards. In May 2020, the Project was also declared a Project of National Importance for Greece.

Ongoing development of the Project comprises studies, performed with the contribution of leading firms specialised in the sector, to include provisions to allow the safe and optimised transportation of hydrogen as well, promoting transition of south-east Europe and East Mediterranean region towards a sustainable and efficient energy transmission network, and supporting hydrogen production plants and development of energy intensive users.

1.2 Type and Size of the Project

1.2.1 EastMed Pipeline Project

The EastMed Pipeline Project aims to transport gas directly from the eastern Mediterranean fields to the European Natural Gas System via Greece. **The object of this report is the development of the ESIA for the section of EastMed within Greek jurisdiction.**

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00

EastMed consists of a Southern Line and a Northern Line to deliver gas from Israeli and Cypriot sources, respectively, through Peloponnese and Western Greece, to the Poseidon Pipeline Project in north-west Greece. Upstream of Crete these two lines are designed to work complementarily as well as independently, foreseeing infrastructure in Cyprus dedicated to each line. Thanks to this, the system is highly flexible, contributing to security of supply. The EastMed Pipeline Project comprises the following main components:

A. Southern Line of EastMed (Israel → Cyprus/Crete → SE Peloponnese):

- Transports gas from Israeli sources directly from the EastMed Compression Platform (ECP) in Israeli waters to a compression and metering station in Crete (CS2/MS2) and from there to the mainland Greece and the Poseidon Pipeline Project,
- Delivers gas to Cyprus for domestic consumption through a subsea Inline Tee Assembly (ITA) and a branch pipeline from the subsea ITA to Cyprus (OSS1 comes from Israeli platform to ITA, OSS1a from ITA to a Metering and Pressure Reduction Station (MS1a/PRS) in Cyprus and OSS2 from ITA to Crete);

B. Northern Line of EastMed (Cyprus → Crete → SE Peloponnese):

- Delivers dry gas originating from one or more of the Cypriot offshore gas discoveries to the compression and metering stations in Cyprus (CS1/MS1) first, through OSS1b and then in Crete (CS2/MS2N), through OSS2N and from there to the mainland Greece and Poseidon Pipeline Project, as referred in the next paragraph;

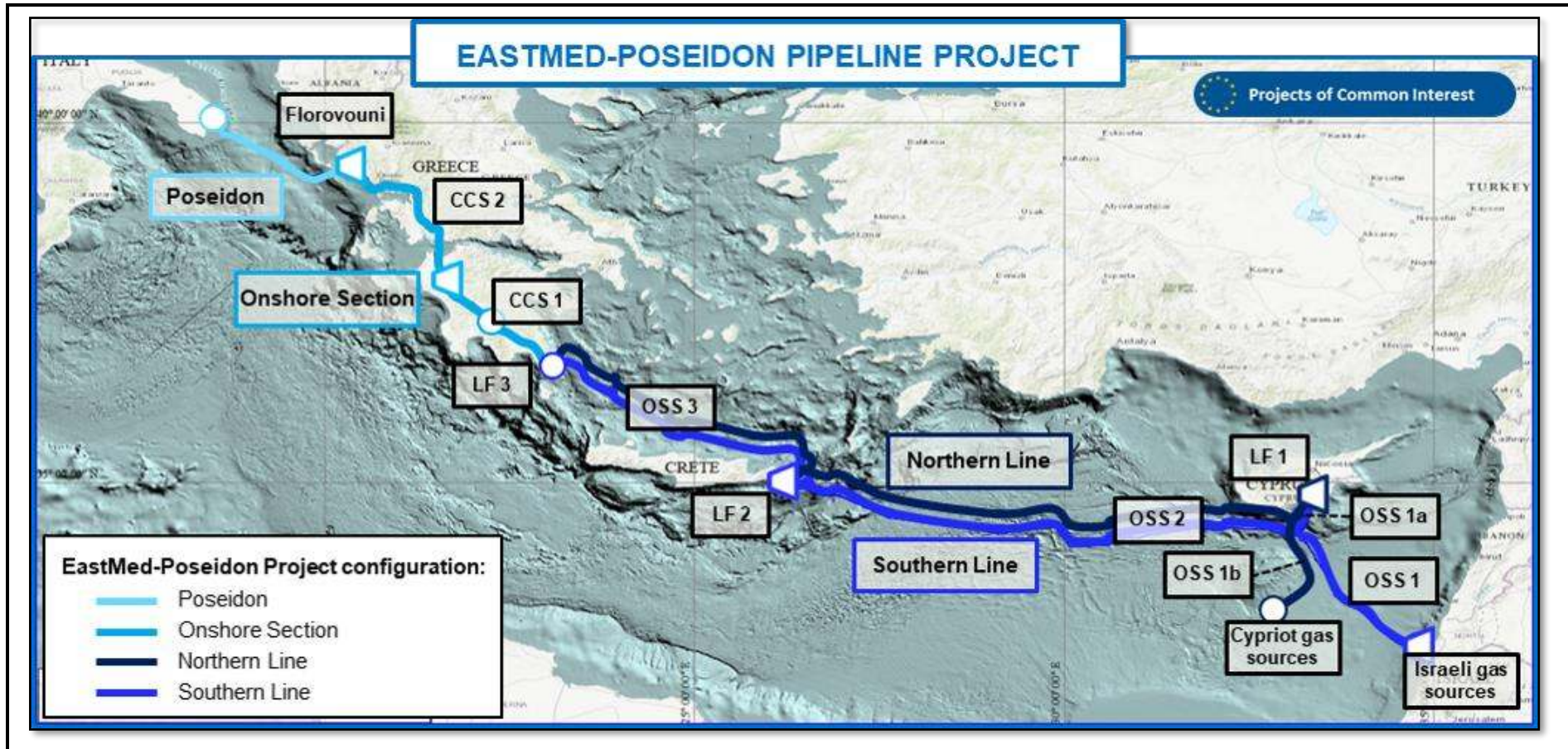
C. Combined System of EastMed (Crete & mainland Greece → Poseidon Pipeline Project):

- At LF3 the gas flow streams from two pipelines will be combined into a single large-diameter pipeline (CCS1-OSS4-CCS2) for transportation to the Poseidon Pipeline Project Compressor Station at Florovouni¹ in north-west Greece,
- Combination of the Southern and Northern flow streams will require additional compression along the CCS1 section in Peloponnese (CS3).

The ‘Northern and Southern Lines’ are shown in Figure 1-1 where the ‘Southern Line’ and ‘Northern Line’ are indicated in blue and dark blue, respectively. The onshore single large diameter pipeline of the ‘Combined System’ (i.e. CCS1 and CCS2) is shown in light blue².

¹Compressor Station of the Poseidon Pipeline Project system at Florovouni in north-west Greece belongs to another project with the same owner and has received environmental permitting through a separate procedure (ETA: ΥΠΕΝ/ΔΙΠΑ/35872/2373/07-06-2019, ΑΔΑ: ΩΠΝ34653Π8-419)

² Light blue line also includes the small offshore section of the Combined System that crosses Patraikos Gulf, i.e. OSS4.



Prepared by: ASPROFOS, 2021.

Figure 1-1 Overview of the EastMed-Poseidon Pipeline Project.

1.2.2 EastMed Pipeline Project in Greece

The EastMed Pipeline Project includes onshore and offshore pipeline features and onshore support facilities and extends into national territory or jurisdiction. In order to facilitate comprehension of project configuration, sectioning is often performed.



EastMed in Greece can be distinguished in two main sections:

- The *Onshore Section*, which essentially consists of the Project’s components in continental Greece (and the Patraikos Gulf crossing offshore section) and the onshore facilities in Crete and in Peloponnese. In relation to the entire EastMed configuration, the onshore section in Greece includes the onshore pipeline of the Combined System and the Onshore facilities in Crete supporting the Southern Line and the Northern Line and the Onshore facilities in Peloponnese; and
- The *Offshore Section*, which essentially consists of the Project’s components in the south Cretan Sea and the South Aegean Sea. In relation to the entire EastMed configuration, the offshore section in Greece includes the Greek part of the Southern Line and the Northern Line.

The following Table 1-1 summarises the main EastMed Pipeline Project sections in Greece, while Section 15.1.1 (Overview Map) shows the overview of the Project.

Table 1-1 Overview of EastMed Greek Sections.

EastMed Main Section	Project Component (for ESIA purposes)	Project Component (based on FEED)	From	To
Offshore	OSS2/OSS2N (South Cretan Sea)	<ul style="list-style-type: none"> • Southern Line OSS2; and • Northern Line OSS2N. 	Start of Greek Section	Crete (LF2)
Onshore	Crete	<ul style="list-style-type: none"> • Compressor and Metering Facilities for Southern and Northern Lines. 	Crete (LF2)	
Offshore	OSS3/OSS3N (South Aegean Sea)	<ul style="list-style-type: none"> • Southern Line OSS3; and • Northern Line OSS3N. 	Crete (LF2)	Peloponnese (LF3)
Onshore	CCS1 (Peloponnese)	<ul style="list-style-type: none"> • Combined System: <ul style="list-style-type: none"> ➤ Compressor Station CS3, ➤ Metering, Pressure Regulating MS4/PRS4 and Heating Station ➤ Dispatching and O&M Centre 	SE Peloponnese (LF3)	NW Peloponnese (LF4)

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00 PAGE : 10 OF 25

EastMed Main Section	Project Component (for ESIA purposes)	Project Component (based on FEED)	From	To
		<ul style="list-style-type: none"> Megalopoli's Branch. 	Soulari settlement, Municipality of Megalopoli	Perivolia settlement, Municipality of Megalopoli
Onshore	OSS4 (Patraikos Gulf)	<ul style="list-style-type: none"> Combined System. 	LF4 (NW Peloponnese)	LF5 (SW Etoloakarnania)
Onshore	CCS2 (West Greece)	<ul style="list-style-type: none"> Combined System. 	LF5 (SW Etoloakarnania)	PPP facilities at Florovouni area (Municipality of Igoumenitsa)
Legend FEED: Front End Engineering Design CS: Compressor Station MS: Metering Station PRS: Pressure Reduction Station LF: Landfall				



Prepared by: ASPROFOS, 2021.

More details about each section (offshore and onshore) are briefly provided below (see also Section 15.1.1 - Overview Map).

1.2.2.1 Onshore Section of the EastMed Pipeline Project in Greece

The **EastMed Onshore Section in Greece** includes the following:

- The Compressor and Metering Stations in Crete (CS2/MS2 and CS2/MS2N) together with the relevant small onshore sections to and from landfall site LF2;
- The onshore section of the 48" pipeline that crosses Peloponnese (CCS1) from landfall site LF3 (SE of R.U. Laconia) to landfall site LF4 (NW of R.U. Achaia on the south coast of the Patraikos Gulf);
- The Megalopoli's Branch line that is foreseen to connect CCS1 with the National Natural Gas System at Megalopoli's area (Perivolia area). The pipeline will have a diameter of 16";
- LF4 (Landfall site in the NW of R.U. of Achaia, close to Lakopetra beach, NW Peloponnese area)
- The offshore section of the 46" pipeline that crosses the Patraikos Gulf (OSS4) from landfall site LF4 to landfall site LF5 (SW of R.U. Etoloakarnania);

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00
		PAGE :	11 OF 25

- LF5 (Landfall site in the SW of R.U. of Elotoakarnania, close to Evinochori settlement, SW Sterea Ellada)
- The onshore section of the 48” pipeline that crosses Western Greece (CCS2) from landfall site LF5 (south-west of R.U. Etoloakarnania) to the installation site of the Poseidon Pipeline Project compressor station at Florovouni , in R.U. Thesprotia;
- The Metering and Pressure Reduction Station (MS4/PRS4) in Megalopoli (start of Megalopoli’s Branch);
- The Heating Station in Megalopoli in the same plot as MS4/PRS4;
- The compressor station CS3 at R.U. Achaia in Peloponnese; and
- The Dispatching and Operation and Maintenance Centre (O&M) in the R.U. of Achaia.

Along the onshore section, Scraper Stations – SS (in total seven³) and Block Valve Stations - BVS (fifteen in total) will be installed as per the current Project design. BVSs will be placed at distances of approximately 30 km. A Landfall Station (LS) (four in total) will be installed near each landfall site.

For the section starting at landfall site LF3 in south-east Peloponnese to the Poseidon Pipeline Project’s compressor station at Florovouni (sections CCS1, OSS4 and CCS2), the design pressure of the Project is 100 barg while the maximum operating pressure (MOP) is considered equal to 95 barg. For the Megalopoli’s Branch line, the design pressure is 80 barg while the MOP is equal to 75 barg.



1.2.2.2 Offshore Section of the EastMed Pipeline in Greece

The **EastMed Offshore Section in Greece**, includes the following:

- OSS2 and OSS2N (the part of the Offshore Section from Cyprus to Crete under Greek jurisdiction): Subsea trunk lines from the start of the Greek Offshore Section to Crete;
- LF2 (Landfall site in Crete): the nearshore and coastal crossing section in the area of Crete;
- OSS3 and OSS3N (Crete to Peloponnese): Subsea trunk lines from Crete to Peloponnese; and
- LF3 (Landfall site in Peloponnese): the nearshore and coastal crossing section in the area of Peloponnese.

The Greek Offshore Section of the Project includes two (i.e. twin) pipelines at an average distance of approximately 100 m. Near the landfall site, the two pipelines approach each other to enter the same

³ It is clarified that 1 Scraper station will be located within the MS4/PRS4 and Heating Station at Megalopoli area, 1 Scraper station will be located within the future CS3, in the R.U. of Achaia, and 4 Scraper Stations will be located within the same plot as the Landfall Stations, bundling permanent facilities of the project as much as possible. The seventh SS concerns the Megalopoli’s Branch.

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	
		REV. :	00
		PAGE :	12 OF 25

shore crossing cofferdam. Up to the landfall site, pipelines will be simply laid on the seabed with the pipelines gradually buried only near the coast.

In more detail:

- OSS2 (in Greece) will have an approximate length of 390 km, a diameter of 26” and a transfer capacity of 11 BSCM/yr;
- OSS2N (in Greece) will have an approximate length of 390 km, a diameter of 26” and a transfer capacity of 10 BSCM/yr; and
- OSS3 and OSS3N will have a diameter of 28” and transfer capacity of 10.5 BSCM/yr each, along an approximate length of 430 km.

Once both lines become operational, the EastMed project will transport a combined total flow rate of 21 BSCM/yr to the EastMed Onshore Section.



The design pressure of the OSS2 and OSS2N sections is 363 barg, while the MOP is considered equal to 345 barg. The design pressure of the OSS3 and OSS3N sections is 231 barg, while the MOP is equal to 220 barg. From a technical point of view, the two pipelines (Southern and Northern) are independent but also parts of a unique project system, and from an environmental point of view, they should be considered as one for most environmental and social parameters. Therefore, unless a clear distinction is necessary, the term “**Line OSS2/OSS2N**” is introduced to describe pipelines OSS2 and OSS2N as one integrated pipeline system across the south Cretan Sea (from the middle of the sea straits between Greece and Cyprus to the designated landfall in Crete); similarly, the term “**Line OSS3/OSS3N**” is used for the OSS3 and OSS3N pipelines across the South Aegean Sea from the landfall in Crete (LF2) to the designated landfall in SE Peloponnese (LF3).

1.3 Geographical Project Location and Administrative Jurisdiction



1.3.1 Location

EastMed in Greece is located in southern (offshore and onshore) and western (onshore) parts of the country; the following sections can be identified:

- **Line OSS2/OSS2N** (South Cretan Sea): The Greek section route of Line OSS2/OSS2N stretches approximately 390 km across the eastern Mediterranean Sea, from the middle of the sea straits between Greece and Cyprus to the designated landfall in Crete (LF2), reaching a maximum depth of approximately 3,000 m (for only about 10 km). The OSS2/OSS2N will have an outer diameter of 26”;

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00
		PAGE :	13 OF 25

- Crete:** The suggested LF2 landfall site of the pipeline is located in south-eastern Crete in the area of Atherinolakkos, in the Municipality of Sitia, R.U. of Lassithi. At a short distance (~800 m north-west) lies the proposed site for construction of the compressor and metering stations (CS2/MS2 and CS2/MS2N) on plot adjacent to the existing Power Public Corporation (PPC) power station. From the LF2 landfall site to the installation site of the compressor and metering stations, two twin pipelines (two entering and two exiting the Facilities) will be constructed in parallel configuration with indicative length of 1 km each. The pipelines entering the station (which will connect LF2 to the facilities in Crete) will have a 26" outside diameter and the ones exiting it (which will connect the facilities in Crete to LF2) have a 28" outside diameter;
- Line OSS3/OSS3N (South Aegean Sea):** The route of Line OSS3/OSS3N starts from the selected LF2 landfall in south-eastern Crete, and by crossing the Cretan Fore-Arc Basin and the Hellenic (Cretan) Margin ends at landfall LF3 in south-eastern Peloponnese. Its total length is approximately 430 km and the maximum water depth is approximately 1,600 m. The OSS3/OSS3N will have an outside diameter of 28";
- CCS1 (Peloponnese):** The section of the pipeline located in Peloponnese starts from the LF3 landfall site located about 300 m north of the settlement of Agios Fokas in the Municipality of Monemvasia of the R.U. of Laconia and following a north-north-western direction terminates at LF4 the landfall site which is 2.8 km north-east of the settlement of Lakkopetra on the southern shoreline of the Patraikos Gulf in the Municipality of Western Achaia of the R.U. of Achaia. More specifically, the routing runs ~6.5 km west of Monemvasia, continues with a north-north-west course running ~1.5 km north-north-east of the settlement of Molai, and continues in the same direction between the settlements of Geraki and Grammousa. Then it continues on the semi-mountainous part located between the settlements of Kalloni and Goritsa on the slopes of Mount Parnon. Following the same north-west direction, it runs for ~4 km initially west, and then north of the city of Sparta and from there, following a route parallel to the National Road of Megalopoli-Sparta, runs for ~6 km initially west and then north of the city of Megalopoli and continues in the direction of the settlement of Karytaina, passing in a distance of ~2 km west of it. After that, it continues within the R.U. of Ilia, crosses at a distance of ~10 km east of Ancient Olympia and 3 km east of the artificial lake of Pinios. Then the routing enters the R.U. of Achaia and runs along the ridge of Mount Movri ending at the beach of Kalamaki in the Patraikos Gulf. CCS1 will have an outside diameter of 48" and a total length of approximately 300 km;
- The **Megalopoli's Branch** bears off CCS1 near Soulari settlement and by following a northern direction extends approximately 10 km to Megalopoli town. The Megalopoli's Branch will have an outside diameter of 16";

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00
		PAGE :	14 OF 25




- **OSS4 (Patraikos Gulf)**. From Peloponnese to Western Greece, the pipeline crosses Patraikos Gulf in a north-east direction. The length of this offshore section (OSS4) is approximately 17 km and the maximum depth is approximately 110 m. OSS4 will have an outside diameter of 46"; and
- **CCS2 (Western Greece)**. The section of the pipeline located in western Central Greece starts from the LF5 landfall site located approximately 3 km south of the settlement of Galatas in the Municipality of Nafpaktia of the R.U. of Etoloakarnania, and in a north-north-western direction ends in the mountainous area of Florovouni which is located ~3.5 km south-east of the settlement of Perdika, in the Municipality of Igoumenitsa of the R.U. of Thesprotia, where the already licensed compressor station of Poseidon Pipeline Project is scheduled to be constructed. Initially, the route intersects with the Evinos River and the Ionian Road and continues through the mountain range of Mount Arakynthos with a north-western course towards Lake Trichonida. It runs south of the lake on a western course and at a distance of ~1 km north of the settlements of Gavalos, Mataraga and Papadates and then passes ~3.5 km south-west of the city of Agrinio. It continues north, crosses the river Acheloos, runs ~500 m west of the settlement of Lepenos, and runs to the north through the mountain range and passes ~700 m west of the settlement of Varetadas, and ~500 m from the settlement of Valmada. Then the routing crosses the plain area north of the Amvrakikos Gulf, between the settlements of Peranthi and Loutrotopos and Polydroso and Rachi. Continuing initially west and then north-north-west, the routing runs ~2 km south of the settlement of Kamarina, ~1 km east of the settlement of Heimadio and ~1.5 km west of the settlement of Kanalaki. For the next 15 km, the routing runs through a plain area on a north-west course passing ~1 km west of the settlement of Spatharaioi, ~1 km west of the settlement of Margariti, ~500 m north of the settlement of Karteri and ends in Florovouni. CCS2 will have an outside diameter of 48" and a total length of approximately 250 km.

1.3.2 Administrative Jurisdiction

The starting point of the Greek Section of EastMed is located in the middle of the sea straits between Greece and Cyprus (coordinates are reported within Table 1-3). According to the current administrative structure of the country in municipalities and regions (Law 3852/2010, A 87), the EastMed Pipeline Project in Greece (onshore section) runs through the Administrative Units presented in Table 1-2. Figure 1-2 presents an overview of the Project location. More details about Project location and administrative jurisdiction in Greece are presented in Section 15.1.2 – Project Definition and Area of Interest Map.

Table 1-2 Administrative Jurisdiction of the Project.

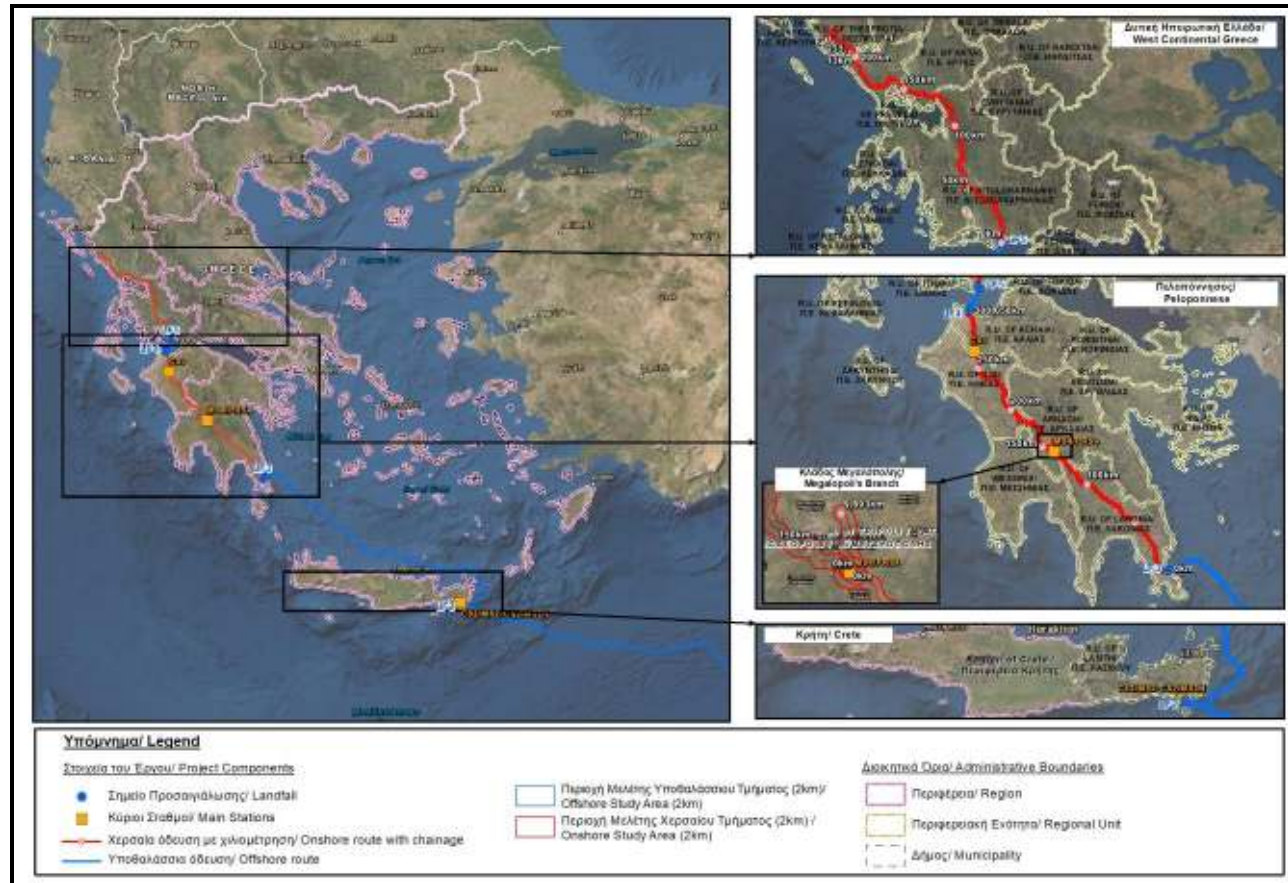
Region	Regional Unit	Municipality	Municipal Unit	
Crete	Lassithi	Sitia	Lefki	
Peloponnese	Laconia	Monemvasia	Molai	
			Monemvasia	
		Evrota	Niata	
			Elos	
			Geronthra	
			Skala	
			Therapnoi	
			Spartiaton	
		Sparti	Oinounta	
			Mystras	
	Pellana			
	Falesia			
	Arcadia	Megalopoli	Megalopoli	
			Gortyn	
Gortynia		Tropaia		
Western Greece	Ilia	Andritsaina-Krestena	Andritsainis	
			Alifeiras	
		Ancient Olympia	Ancient Olympia	
		Pyrgos	Foloi	
	Ilida		Oleni	
			Pinia	
		Western Achaia		Olenia
				Larissos
			Dymi	
			Mombri	
	Etoloakarnania	Nafpaktia		Chalkia
			Iera Polis of Messolonghi	Iera Polis of Messolonghi
		Agrinio		Makrynia
				Arakinthos
				Thestieis
			Agrinio	

	EASTMED PIPELINE PROJECT	 
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA REV. : 00 PAGE : 16 OF 25

Region	Regional Unit	Municipality	Municipal Unit	
			Stratos	
		Amfilochia	Amfilochia	
			Inahos	
			Menidi	
Epirus	Arta	Nikolaos Skoufas	Kompotio	
			Arachthos	
		Artaion	Amvrakikos	
			Philothei	
	Preveza	Ziros	Philippiada	
		Preveza	Louros	
			Zalogo	
		Parga	Fanari	
	Thesprotia	Igoumenitsa		Margaritio
				Perdika



The Municipality of Oichalia of R.U of Messinia and the Municipality of Andravida-Kilini of R. U of Ilia are not crossed by the Project itself, but only by the study area.

Prepared by: ASPROFOS, 2021.



Prepared by: ASPROFOS, 2021.

Figure 1-2 Project Location in Greece.




	EASTMED PIPELINE PROJECT	
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA REV. : 00 PAGE : 18 OF 25

1.3.3 Geographical Coordinates

The following table provides the coordinates at the start, middle and end of the individual sections as well as the centroids of the major stations (Compressors and Metering Stations) of the Project, in the Hellenic Geodetic Reference System 1987 (EGSA 87). The coordinates are based on the level of accuracy associated with the actual design stage.

Table 1-3 Coordinates of the Sections and Major Components of the Project in Greece

Section/ Component	Point	X (EGSA87)	Y (EGSA87)
Line OSS2/OSS2N	Start	1,059,268	3,795,135
	Middle	878,515	3,820,053
	End	694,578	3,874,859
Crete (pipeline)	Start	694,556	3,874,857
	Middle	694,146	3,875,055
	End	693,942	3,875,460
Station CS2/MS2 and CS2/MS2N (Crete Facilities)	Centroid	693,712	3,875,571
Line OSS3/OSS3N	Start	694,578	3,874,859
	Middle	583,480	3,943,988
	End	415,621	4,050,681
Peloponnese (CCS1 pipeline)	Start	415,621	4,050,681
	Middle	329,949	4,135,672
	End	279,707	4,228,552
Station MS4/PRS4 & Heating (Megalopoli Facilities)	Centroid	337,845	4,131,779
Megalopoli's Branch (pipeline)	Start	337,831	4,131,868
	Middle	337,745	4,135,891
	End	336,696	4,139,763
Station CS3 (Achaia Facilities)	Centroid	283,670	4,200,375
Patraikos Gulf (OSS4 pipeline)	Start	279,707	4,228,552
	Middle	283,780	4,236,089
	End	286,649	4,244,179
Western Greece (W. Greece – Epirus) (CCS2 pipeline)	Start	286,649	4,244,179
	Middle	255,180	4,323,961

	EASTMED PIPELINE PROJECT	 
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA REV. : 00 PAGE : 19 OF 25

Section/ Component	Point	X (EGSA87)	Y (EGSA87)
	End	185,526	4,362,847

Prepared by: ASPROFOS, 2021.

1.4 Project Classification



The classification of the Project according to the requirements of the MD 170225/2014 is provided in Table 1-4. Relevant legislation includes:

- MD 1958/2012, as codified by MD YA 37674/2016 and as amended by MD 2307/2018, regarding environmental classification of projects;
- Greek and European statistical classification of economic activities (STAKOD and NACE, respectively); and
- JMD 3137/191/Φ.15/12 (B' 1048), as amended and applicable, regarding nuisance classes of projects.

It is emphasised that the type of the Project may not be explicitly mentioned in some of the relevant legislation (i.e. NACE or JMD 3137/2012). In such cases, it was deemed appropriate to present the group that is most relevant to the Project under consideration.

Table 1-4 EastMed Classification in Compliance with MD 170225/2014

Legislation	Classes	Project Classification
MD 1958/2012	Group	11 - Transport of energy, fuels and chemical compounds
	a/a	1 – Pipelines of national importance or included in European or international networks and associated/ supporting facilities
	Category	A1 – Project and activities that may have very significant impacts on the environment
	Comments	-
STAKOD 08/ NACE Rev.2*	Section	D – Electricity, Gas, Steam and Air Conditioning Supply
	Division	35 – Electricity, gas, steam and air conditioning supply
	Group	35.2 – Manufacture of gas; distribution of gaseous fuels through mains
	Class	35.23
	Description	Trade of gas through mains
JMD 3137/191/Φ.15/2012*	Group	n/a
	Subgroup	n/a
	s/n	n/a
	Nuisance Class	n/a

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00 PAGE : 20 OF 25

Legislation	Classes	Project Classification
<p>* The classification presents the activity most relevant to the Project. The applicable provisions concern also the compressor stations.</p> <p>It is noted that the compressor stations, having a total capacity >50 MW, fall into the provisions of JMD 36060/1155/E.103 regarding “Establishing a framework of rules, measures and procedures for the integrated prevention and control of environmental pollution from industrial activities, in compliance with the provisions of Directive 2010/75 / EU "On Industrial Emissions (Integrated Pollution Prevention and Control)" of the European Parliament and of the Council of 24 November 2010”</p>		

Prepared by: ASPROFOS, 2021.



The Project is part of the European System of natural gas pipelines as the construction of the pipeline is classified as a *Project of Common Interest* (PCI) in accordance with the provisions of EU Regulation 347/2013.

According to Law no. 4014/2011, the competent environmental authority for the Project under study is the relevant Directorate of Environmental Licensing (DIPA) of the Ministry of Environment and Energy (YPEN).

In addition, IGI Poseidon has voluntarily adopted the EBRD Performance Requirements (PRs) as the international reference standard for their social and environmental strategies and intends to comply with these requirements throughout all stages of the Project. EBRD has an Environmental and Social Policy which seeks to ensure that sustainable development is achieved by projects that it finances. The bank has adopted a set of Performance Requirements (PRs) that clients are expected to meet covering key areas of environmental and social impacts and issues.

Table 1-5 EBRD Performance Requirements.

No	Name
PR1	Environmental and Social Appraisal and Management
PR2	Labour and Working Conditions
PR3	Pollution Prevention and Abatement
PR4	Community Health, Safety and Security
PR5	Land Acquisition, Involuntary Resettlement and Economic Displacement
PR6	Biodiversity Conservation and Sustainable Natural Resource Management
PR7	Indigenous Peoples
PR8	Cultural Heritage
PR9	Financial Intermediaries
PR10	Information Disclosure and Stakeholder Engagement

	EASTMED PIPELINE PROJECT		
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA	REV. : 00

EastMed Pipeline Project is classified as “Category A” according to EBRD criteria⁴, and as such, a special formalised participatory assessment process is required according to EBRD standards. The process includes:

- A comprehensive Environmental and Social Impact Assessment in compliance with PR1 Environmental and Social Appraisal and Management and PR10 Information Disclosure and Stakeholder Engagement;
- An examination of the technically and financially feasible alternatives and the rationale for the alternative selection;
- Also addressing PRs 2 and 4 the ESIA will identify issues related to potential risks in regard to community health, safety and security, as well as labour and working conditions;
- An assessment of involuntary resettlement issues according to PR5 Land Acquisition, Involuntary Resettlement and Economic Displacement;
- The sustainable use of natural resources and the protection of biodiversity will have to be considered as instructed by PR6; and
- An assessment of impacts on cultural heritage according to PR8 Cultural Heritage.

ANNEX 1 A provides more details about the legislative framework of the environmental and social permitting.




1.5 Project Owner

The Project belongs to the company IGI Poseidon S.A. (Project Owner) based in Athens, Greece. IGI Poseidon (IGI) is a Company equally owned (50-50%) by DEPA International Projects S.A. and Edison S.p.A., founded in June 2008, subject to Greek law. The following table holds the necessary contact details of the Project Owner.

Table 1-6 Contact Information of Project Owner

Contact Elements	Contact Details
Project Owner Details	
Name	IGI Poseidon S.A.

⁴ Category ‘A’ Projects are defined by EBRD as projects which are likely to have significant environmental and/or social impacts and which require a more formalized process of assessment than other projects. The definition applies to: (i) ‘greenfield’ projects, or major extension or transformation or conversion projects; (ii) projects in sensitive locations; (iii) projects with significant adverse impacts on local communities; and/or (iv) projects involving significant involuntary resettlement or economic displacement.

	EASTMED PIPELINE PROJECT	 
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA REV. : 00 PAGE : 22 OF 25

Contact Elements	Contact Details
Postal address	207, Mesogeion Ave., 115 25 Athens, Greece
Telephone	+30 212 8081400
Internet Address	http://www.igi-poseidon.com/
Contact Person – Onshore Section	
Full name	Kamilaki Areti
Organic Position	ESIA and Permitting Coordinator – EastMed Onshore Section
Telephone	212 8081400 (412)
Email	a.kamilaki@depa-int.gr
Contact Person – Offshore Section (English speaking)	
Full name	Miriam Biscotti
Organic Position	ESIA and Permitting Coordinator – EastMed Offshore Section
Telephone	0039 3316283702
Email	Miriam.Biscotti@edison.it
Contact Person – Offshore Section	
Full name	Kostas Tyroyiannis
Organic Position	Deputy ESIA and Permitting Coordinator – EastMed Offshore Section
Telephone	212 8081400 (420)
Email	k.tyroyiannis@depa-int.gr

1.6 Project’s Environmental Consultant

The study was prepared on behalf of the Project Owner by the company ASPROFOS Engineering S.A. (ASPROFOS) (member of the HELPE Group of Companies) and in collaboration with renowned, experienced and specialised consultants, in accordance with applicable environmental legislation. The preparation of the Offshore Section study has been led by the international expertise of ERM Italy SpA (ERM). The individual works were prepared by an interdisciplinary team so as to cover all scientific fields and specialisations for the documented assessment of the impact on the environment.

From the ERM side, the supervision and coordination of all related works was performed by Mr Marco Ruffoni (ERM), Environmental Expert – Geologist, with 12 years of experience in environmental and permitting activities with particular reference to oil and gas.

The contact details of ERM are provided in the following table.




	EASTMED PIPELINE PROJECT	 
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA REV. : 00 PAGE : 23 OF 25

Table 1-7 Contact Details of ERM Italy




Environmental Consultant Details	
Name	Environmental Resource Management (ERM)
Registration Number and Tax Code	10669840158
Headquarters	Via San Gregorio, 38, Milano, Italy
Telephone	+39 02 674401
Fax	+39 02 67078382
E-mail	info.italy@erm.com
Contact Persons (English speaking)	
Full name	Daniele Zoli
Position	Program Director
Telephone	+39 347 2400384
Email	daniele.zoli@erm.com
Full name	Marco Ruffoni
Position	Program Manager
Telephone	+393425169213
Email	marco.ruffoni@erm.com

From ASPROFOS' side, the supervision and coordination of the study team work for the onshore sections was performed by Mr. Dimitris Hourmouziadis, Forester – Environment Expert, holder of Consultant's Degree category 27A, Reg. 20873, tel. 2109491373, email: dhourmouziadis@asprofos.gr. The supervision and coordination of the study team work for the offshore sections was performed by George Valais, Environmental Expert - Ichthyologist, holder of Consultant's Degree category 27A, Reg. 27275, tel. 2109491363, email: gvalais@asprofos.gr.

The contact details of ASPROFOS are provided in the following table.




Table 1-8 Contact details of ASPROFOS Environmental Consultant

Contact Elements	Contact Details
Environmental Consultant Details	
Name	ASPROFOS SA
Type of Business	Technical company
Headquarters	284 Eleftheriou Venizelou, Ave, Kallithea
Telephone	+30 2109491 600
Fax	+30 2109491 610

	EASTMED PIPELINE PROJECT	 
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA-0001_0_ESIA REV. : 00 PAGE : 24 OF 25

Contact Elements	Contact Details
Internet Address	www.asprofos.gr
Contact Person	
Full name	Dr. Spanidis Philippos - Markos
Position	Project Manager - Surveyor Engineer
Telephone	210 94 91 371
Email	pspani@asprofos.gr
Signatory Person – Onshore sections	
Full name	Hourmouziadis Dimitris
Position	Responsible for the Supervision and Coordination of Environmental Studies for the onshore section
Telephone	210 94 91 373
Email	dhourmouziadis@asprofos.gr
Consultant's Reg. No.	20873
Degree Category	27A
Signatory Person – Offshore sections	
Full name	Valais George
Position	Responsible for the Supervision and Coordination of Environmental Studies for the offshore section
Telephone	210 94 91 363
Email	gvalais@asprofos.gr
Consultant's Reg. No.	27275
Degree Category	27A

ANNEX 1 B lists the members of the interdisciplinary study team and their key qualifications.

	EASTMED PIPELINE PROJECT	 
	EastMed Greek Section – Environmental and Social Impact Assessment	DOC No: PERM-GREE-ESIA- 0001_0_ESIA REV. : 00 PAGE : 25 OF 25

ANNEX 1 - SUPPORTING MATERIALS FOR CHAPTER 1

ANNEX 1 A LEGISLATIVE AND REGULATORY FRAMEWORK

ANNEX 1 B STUDY TEAM MEMBERS AND KEY QUALIFICATIONS