

General Infrastructures

ENG

DUCTOS
GROUP

the company



Hotel Quinta da Marinha Resort, Cascais

DUCTOS, SOCIEDADE DE PROJECTOS, LDA., started off as a private limited corporation in July 1992, as a result of an already long collaboration between its partners, collaborators and consultants, working together in the preparation and implementation of studies and projects for public and private entities.

Ductos professional and technical staff includes a team of Engineers, who possess qualifications in the several fields of Engineering. Our professional and technical staff are supported by AutoCAD technicians, administrative staff and when necessary, consultant specialists in various subject areas.

With a sustained growth and implantation in international markets, **Ductos** is now known as **DuctosGroup**. With local societies constituted in **Mozambique** and in **Macau**, we also consolidated our position in such significant markets like **Angola, Brasil, Cape Verde** and **Algeria**, where we continue developing studies and projects in several areas.



As a result of **DUCTOS** development and its growing role within international markets, a strategy was defined looking to establish new society constitutions and partnerships in countries which have portuguese as the official language.

By September 2009 **Ductos** was already established in **Angola**, in order to provide a direct response to its customers, projects, and on-going work in this country.

In October 2010, a new office headquarters was open in the City of Praia, Santiago Island, **Cape Verde**, giving response to all the local solicitations.

internationalization

As a consequence of an implemented strategic expansion, and the high volume of business in **Brazil**, **DUCTOS** created a new company with its headquarters in São Paulo.

DUCTOS is also present in **Mozambique**, where in July 2012 established a new society of Mozambique Rights called **Ductos Moçambique**, Sociedade de Projectos, Lda., having its headquarters in Maputo.

In January 2013, has begun the process of incorporating a company in **Macau** designated **Ductos Macau** Engineering, in response to the great challenges of the East.

specialties

Having a group of engineers and technicians with a solid experience in our subject fields, **Ductos Group** provides services in the following areas:

**Hydraulic Installations;
Sustainability;
General Infrastructure;
Basic Sanitation;
Other Specialties.**

in partnership:

**Structures and Foundations;
Special Technique Installations;**

You can find below our engineering specialties.



Assisted Living Housing, Junqueira, Lisbon



Portimão's Marina

specialties



Thermal Central

Hydraulic Installations

- Water Supply Equipments and Installations;
- Water Equipments and Installations for Fire Services;
- Water Drain Systems and Installations for Domestic Waste Waters and Rain Waters;
- Fuel Gas Mains Installations.

General Infrastructure

- Road Infrastructure;
- Water Supply Infrastructure, Irrigation, Fire Services;
- Domestic Waste Waters and Rain Water Infrastructure;
- Gas Mains Infrastructure;
- Electrical Infrastructure and Lighting;
- Telecommunications Infrastructure;
- Urban Solid Waste Infrastructure.

Sustainability

- Sustainable Construction;
- Systems Centralization;
- Economy of the Consumption of Water;
- Exploration Economy;
- Use and reuse of water resources, especially rainwater and domestic waste waters for irrigation, washing and special consumption systems.

Basic Sanitation

- Water Supply;
- Sanitation;
- Water Treatment Station;
- Waste Water Treatment Station

Other specialties

- Health and Safety Plans;
- Urban and Municipal Solid Waste;
- Medical Gases;
- Hydraulic Circuits in Pools and Water Games.

in partnership



Structures and Foundations

- Studies and Evaluation of existing constructions;
- Geotechnical Report Analysis;
- Excavations and Earthworks;
- Foundations, underground and surface floor structures.

Special Technique Installations

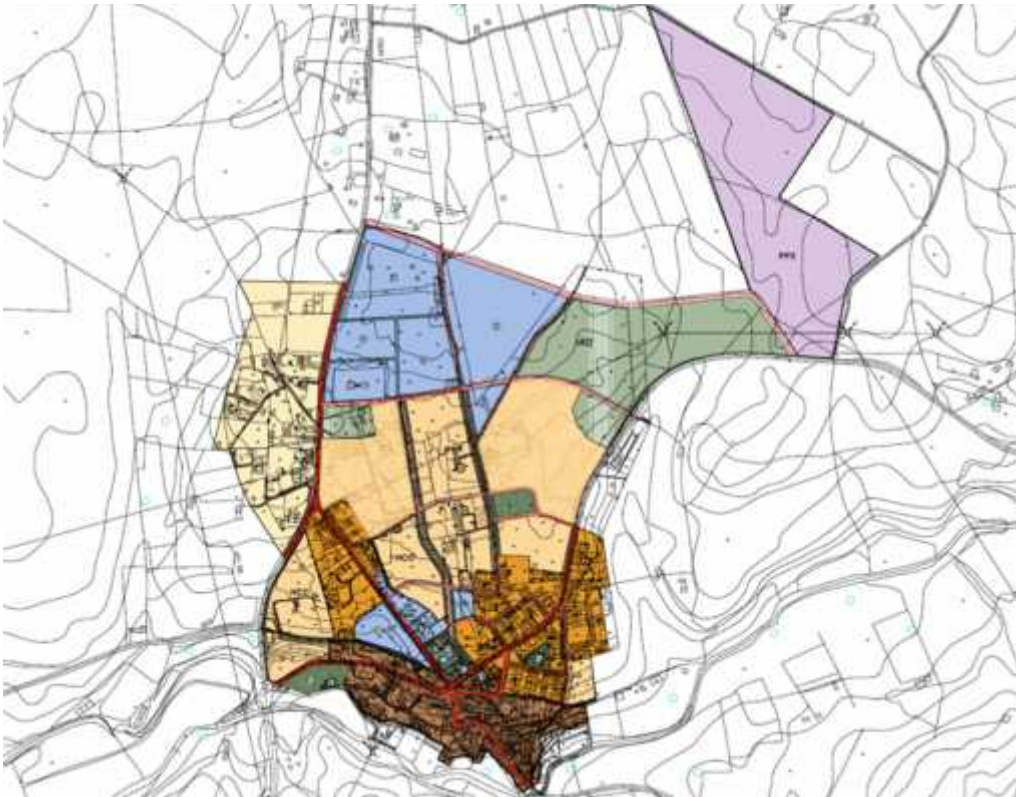
- Installations and Electrical Equipment;
- Installations and Communication Equipment;
- Installations and HVAC Equipment (Mechanical);
- Installations and Electromechanical Equipment;
- Integrated Security;
- Acoustics;
- Temperature Control;
- Centralized Technical Management;
- Luminosity Studies.

general infrastructure



Marina of Portimão

urbanization plans



TITLE OF WORK

URBANIZATION PLAN OF MELIDES

Grândola Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The Urbanization Plan of Melides sets to establish the rules that the occupation, use and transformation of the area it covers, as well as set standards of urban management according to various strategic objectives, including the protection and enhancement of existing assets, secure, organize and structure the urban tissue, reshaping the road infrastructure serving the cluster as well as the expansion of networks of basic infrastructure sites.

The Urbanization Plan covers an area of **94 hectares intervention**.

PROJECT DESCRIPTION

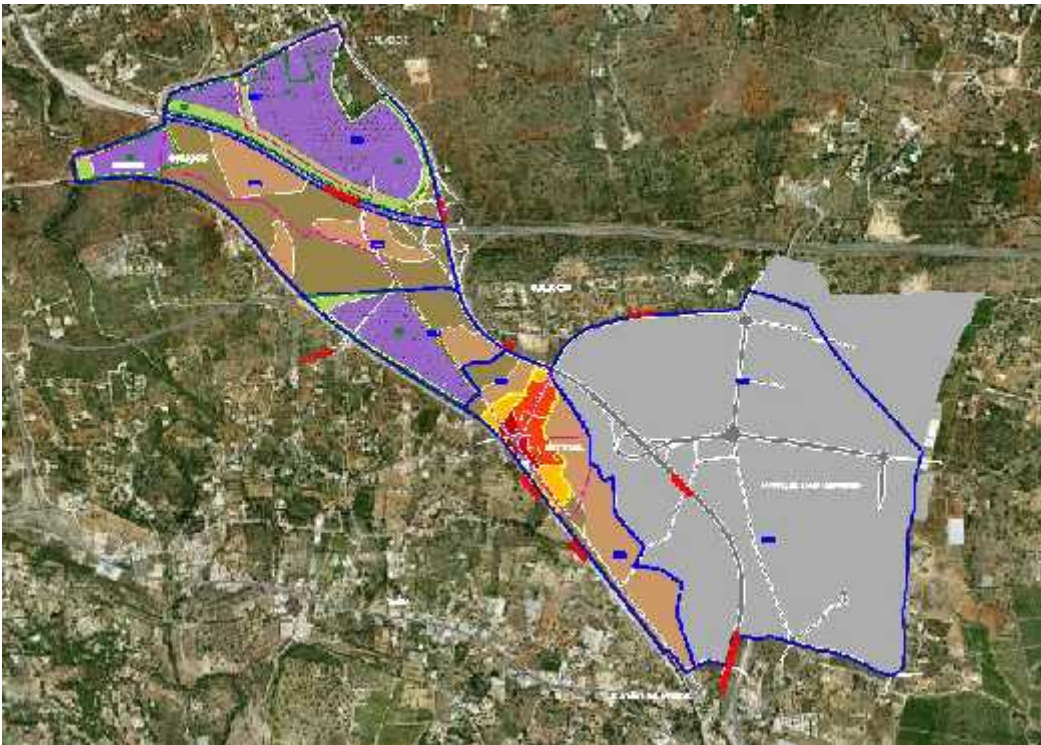
DUCTOS was responsible for the preparation of specialties:

- **Roads Infrastructure**, with the definition of 4.5 km of roads,
- **Infrastructure Sanitation** component of the storm water drainage and domestic waste, with 8.0km of sewer network, three retention basins for storm water pumping station and a domestic wastewater treatment plant connected to the existing
- **Water Supply Infrastructure**, with 5.2 km of pipes.

DATE

October 2011

urbanization plans



TITLE OF WORK

URBANIZATION PLAN OF CALÍÇOS-ESTEVAL

Loulé Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The Urbanization Plan of Calíços-Esteval sets to establish the rules that the occupation, use and transformation of the area it covers, as well as set standards of urban management according to various strategic objectives, including the protection and enhancement of existing assets, secure, organize and structure the urban tissue, reshaping the road infrastructure serving the cluster as well as the expansion of networks of basic infrastructure sites.

The Urbanization Plan covers an area of **355 hectares intervention**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of specialties:

- **Infrastructure Sanitation** component of the storm water drainage and residual domestic integrating their networks gravitational collectors,
- **Water Supply Infrastructure**, including the expansion of the water distribution network.

DATE

October 2010

detailed plans

TITLE OF WORK

DETAILED PLAN OF QUINTA DA CAMACHA

Almodôvar Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The project consists of six distinct categories. A hotel zone, three tourist complex areas with apartments/townhouses or isolate, one commerce and services area and a Golf Course. By interconnecting these devices a road network was provided with distinct and shared use by motor vehicles, bicycles and pedestrians. The enterprise covers an approximate area of **177 hectares**.

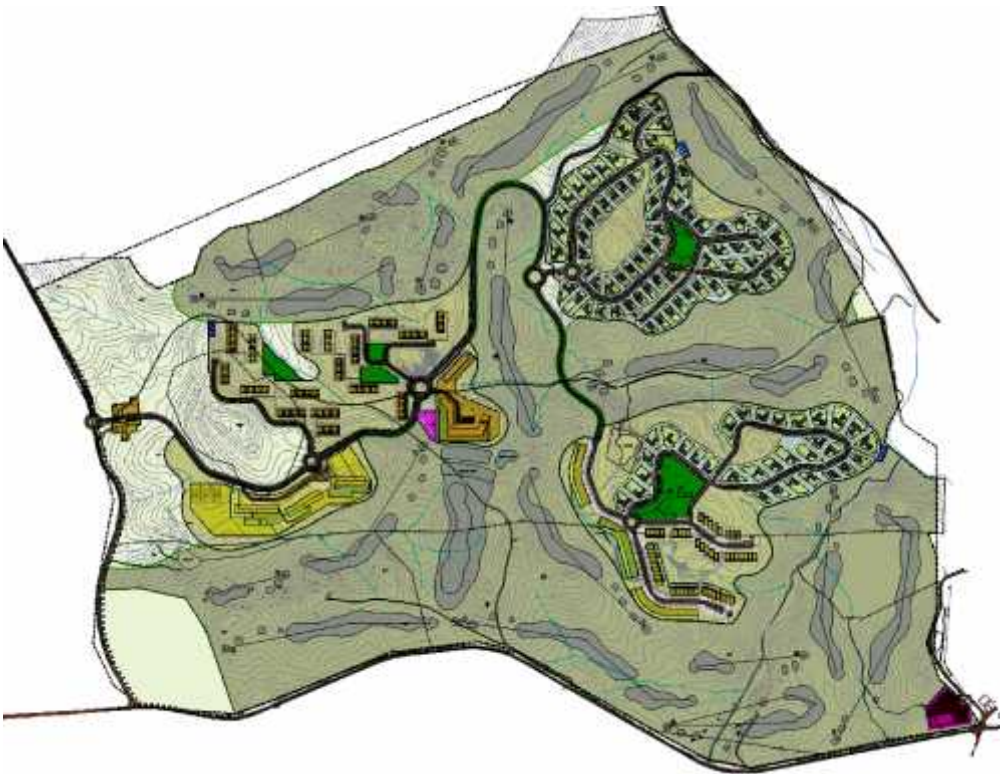
PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of specialties:

- **Roads Infrastructure**, with the definition of 8.1 km of roads,
- **Infrastructure Sanitation** component of the storm water drainage and domestic waste, with 9.9 km of sewer network, elevating system with four pumping stations and associated pipelines pumping and treatment system comprising three WWTP,
- **Water Supply Infrastructure**, which includes the pipeline system, reservation and distribution with 13.1 km of pipelines,
- **Infrastructures Fuel Gas Pipeline**,
- **Urban Solid Waste**.

DATE

September 2009



detailed plans



TITLE OF WORK

PLANO DE PORMENOR DO ESPAÇO DE REESTRUTURAÇÃO URBANÍSTICA DE CARCAVELOS SUL

Cascais Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The proposal contemplates an occupation distributed over three areas urbanize:

- East Zone, which includes the construction of housing blocks and residences assisted type and a hotel.
- West Zone, consisting of housing blocks, areas for trade / services and lots of equipment (Parish Center, Health Center and School Building), keeping the area affects the college St. Julian's.
- Urban Park, which extends along the Ribeira Sassoeiros, which foresees the construction of playgrounds and various leisure facilities.

The enterprise covers an area of approximately **47 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of specialties:

- **Roads Infrastructure**, with the definition of 4.3 km of roads,
- **Infrastructure Sanitation** component of the storm water drainage and domestic waste, with 8.8 km of sewer network,
- **Water Supply Infrastructure**, with 4.5 km of pipes,
- **Infrastructures Fuel Gas Pipeline**, with 4.3 km of pipes.

DATE

September 2009

detailed plans



TITLE OF WORK

DETAILED PLAN OF CAMPUS DE CAMPOLIDE

Lisboa Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The Detailed Plan Campus Campolide will predict the expansion of existing university infrastructure, which will be installed at the Faculty of Social and Human Sciences of the New University, the construction of the new building of the Faculty of Law of the building and expansion of the Institute of Statistics and Information Management (ISEGI), supplemented with private lots for housing. We propose structuring routes and public and private roads, based on the current framework in the road structure. The Allotment occupies an area of **37 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of specialty: **Roads Infrastructures**, with the definition of 3.0 km of roads.

DATE

November 2011

allotment



TITLE OF WORK

ALLOTMENT ALTO DA VERDIZELA

Seixal Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The project is characterized by presenting a kind of occupational oriented residential typology which is shared by multi-family lots, centered on a main core and single-family lots, spread across the surrounding areas.

The Allotment occupies an area of **31 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of specialties:

- **Roads Infrastructure**, with the definition of 7.3 km of roads.
- **Infrastructure Sanitation** component of the storm water drainage and domestic waste, with 11.3km network of collectors.
- **Water Supply Infrastructure**, with 8.6 km of pipes.
- **Infrastructures Fuel Gas Pipeline**, with 6.6 km of pipes.

DATE

April 2008

allotments



TITLE OF WORK

ALLOTMENT L7 – ENCOSTA

Grândola Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The development consists of 52 lots, presenting a set of roads that develops according to a branched arrangement, centered on a main street that divides the subdivision into two distinct zones, the North Zone and South Zone
The subdivision covers an area of **14 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of specialties:

- **Infrastructure Roads**, with 1.5 km of roads,
- **Sanitation Infrastructure**, with 2.7 km of sewers,
- **Water Supply Infrastructure**, with 2.0 km of pipes,
- **Infrastructures Fuel Gas Pipeline** with 1.7 km of pipes and LPG tank.

DATE

July 2009

allotments



TITLE OF WORK

ALLOTMENT OF MUNICIPAL INITIATIVE OF BAIRRO DA BOAVISTA

Lisboa Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The redevelopment of the urban fabric of the neighborhood of Boavista involve full demolition of existing buildings in the designated "Bairro da ALvenaria", and predicted a housing project with 922 units, spread over 9 residential lots, complemented with a lot of trade and three lots equipment and is supported in the current road network for which the effect is properly restructured. The subdivision covers an area of **21 hectares**.

PROJECT DESCRIPTION

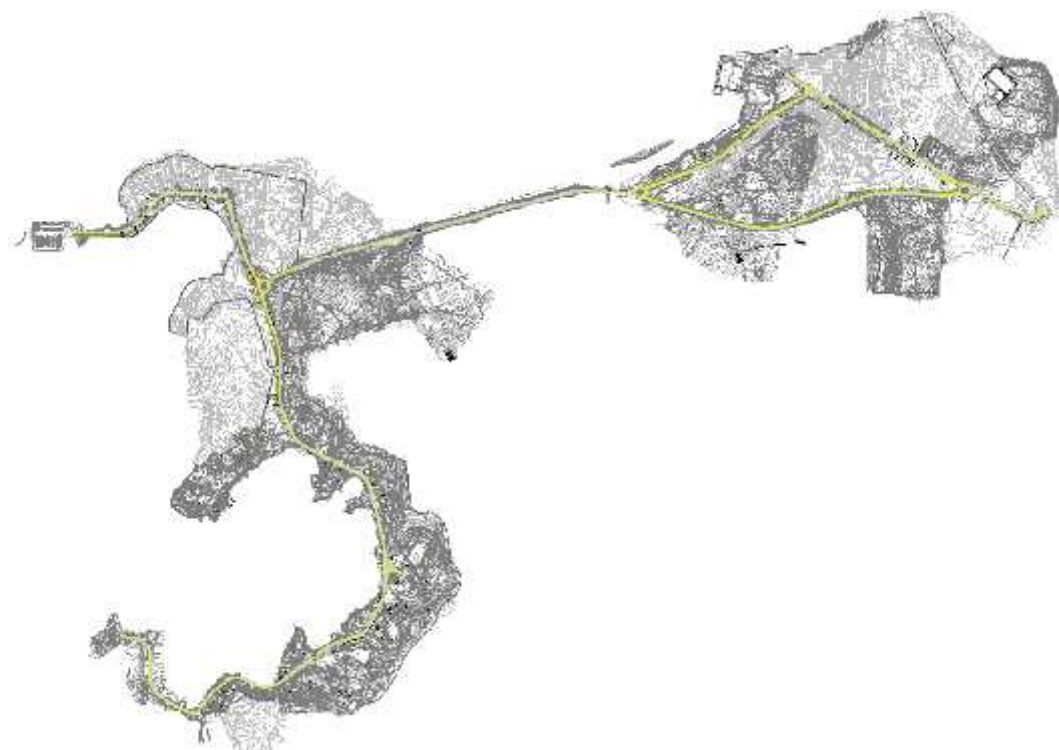
DUCTOS was responsible for preparing the Detailed Plan level of specialties:

- **Infrastructure Roads**, with 2.1 km of roads,
- **Sanitation Infrastructure**, with 3.2 km of sewers,
- **Water Supply Infrastructure**, with 1.9 km of pipes,
- **Infrastructures Fuel Gas Pipeline**, with 1.7 km of pipes.

DATE

July 2009

allotments



TITLE OF WORK

MACROSTRUCTURES OF CARVALHAL E DA LAGOA
Grândola Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The project consists in the implementation of infrastructure allocated to urban centers Carvalhal and Lagoa given the population growth forecast for the horizon year of the project and whose urban area extends over **135 hectares**, with an estimated population of 5500 inhabitants future

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of projects for the following infrastructure:

- **Roads Infrastructure**, comprising 9.0 km of roads;
- **Water Supply Infrastructure**, the infrastructure has been set for the pipeline system (pickup holes), reservation system (reservoirs) and distribution system (ductwork with 8.0 km);
- **Sanitation Infrastructure**, comprising a network infrastructure collectors wastewater with 8.0 km long, 5 pumping stations and two wastewater treatment plants assigned to each core;
- **Combustible Gas Pipeline Infrastructure**, comprising its distribution network of natural gas.

DATE

April 2006

allotments



TITLE OF WORK

ALLOTMENT OF THE REIS MAGOS

Santa Cruz Council – Madeira

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The project includes the construction of single-family houses, apartment blocks, a golf course, a park and Waterpark hotel units, with a total area of **66 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of projects relative to the following infrastructure:

- **Infrastructure Roads**, with 7.0 km of roads,
- **Water Supply Infrastructure**, with 7.5 km of distribution network,
- **Sanitation Infrastructure**, with 13.0 km of sewers.
- **Infrastructures Fuel Gas Pipeline**, with 13.0 km of pipelines.

DATE

April 2003

allotments



TITLE OF WORK

ALLOTMENT OF THE HERDADE DA AROEIRA

Almada Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The venture Aroeira Estate is the largest residential complex and golf in Greater Lisbon and offers 2 championship golf courses, 18 holes, golf school, clubhouse with restaurant, snack bar, apartments and villas, tropical pool, fields tennis courts and a shopping area, occupying a land area of **350 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of projects relative to the following infrastructure:

- **Roads Infrastructure**, with 12.5 km of roads envisaged
- **Water Supply Infrastructure**, with 13.0 km of pipelines,
- **Sanitation Infrastructure** in storm water drainage component (with three retention basins and network of gravity sewers) and residual household (with five pumping stations and associated pipelines pumping with network connection gravitational collectors projected) with a total of 20 km collectors,
- **Infrastructures Fuel Gas Pipeline**, with 13.0 km of pipelines.

DATE

April 2000

tourism developments



TITLE OF WORK

TOURISM DEVELOPMENT AZORES GOLF COURSES

Ponta Delgada Council – Açores

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

Tourist development and housing, consisting of Hotel, apartments and townhouses, built on the existing golf course.
The resort covers an area of **117 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of projects relative to the following infrastructure:

- **Roads Infrastructure**, with the definition of 4.6 km of roads,
- **Infrastructure Sanitation** component of the storm water drainage and domestic waste, the latter being subdivided into gravity drainage system with 1.1km network of sewers, lift system with two pumping stations and associated pipelines connecting the aerial treatment system with two WWTP ,
- **Water Supply Infrastructure**, which includes the pipeline system, reservation and distribution with 4.1 km of pipes,
- **Infrastructures Fuel Gas Pipeline**.

DATE

April 2006

tourism developments



TITLE OF WORK

TOURISM DEVELOPMENT OF MONTE SANTO

Lagoa Council

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

Tourism venture composed of single-family houses, apartment blocks, club house, swimming pools and playing fields. The resort covers an area of **8 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of projects relative to the following infrastructure:

- **Roads Infrastructure**, with the definition of 1.7 km of roads,
- **Infrastructure Sanitation** component of the storm water drainage (2.7 km of sewer network), and drain residual domestic (gravitational drainage network with 1.8km of sewers and lift system with a pumping station and their conduct),
- **Water Supply Infrastructure**, which includes the pipeline system, reservation and distribution with 3.2 km of pipes.

DATE

November 2007

tourism developments



TITLE OF WORK	TOURISM DEVELOPMENT OF MEIA PRAIA BAY RESORT Lagos Council
AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT	Tourism enterprise, integrating three separate lots. Lot 4 is as integrated tourist village apartment blocks. Lot 52 and Lot 53 spaces comprise hotel and a conference center in the latter. The project occupies an area of 14 hectares .
PROJECT DESCRIPTION	DUCTOS was responsible for the preparation of projects for the following infrastructure: - Roads Infrastructure , with the definition of 2.0 km of roads, - Infrastructure Sanitation component of the storm water drainage and drainage of residual household with 2.4 km of sewer network, - Water Supply Infrastructure , with 3.4 km of pipes, - Infrastructures Fuel Gas Pipeline , with 0.7 km of pipelines and two gas tanks.
DATE	June de 2010

marinas



TITLE OF WORK

MARINA OF FERRAGUDO

Lagoa Council.

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The project comprises a set of buildings that are distributed in the surrounding North and South of the marina, disposing of this capacity for 319 boats, limited by a wraparound promenade. The north building will include a hotel and a set of 82 tourist apartments.

The South envisages the construction of residential and commercial district administration. This distribution will be for 29 single-family dwellings and tourist rental apartments with capacity for 335 housing units.

The project occupies an area of **18 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of projects for the following infrastructure:

- **Roads Infrastructure**, with the definition of 2.3 km of roads,
- **Infrastructure Sanitation** component of the storm water drainage, with 2.1 km of sewer network, and residual domestic drainage, drainage gravity with 1.6 km of sewer network and lift system with a pumping station and their conduct,
- **Water Supply Infrastructure**, with 6.3 km of pipes,
- **Infrastructures Fuel Gas Pipeline**,
- **Urban Solid Waste**.

DATE

June de 2009

marinas



TITLE OF WORK

MARINA OF PORTIMÃO

Portimão Council.

AREA OF CONSTRUCTION AND DESCRIPTION OF THE DEVELOPMENT

The project consists of 3 zones built, destined to exploration for Tourist and Real Estate, including areas in the basement for parking and technical areas:

- Sector A - Exploration Tourist
- Sector B - Exploration Tourist and Real Estate
- Sector C - Exploration Tourist and Real Estate

The project occupies an area of **26 hectares**.

PROJECT DESCRIPTION

DUCTOS was responsible for the preparation of projects for the following infrastructure:

- **Infrastructure Roads**, with 1.5 km of roads envisaged
- **Infrastructure Sanitation** component of the storm water drainage, with 1.5 km of sewer network, and residual domestic drainage, drainage gravity with 2.0 km of sewer network and lift system with a pumping station and their conduct,
- **Water Supply Infrastructure**, with 2.0 km of pipes.

DATE

March 2001

Adress Lisbon-Portugal



contacts

Contact: José Vieira de Sampaio
Email: jvsampaio@ductosgroup.com

Mobile: +351 917 619 228
Office: +351 218 455 020
Fax: +351 218 455 039

Website: www.ductosgroup.com

Address: Rua João da Silva, N. 24 A
1900-271 Lisboa – Portugalgal



DUCTOS
GROUP