

## Ductile Iron



### Description

Ductile iron, obtained by a special magnesium treatment, has an elastic behaviour which confers outstanding mechanical properties upon the metal. All the water supply castings, pipes and fittings, that are made of ductile iron can benefit from its outstanding mechanical properties. Being extremely tough and robust, they can withstand high external loading and changes in their environment without damage: ie, ground movements, pipe undermining or bedding destabilisation, without fracturing, cracking or disjoining.

The mechanical properties of ductile iron, combined with flexible rubber gasket joints, have resulted in the development of robust, flexible pipe systems, capable of withstanding the operating conditions or adverse site conditions without damage. Ductile iron pipes now constitute the best engineered offer in the market for medium-and large-diameter pipes. Above and beyond the mechanical properties of ductile iron, they are able to withstand, not only high continuous service regimes, but also any overpressures and water hammer, without deterioration or effect on the life of the installation.

### Features

- ✓ **MECHANICAL STRESSING**  
External loads , Undermining and unstable grounds , Site environments
- ✓ **OPERATING STRESSES**  
Withstands High pressures , Exceptional regimes
- ✓ **ADAPTABILITY AND DURABILITY**  
External coating performances , TT coatings, for very aggressive soils , Protection against ageing.
- ✓ **DRINKING WATER PROTECTION**  
Internal lining performances , Durability of installations, Compatibility with drinking water.
- ✓ **SYSTEMS EASY TO LIVE WITH**  
Modularity , Easy laying of socket joint systems , Operational durability

## Specifications

### PIPELINE LEAKTIGHTNESS UNDER PRESSURE

- ✓ Absence of leaks
- ✓ Protection of drinking water conveyed
- ✓ Reliability and continuity of service

### MATERIAL IN CONTACT WITH DRINKING WATER

- ✓ Assurance of high quality drinking water
- ✓ Guarantee of compliance with national legislations or regulations

### SUSTAINABLE DEVELOPMENT

- ✓ Savings on materials and energy
- ✓ Long term reliability of water networks, for lifetimes of over 100 years
- ✓ Increased durability