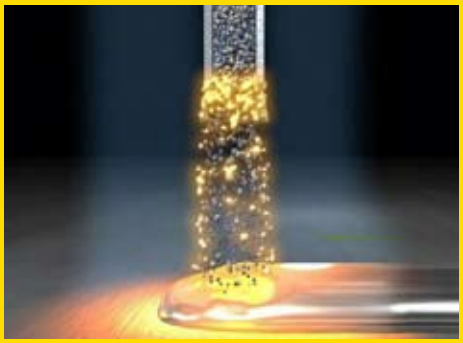
Gas shielded welding cored wire technology for wear protection & repair

EnDOtec® DO*23



- Tough nickel-iron matrix dispersed with fine spheroidal graphite
- Low heat input reduces Heat Affected Zone
- Highest resistance to hot & cold cracking
- Dissimilar joining capability between cast irons & steel

WELDING

Castolin Eutectic®
Eutectic Castolin

EnDOtec® DO*23

*Wheel hub wearfaced with DO*23*

Drive sprocket protected against friction combined with pressure

Features & Benefits

Alloy type	Microstructure	Properties
Ni-FeMn	Austenitic + SG	Tensile strength ~470 MPa Yield strength ~350 MPa Elongation ~15% Hardness ~190 HV

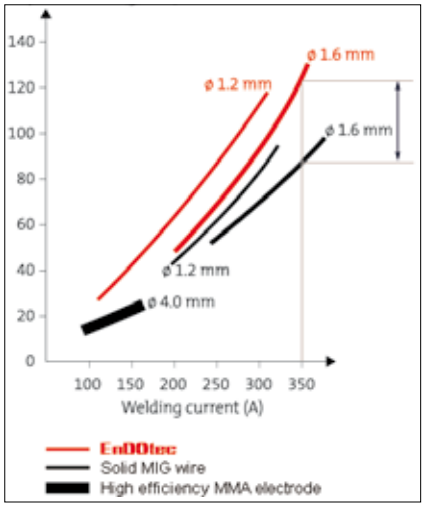
- Tough nickel-iron matrix dispersed with fine spheroidal graphite
- Low heat input reduces Heat Affected Zone
- Preheating & Postheating normally not required
- Highest resistance to hot & cold cracking
- Dissimilar joining capability between cast irons & steel
- Reduced residual stresses allow thick welds (~3cm)
- Slag free, machinable deposits
- Rust resistant welds
- Deposits can be chromium plated

Applications

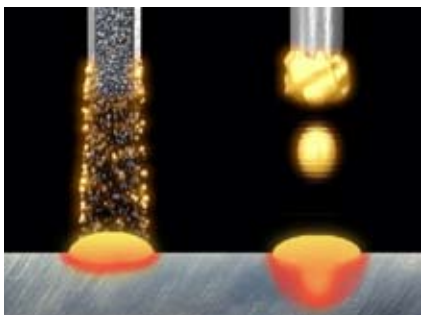
For semi-automatic & robotic welding applications.
Weld repair of cracks / joining Spheroidal Graphite, malleable & grey flake cast iron castings to low carbon steels. Modification or rebuilding machining errors or worn cast iron tools & dies, pump & valve casings, engine blocks in automotive, machine workshops, foundry, textile industries.

Higher weld deposition rates

EnDOtec®'s composite cross sectional design, automatically produces a higher current density in the electrode's metallic periphery over solid MIG/MAG wires of the same diameter using the same welding amperage.
This ensures over 30% faster electrode fusion without sacrificing weld quality giving record weld deposition rates over MIG/MAG and Manual Metal Arc processes.



Peripheric cool arc concept



Thanks to EnDOtec®'s intrinsic higher current density, a cored wire can always be welded at lower amperages than a solid wire whilst keeping a stable metal transfer across the arc due to ionising elements in the core. Lower heat input means that EnDOtec® welds have better bonding, lower dilution, superior microstructure properties and minimal heat affected zones for maximum service performance.

Your resource for protection, repair and joining solutions

Castolin Eutectic
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