

## ZIRCALLOY® AND ZIRCALLOY® SUPER INOCULANTS FOR GRAPHITIZING TREATMENT

Such chemically active components as **Al, Ca** and **Zr** in combination with high-concentration silicon make it possible to efficiently treat molten iron for further production of ductile cast irons with low content of sulfur.

### **Treatment of molten iron makes it possible to:**

- prevent appearance of chilling defects in thin-walled castings
- promote uniform distribution of graphite in the structure of the melt
- enhance the mechanical properties of cast iron
- neutralize the harmful influence of nitrogen that leads to the formation of gas- and shrinkage-related porosity defects.

**Addition of manganese to the ZIRCALLOY® Super inoculant makes it possible to slow down the weakening of the spheroidizing effect** during long periods of pouring large amounts of molten metal into pouring ladles.

### **Standard sizes of inoculant particles:**

- 0.5-6 mm for inoculants introduced into the molten metal as it enters a ladle
- 0.2-0.8 mm for inoculants introduced into the molten metal as it enters a mold
- Cored wires

In the case when molten metal is poured into a ladle, 1-3 kg of inoculants is consumed per 1 t of iron. In the case when molten metal is poured into a mold, twice as small an amount of inoculants may be consumed.