SAND CASTINGS







PRIMARY PROCESS

- PATTERN MAKING
- SHELL MOULDED CORES
- GREEN SAND MOULDING
- RESIN SAND MOULDING

SECONDARY PROCESSES

- SHOT BLASTING
- PRIMER PAINTING/PAINTING
- COATING
- MACHINING
- ASSEMBLE & TESTING

MATERIALS

- STAINLESS STEEL
- CARBON STEEL
- CAST IRON/SG IRON
- ALUMINIUM BASED ALLOYS
- COPPER BASED ALLOYS

Widely used method of producing small & large metal castings - both ferrous and non ferrous - by pouring molten metal into a sand mould comprising a mixture of silica sand and clay (known as 'Greensand') or silica sand and chemicals (generally known as 'Air set'). Sand castings can be made from a variety of materials including iron, steel, bronze, brass, aluminium and magnesium.

Less expensive than other systems, this form of production allows the casting of complex shapes, weighing from a fraction of a kilo to several tonnes. Although the surface finish of Airset and Greensand castings often shows evidence of sand grain this can simply and effectively be removed by secondary processing.

Shell moulded castings also fall into the sand casting category, where the mould material is made from sand and a thermo setting resin. Shell moulding offers a good surface finish and good dimensional tolerances.