



Company Information

Founded in 1989, Fusion Babbitting Company is a quality, service oriented company specializing in the rebuilding of babbitt-lined bearings. Fusion services many major OEM manufacturers in the area of rebabbitting as well as manufacturing new bearings. We offer 24 hour emergency service when required. We have a unique process, which enables us to guarantee 98 to 100 percent bond to the bearing shell. We can centrifugal cast bearings from 1" bore diameter up to 52" outside diameter and deliver a completely refurbish babbitt-lined bearing faster than any company today. All bearings are ultrasonically tested for bond.

Fusion uses the latest and most efficient equipment in the bearing rebuilding procedure. This equipment is operated by a staff of specialists with combined experience of over 38 years in bearing rebuilding.

Fusion is eager to be your "Rebabbitting Source." You'll get our personal guarantee that your rebuilt bearings will be as good as, or even better than new. Each bearing will be thoroughly inspected with ultrasonic and dye penetrant so they match all specifications. Assign your next rebuilding project to Fusion, the Bearing Rebuilding Specialists.

Fusion is capable of rebuilding the following: Three Lobed Bearings, Plain (solid and split) Journal Bearings, Babbitt Liners, Exciter Bearings, Fan Bearings, Fan Motor Bearings, Generator Bearings, Hydro Guide Bearings, Hydro Guide Shoes, Motor Bearings, Oil Deflector Seals, Pinion Stand Bearings, Pump Bearings, Tapered Land Thrust Plates and Thrust Shoes, Tilt Pad (journal/thrust) Bearings, Trunion Bearings, Turbine Bearings, 3 pc. Upper & Lower Guide Bearings.

Superior Methods of Repair: Centrifugal casting up to 52" OD; tig welding; oxygen acetylene repairing and static pouring; hydrostatic and ultrasonic testing; dye penetrant inspection; final inspection reports provided; water jacketed bearings cleaned and pressure tested for leaks. All procedures meet or exceed OEM specifications.

Applications:

Quality Control is Our First Priority: Babbitt bearings of all types are centrifugally cast and machined to meet or exceed the original manufacturer's specifications. Bearing shells are carefully examined for mechanical flaws and purified. Our Certified Technicians use ultrasonic testing and dye penetrant inspection to guarantee babbitt-to-shell bond.

Industries Served: Aluminum Mills; Cement Plants; Chemical Plants; Crushed Stone and Lime Producers; Fossil Plants; Hydro/Pump Storage Plants; Mines; Motor Repair Shops; Nuclear Plants; OEM's; Shipyards; Steel Mills; and Paper Mills.

Fusion Babbitting also can perform arc spray to restore bearing seat areas.



Standard Bearing Procedure

1. Identify the OEM of bearing.
2. Prepare standard re-babbitt and re-machine routing.
3. Pull drawing; if drawing is not available a print will be made.
4. Take digital camera pictures at incoming inspection.
5. Remove hardware, label and store for reassembly.
6. Measure and record the outside diameter, inside diameter and length.
7. Sign the incoming routing prior to releasing the bearing.
8. Existing babbitt will be removed by machining, or submerging the shell completely in the tin tank, which equalizes the heat and reduces the distortion as opposed to melting with a torch.
9. Check all water-cooled bearings for leaks; if bearing water jacket leaks, the customer will be notified and the water jacket will be repaired by a local company, which will impregnate the water jacket.
10. Perform Kolene cleaning; this purifies the shell from all impurities and removes the film of graphite, which will allow for a 100% tin bond.
11. Submerge all bearing shells into an acid, flux, and tin bath.
12. Assemble all bearing shells. Preheat in the tin bath by submerging the entire shell, which will bring the shell up to proper pre-heat temperature equally and minimizes distortion.
13. Centrifugal cast all bearings.
14. Completely pre-machine the bearing.
15. Perform ultrasonic inspection to assure a good bond. Fusion Babbitting Co., Inc. guarantees a 98% to 100% bond for all bearings.
16. Completely clean the bearing and verify all holes are cleaned and open.
17. Perform and document final inspection.