

Breathing New Life into Old Equipment, with Innovative Solutions!

Case Study Multi-Stage Split Cartridge, Barrel (BB5)



Duty & Fluid	OEM & Designation	Materials
Boiler Feed Pump. Water	Siemens Delaval 7 stage Type 5BB81510	Carbon Steel Hydraulic components, Stainless Steel shaft.

Challenge

The customer in Cairo Egypt operates 12 pumps of this type in 4 steam trains. They require the overhaul of 2-3 cartridges every other year. The pumps suffer from substandard operational conditions and the local maintenance team dis- and re-assemble these on a regular basis. The OEM quotes excessive lead times and cost and refuse to refurbish any parts, i.e. only offer complete new cartridges.

We have been overhauling these units for the customer for over 15 years and are usually required to come to site and select suitable old parts to build 2 or 3 new cartridges. The rotating parts are usually beyond repair, but the casing parts are serviceable. The customer requires complete reverse engineered rotor and refurbishment of the cartridge, ready for service in 24 weeks.



Presentation of cartridges and parts on site.

Solution

Pinnacle Re-Tec select suitable parts and transport them back to the UK for refurbishment. All parts have been reverse engineered so that we can start production of all new parts as soon as we have a PO and don't need to wait for sample parts. The casing parts are refurbished and assembled together with the rotor to form a complete ready to install cartridge. The shipment usually also includes parts that are added during the assembly on site such as balance drum and sleeves.

New impellers, old and new balance drum and sleeves and final skimming of rotor post assembly for balancing



To see how Pinnacle Re-Tec can help you with cost effective pump repairs and innovative solutions to increase MTBF please call us on 01207 588 731 or email info@pinnacle-re-tec.co.uk

**Breathing New
Life into Old
Equipment, with
Innovative
Solutions!**

Case Study Multi-Stage Split Cartridge, Barrel (BB5)



Duty & Fluid	OEM & Designation	Materials
Boiler Feed Pump. Water	Siemens Delaval 7 stage Type 5BB81510	Carbon Steel Hydraulic components, Stainless Steel shaft.



Benefit

Reverse engineering and manufacturing inhouse ensured that not only did our client benefit from a cost effective pump repair solution. The added benefit is our capability to repair damaged parts and re-use all serviceable parts to minimise the cost. In this case, our approach has resulted in repeat orders every other year from a very satisfied customer.



Result

Customer received a complete refurbished cartridge assembly, fitted in the new rotor within the 24 week deadline. Pinnacle RE-Tec provided client with an improved, faster and cheaper pump repair compared to the OEM. The customer has repeated the same order every 2 years, all 12 pumps in the power-station are now from Pinnacle RE-Tec.

To see how Pinnacle Re-Tec can help you with cost effective pump repairs and innovative solutions to increase MTBF please call us on 01207 588 731 or email info@pinnacle-re-tec.co.uk