

# Column Pump Refurbishment



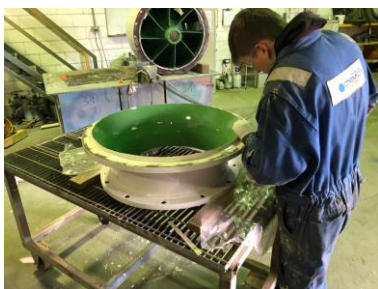
Condition in situ



Reinforcing diffuser leading edges



After First Coat



Detailing flange faces of impeller casing



(Intermediate) Column Externals

<b>Industry</b>	Power Generation
<b>Date</b>	April 2018
<b>Substrate</b>	Cast Iron Pump
<b>Products</b>	<p><i>Internals</i>, <a href="#">Chem-TECT™ RB 364</a> a glass flake filled vinyl ester. <a href="#">Ceram-chem™ RP 500</a> a ceramic filled epoxy.</p> <p><i>Externals</i>, <a href="#">Epo-chem™ RS 500P</a> a surface and moisture tolerant primer. <a href="#">Epo-chem™ RA 500M</a> a glass flake filled epoxy.</p>
<b>Environment</b>	Ambient Salt Water
<b>Challenge</b>	Chemco were brought in to carry out pump refurbishment after catastrophic failure of bearing causing the impeller to wear through the casing
<b>Chemco's Solution</b>	Refurbish pump lining to extend service life using glass flake filled coatings, then top coated using RP 500 to improve fluid flow efficiency.
<b>Scope</b>	<p>Abrasive blast to AS.1627.4 to class 2.5</p> <p>Masking and protection of critical tolerances and bush area on flange.</p> <p>Pit filled to allow smooth transition and prevent coating defects</p> <p>Sand smooth where necessary &amp; application of RB364 to 1,000µm</p> <p>Internal &amp; external holiday testing to ensure coating continuity using the required voltage to suit the dry film thickness.</p> <p>Application of the top coat <a href="#">Ceram-chem™ RP 500</a></p>
<b>Results</b>	Improved corrosion resistance and fluid flow efficiency through the quality assurance process employed by Chemco.