

Generator End Ring

Why stainless?

- Non magnetic
- Good mechanical properties.

Fabrication process:

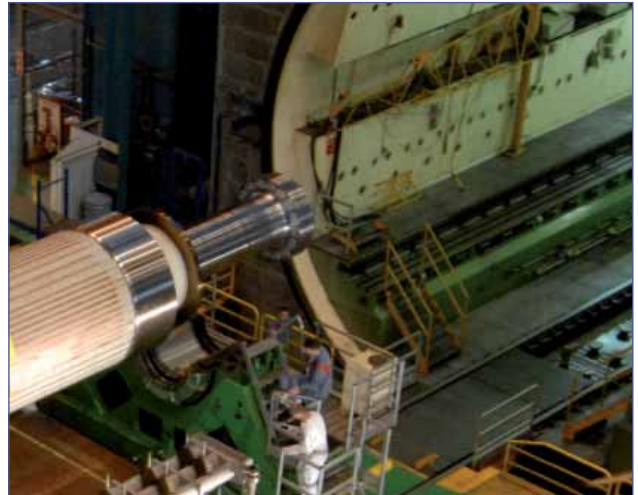
The ring, with a bore of between 0.6 and 1.6 m, is obtained by forging, heat treating and machining.

Grade:

DIN: 1.3816.

Manufacturer:

Alstom Power SA, Switzerland (alstom.ch).



The diameter of the end ring of a turbo generator can be between 0.5 and 1.6 metres. The end ring must pass stringent tests to ensure it can operate without deformation at speeds ranging from 3,000 to 3,600 revolutions per minute. A 20% overspeed test is also conducted before the end rings are passed for use.

Non-magnetic stainless steel reduces the losses in the ring that are caused by eddy currents and thermal stresses. The steel also possess a high yield strength in order to avoid plastic deformation due to the high stresses produced by the shrink-fit and centrifugal forces

Image courtesy of Alstom Switzerland SA, Switzerland.

