

Vanes equivalent to Siemens V64.3A / SGT-1000F and Ansaldo AE64.3A

Sulzer provides design and manufacturing of new gas turbine components in both hot and cold sections. We focus on lifetime extension and performance improvement of your equipment. We have unique insight into designing a high quality product that is compatible with the original equipment. All vane kits include installation hardware suitable for installation in Siemens V64.3A / SGT-1000F and Ansaldo AE64.3A gas turbines.

First stage vane

The first stage vane is manufactured through an investment casting process using a cobalt-based super alloy for maximum durability. The first stage vane features fan shape film cooling holes, leading edge shower head cooling, trailing edge cooling and internal impingement cooling. Sulzer applies Thermal Barrier Coating (TBC) to protect the base material from oxidation and corrosion. In addition, TBC will prevent the base material from overheating and reduces thermal gradients along the hot gas path. This effect produces improved durability resulting in lifetime extension. Internally, an aluminum diffusion coating is applied for protection against intergranular attack.



First stage vane

Design	Single vane piece
Cooling	Internal impingement cooling, leading edge shower head cooling and airfoil fan shape cooling holes
Material	Cobalt-based super alloy
Coating	External 100% coverage TBC and internal aluminum diffusion coating
Auxiliaries	All installation hardware included

Second stage vane

The second stage vane is also manufactured through an investment casting process using nickel-based super alloy. The second stage vane features an internal serpentine cooling passage, trailing edge cooling, airfoil film cooling holes and leading edge shower head cooling. The second stage vane is protected with TBC and an internal aluminum diffusion coating against oxidation, corrosion and thermal gradients.



Second stage vane

Design	Single vane piece
Cooling	Internal serpentine cooling passage, leading edge shower head cooling and impingement cooled outer shroud
Material	Nickel-based super alloy
Coating	External 100% coverage with TBC and internal aluminum diffusion coating
Auxiliaries	All installation hardware included

Third stage vane

The third stage vane is also manufactured through investment casting using a nickel-based super alloy. The vane is internally cooled by impingement cooling. The third stage vane is externally coated with a MCrAlY coating and internally with an aluminum diffusion coating.



Third stage vane

Design	Single vane piece
Cooling	Internal impingement cooling and trailing edge cooling holes
Material	Nickel-based super alloy
Coating	External MCrAlY coating and internal aluminum diffusion coating
Auxiliaries	All installation hardware included