

FAIRINGS: DESIGNED FOR OPTIMAL PERFORMANCE



Fairings provide unrivaled protection against vortex-induced vibration (VIV) forces by streamlining the flow of currents around a tubular, effectively dispersing the vortices that cause oscillating forces on its surface. Fairings are designed to rotate freely around the tubular and self-orient with the tail pointing downstream.

One key advantage of fairings is that they significantly reduce drag. Fairings are especially beneficial in high-current regions, or near the top of the water column where surface currents dominate. Tail geometry can be customized to achieve maximum performance. Additionally, fairings are somewhat less susceptible to marine growth performance degradation than other types of suppression devices.

Thrust collars are installed between fairing bodies and serve as a bearing surface for fairing rotation. They help the fairings maintain their axial position along the riser string. Specialized collars are used on tubulars with insulation to accommodate diameter changes caused by hydrostatic shrinkage.

VIV Solutions™ fairings are fast to install in the field regardless of installation method. Onshore, vessel (including s-lay, j-lay, and reel lay), and underwater retrofit operations have all been performed successfully. A complete installation toolkit accompanies each order and is ready for immediate use offshore.

We conduct full-scale factory acceptance testing of both fairings and collars to confirm that they are properly sized for the tubular. The collars are also load-tested to ensure zero slippage. A third-party laboratory conducts a thorough material qualification program for each project.

Quality control and safety are integral parts of our manufacturing process. The fit and finish of each fairing is visually confirmed during assembly. We employ repeatable methods to ensure that the material is heated to an appropriate temperature before it is removed from the mold. Experienced technicians package and secure the equipment for offshore transport. A detailed data book accompanies delivery of the fairings and includes items such as assembly drawings, material certifications, inspection reports, job safety analyses, and shipping records.

For additional information about VIV Solutions fairing products, please contact us or visit us online. We look forward to working with you on your next suppression project.

Common fairing design parameters*:

Fairing efficiency = 90% or greater

Drag coefficient = 0.5-1.0

**Values are dependent upon factors such as surface roughness, coverage density, etc.*

VIV Solutions
THE VIV SUPPRESSION EXPERTS