



Flame Arrester

The Flame arrester protect storage, distribution and chemical process facilities containing Flammable gasses from fire and explosions. It is an effective device that isolate source of ignition and allows vapour to flow freely in venting and collection system. The most effective method of quenching flame is to install these . Flame arrester either at the strategic point along with pipe work system or at end of pipe line where gas/vapour are being vented into atmosphere. These Flame arrester operates on the principle; removing of heat from the flame, as it attempts to travel through narrow passages with wall of metal or other heat conductive materials. For instance these Flame Arresters employ layers of metal ribbons with crimped corrugations.



Available types of flame arresters.

	<p>Crimped Wound Metal Ribbon Element: The construction produces a matrix of uniform opening. Which are carefully constructed to quench flame by absorbing the heat of the flame. This provides an extinguishing barrier to the ignited vapour mixture.</p>
	<p>End of Line Bi Directional: End of line flame arrester are designed for unconfined deflagration and also for Atmospheric explosion. They can be simply mounted on the tank nozzles. This end of line flame arrester provides maximum flow capacity with minimum pressure drop. It also provides less maintenance and service.</p>
	<p>End of Line Free Vent: This free vent is combination which allows free venting and Protect from fire hazards. They prevent flame transmission by absorbing & dissipating heat using crimped ribbon corrugated spiral wound flame element. Free vent is used only for vertical mounting application.</p>
	<p>In Line Bi Directional: This Horizontal In Line Bi Directional Flame Arrester are designed to prevent the propagation of confined low pressure deflagration. Low pressure deflagration means the flame front travels below the speed of sound with minimal pressure increase caused by the expanding boundary layer.</p>
	<p>Deflagration type In Line Bi Directional: This high pressure deflagration arrester are designed to protect against high velocity and pressure flame front. The arresters are Bi Directional and can stop Low, Medium and High pressure Deflagration. This design provides multiple layers of flame element which offers maximum flow to pressure.</p>