



## Description

Air assist flares smokeless dispose of heavier waste gases which have greater tendency to smoke. Air assist flares can be employed at sites where steam may not be available.

Air flare systems are composed of two concentric risers and one or more blowers providing supplemental combustion air. A blower forces air into an outer air annulus where the process gas passes through an inner riser and upon reaching the flare tip, these two streams intermix. This air assist has three principle effects:

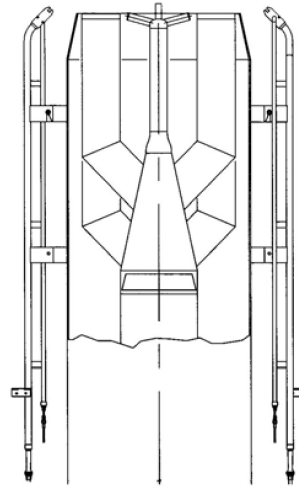
- High-pressure airflow causes turbulence in the waste stream which improves mixing and therefore enhances combustion efficiency.
- Additional air is induced into the waste gas providing the oxygen necessary for augmented smokeless capacity.
- Constant airflow creates a cooling effect for extended flare tip service life.

## Advantages

- High smokeless rates due to superior mixing
- Capable of burning heavier hydrocarbons smokeless
- Extended service life
- Lower operating costs at a given smokeless rate
- Lower radiant heat at a given capacity
- Stable, reliable combustion
- Wide range of flow capacities

### Principle Applications

- Petroleum refining
- Petroleum production
- Chemical processing
- Pipeline transportation
- Tank and barge loading facilities
- Natural gas compression and production



ENVIRON AIR  
FLARE TIP

### Specifications

<b>Dimensions:</b>	Length:	6' – 10' (1.8m – 3.05m)
	Diameter:	3" – 84" (DN75 – DN2100)
<b>Materials:</b>	Tip Body:	304, 316, 310 SS Incolloy 800H
	<b>Models:</b>	MAVP: High Pressure Vapors SFVP: Low Pressure Vapors Environ: High Capacity

### Design Features

- Large air/fuel boundary to increase smokeless capacity
- Dynamic/velocity seal to reduce purge gas expenses and prevent flashback
- High alloy construction in the heat affected zone
- One or more blowers for greater smokeless range