



COLIBRÌ'

Multipurpose Plasma System

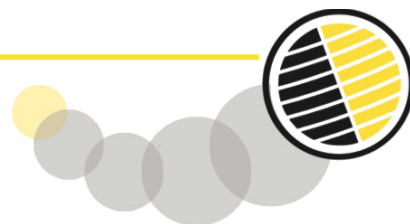
Colibrì is a bench-top plasma system, designed for surface cleaning, modification and activation.

It can operate on different materials such as metals, plastic, ceramic, paper and others.

The user friendly control interface makes the Colibrì an easy and versatile solution for small productions or R&D environments.



Sistemi di Processo
Caratterizzazione Superficiale
Strumentazione Controllo di Processo
Prodotti di Consumo
Prodotti Gambetti



Principle of operation

The **Colibri** system is completely controlled by a **microcontroller**. With this system it is possible to carry out treatments simply by executing one of the 9 recipes that can be edited by the user. Using an **high precision needle valve**, a controlled flow of gas is introduced into the process chamber. A low frequency signal (50 kHz) is applied to the electrodes inside the chamber, this interacts with the gas molecules thus triggering the plasma. The plasma generated provides the **reactive ion species** that interact with the first monolayers of the surface of the substrate to be treated. The resulting process can be changed by acting on the process parameters (gas flow, signal strength, duration ...)

Product Features

- Bench-top plasma system , easy and versatile
- Able to process up to ten different editable recipes
- Uniformity for Consistent Results
- Long Term Reliability
- Primary brands components used

TECHNICAL SPECIFICATION

Dimensions	W x L x H – Footprint	464 mm x 436 mm x 240 mm
	Net Weight	20 Kg without vacuum pump
	Clearances	Right, Left, Front – 600 mm, Back – 300 mm
Chamber	Material	Aluminum
	Max Volume	2 lt. (128,6 in ³) - Ø 102 mm L 256 mm
Electrode	Electrode Configuration	Plane and parallel With dark shield
	Active work area/Sample tray	83 mm x 250 mm
	Electrode gap	34 mm
	Material	Aluminum
RF Signal	Maw output Power	200W
	Frequency	50 kHz
Process Gases	Manual valve	Aluminum needle valve flow regulator
	Max gases number	1
Control Interface	Control	Microcontroller
	User Interface	Display and panel keyboard
Facility Service	Power supply	Single phase + Earth 220/240 VAC, 8 Amax 50/60 Hz, 13 AWG Single phase + Earth 110/120 VAC, 16 Amax, 50/60 Hz, 10 AWG
	Process Gas inlets, type and dimensions	6 mm OD, Compression Fittings
	Process gas pressure	From 0.8 bar min. to 1 bar max., regulated
	Purge Gas inlets, type and dimensions	6 mm OD, Compression Fittings
	Suggested Purge Gas	N2, Air
	Purge Gas Pressure	From 0.8 bar min. to 1 bar max., regulated
	Exhaust	NW16 ISO-KF
Compliance	International	CE Marked



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