The Rosin Bag as a Flow-Control Device

Engineering the micro flow path in solventless pressing.

THE BAG IS A FLOW-CONTROL DEVICE, NOT A FILTER

During pressing, the bag is a pressurized porous container: heat has thinned the resin, the press is driving it out of the puck, and every gram of extract must pass through the bag wall. How fast it does that is governed by flow-through-a-porous-medium physics, and the bag — not the press — sets three of the variables the press cannot: its **permeability** (mesh, and where seams interrupt it), its **effective flow area** (which surfaces stay open as exits under load), and the **path length** resin must travel to an exit (folds, flaps, and bottom seams lengthen it). Flow rate is not just throughput: faster, channeled flow means shorter press time — less time-at-temperature — while choked flow raises internal pressure until a seam fails. Bag design is a yield, quality, and reliability decision at once.

FOUR WAYS A CONVENTIONAL BAG FAILS

Seam trapping

Stitching in the flow path is a low-permeability wall; resin pools at seams and wicks into the thread.

Blowouts

Choked flow is a flow-path problem: pressure climbs until a seam gives way — and plant material ends up in the extract.

Bottom-seam obstruction

A stitched bottom seam sits across the natural exhaust path — highest flow demand, lowest local permeability.

Taper & flap trapping

Tapered bases collapse under load and close channels; flaps and fold-overs add stagnant pockets where resin cools and is lost.

THE V3.7 DESIGN, FEATURE BY FEATURE

The Access Rosin Improved Rosin Extraction Bag (V3.7) is a fold-over-bottom, side-seam-only, flapless, non-tapered design that forms directional exhaust channels. Each feature targets one failure mode — flow engineering applied to a consumable, not a new micron rating.

V3.7 FEATURE	FAILURE MODE ADDRESSED	WHAT IT DOES TO THE FLOW
Fold-over bottom (no bottom stitching)	Bottom-seam obstruction; seam trapping at the highest-pressure zone	Takes the low-permeability seam out of the primary exhaust path; shortens the path to an exit.
Side-only seams	Seam trapping along the flow path	Keeps stitching out of the flow field — seams run with the flow, not across it.
Flapless geometry	Flap/fold resin trapping; snagging while loading	Removes stagnant pockets and dead volume; smooth interior surface.
Non-tapered base, directional channels	Taper collapse; random choked flow; blowouts	Holds defined channels open under load; relieves internal pressure through controlled exits.
Increased capacity & durability	Overfilled bags; seam stress at high load	Keeps a given charge in a workable pressure window; raises the failure threshold.

THE FIRST STAGE OF THE CLOSED PATH

The bag governs the micro flow path (gland to mesh exit); the press governs the macro flow path (plate, off the heat, into the seated collection cylinder). In the Access Rosin architecture the two are continuous — the bag and parchment are positioned so their geometry defines the internal flow channels, which is why the granted press-system patents recite the bag and parchment as components of the press. A controlled bag makes the press architecture's collection advantages fully effective. The V3.7 bag is the first stage of the same functionally closed collection path described in the companion note — functionally closed, not sealed or hermetic.

An honest boundary. The V3.7 bag design is **patent pending** — an application has been filed, but no bag patent has issued; the granted patents (US 11,040,510 / 11,511,465 / EP 3938197) cover the press system that recites the bag as a component. The claims here are qualitative and mechanism-

based — yield, blowout-rate, and terpene comparisons require controlled testing and are not asserted as numbers. This is engineering design intent, not a medical, therapeutic, or certification claim.
