SACMI
ENDLESS INNOVATION SINCE 1919

PVS 10L

A OFF-LINE QUALITY CONTROL MACHINE FOR PET PREFORMS

Designed to be installed on a preform warehouse, the PVS10L checks for non-conforming production lots. Thanks to D.R.I.V.A. (Drive and Recognize through Vision Algorithm), the format changeover is fully automatic on both machine and feed device, switching from one preform to another in about 1 minute.
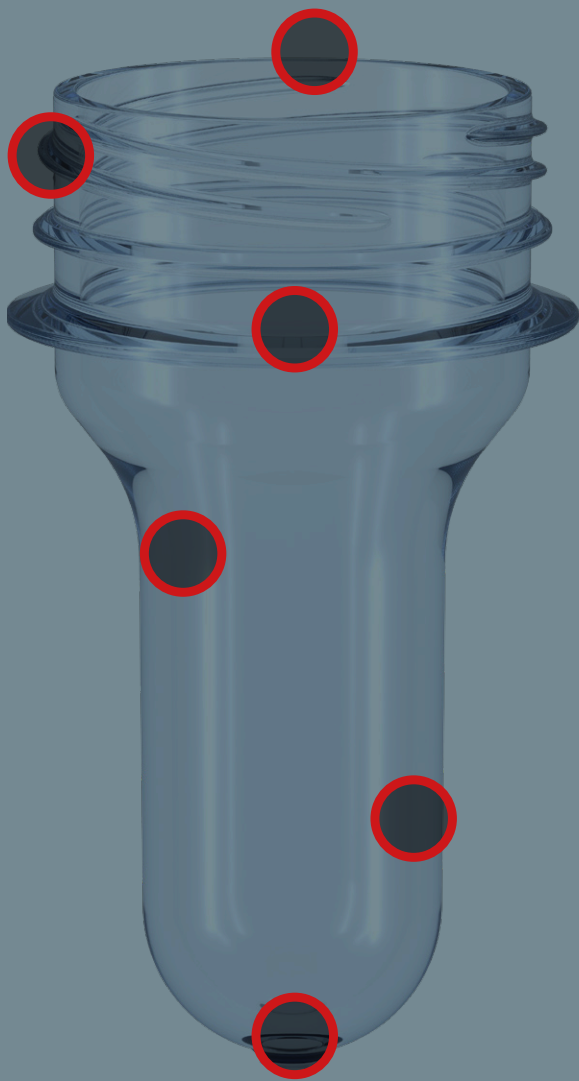
Moreover, the machine introduces innovative AI algorithms that allow identification of flaws with the aid of polarised light and reading of the cavity number. This latter feature makes it possible to efficiently reject all preforms produced from blacklisted cavity numbers and produce a wide range of cavity-related statistics.

TECHNICAL SPECIFICATIONS

- Output rates up to 72,000 preforms/hour
- D.R.I.V.A.: automatic format changeover
- 11 high resolution video cameras
- Patented inspection with polarized light and AI algorithms
- AI algorithm for Cavity recognition
- SACMI PLO030 feeder with automatic format changeover
- Can be combined with any sorting/feeding device
- Precise count of preforms in octabins
- Remote support via intranet/internet

Inspection criteria

TOP SEAL: Contamination, Flashes, Short shots, Notches, Black specks, Indicative measurement of inner and outer diameter, Ovalization

FINISH: Contaminations, Flashes of material on the seaming line, Insufficient material, Black specks

BODY: Inclusions, Black specks, Opacity, Crystallization, Bubbles, Mould dents, Long gate, Colour deviation and inconsistency, Shape, Scratches

BODY USING POLARIZED LIGHT: Orange peel, Pinches, Water marks, Surface deformation, Shrinkages, Semi-transparent crystallization, Mould marks, Thermal degradation

BOTTOM: Crystallization, Pinhole, Inclusions, Off-centre gates, Gate length, Bubbles, Unmelted resin, Black specks