



Active Packaging for Inhaled Drug Products

Customized solutions for unique stability challenges



Your product, actively protected™

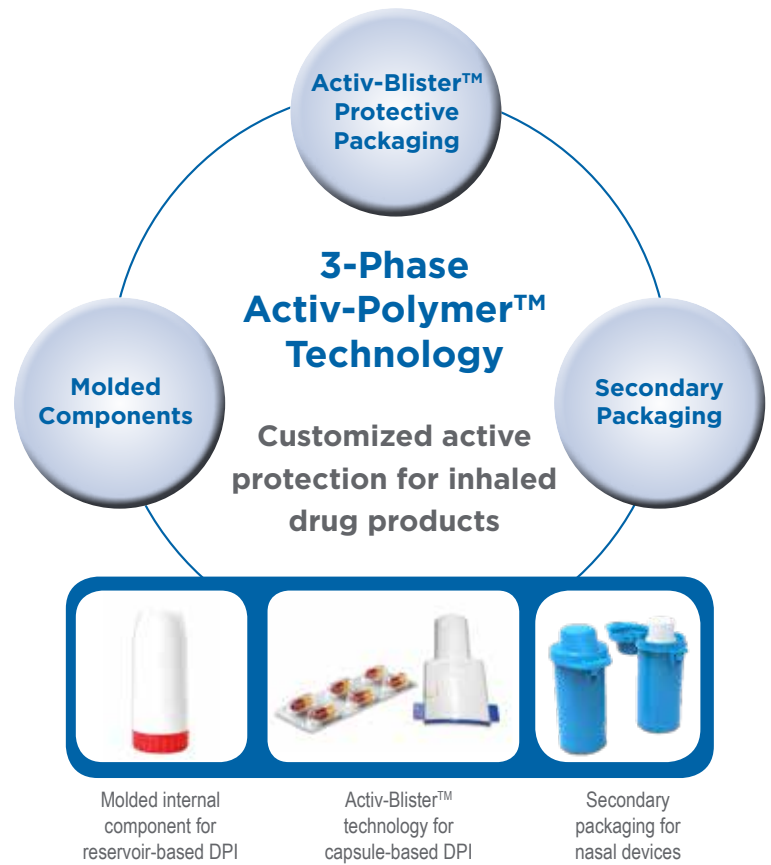
Aptar 
CSP Technologies

Active packaging solutions for inhaled drug products

Inhaled drug delivery systems face unique stability challenges, from keeping powder formulation dry within a delivery system, to controlling the build-up of powder in the delivery channel, to maintaining the integrity of APIs within capsule- and reservoir-based DPIs. No matter your stability challenge, Aptar CSP Technologies can custom-design a solution to meet your needs.

Our proprietary 3-Phase Activ-Polymer™ platform technology can be integrated into virtually any inhaled drug product to adsorb moisture, oxygen or volatile compounds, mitigating failure of product integrity and/or stability. Our complete solutions include:

- Customized active molded components integrated into the delivery device
- Activ-Blister™ technology to ensure greater efficacy and compliance for all capsule-based DPIs
- Secondary packaging with 3-Phase Activ-Polymer™ material inside or Activ-Film™ technology heat staked to foil seal to protect the entire device



Benefits of partnering with Aptar CSP Technologies

- **Extend shelf life**
Advanced product protection for controlling humidity, oxygen and reactive impurities.
- **Better dosage delivery to patients**
Drier environment for the device's delivery pathway reduces build up and ensures better dosage delivery.
- **Seamless integration**
Replace an existing component with an activated component to control the moisture within your device without impacting your design.
- **Full partner from concept to commercialization**
End-to-end development support from design to formulation development, stability, regulatory submission and market launch.



Award-winning **Xcelerate Development Services** designed to expedite time-to-market.

csptechnologies.com

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