Cyberpax Increased Product Quality and Safety using Cascade™ Aerosol Micro Leak Detection System

RESULTS

• 100 percent real-time monitoring and instant detection of aerosol leaks obtained without stopping production
• Enhanced safety and substantial improvement in product quality
• Increased line operating speed up to 220 cans per minute from fewer than 100 cans per minute

APPLICATION

Online leak detection for filled aerosol cans

CUSTOMER

Cyberpax Co. Ltd was formed in May 2001 through a technical agreement between Toyo Aerosol Industry Co., Ltd. (the largest in Japan) and Packserv Co., Ltd. (the largest in Thailand). It is one of the world’s leading contract filling manufacturers.

CHALLENGE

Cyberpax was using the traditional method of leak detection, which involves personnel visually observing bubbles in the waterbath as aerosol cans pass through.

As aerosol manufacturing line speeds increase, many of the world’s aerosol brand owners and subcontract fillers no longer accept this traditional waterbath testing method to identify microleaks within filled aerosol and deem it as an unsatisfactory test method to achieve the desired results and meet regulatory requirements.

When filling lines operate faster than 60 cans per minute, it is not feasible for personnel to identify leaking aerosols in the waterbath. Turbulence caused by the cans moving through the water makes identifying bubbles formed at a rate of one bubble every five seconds extremely difficult.

Failure to identify leaking aerosol cans during production could result in the release of flammable or explosive gases or liquids resulting in product recalls, brand reputation damage or worse—a safety incident.

A critical aspect of many brand owners’ auditing processes is that the subcontract fillers achieve the same level of quality and safety. Indeed in many instances, the awarding of a filling contract by a brand owner carries a mandate that the filler must guarantee the implementation of a microleak detection system.

“Adoption of the Cascade Micro Leak Detection System helped us to meet the stringent safety and quality demands of our clients.”

Manop Doungjai
Project Engineering Manager
Cyberpax Co. Ltd.
PACKAGING

SOLUTION

Cyberpax wanted a reliable leak detection system that not only complies with strict quality control requirements but ensures high quality and safe products for their customers. With the Cascade CT2211 Aerosol Micro Leak Detection System installed after the waterbath, Cyberpax was able to carry out a quantifiable test regime for microleaks. This method ensures that they are fully compliant with pressure and leak test requirements and regulations. The advanced system allows Cyberpax to operate at line speeds of up to 220 cans per minute and automatically rejects leaking cans from the conveyor belts. This enables them to meet the production demands of their customers without sacrificing quality or safety. Cyberpax can also capture batch performance data, which was not available previously. This data supports identifying production issues that would otherwise result in faulty or contaminated cans being released to the market.

RESOURCES

ResourceHeader - Product
emerson.com/en-us/cascade-technologies-ct2211