All things Listeria and combating the deadly bacterium!

What is Listeria?

Listeria monocytogenes (genus listeria) is a bacterium illness that causes listeriosis. Listeria can be found in unpasteurised milk, dairy products, soft cheeses (camembert or brie) and chilled ready to eat foods like prepacked sandwiches, pâte and deli meats. Listeria is well known for serious symptoms that can hospitalise and cause death in certain groups of people, those with weakened immune systems or those suffering from long term health conditions such as Cancer. Listeria can be found in any stage of the process of food manufacturing and food chain adding to the importance of stricter quality control procedures such as using detection products during differing part of manufacturing to prevent the multiplication of this bacteria in food. The challenges for controlling Listeria in particular L.monocytogenes are challenging given its nature and being highly resistant to preservative methods.

Recent Outbreaks

Earlier this year the UK hospitals suffered an <u>outbreak leading to hospitalisation and deaths</u>. It was found the listeria outbreak came from pre-packed salads and sandwiches. Most recently on a larger scale, Spain issued an international alertdue to the largest ever outbreak of Listeria that killed and hospitalised many people. This has got back under control however; Listeria still proves to be a bacterium that is hard to prevent and manage once developed and multiplied.

Our genesig Listeria monocytogenes kits provide rapid detection of all clinically relevant subtypes. They have a highly specific detection profile and high priming efficiency. We supply open platform kits known as our standard and advanced. The advanced kit contains alf you would like to use our kits with our q16 then the easy kit would be applicable. If you are looking to detect a specific pathogen of interest then we can make new kits **OnDemand**. These kits are for research use only and provide a broad dynamic detection range (>6 logs) and sensitive to <100 copies per target.

Latex Agglutination kit

Microgen Bioproducts also supplies Latex Agglutination kits. A rapid test with high sensitivity and specificity identification screening with results confirmed within 2 minutes. The Latex kit is easy to use with its one-step process allowing users to quickly obtain early indications of a Listeria outbreak. This kit is used to screen colonies before full biochemical identification can take place enabling users to catch the bacterium sooner before the multiplication progresses and impacts the supply chain further.

Path-Chek

Microgen Bioproducts Path-Check is a simple swab based test directly testing surfaces. The Path-Check's premoistened swab is capable of neutralising commonly employed detergents and sanitisers so these don't disrupt your result during testing. The Path-Check is a cost-effective and easy to use kit with results within 24-48 hours.

Biochemical Identification Kit

Microgen Bioproducts Biochemical Identification kits are reliable identification systems for food, environmental and industrial laboratories. The Listeria Biochemical Identification kit is a 12 substrate system identifying members of the Genus Listeria (Listeria monocytogenes, Listeria welshimeri, Listeria ivanovii, Listeria innocua, Listeria grayi and Listeria seeligeri. The kit is AOAC-RI validated conforming to international standards. With an enhanced built-in haemolysis test and no additional materials required, this kit provides the complete one test solution. If you would like to know more about our kits that detect genus Listeria for research use and microbiological use please contact us <u>customerservices.microgen@novacyt.com</u> or <u>enquiry@primerdesign.co.uk</u>.