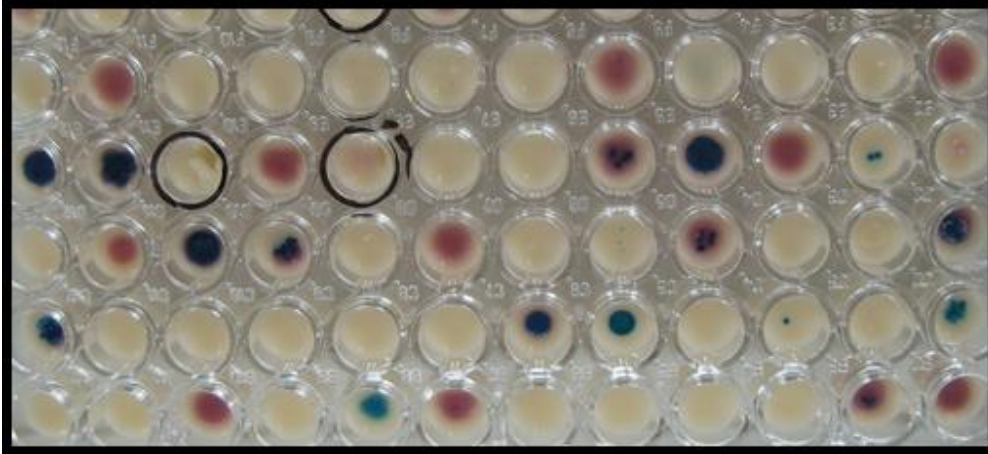




The Royal College of Pathologists

Pathology: the science behind the cure

Object 38: Microtitre plate



What is it?

A microtitre plate is a tray with multiple wells that hold small volumes of liquid. Plates can have thousands of individual wells, although most of those used in pathology laboratories have 96 wells. Plates are made of a range of materials including polystyrene, polypropylene and polycarbonate.

History

The first microtitre plate was invented by Hungarian microbiologist Gyula Takátsky in 1951. An influenza epidemic resulted in a shortage of laboratory equipment. Takátsky therefore developed several smaller versions of existing equipment, including plates with multiple wells that each contained only a few millilitres of fluid, as an alternative to conventional test tubes.

Pathology

Microtitre plates have many uses, including serology tests for antibodies against infectious diseases and the examination of urine specimens for the presence of white blood cells, which indicate infection. Multiple specimens can be tested at the same time for the presence of antibodies. A colour change usually indicates a positive reaction. It is estimated that over 125 million microtitre serology plates are used worldwide ever year.

Find out more

Visit your local pathology department to see microtitre serology plates in use. See the online [programme of events](#) to see if there's a lab open day near you.