PlentiPlex®
Made by PentaBase

Convenient and accurate assays

PlentiPlex® is a series of ready-to-use PCR-based assays for convenient and accurate analysis of DNA including genotyping, microsatellite instability and somatic mutation detection.

PlentiPlex® assays include PlentiPlex® genotyping assays for fast, reliable and unambiqious analysis of single nucleotide polymorphisms. Use PlentiPlex® MSI for easy and fully multiplexed determination of microsatellite instability, and PlentiPlex® Mastocytosis for highly sensitive and selective detection of somatic mutations in hematopoetic cells.

Common for PlentiPlex® assays is that they work on open instruments and rely on PentaBase's INA® platform technologies; SuPrimers™, EasyBeacons™, HydrolEasy™ probes and BaseBlockers™, to assure ease-of-use, robustness and optimal analysis performance.

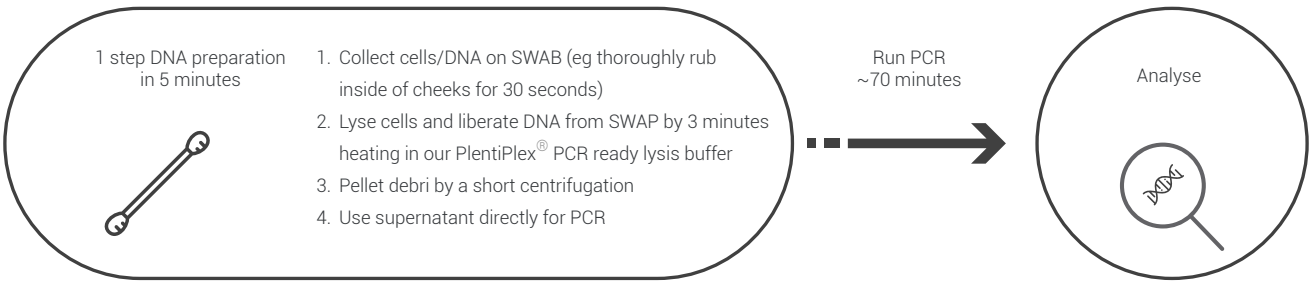
Based on PentaBase's INA® platform technology

PlentiPlex® genotyping

The PlentiPlex® genotyping assays offer extremely easy, fast and multiplexed SNP determination on standard real-time PCR instrumentation. We have a range of SNP assays for genes involved in tolerance, diet and exercise in stock, but are also developing new assays on demand.

One step DNA preparation
One probe for three genotypes

From swap to genotype in 75 mintues



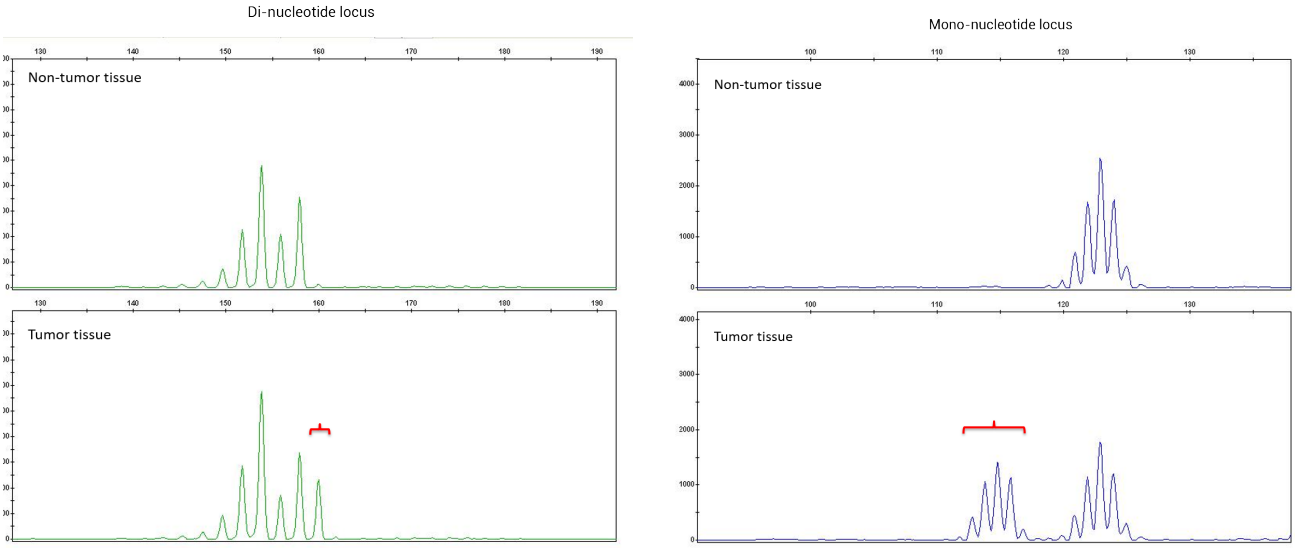
PlentiPlex® MSI

Made by PentaBase

Five loci in one vial! Bethesda and Hamelin Pentaplex panels

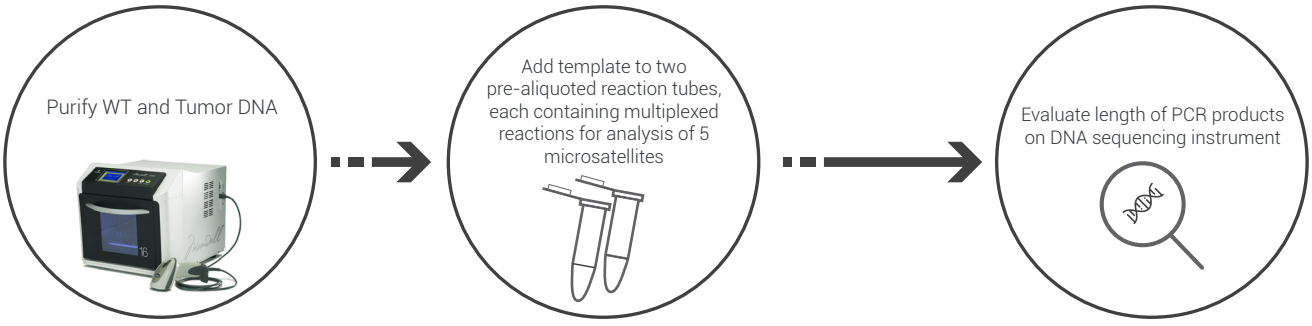
PlentiPlex® MSI assays are intended for *in vitro* diagnosis of impaired DNA mismatch repair system (MMR) affecting prognosis and selection of treatment in cancer patients. PlentiPlex® MSI assays offer two different multiplexed MSI assays for the length analysis of five micro-satellite loci. The mono- and di-nucleotide panel recommended by the Bethesda guidelines and, the Pentaplex mono-nucleotide panel introduced by Hamelin, enabling evaluation of MMR status on DNA sequencer instruments.

Micro-satellites are genetic motifs consisting of short (one to six bases) nucleotide sequences repeated up to 100 times. During replication, these sequences are susceptible to errors, deletions and insertions, normally corrected by the DNA mismatch repair system. Uncorrected micro-satellite errors are commonly referred to as micro-satellite instability, MSI.



Two examples of micro satelitte instability samples. The tumor tissues (bottom) is compared to non-tumor tissues (top). Shown is capillary gel migration charts with MSI peaks marked with red brackets.

PlentiPlex® MSI workflow



More information at www.pentabase.com

PlentiPlex® Mastocytosis

Made by PentaBase

Detect down to one copy of KIT D816V in 100 ng DNA sample

The PlentiPlex® Mastocytosis assay combines the high selectivity of SensiScreen® FFPE assays with the extreme sensitivity of SensiScreen® Liquid, enabling detection of single copy mutants in concentrated DNA samples.

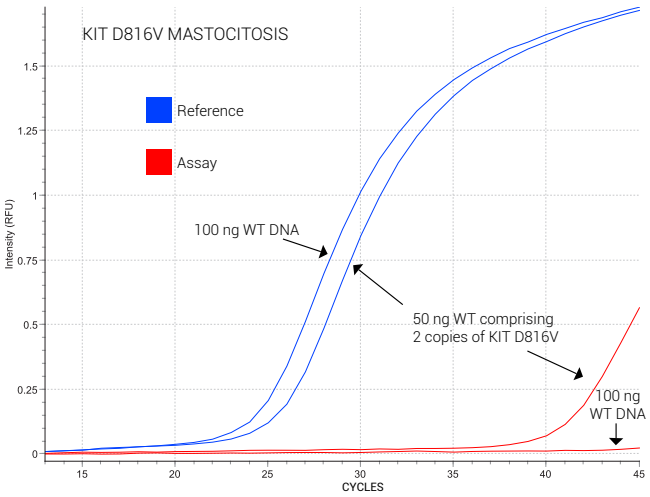
Mastocytosis is the common term for a heterogenous group of diseases characterized by abnormal accumulation and growth of neoplastic mast cells in tissue and organs.

KIT D816V mutation is almost always present in Mastocytosis patients and this somatic alteration is among the WHO criteria for diagnosis of mastocytosis.

PlentiPlex® Mastocytosis recognizes down to a single copy of mutated DNA in 100 ng WT DNA (LOD 0.003%)

PlentiPlex® Mastocytosis workflow

PlentiPlex® Mastocytosis assay run on a MyGo Pro qPCR instrument. 100 ng WT DNA and 50 ng WT DNA spiked with 2 copies of KIT D816V mutant was analysed.



PlentiPlex® Mastocytosis offers a simple, efficient and sensitive analysis

More information at www.pentabase.com