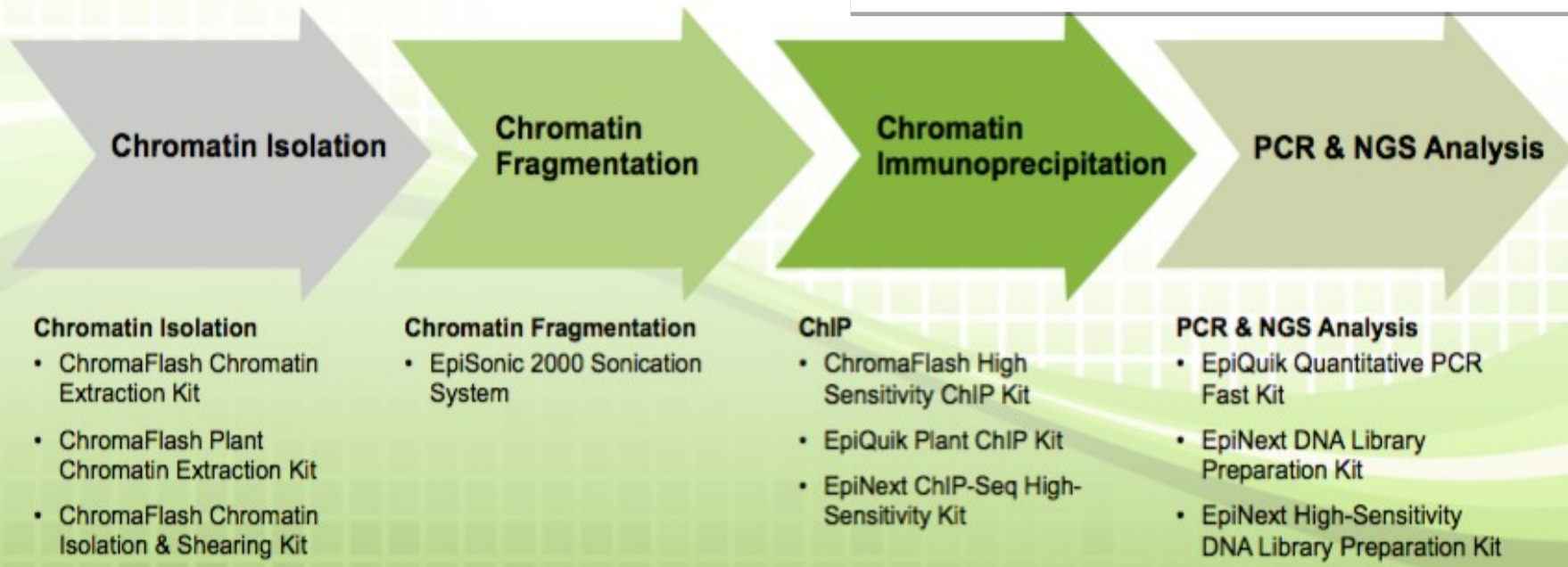


Chromatin research products to cover every step of your experiment workflow, from upstream to downstream.



**EXAMPLE WORKFLOW**

**ChromaFlash Chromatin Extraction Kit**

Start with cell or tissue sample with or without cross-link

Lyse sample with lysis buffer

Extract chromatin with extraction buffer

Obtain isolated chromatin

Relative Enrichment Fold

ChIP analysis of RNA polymerase II enriched in GAPDH and MLH1 promoters with chromatin extract prepared from formaldehyde fixed colon cancer cells (2x10<sup>7</sup>) using the ChromaFlash Chromatin Extraction Kit.

**EpiSonic 2000 Sonication System**

Complete setup of EpiSonic 2000

EpiSonic's sonication mechanism

Reproducibility at 300 bp shearing

Reproducibility at 20 kb shearing

**ChromaFlash High Sensitivity ChIP Kit**

Cell lysis and chromatin shearing

Protein antibody immunoprecipitation

Clean protein/DNA complex & reverse cross link

Capture and cleaning of DNA

Sequencing, PCR, or microarray

High abundance protein enrichment: Sheared chromatin isolated from different numbers of MBD-231 cells was used for ChIP-qPCR analysis of RNA polymerase II enrichment in GAPDH promoters using the ChromaFlash High-Sensitivity ChIP Kit and the EpiQuik Quantitative PCR Fast Kit.

**EpiNext High-Sensitivity DNA Library Preparation Kit (Illumina)**

Input DNA

DNA End Polishing

Adaptor Ligation

Size Selection (Optional)

Amplification

NGS (Illumina)

Size distribution of library fragments. Human placenta DNA was sheared to around 300 bps in peak size and 0.2 ng of DNA was used for DNA library preparation using EpiNext High-Sensitivity DNA Library Preparation Kit.

- Chromatin Isolation**
- P-2001 **ChromaFlash Chromatin Extraction Kit**  
Quickly isolate chromatin or DNA-protein complex from mammalian cells or tissue
  - P-2022 **ChromaFlash Plant Chromatin Extraction Kit**  
Quickly isolate chromatin from plant cells or tissues
  - P-2023 **ChromaFlash Chromatin Isolation & Shearing Kit**  
Quickly isolate chromatin, followed by shearing optimization steps

- Chromatin Fragmentation**
- EQC-2000 **EpiSonic 2000 Sonication System**  
Multi-sample shearing of chromatin (or DNA) for high-throughput applications; ideal for NGS

- Additional EpiQuik Chromatin Immunoprecipitation Kits**
- P-2006 Methyl-Histone H3K9
  - P-2006T Tri-Methyl-Histone H3K9 ChIP
  - P-2007 Methyl-Histone H3K4 ChIP
  - P-2008 Tissue Methyl-Histone H3K9 ChIP
  - P-2009 Tissue Methyl-Histone H3K4 ChIP
  - P-2015 Methyl-Histone H3K27 ChIP
  - P-2016 Tissue Methyl-Histone H3K27 ChIP
  - P-2010 Acetyl-Histone H3 ChIP
  - P-2011 Acetyl-Histone H4 ChIP
  - P-2012 Tissue Acetyl-Histone H3 ChIP
  - P-2013 Tissue Acetyl-Histone H4 ChIP

- PCR & NGS Analysis**
- P-1053 **EpiNext High-Sensitivity DNA Library Preparation Kit (Illumina)**  
Prepare a DNA library using sub-nanogram amounts of DNA input for NGS applications
  - P-1051 **EpiNext DNA Library Preparation Kit (Illumina)**  
Prepare a DNA library for NGS applications
  - P-1029 **EpiQuik Quantitative PCR Fast Kit**  
Perform fast, specific, sensitive, and reproducible quantitative real-time analysis of DNA samples