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(54) Title: METHOD FOR DETECTION OF ALKYLATED CYTOSINE IN DNA

(57) Abstract: There is described a method for detecting alkylated cytosine in double stranded DNA employing one or more enzymes that differentially modify alkylated cytosine and cytosine. At least one region of the DNA is converted to single stranded DNA and the enzyme is reacted with a target region in the single stranded DNA. The presence or level of alkylated cytosine in the target region is detected by determining the level of enzymatic modification of the target region by the enzyme.

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