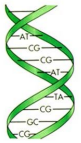
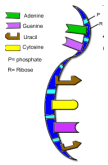
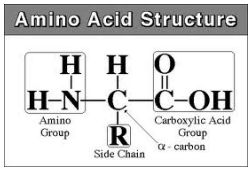
Understanding Your Child's Most Important Biochemical Pathways

DNA: Deoxyribonucleic Acid

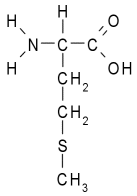



RNA: Ribonucleic Acid

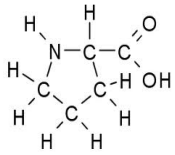


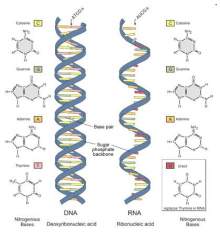



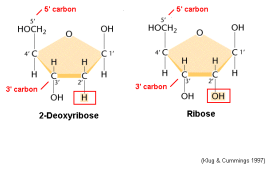

Methionine

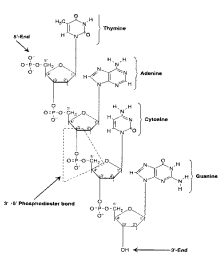


Proline

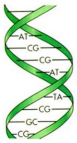


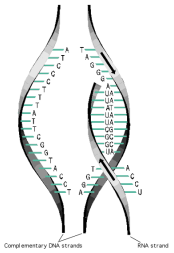


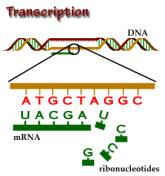



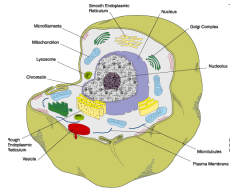



DNA: Deoxyribonucleic Acid





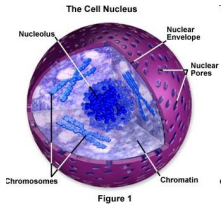
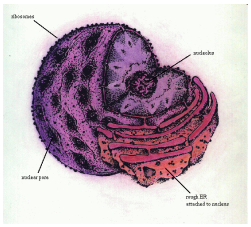
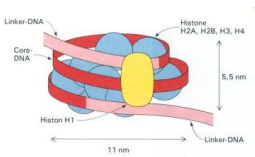


Figure 1

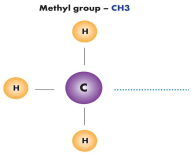


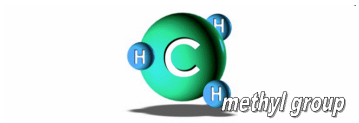



Any organic substrate that ends in 'ase' is an enzyme. An enzyme is a protein that catalyses a chemical reaction, that makes the reaction happen.

A **Restriction Endonuclease** is an enzyme that cuts DNA at very specific intervals. If the DNA is **methylated** at those places, i.e., the DNA has a methyl group attached to it at those locations, the cleavage cannot occur.

This is an example of **Epigenetic Modification**, a modification of the vulnerability of DNA to an enzyme, that comes from a source external to the DNA, a methyl group, and that makes no structural change to the DNA.



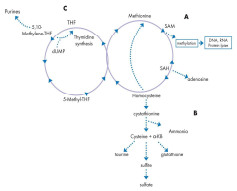


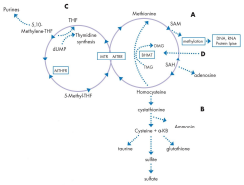

Methylation is central to:

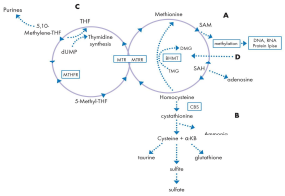
Repairing and building DNA and RNA
How your body responds to and fights infection
Digestive issues
DNA silencing
Neurotransmitter balance
Metal Detoxification
Inflammation
Membrane Fluidity
Energy Production
Protein Activity
Myelination
Cancer Prevention

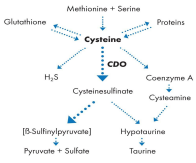
**Insufficient function of the biochemical pathway that makes methyl groups can result in a wide range of conditions including:**

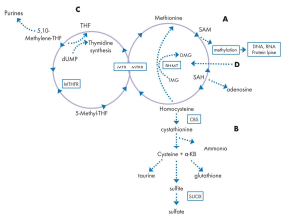
- Aging
- Allergic Reactions
- Alzheimer's
- Anxiety
- Arthritis
- Autism
- Bipolar Disorder
- Bowel Disfunction
- Cancer
- Chronic Fatigue Syndrome
- Fibromyalgia
- Chronic Bacterial Infections
- Cytoskeletal Breakdown
- Diabetes
- Downs Syndrome
- Heart Disease
- Herpes
- Huntington's Disease
- Language and Cognition Impairment
- Leaky Gut Syndrome
- Metal Toxicity
- Miscarriage
- Mitochondrial Disease
- Neural Tube Defects
- Pneumonia
- Psoriasis
- Renal Failure
- Rhett's Syndrome
- Schizophrenia
- Seizures
- Sleep Disorders
- Systemic Lupus Erythematosus (SLE)
- Thyroid Dysfunction









www.GetRealAnswersNow.com

Nancy Mullan, MD
2829 W. Burbank Blvd
Burbank, CA 91505
(818) 954-9267

www.NancyMullanMD.com
NancyMullanMD@aol.com