

RAJIV GANDHI INSTITUTE OF MEDICAL SCIENCES(RIMS),ONGOLE

CME PROGRAMME CONDUCTED ON 15.02.2014 FROM 9.00 A.M. TO 4.00 P.M.

Organizing Department:-

Department of Biochemistry, RIMS, Ongole.

Topic for Discussion: "METABOLIC SYNDROME"

KEY WORDS:

- Pre-Diabetic status
- Hypertension
- Hyperlipidimias
- Insulin Resistance

SPEAKER

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MODERATOR:-

**Dr. R. VISWA KUMAR M.D.,
PROFESSOR AND HOD,
Dept, of Biochemistry , RIMS, Ongole.**

PARTICIPANTS:

**All the faculty members and students.
ABSTRACT:-**

The metabolic derangements that are often seen in patients with Insulin Resistance have been designated as Metabolic Syndrome or Syndrome X, associated with Hypertension, Obesity, Dyslipidemia and Atherosclerotic cardiovascular disease , the deadly Quartet.

According to the NCEP guidelines it is based on presence of 3 of the following 5 risk factors

- Abdominal Obesity [Waist circumference >40 inches in Men, >35 inches in Women
- Plasma Triglycerides >150 mgs/dl
- Plasma HDL cholesterol <40mgs/dl in Men ,<50mgs/dl in Women
- Blood pressure 130/85 mm of Hg
- Fasting plasma glucose >110mgs/dl

The diagnosis of Metabolic Syndrome indicates increased risk of Cardiovascular disease.

Insulin Resistance is common among the persons with high Triglycerides and low HDL-C levels . Insulin resistance defined by the Insulin Clamp Technique, the gold standard test met the criteria for diagnosis of Metabolic Syndrome.

A simple indicator of Insulin Resistance in persons with Metabolic Syndrome is Fasting triglycerides / HDL-C.

A value of Fasting TGL / HDL-C = 3.5mg /dl predicts Insulin resistance.

Abdominal Obesity is the second risk factor for Metabolic Syndrome. The absolute values defining abdominal obesity vary with Ethnic group. The presence of abdominal obesity is highly correlated with factors as is an elevated BMI.

The simple measurement of Waist circumference is recommended to identify the body weight component of Metabolic Syndrome.

Hypertension:-

The defects in Vasodilation and alterations in blood flow might provide a link to Hypertension in Insulin resistant subjects

Treatment:-

Weight loss and Increased Physical Activity are the best therapy and may be the only therapy the patients require.