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DIABETES MELLITUS (DIABETES)

- Diabetes Meaning 'a siphon'
 - ► To Pass through like siphon
 - Mellitus meaning 'like honey'
 - Urine taste and smell like honey
 - Passing large amount of sweet urine

DIABETES INSIPIDUS

► Insipidus = Tasteless

Passing Tasteless Urine

- Passing copious amount of tasteless urine
 - ▶ Inability to concentrate urine
 - ► Lack of Anti- Diuretic Hormone (Pituitary)

- ► Type 1 Diabetes
- ► Type 2 Diabetes
- Gestational Diabetes
- Others
 - ► Latent Autoimmune Diabetes of Adults (LADA)
 - Maturity Onset Diabetes of Young (MODY)
 - Secondary Diabetes
 - ► Drug induced
 - ▶ Pancreatic damage
 - ▶ Other hormonal imbalance
- Rare genetic variety

- ► Type 1 Diabetes
 - lack of insulin production from pancreas
 - Destruction of insulin producing cells in pancreas by immune system
 - ▶Occurs from infancy to late 30s
 - ► Unknown cause of immune system trigger
 - ► Absolute need for Insulin

Type 1 DIABETES

- Over 90% T1DM have no family history
- 50 different gene identified with increase risk of developing T1DM
- Risk gene may trigger immune destruction of Beta pancreatic cells
- Environment, viral infection, food particles etc may play a role
- ► Though family member may carry risk genes chance of multiple family members developing T1DM is very low
- ► High circulating autoantibodies (GAD, ICA, IA2, ZnT8)
- Low Cpeptides

- Type 2 Diabetes
 - Insufficient production or resistance to Insulin
 - Most common nearly 90% of DM
 - ► Usually over 40 yrs age
 - ► Can happen early due to lifestyle
 - ► Coca-Cola syndrome, Lucozade Syndrome
 - Symptoms may not be obvious
 - Can take long to develop = missed diagnosis for a period

DIABETES Type 2 DM

- **▶** OBESITY
- ► LACK OF EXERCISE
- **►** LIFESTYLE
- **SMOKING**
- ► GENETIC -STRONG FAMILY LINAGE

DIABETES T2DM

- Diet
- Exercise
- **▶** Tablets
 - METFORMIN, GLICLAZIDE, GLIPTINS, GLIFLOZINS
- **►** INJECTIONS
 - ► INCRETIN MIMETICs
 - **► INSULINS**

- ► LADA (Latent Autoimmune Diabetes of Adults
 - ► Mixed features of Type 1 and Type 2
 - Immune damage to pancreas (GAD, ICA, IA-2 Ab, ZnT8)
 - ►Low C-peptide
 - Some Insulin resistance
 - May manage with diet and tablets initially but soon move to Insulin

- ► GESTATIONAL DIABETES
 - During Pregnancy
 - Large amount of hormone of pregnancy increase glucose level as well as interfere with Insulin action
 - Mismatch between insulin production and demand
 - ► High risk of developing Type 2 Diabetes in later life

- MATURITY ONSET DIABETES OF THE YOUNG (MODY)
 - ► DIAGNOSED AT YOUNG AGE (<25 YRS)
 - ► Runs in family (A dom)
 - Lack of autoantibodies
- Any disease causing damage to Pancreas
 - ▶ Infection or inflamation
 - Cancer
 - Hereditary conditions i.e Cfibrosis, Haemochromatosis (too much iron)
- Drug induced

- ► Type 1 Need regular Blood glucose monitoring
- ► Type 2 initial regular monitoring and then less frequent
- Good control delays complications
 - Eyes, kidneys, nerves, circulation, memory loss, infections and gangrene
- Driving inform DVLA
 - ► No HGV, MPVs
- Foot Care

- Chronic condition
- Supply and demand mismatch
- ► Live within means! No over indulgence!
- Live healthy smoking x, alcohol
- Exercise regularly
- Regular meals
- ► Take care of your feet
- Regular reviews