The aim of the study was to study the prevalence of asymptomatic bacteriuria in diabetics and nondiabetics age <45 years and to study the clinical and laboratory parameters in patients with asymptomatic bacteriuria. The study also intended to determine if there was any correlation between ASB and age, BMI, duration of diabetes and metabolic control. It was also intended to determine the prevalence of microvascular and macrovascular complications in patients with ASB. There are many studies regarding ASB done in Europe and North America and very few studies are done in South India. This study was done with the intention of finding the prevalence of ASB in Diabetic patients in South India. ASB is defined as 2 consecutive clean catch voided urine specimens with isolation of the same bacterial strain in counts >10^5 CFU/ml. 90 diabetic patients with age <45 years attending the diabetic opd of GRH who satisfied the inclusion criteria were recruited for the study. The study period was 6 months. 90 non diabetic patients with age<45 were taken as controls.

During initial visit relevant details and history regarding the patients are collected like age, duration of diabetes, medications, pregnancy, history of hospitalisation, catheterization, surgery, history pertaining to urinary symptoms and gynaecological infections like dysuria, frequency of micturition, history of white discharge of pruritis vulva.

Relevant investigations like fasting and post prandial sugar, urine analysis, urine culture and sensitivity, renal function tests, ultra sound for PVR, urine microalbuminuria, screening for diabetic retinopathy and neuropathy to be carried out (Questionnaire attached)

CONCLUSION:

1)Asymptomatic bacteriuria is a common finding in adults and diabetic patients especially women have more prevalence than men.
2)In our study the prevalence of Asymptomatic bacteriuria in diabetic patients ≤45 years is 21.1%
3)There was no significant correlation between Asymptomatic bacteriuria and post voidal urine.
4)There was significant association between Asymptomatic bacteriuria and retinopathy and nephropathy.
5)There was no association between Asymptomatic bacteriuria and peripheral neuropathy, IHD, CAD and peripheral vascular disease.
6)There was significant association between poor glycemic control and use of insulin and Asymptomatic bacteriuria signifying the importance of metabolic control.

KEY WORDS: ASB-asymptomatic bacteriuria, PVR-post voidal urine, BMI – Body mass index, T2DM-Type2 Diabetes mellitus, IHD- ischemic heart disease, CFU-Colony forming units, CAD-coronary artery disease