

# BU-02950 REAL WORLD ASSESSMENT OF GLYCAEMIC CONTROL AMONG FEMALE DIABETES SUBJECTS AN OBSERVATIONAL COHORT STUDY





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# **BACKGROUND**

Diabetes and its management among women are considered challenging and different when compared to their men counterparts. Several socioeconomic, cultural and biological factors are estimated to impact men and women diabetes subjects differently. Women in Indian cultural settings face numerous barriers receiving adequate medical care, time for self-care, maintaining healthy BMI, adherence to lifestyle or therapeutic interventions. Moreover, a plethora of epidemiological evidence suggests that women diabetes subjects are more susceptible to cardiovascular disease, stroke, cancer, depression, osteoporosis, increased morbidity and mortality than men with diabetes.

AIMS



This study aims to assess glycemic control among female subjects with diabetes being followed up via integrated diabetes care.



### **METHODS**

Patients attending our diabetes center are encouraged to participate in our telemedicine program (Diabetes Tele Management System - DTMS® launched in 1998). The program allows for customized titration of medications, diabetes education and behavioral modifications through virtual consultations and timely physical visits. The 5-year follow-up data of 800 consecutive female T2DM patients enrolled in DTMS® with mean A1c  $\geq$ 6.5% were deidentified from EMR. Subjects with virtual consultations  $\geq$  1 in 3 months and physical visit  $\geq$  1 in 3y were considered to have regular follow up. CKD stage 4 & 5 were excluded from the study. Glycemic parameters of 326 female subjects having regular follow up and 318 female subjects having irregular follow up were analyzed. Average age 49.30 $\pm$ 7.30 years, diabetes duration 10.36  $\pm$ 5.67 years, baseline A1c: 8.38 $\pm$ 0.67% (for regular follow up) and mean age 48.84 $\pm$ 8.24 years, diabetes duration 9.78  $\pm$ 5.03 years, mean A1c 8.40 $\pm$ 1.42% (irregular follow up). A separate cohort of 312 male diabetes subjects having regular follow up(average age 50.15 $\pm$ 7.58 years, diabetes duration 10.81  $\pm$ 5.02 years, mean A1c:8.50 $\pm$ 1.45%) was compared with female diabetes subjects with regular follow up.

RESULTS



Male subjects on regular follow up achieved a significant reduction in A1c(-1.62, p-value < 0.0001 whereas female subjects on regular follow up failed to achieve statistically significant A1c reduction (-0.85; p-value 0.0744) during the 5 year follow up period. Significant reduction in FBS was observed for both males (-37.93, p-value 0.0429) and females with regular follow up(-40.27, p-value 0.0254). However, a marked reduction of PPBS was demonstrated only in male subjects (-57.52, p-value 0.0015) on regular follow up. Women with irregular follow up(mean A1c change: -0.4833, p-value 0.2521) failed to achieve significant A1c reduction.



## DISCUSSION

Women with diabetes, though followed up via integrated diabetes care failed to achieve glycemic targets when compared to their male counterparts. This disparity may be attributed to sociocultural components, family priority setting, gender discrimination or lack of time for self-care and regular exercise. This calls for an increased need for women-centric studies to formulate customized guidelines for diabetes care in women taking into consideration their socio-economic and biological aspects.

#### REFERENCES.

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