PROSTATE HEALTH & SAFETY PARAMETERS: HYPOGONADAL PATIENTS ON TRT ARE NOT AT HIGHER RISK THAN EUGONADAL SUBJECTS OF AGE-MATCHED CONTROL GROUP - PROSPECTIVE COMPARATIVE 6-YEARS FU ANALYSIS

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Objective: evaluating prostate safety parameters in subjects under TRT in comparison with age-matched control group in follow up of 6 years.

Material & Methods: 154 hypogonadal patients (baseline average age 58 +/- 1.7 years and mean follow-up of 42 months, range: 38-61 months), receiving longacting injectable testosterone undecanoate 1000mg) were compared to 160 eugonadal as control group (average age 59 +/- 2.8 years) with similar characteristics visiting the clinic for preventive check up. They underwent monitoring at baseline and 6-monthly including co-morbidities, concomitant medication, International Prostate Symptom Score (IPSS), prostate-specific antigen (PSA), digital rectal examination (DRE), prostate volume measured by transrectal ultrasound (TRUS). Residual postvoiding urine volume and measuring bladder wall thickness. TRUS-guided biopsies were performed when indicated by PSA velocity > 0.75 ug/L.

Results: At baseline, hypogonadal patients showed lower PSA values and lower prostate volumes (0.68 +/- 0.4 ug/L and 25.6 +/- 1.4 ml, respectively). Subjects of control group had PSA levels of 2.42 +/- 1.2 ug/L, and prostate volume 38.4 +/- 2.4 ml at baseline. IPSS, residual postvoiding urine volume and bladder wall thickness were slightly improving. Prostate volume increased as higher as in control group. No acute urinary retention and/or surgery had been noticed in TRT group, but in controls.

Conclusions: TRT does not worsen LUTS/BPH symptoms. 6 years follow up showed that group on TRT had no adverse events such as Acute Urinary Retention (AUR) or prostate surgery as met in controls. Hypogonadism offers no protection against the development of symptomatic BPH.