Active Surveillance for the Management of Low-Risk Prostate Cancer in a Japanese Cohort

Introduction and Objective: The widespread use of prostate-specific antigen (PSA) blood tests for prostate cancer screening has resulted in a substantial increase in the number of patients diagnosed with early-stage disease who are at low risk for disease progression. Active surveillance (AS) for low-risk, localized prostate cancer may reduce the risk of overtreatment of clinically insignificant prostate cancer while retaining the option of definitive therapy for those patients who are reclassified over time as a higher risk. In this article, the authors report their experience in a contemporary cohort of Japanese men with prostate cancer who were managed with active surveillance.
Materials and Methods: In all, 48 men (average age 71.63) with localized prostate cancer were followed on AS from 2005 to 2012. The inclusion criteria for AS included: Gleason score of < or = 6, a serum prostate-specific antigen (PSA) level of < or = 10ng/mL, stage < or = T2a, cancer involvement of <33% of biopsy cores and≦30% of cancer in any core. The follow-up was rigorous, with PSA tests and a digital rectal examination every 3 months for 2 years, and a repeat biopsy 12 months after the initial diagnosis and yearly when indicated. Continuance of AS was based on the PSA doubling time (<24 months), PSA velocity changes (>0.75 ng/mL per year), re-biopsy score, Gleason score, tumour volume, stage progression and patient preference. In addition, we compared immediate active treatment with candidate for active surveillance VS delayed active treatment after active surveillance. The association between clinical characteristics and receipt of active treatment was analyzed by using Cox proportional hazards regression.
Results: In all, 48 patients met the inclusion criteria; their mean age at diagnosis was 71 years, their mean PSA level 5.79 ng/mL and the mean follow-up 33.6 months. Deferred Treatment Free Survival and cause-specific survival and over-survival are 71.54% (5y), 100% ,100% in active surveillance cases. Reason for active treatment in patients on AS in our dept. are increased anxiety (4men), up-risk on biopsy (3 men), PSA change (2 men).There was a significant difference between immediate treatment and delayed active treatment in cause-specific survival, over survival and biochemical recurrence free survival. Nine patients were treated; four had radical prostatectomy; five had radiotherapy. The PSA doubling time and clinical stage at diagnosis were predictive of progression.
Conclusion: Selected individuals with early-stage prostate cancer may be candidates for active surveillance. Specific criteria can be and need to be developed to select the most appropriate individuals for this form of management and to monitor disease progression. A small attrition rate can be expected because of increased anxiety.