Adel Alrabadi
Dr. med

Pathological outcomes of patients with clinically localized low risk prostate cancer who might be candidates for active surveillance or hemi-ablative therapy.

Promotionsfach: Urologie.
Doktorvater: Prof. Dr. med. Jesco Pfitzenmaier.

Active surveillance and hemi-ablative therapy are emerging as treatment options for patients with low risk prostate cancer in order to avoid the complications associated with radical therapy whether it is radical surgery or radiotherapy. Accurate selection of patients for active surveillance or hemi-ablative therapy is of great importance. However, accurate identification of patients who can be real candidates for active surveillance or hemi-ablative therapy is still a challenge. The aim of our study was mainly to assess the ability of our current diagnostic approach and staging tools to identify prostate cancer patients who can be real candidates for active surveillance or hemi-ablative therapy.

A retrospective study and statistical analysis was performed for our prospective uro-oncology data-base of 825 prostate cancer patients who underwent radical prostatectomy at our department between 1998 and 2008. We compared the post-operative pathological findings with the pre-operative data for the patients with low risk criteria (Gleason score <=6 in <=2 unilateral positive prostate biopsies and prostate specific antigen <10). We evaluated the risks of up-grading, up-staging, and bilaterality in those patients and the factors that may predict the risks of up-grading and up-staging.

11.6% of our patients had unilateral low risk prostate cancer on final pathology. Overall, 42.6% experienced Gleason score up-grading. Up-staging had to be stated in 21.8%. Bilateral disease was found in 74 patients (57.4%). The number of biopsies was found to be a significant predicting factor for up-staging in both univariate and multivariate analyses (P= 0.008 and 0.045 respectively). With more than 10 biopsies the risk of upstaging decreased significantly (p=0.01).

With our current clinical diagnostic approach and staging tools, we are still not able to accurately identify low risk prostate cancer patients who can be managed with active surveillance strategy or hemi-ablative therapy. Increasing the number of prostate biopsies (>10) should be considered at least in patients who are supposed to go for active surveillance or hemi-ablative therapy.