Urinary toxicity after the treatment of gynecological malignancies

Background

The treatment of gynecological malignancies has significantly enhanced over the last two decades. This is manifested not only in the surgical field but also in oncology. The effort to individualize treatment is aimed at choosing the optimal therapeutic procedure. By this, we mean achieving long-term remission on the one hand and maintaining a good quality of life on the other. Most studies evaluating the quality of life in connection with the treatment of gynecological malignancies focus on patients with cervical cancer. However, in terms of incidence, the diagnosis of endometrial cancer currently dominates in gynecologic oncology. This study aims to assess the effect of treating gynecological malignancies on the urinary tract and its related influence on quality of life.

Methods

We divided the research into a retrospective and a prospective part. In the retrospective analysis, we focused on the most severe complications that arose as a compliaction of surgical and oncological treatment. Over ten years, the overall frequency and success of treatment of urogenital fistulas, post-radiation cystitis, and surgical complications in women with a history of the treatment of gynecological malignancy were monitored. A prospective study assessed the effect of modern surgical and oncological treatment of endometrial cancer on lower urinary tract function and quality of life. The effect of treatment on the lower urinary tract was evaluated by urodynamic examination, which was performed before surgery and, six months after surgery, or six months after completion of adjuvant oncological treatment. Quality of life was assessed based on completed EORTC QLQ-C30 and QLQ-EN24 quality of life questionnaires.

Results and discussion

A retrospective analysis confirmed that urological fistulas are a very severe complication that arises in association with the treatment of gynecological malignancies. This condition has an unprecedented impact on the quality of life, but it can also cause endangerment, as in the case of ureteroarterial fistulas. The vast majority of these were patients who had undergone primary or adjuvant radiotherapy for cervical cancer. The results of the prospective research did not show a significant increase in urological toxicity associated with adjuvant oncological treatment in patients treated with endometrial cancer compared to the control group of patients who underwent only surgery for the same diagnosis.

Conclusion

Modern approaches in the treatment of gynaecological malignancies hold promise that could lead to better oncological control of malignant diseases while maintaining quality of life. Urological complications of pelvic malignancies are unlikely to disappear completely, but it can be expected that we will encounter less serious side effects.