About this issue…

Lower genital tract gynaecological cancers remain classic examples of diseases which are so-called noncommunicable, but which are caused by infective agents; challenging our desire to classify in order to control. The epidemiology of these cancers follows that of several sexually transmitted infections. Interactions between different infective agents are intriguing, and although often studied, remain difficult to prove and understand. Current evidence demonstrates viruses to be by far the most important infective oncogenes, with other infections acting as co-factors in transmission at most. An intact mucosa in cervical pathogenesis may be critical, as has also been demonstrated in human immunodeficiency virus (HIV) transmission trials.

Herpes simplex virus has been implied and denied as an agent in cervical cancer. Some authors have called it an "accomplice" with human papillomavirus (HPV), while others found no association.[1,2] In the same way, granulomatous infection with the bilharzia parasite has been suspected as a co-factor; in theory granting the HPV entry via chronic inflammation. Responding to a previous publication, local numbers from the pathology data basis in Limpopo province are presented in the communication section exploring this potential link.[3] Like an intact mucosa, an intact immune system remains crucial in preventing infection, persistence, reactivation and viral oncogenesis, and eventually in inhibiting cancer growth. Therefore, co-infection with HIV has a unique mechanism of action when infectious carcinogenesis is being considered, and is known to change the epidemiology of HPV-related cancers in a major way.

Small biopsy pathology of mass lesions of the endometrial cavity: differential diagnostic considerations

In this review, Liptak and Barnetson[4] discuss not only aspects of pathology, but also pay attention to clinical implications. Among others, the implications of the pathologist's differential diagnosis regarding the need or not for lymphadenectomy, and also for radical versus non-radical surgery, are addressed. Histological findings, in spite of the limitations of a small endometrial biopsy, are therefore of huge interest in deciding whether to refer a woman preoperatively to a colleague trained in oncologic surgery, or whether she can be safely managed with simpler surgery by a generalist.

In spite of many efforts to standardise grading, the "moderately differentiated" category often remains the largest group, complicating referral, prognosis setting and treatment. Similar to ovarian cancers, endometrial cancer would be better classified as low- versus high-grade tumours, and it is in this regard that immunohistochemistry could really contribute. The manuscript is essential reading for all registrars preparing for examination and for gynaecologists involved in the management of women with abnormal uterine bleeding.

The role of sentinel lymph node biopsy in cervical cancer: an overview of the literature

As part of constant efforts to individualise the surgical treatment of women's cancer, complete pelvic lymphadenectomy in cervical cancer has come under scrutiny. While the morbidity of lymph node dissection in the pelvis is much less than that of removal of the nodes in the inguinal or axillary areas, lessons learnt about sentinel node biopsy may be valuable with regard to pelvic tumours as well. The authors of this review[5] conclude that sentinel node biopsy can play an important role in the surgical management of cervical cancer as long as important rules are followed. Inflammation and advanced malignancy with nodal spread may limit accuracy, thus care should be taken in patients with immunodeficiency, large operable tumours and possibly after large loop excision of the transformation zone procedures. Owing to bilateral drainage, sentinel nodes on both sides must be identified while suspicious nodes should always be removed.

Certainly, there is merit in determining the important draining nodes, especially if the lymphadenectomy is limited. This would ensure that the important diagnostic

nodes are removed, investigated and ultrastaged, if indicated. The method currently offers most advantage in the laparoscopic setting, offered to patients with small localised tumours.

HPV L1 capsid protein detection in high-risk human papillomavirus-positive cervical smears

Cervical cancer screening in South Africa needs to be scaled up, which would create a huge burden on the already overloaded treatment centres. Immediate triage tests, which can reflex women away from treatment, are therefore of huge interest. The L1 capsid protein stain is a promising candidate as it has been associated with lesion regression. This research paper[6] reports the findings of a pilot study on the use of this prognostic biomarker to triage women with cytological abnormalities. The study population was also positive for high-risk HPV and had a high background prevalence of HIV. Approximately half of the specimens with low-grade abnormalities would be deflected from treatment using this test.

Although the study population tested largely negative for this protein, results in other sections of the South African population may be very different. There is often pressure to perform cervical screening in young women and these women are also at highest risk of having cytological abnormalities. It remains important to limit unneeded treatment of these womem who have a very limited risk for malignancy in the near future. This test may contribute to redirect some women away from therapy.

Case reports

Lastly, this issue features three case reports that cover fertility preservation in premalignant endometrium, unusually advanced malignancy and a case of pelvic Rosai-Dorfman disease.[7-9]

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