## **DEFINITION**

1. A **papilloma of the bladder** is a benign tumour, which originates in the mucous membrane of the bladder.

## **CLINICAL MANIFESTATIONS**

- 2. The most common presenting symptom of the disease is haematuria, which is usually painless and intermittent.
- 3. Urgency of micturition, frequency of micturition and pain may occasionally be the presenting symptoms, these being commonly due to superadded infection.

## **AETIOLOGY**

- 4. The majority of cases occur without any known cause but certain environmental factors are associated with a higher incidence of bladder papillomata. These factors are discussed below
  - 4.1. there is an undue incidence of bladder papillomata among those engaged in the manufacture of synthetic dyes. The precise agent is still not known but it has been shown convincingly that the manufacture of, or exposure to, the dyestuff intermediates alpha-naphthyl-amine, beta-naphthyl-amine and benzidine, and the manufacture of the dyes aniline and magenta carry (for those employed) a greatly increased risk of developing papillomata of the bladder.
  - 4.2. There is also an excessive incidence of these tumours among workers manufacturing or exposed to certain nitro or primary amino derivatives of diphenyl.
  - 4.3. Investigation of cigarette smokers has shown that an increased incidence in the disease papillary carcinoma parallels the increased incidence in bronchogenic carcinoma and the reasons for this are probably chemical.
- 5. There remains a group of cases in which a cause is not identified.

## CONCLUSION

6. Whilst the disease papilloma of the bladder is of unknown aetiology, certain environmental factors identified at paragraph 5 have been shown to be associated with the increased incidence of the disease.

# **REFERENCES**

Mann C V and Russell R C G (Eds). Bailey and Love's Short Practice of Surgery. 21<sup>st</sup> Ed. 1992. London. Chapman & Hall Medical. p1405.

Davison A M, Lambie A T. Diseases of the kidney and genito-urinary system – Tumours of the renal pelvis ureter and bladder. In: Edwards Christopher R W, Bouchier Ian A D (Eds). Davidson's Principles and Practice of Medicine. 16<sup>th</sup> Ed. 1991. Edinburgh. Churchill Livingstone. p603–604.

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