FR02-06 Down the Chute: A Brief History of Intraurethral Treatments

Kenneth Sands DO, MBA¹, Margeaux Dennis DO², Ramakrishna Venkatesh MD¹
¹Washington University School of Medicine in St. Louis
²Sparrow Hospital Urology Residency, Michigan State University College of Osteopathic Medicine

Introduction

• Local treatments are a common paradigm throughout history.
• Historically, treatment of sexually transmitted infections (STIs) had been intraurethral solutions.
• In modern times, we use intraurethral alprostadil for the treatment of erectile dysfunction.

Methods

• We reviewed available news articles, advertisements and correspondence regarding urethral applicators, urethral injections, and urethral treatments.

Results

In 1718, the pirate Blackbeard's ship, the Queen Anne's Revenge, sank. In 2015, researchers exploring the wreckage found a urethral syringe used to inject mercury for syphilis. In The Lancet, Richard Barnett noted that "by the 17th century, mercury had become the standard European therapeutic for this new plague." Perhaps in response to the epidemic of STIs, on March 5, 1889 Sage was granted a patent for the Urethral Powder Applier. In the Boston Medical Brief from 1889, S.H. Hall, MD from San Francisco stated "I am very much pleased with the instrument. It will answer the purpose for which it is intended. I have cured three cases with it." Dr. Boerstler from Peninsula, OH stated, “Your method of treatment is a complete success, and I am enthusiastic over it.” In January, 1890 Leonard's Illustrated Medical Scientific Journal, an ad posits that, "it cures in from one to three applications...is not painful to the patient...endorsed by every physician employing it." In The Medical World of Philadelphia, PA, C.S. Pixley, MD stated it “gives the attending surgeon a satisfaction unknown by any other method." He had “the urethra packed comfortably full with any dry antiseptic powder from the membranous portion to the meatus.” Dr. Morgan in Chicago marketed a formula that was “quickly and painlessly done with ‘Sage’s urethral powder applier’. This method gives to the practitioner the same ability to handle gonorrhea that the cinchona bark did the malarial affections.” In the 1915 Edition of "The Practitioner’s Encyclopaedia of Medical Treatment" Mr. J.E.R. McDonough, FRCS, gives an exhaustive review of the local treatment of gonorrhea and advocates that "in acute posterior urethritis nothing is better than sodium salicylate." He describes further mixtures and injection regimens and how it might exert its effect on the gonococci including albargain, perhydral, and iodex among others. Contemporarily, oral treatments have supplanted most intraurethral remedies. Nonetheless, the use of intraurethral alprostadil is still a viable option.

Conclusion

The fascination with local urethral therapy has not waned; however, the indications changed over time from treatment of STIs to erectile dysfunction.