

ENDOSCOPIC RETRIEVAL OF A PROXIMAL CORPUS CAVERNOSUM POLYTETRAFLUOROETHYLENE SLEEVE DURING EXPLANTATION OF AN INFECTED PENILE PROSTHESIS

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We report the use of corpus cavernosum endoscopy to retrieve a proximal polytetrafluoroethylene sleeve during removal of an infected penile prosthesis. To our knowledge this report represents the first published description of this technique, which we found to be a safe and expeditious alternative to open surgical removal.

CASE REPORT

A 64-year-old man with insulin dependent diabetes mellitus returned to our institution complaining of penile pain 6 weeks after implantation of a malleable penile prosthesis, which had been inserted through a subcoronal incision. Initial prosthesis placement was complicated by a perforation of the proximal right corpus cavernosum, which was repaired by introducing a polytetrafluoroethylene sleeve through a perineal incision.

At presentation there was no evidence of infection. Physical examination of the penis revealed no disparity in corporeal length. The implant was not palpable on rectal examination. Because of persistent pain, prosthesis explantation via a subcoronal incision using local anesthetic was planned. If the sleeve were retrieved with the prosthesis, it was also to be removed, but otherwise it would remain in place.

After making a subcoronal incision a small amount of purulent material was observed after exposure of the right prosthetic body, necessitating removal of the polytetrafluoroethylene sleeve. Although removal of the prosthetic bodies was accomplished using local anesthetic only, additional anesthesia would have been required to make a repeat perineal incision for removing the proximally placed sleeve. To avoid converting to a higher level of anesthesia we decided to attempt retrieval of the proximal sleeve using corpus cavernosum endoscopy.

Using a 17F rigid cystoscope the right corpus cavernosum was explored, the polytetrafluoroethylene sleeve was identified and the infected body was retrieved using 4F biopsy forceps (see figure). Because the sleeve had not been secured with sutures and had been in place for only a brief time, it was easily removed in this fashion. Were this not the case, endoscopic dissection would likely not have been attempted. The corpora were then irrigated copiously with antibiotic solution and closed with interrupted 3-zero polyglactin sutures. The subcoronal wound was similarly closed with 3-zero polyglactin sutures. The patient was placed on intravenous antibiotics. Postoperatively he did well without pain or clinical infection.

DISCUSSION

Periprosthetic infection represents a serious complication of penile prosthesis implantation that generally develops in less

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Endoscopically retrieved polytetrafluoroethylene sleeve after explantation of infected penile prosthesis.

than 3% of cases.¹ Although salvage procedures and immediate reimplantation have recently been advocated as safe and effective, the most common treatment involves aggressive antibiotic therapy as well as complete removal of the prosthesis and all components.¹ Management of an infected penile prosthesis may be compounded by retention of infected components, as may occur after repair of another common intraoperative complication of implantation, namely corporeal perforation. In these cases removing the proximal sleeve by traditional means necessitates a repeat perineal incision that requires regional or general anesthesia. Conversion to a higher level of anesthesia and the possible need for repositioning may significantly increase operative time. The use of corpus cavernosum endoscopy to retrieve such retained components greatly simplifies the procedure, leading to decreased anesthetic risk, operative time and cost, and time to recovery.

Originally described by Weese and Zimmern as a technique for diagnosing corporeal perforation,² Carmignani et al reported using corpus cavernosum endoscopy intraoperatively to guide dilation during prosthesis implantation.³ Our novel procedure represents another application of this versatile technique. In conclusion, corpus cavernosum endoscopy is a safe and expeditious alternative to open surgical removal of infected penile prosthesis components.

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