

**EFFECTIVE DATE:** 01|01|2017

**POLICY LAST UPDATED:** 01|19|2017

## OVERVIEW

Various minimally invasive treatments for uterine fibroids have been proposed as alternatives to surgery. Among these approaches are laparoscopic and percutaneous techniques to induce myolysis, which includes radiofrequency volumetric thermal ablation (RFVTA), laser and bipolar needles, cryomyolysis, and magnetic resonance imaging (MRI)-guided laser ablation.

## PRIOR AUTHORIZATION

Prior authorization is not required.

## POLICY STATEMENT

### BlueCHiP for Medicare and Commercial Products

Laparoscopic and percutaneous techniques of myolysis as a treatment of uterine fibroids are considered not medically necessary as there is insufficient peer-reviewed scientific literature that demonstrates that the procedure/service is effective.

## MEDICAL CRITERIA

Not applicable

## COVERAGE

Benefits may vary between groups/contracts. Please refer to the appropriate section of the Benefit Booklet, Evidence of Coverage, or Subscriber Agreement, for services not medically necessary.

## BACKGROUND

Uterine fibroids are among the most common conditions affecting women in their reproductive years; symptoms include menorrhagia, pelvic pressure, or pain. Surgery, including hysterectomy and various myomectomy procedures, is considered the criterion standard treatment for symptom resolution. However, there is the potential for surgical complications and, in the case of hysterectomy, the uterus is not preserved. In addition, for multiple uterine fibroids, myomectomy can be a time-consuming procedure.

There has been long-standing research interest in developing minimally invasive alternatives for treating uterine fibroids, including procedures that retain the uterus and allow for future childbearing. Treatment options include uterine artery embolization and the transcutaneous procedure MRI-guided focused ultrasound therapy. Various techniques to induce myolysis have also been studied including Nd:YAG lasers, bipolar electrodes, cryomyolysis, and radiofrequency ablation. With these techniques, an energy source is used to create areas of necrosis within uterine fibroids, reducing their volume and thus relieving symptoms. Early methods involved multiple insertions of probes into the fibroid, performed without imaging guidance. There were concerns about serosal injury and abdominopelvic adhesions with these techniques, possibly due to the multiple passes through the serosa needed to treat a single fibroid. Newer systems using radiofrequency energy do not require repetitive insertions of needle electrodes.

Ultrasonography is used laparoscopically to determine the size and location of fibroids, to guide the probe, and to ensure the probe is in the correct location so that optimal energy is applied to the fibroid. Percutaneous approaches using MRI guidance have also been reported.

Randomized controlled trials comparing MRI-guided laser ablation to alternative treatments for uterine fibroids are needed to adequately evaluate the safety and efficacy of this technology. The evidence is insufficient to determine the effects of the technology on health outcomes.

## **CODING**

### **BlueCHiP for Medicare and Commercial Products**

The following CPT code is considered not medically necessary:

**58674** Laparoscopy, surgical, ablation of uterine fibroid(s) including intraoperative ultrasound guidance and monitoring, radiofrequency.

## **RELATED POLICIES**

None

## **PUBLISHED**

Provider Update, March 2017

## **REFERENCES**

1. Jones S, O'Donovan P, Toub D. Radiofrequency ablation for treatment of symptomatic uterine fibroids. *Obstet Gynecol Int.* 2012;2012:194839. PMID 21961009
2. Brucker SY, Hahn M, Kraemer D, et al. Laparoscopic radiofrequency volumetric thermal ablation of fibroids versus laparoscopic myomectomy. *Int J Gynaecol Obstet.* Jun 2014;125(3):261-265. PMID 24698202
3. Hahn M, Brucker S, Kraemer D, et al. Radiofrequency volumetric thermal ablation of fibroids and laparoscopic myomectomy: long-term follow-up from a randomized trial. *Geburtshilfe Frauenheilkd.* May 2015;75(5):442-449. PMID 26097247
4. Kramer B, Hahn M, Taran FA, et al. Interim analysis of a randomized controlled trial comparing laparoscopic radiofrequency volumetric thermal ablation of uterine fibroids with laparoscopic myomectomy. *Int J Gynaecol Obstet.* May 2016;133(2):206-211. PMID 26892690
5. Chudnoff SG, Berman JM, Levine DJ, et al. Outpatient procedure for the treatment and relief of symptomatic uterine myomas. *Obstet Gynecol.* May 2013;121(5):1075-1082. PMID 23635746
6. Berman JM, Guido RS, Garza Leal JG, et al. Three-year outcome of the Halt trial: a prospective analysis of radiofrequency volumetric thermal ablation of myomas. *J Minim Invasive Gynecol.* Sep-Oct 2014;21(5):767-774. PMID 24613404
7. Yin G, Chen M, Yang S, et al. Treatment of uterine myomas by radiofrequency thermal ablation: a 10-year retrospective cohort study. *Reprod Sci.* May 2015;22(5):609-614. PMID 25355802
8. Goldfarb HA. Bipolar laparoscopic needles for myoma coagulation. *J Am Assoc Gynecol Laparosc.* Feb 1995;2(2):175-179. PMID 9050553
9. Goldfarb HA. Nd:YAG laser laparoscopic coagulation of symptomatic myomas. *J Reprod Med.* Jul 1992;37(7):636-638. PMID 1387912

10. Nisolle M, Smets M, Malvaux V, et al. Laparoscopic myolysis with the Nd:YAG laser. *J Gynecol Surg.* Summer 1993;9(2):95-99. PMID 10171973
11. Donnez J, Squifflet J, Polet R, et al. Laparoscopic myolysis. *Hum Reprod Update.* Nov-Dec 2000;6(6):609-613. PMID 11129695
12. Phillips DR, Nathanson HG, Milim SJ, et al. Laparoscopic leiomyoma coagulation. *J Am Assoc Gynecol Laparosc.* Aug 1996;3(4, Supplement):S39. PMID 9074213
13. Zreik TG, Rutherford TJ, Palter SF, et al. Cryomyolysis, a new procedure for the conservative treatment of uterine fibroids. *J Am Assoc Gynecol Laparosc.* Feb 1998;5(1):33-38. PMID 9454874
14. Zupi E, Piredda A, Marconi D, et al. Directed laparoscopic cryomyolysis: a possible alternative to myomectomy and/or hysterectomy for symptomatic leiomyomas. *Am J Obstet Gynecol.* Mar 2004;190(3):639-643. PMID 15041993
15. Zupi E, Marconi D, Sbracia M, et al. Directed laparoscopic cryomyolysis for symptomatic leiomyomata: one-year follow up. *J Minim Invasive Gynecol.* Jul-Aug 2005;12(4):343-346. PMID 16036195
16. Hindley JT, Law PA, Hickey M, et al. Clinical outcomes following percutaneous magnetic resonance image guided laser ablation of symptomatic uterine fibroids. *Hum Reprod.* Oct 2002;17(10):2737-2741. PMID 12351555
17. Vilos GA, Allaire C, Laberge PY, et al. The management of uterine leiomyomas. *J Obstet Gynaecol Can.* Feb 2015;37(2):157-181. PMID 25767949
18. American College of Obstetricians and Gynecologists (ACOG). Alternatives to hysterectomy in the management of leiomyomas. ACOG practice bulletin No. 96. 2008, reaffirmed 2014; <http://www.acog.org/-/media/List-of-Titles/PBListOfTitles.pdf>. Accessed July 19, 2016.

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