In July 2007, a 56-year-old man with hepatitis B-related cirrhosis and hepatocarcinoma underwent living donor liver transplantation (LDLT), at our institute, using the right lobe graft. We carried out double duct-to-duct biliary anastomoses of the two graft bile ducts – one to the recipient’s common hepatic duct and the other to the cystic duct.

In October 2008, the patient had obstructive jaundice, and was diagnosed as having late biliary strictures involving both anastomoses (Fig. 1). Two percutaneous trans-anastomotic biliary catheters were placed. Over the course of 12 months, the patient underwent seven sessions of percutaneous balloon dilation in both anastomoses. Follow-up cholangiography showed resolution of the stricture at the anastomosis with the recipient cystic duct, and persistence of the angulated stricture at the common hepatic duct, which was confirmed by magnetic resonance imaging (Fig. 2).

Owing to failure of the percutaneous treatment, and to avoid occlusion of the anastomosis to the cystic duct, we placed a short Niti-S biliary, fully covered, self-expandable metal stent (SEMS; Taewoong Medical Co. Ltd., Seoul, South Korea), 3 cm in length and 8 mm in diameter, with an incorporated platinum radiopaque-marked, 10-cm long retrieval string, across the stricture (Fig. 3). The SEMS was removed 3 months later by grasping the string with standard forceps. A final cholangiogram showed resolution of the stricture (Fig. 4). No further procedure was carried out during the 1 year of follow-up.
Biliary complications remain the most common and intractable problem after LDLT, with the incidence of biliary strictures ranging from 3.7% to 25.3% [1,2]. The use of covered SEMS to treat post-liver-transplantation biliary strictures has been reported [3–5]. This report highlights the feasibility and usefulness of a short SEMS in the treatment of a refractory, and otherwise untreatable, biliary stricture after LDLT with double duct-to-duct biliary reconstruction.

Endoscopy_UCTN_Code_TTT_1AR_2AZ

Competing interests: None

G. Curcio1, M. Traina1, R. Miraglia2, I. Tarantino1, L. Barresi1, A. Granata1

1 Department of Endoscopy, Mediterranean Institute for Transplantation and Advanced Specialized Therapies (IsMeTT), Palermo, Italy
2 Department of Radiology, Mediterranean Institute for Transplantation and Advanced Specialized Therapies (IsMeTT), Palermo, Italy

References

Bibliography
DOI http://dx.doi.org/10.1055/s-0031-1291600
Endoscopy 2012; 44: E74–E75
© Georg Thieme Verlag KG
Stuttgart · New York
ISSN 0013-726X

Corresponding author
G. Curcio
Department of Gastroenterology
IsMeTT, UPMC
Via Tricomi 1
Palermo 90127
Italy
Fax: +39-091-2192400
gcurcio@ismett.edu

Curcio G et al. Treatment of a refractory biliary stricture ... Endoscopy 2012; 44: E74–E75