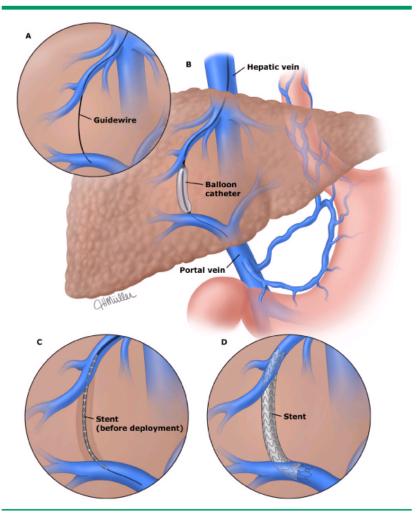
ESLD: TIPS

Transjugular intrahepatic portosystemic shunts (TIPS) involve creation of a low-resistance channel between the hepatic vein and the intrahepatic portion of the portal vein (usually the right branch) using angiographic techniques

Transjugular intrahepatic portosystemic shunt



A transjugular intrahepatic portosystemic shunt (TIPS) is created by passing a needle catheter via the transjugular route into the hepatic vein and wedging it there. The needle is then extruded and advanced through the liver parenchyma to the intrahepatic portion of the portal vein and a stent is placed between the portal and hepatic veins. A TIPS functions like side-to-side surgical portacaval shunt, but does not require general anesthesia or major surgery for placement. (A) Passage of a guidewire between the hepatic vein and the portal vein. (B) Inflation of a balloon catheter within the liver to dilate the tract between the hepatic vein and the portal vein. (C) Deployment of the stent. (D) Stent in its final position.

TIPS is recommended in:

- 1. Salvage therapy in patients with recurrent variceal bleeding despite an adequate trial of endoscopic and pharmacologic treatment. Shunt surgery can also be considered in this setting in centers with expertise in these procedures. TIPS is preferred to shunt surgery in patients with poor liver function.
- 2. Patients with bleeding gastric varices despite pharmacologic treatment
- 3. Bleeding ectopic varices. Endoscopic and surgical approaches may be acceptable alternatives where expertise is available. Endoscopic approaches tend to be unsuccessful for long-term prevention. Surgical approaches should be considered based upon the availability of local expertise and should generally be performed in patients with relatively preserved liver function.

Question:

A 50 year-old male with ESLD and a MELD score of 40 presents with recurrent variceal bleeding unresponsive to endoscopic intervention. The use of TIPS is:

- a. Contraindicated in patients with MELD score > 20
- b. Only considered in patients unable to tolerate surgical intervention
- c. Salvage therapy
- d. Contraindicated in patients with INR > 2

Answer: C – TIPS is considered salvage therapy in patients with recurrent variceal bleeding despite an adequate trial of endoscopic and pharmacologic treatment