A 70-year-old female patient with hypertrophic cardiomyopathy was admitted 18 months after surgical septal myectomy, venous bypass of the left circumflex artery, and mitral valve repair using an autologous pericardial patch extension of the anterior mitral leaflet. Echocardiogram revealed severe mitral insufficiency with a central regurgitation orifice after Mitraclip implantation and plug closure of the patch perforation. The heart team agreed upon Mitraclip implantation and plug closure of the patch perforation.

Panel B demonstrates the mitrascip opening in the left ventricle before leaflet grasping. The mitral double orifice after Mitraclip implantation as seen by three-dimensional by transoesophageal echocardiography (TOE) is shown in Panel C. Panels D and E display the residual leak through the patch (red arrow) after mitrascip (arrowhead) implantation. The patch perforation is crossed by a 6-French multipurpose diagnostic catheter (Panel F—TOE, Panel G Fluoroscopy, note mitrascip (*) in situ). A 8 × 6 mm AMPLATZER™ Duct Occluder (St Jude Medical, St Paul, MN, USA) is deployed in the patch perforation with initially mild residual patch leakage (Panel H—TOE). Transthoracic echocardiography 4 days later confirms mild central mitral regurgitation with no residual patch leakage (Panel I). Panel J (TTE) and K (fluoroscopy) illustrate the mitrascip (*) and duct occluder within the patch (arrow) in situ.

Supplementary material is available at European Heart Journal online.