

## IMÁGENES EN MEDICINA

### Patterns of branch vessel occlusion due to Aortic Dissection

Dr. Gonzalo Pullas Tapia, PhD\*

Aortic dissection is the rupture of the innermost layer of the artery that conduct the flow of blood through a lumen false, causing the weakness of the wall and subsequent risk of aneurysm or rupture. This disease is in association with symptoms of thoracic or abdominal pain, and signs of arterial insufficiency of the organs affected by static or dynamic occlusion of the aortic branches<sup>1</sup>, tamponade, or aortic insufficiency<sup>2</sup>.

Aortic dissection is a medical emergency with high mortality even with appropriate treatment, due to ischemia of the affected organs, heart failure, and the rupture of the aortic wall.

The involvement of aortic vessels is due to the dynamic and static obstructive effect of the dissection flap<sup>3</sup>. **(Figures 1,2)**. Moreover, embolic and thrombotic causes or the compressive effect of the false lumen of the vessels results in ischemic complications of organs<sup>4</sup>. The most common complications are kidney failure, intestinal ischemia, coronary arteries obstruction and peripheral arteries occlusion. The deficit of pulse in the dissection Stanford A, is present in 31%, and its presence has correlation with high-frequency intra-hospital complications and high mortality<sup>5</sup>.

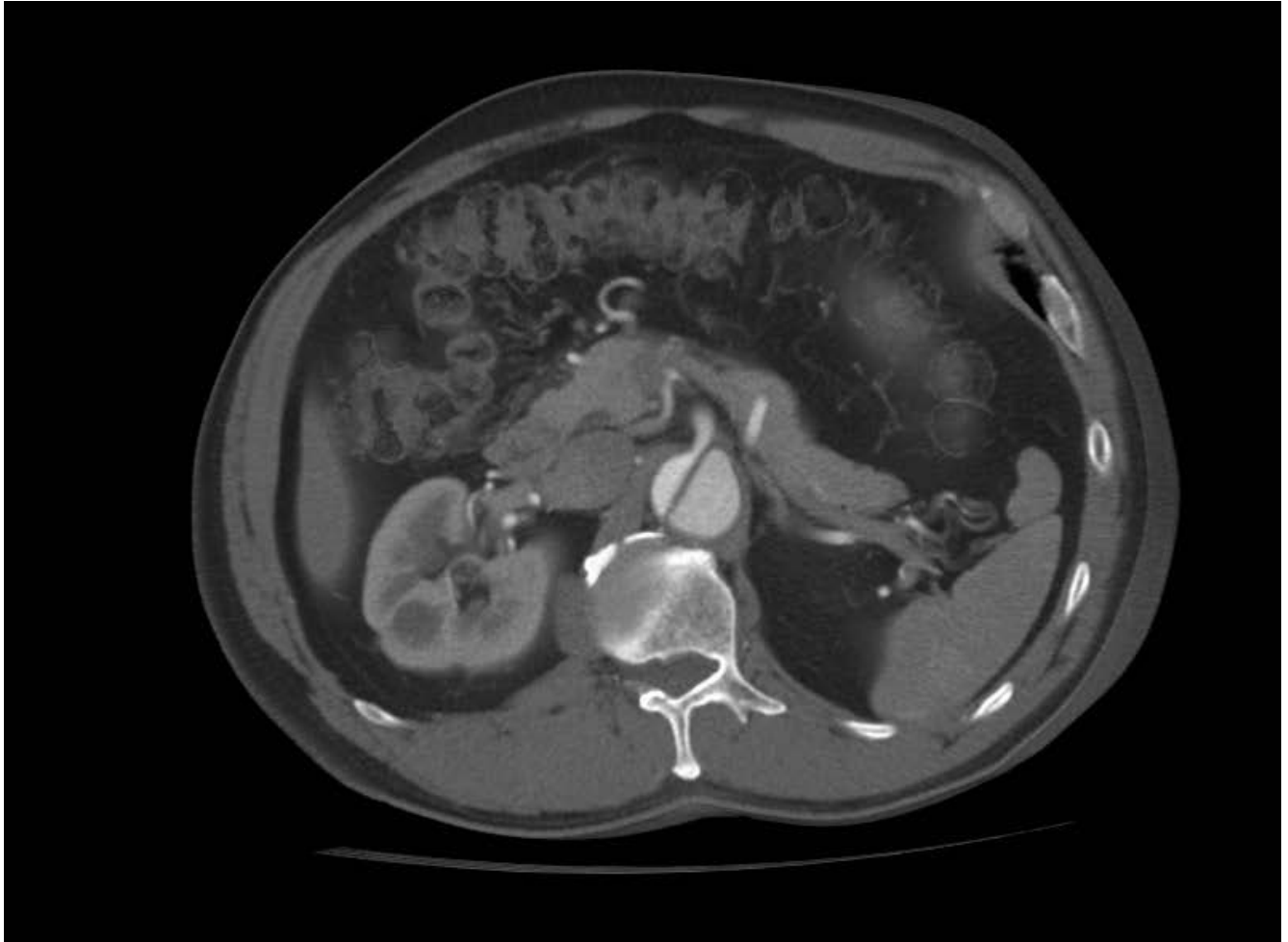
#### FIGURE 1

**STATIC OCCLUSION.** OCCLUSIVE EFFECT ON THE SUPERIOR MESENTERIC ARTERY DUE TO THE DISSECTION OF THEIR WALLS IN CONTINUITY WITH THE DISSECTED AORTIC WALL.



**FIGURE 2**

**DYNAMIC OCCLUSION.** OCCLUSIVE EFFECT ON THE OSTIUM OF THE CELIAC ARTERY, DUE TO THE MOVEMENT OF THE FLAP OF DISSECTION DURING THE CARDIAC CYCLE.



## REFERENCIAS

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Institución de origen:

\*Jefe de Servicio de Cirugía Vascular y Endovascular Hospital de Especialidades FEAA. No.1 Quito-Ecuador

Correspondencia: Dr. Gonzalo Pullas Tapia, PhD.

Dirección: Av. Gran Colombia y Queseras del Medio

Tel: +593 98443873

gpullas@yahoo.com