

ECG Contest

Response to ECG, March 2019

Respuesta al ECG de marzo de 2019

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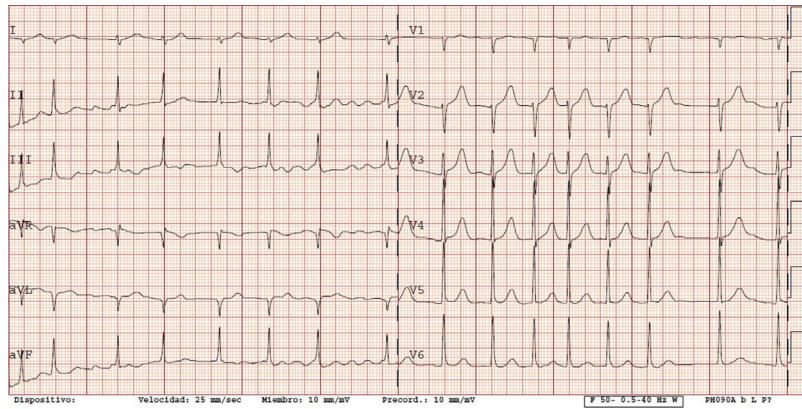


Figure.

This is pre-excited atrial flutter with atrioventricular (AV) 2:1 conduction and 1:1 transient conduction exclusively through a left posteroseptal accessory pathway on administration of adenosine (therefore, answer 2 is correct). Although isolated cases have been reported of conduction acceleration through the AV node, probably due to direct effect of adenosine on the sympathetic system,¹ the expected observation in the case of aberrant conduction would have been an increase in the degree of AV block (answer 4 incorrect). Idiopathic posterior fascicular ventricular tachycardia presents as a relatively narrow QRS tachycardia with an image of right bundle branch block with left axis deviation²; nevertheless, doubling of the heart rate is not expected with adenosine (answer 1, incorrect). Supraventricular paroxysmal AV node re-entry tachycardia usually has a typical clinical presentation and adenosine is very effective at terminating it (answer 3, incorrect). The Figure shows ECG during atrial fibrillation after ablation of the accessory pathway and the cavoatrial isthmus.

REFERENCES

1. Biaggioni I, Killian TJ, Mosqueda-García R, Robertson RM, Robertson D. Adenosine increases sympathetic nerve traffic in humans. *Circulation*. 1991;83:1668–1675.
2. Ward DE, Nathan AW, Camm AJ. Fascicular tachycardia sensitive to calcium antagonists. *Eur Heart J*. 1984;5:896–905.

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