clinical cases DDIs

Date of report 20 Jul 2020

Reported case interaction between **Etravirine** and **Apixaban**

Drugs suspected to be involved in the DDI

Perpetrator
Etravirine

Daily Dose
400 (mg)

Dose adjustment performed
No

Administration Route
Oral

Start date
Dec. 1, 2008

End date
Ongoing

Victim
Apixaban

Daily Dose
10 (mg)

Dose adjustment performed
Yes

Administration Route
Oral

Start date
Feb. 2, 2019

End date
Unknown

Complete list of drugs taken by the patient

Antiretroviral treatment

Etravirine
Emtricitabine/Tenofovir-DF

Complete list of all comedications taken by the patient, included that involved in the DDI

apixaban

Clinical case description

Gender

Male

Age

50

eGFR (mL/min)

>60

Liver function impairment

No

Description

50 year man durably suppressed on Truvada and Etravirine (HIV seroconversion in 2003 with V106I RT mutation, intolerant of EFV (CNS disturbance), borderline eGFR 68mls/min. 2019 presented with pleuritic chest pain and breathlessness, CT confirmed extensive bilateral pulmonary emboli. Since unprovoked pulmonary embolism, for lifelong anticoagulation, apixaban started at standard dosing 5mg bd for 1 week, then 2.5mg daily (prescriber unaware of potential DDI with etravirine). HIV team continued apixaban dosing at 5mg bd- heparin concentrations were therapeutic (1.37U/mL). However, dose subsequently dropped to recommended maintenance of 2.5mg daily- heparin concentrations were subtherapeutic at 0.59 U/mL. DDI considered likely, antiretrovirals changed to an integrase regimen.

Clinical Outcome

Loss of efficacy

Drug Interaction Probability Scale (DIPS)

Score

5 - Probable

Editorial Comment

Coadministration has not been studied. Apixaban is metabolized by CYP3A4 and to a lesser extent by CYP1A2, CYP2C8, CYP2C9 and CYP2C19. Etravirine could potentially decrease apixaban exposure resulting in diminished efficacy. In this situation, it may be recommended changing cART to unboosted integrase inhibitors, as in the present clinical case.

University of Liverpool Recommendation

■ Potential interaction - may require close monitoring, alteration of drug dosage or timing of administration

For more information click here