

Date of report 08 Apr 2021

Reported case interaction between Cobicistat and Midazolam (oral)

Drugs suspected to be involved in the DDI

Perpetrator

Cobicistat

Dose adjustment performed

No

Start date
Unknown

Daily Dose

150 (mg)

Administration Route

Oral

End date

Unknown

Victim

Midazolam (oral)

Dose adjustment performed

Yes

Start date

Unknown

Daily Dose

15 (mg)

Administration Route

Oral

End date

Unknown

Complete list of drugs taken by the patient

Antiretroviral treatment

Darunavir/Cobicistat Emtricitabine/Tenofovir-DF

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

Midazolam

Clinical case description

Gender Age Female 45

eGFR (mL/min) Liver function impairment

>60 No

Description

45 years-old, female patient. HIV-infection was diagnosed at the age of 33. Her current cART is darunavir/cobicistat plus emtricitabine/tenofovir DF. Her last HIVRNA pVL was 50 copies/mL (December 2019). Due to anxiety episodes, midazolam was prescribed (15 mg QD) by her psychotherapist. The patient felt nausea, drowsiness, over sedation, forgetfulness and uncontrollable movements. After consultation with her HIV doctor, midazolam dose was reduced to 7,5 mg QD and soon after, patient did not complain on any side effects.

Clinical Outcome

Toxicity

Drug Interaction Probability Scale (DIPS)

Score

4 - Possible

Editorial Comment

Orally administered midazolam is extensively metabolized by CYP3A. Co-administration with darunavir/cobicistat may cause large increases in the concentrations of this benzodiazepine. Coadministration of darunavir/cobicistat with orally administered midazolam is contraindicated due to the potential for serious and/or life threatening reactions, such as prolonged or increased sedation or respiratory depression. Coadministration of parenteral midazolam should be done with caution and in a setting which ensures close clinical monitoring and appropriate medical management in case of respiratory depression and/or prolonged sedation. Dosage reduction for midazolam should be considered.

University of Liverpool Recommendation

These drugs should not be coadministered

For more information click here