

DRUG-DRUG INTERACTIONS IDENTIFIED BY THE PHARMACIST IN PROM-GP STUDY

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Background: Drug-Drug Interactions (DDIs) and their management are a growing issue in an aging HIV population where polypharmacy is common, in addition to antiretroviral therapy (ART). The Pharmacist Review of Medications for people living with HIV (PLHIV) seen in General Practice (PROM-GP) study recruited 335 participants (98% male, median age 57 years) and polypharmacy was common (median 6 non-ART medications). Here we describe the DDIs encountered within the full study population.

Methods: Medication Related Problems (MRPs) identified by the pharmacist were categorised and assessed for risk using validated tools. Over 10% were independently reviewed by an expert panel. DDIs were assessed within clinical context (dose, treatment length, laboratory and patient factors considered) rather than interaction database risk alone, and were characterised as clinically significant (CS-DDI) or low risk.

Results: A total of 409 DDIs were identified amongst 215 of the 335 PLHIV undergoing pharmacist review. Two-hundred and one (49%) were CS-DDIs. ART was involved in 82% of CS-DDIs identified, with protease inhibitors present in 37%, cobicistat 21%, non-nucleoside reverse transcriptase inhibitors 20%, and integrase inhibitors 17%. Most common non-ART medicine types within 164 CS-DDIs involving ART were: cation supplements (eg iron, magnesium, calcium) 11%, erectile dysfunction agents 7.9%, corticosteroids 7.3%, statins 7.3%, calcium channel blockers 6.7%, antidepressants 6.1%. Amongst the CS-DDIs involving ART, 77.4% were addressed by the pharmacist or GP at 4-months follow-up.

Conclusion: DDIs were identified by the pharmacist for management as part of PROM-GP study in two-thirds of participants, with ART directly involved in 82% of CS-DDIs. This study demonstrates that although prescribers are generally aware of ART interactions, complete medication review can reveal significant DDIs requiring further action. An HIV-experienced pharmacist located within the clinic is ideally placed to assist in prevention and management of our aging and increasingly co-morbid PLHIV community experiencing polypharmacy.

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