DRUG-DRUG INTERACTION TESTING

Interaction descriptions are compiled from information contained in First Databank (FDB) databases, and are reported utilizing the most recent available updates. Interactions identified in the FDB database are subject to the following interpretations/limitations:

1. Reported Drug-Drug Interaction test results reflect substances identified in a submitted urine or oral fluid sample through definitive tandem mass spectrometry testing. Each analyte included in the profile is tested prior to release of a report. Those substances that are tested, but are not identified, are excluded from the interaction analysis. Results from the Drug-Drug Interaction test should not be utilized for determination of compliance with a prescribed medication. Periods of detection for those substances included in testing will vary based on factors including, but not limited to, timing of last ingestion, frequency of ingestion, and/or time of sample submission related to last ingestion.

2. Interaction severities subject to dose-dependency are reported as the most severe interaction identified as part of the analysis. Patients who are prescribed or taking different dosages of the medication may or may not be subject to the same effects of the interaction.

3. Interactions which are variable depending on dosage form are reported only after considering the most commonly prescribed dosage form (usually oral). A patient utilizing a different route of administration (e.g., intravenous or topical) of the same medication may be more or less susceptible to the reported effects of the interaction, or subject to other possible adverse events not reported in the analysis.

4. Certain opioids may be co-formulated with other medications for relief of cough/cold symptoms. Interaction severity may be further increased depending on which opioid formulation is ingested by a patient, and providers should determine the type of opioid formulation taken when interactions are identified to evaluate for additive risk of CNS depression.

5. Clinical effects of interactions reported for medications which are present only in combination products (e.g., butalbital) may not include all potential interactions of other medications present in the formulation (e.g., acetaminophen, aspirin, caffeine, codeine). These interactions must be evaluated independently as they may present other adverse events/consequences.

6. For medications which exist as isomers (e.g., citalopram/escitalopram or milnacipran/levomilnacipran), reported interactions are provided for both isomers.

7. Drug interactions are not evaluated for illicit compounds or nicotine. These interactions must be evaluated independently.

8. Concurrent ingestion of grapefruit juice and drugs metabolized via CYP3A4 has been extensively studied. Furanocoumarins, organic compounds found in a variety of plants and fruits, are capable of causing CYP3A4 inhibition and altering metabolism of prescription medications. The compounds bergaptol and dihydroxybergamottin are the two furanocoumarins found at highest concentration in grapefruits and grapefruit juice. Detection may be indicative of recent grapefruit ingestion and the potential for a drug-food interaction. Clinical judgment must be exercised in determining the original source of tested analytes.

9. Testing for the analytes listed below may be ordered as part of both healthcare compliance testing and DDI testing. If analytes are tested in each testing scenario, any discrepancies found between the definitive-qualitative DDI and the definitive-quantitative healthcare compliance will result in only the healthcare compliance test findings being utilized and reported for each testing scenario. All DDI testing for methadone will be conducted utilizing the established healthcare compliance testing method.

The information contained in this report is intended to supplement the knowledge of healthcare providers regarding drug therapy problems and patient counseling information and is not intended to replace sound clinical judgment in the delivery of healthcare services.