

Interactions with HCC Therapies

Charts revised March 2023. Full information available at www.hep-druginteractions.org

Please note that if a drug is not listed it cannot automatically be assumed it is safe to coadminister.

LEN, lenvatinib; PEM, pembrolizumab; REG, regorafenib; SOR, sorafenib.

	LEN	PEM	REG	SOR
Anaesthetics and Muscle Relaxants				
Bupivacaine	◆	◆	▲	▲
Cisatracurium	◆	◆	◆	◆
Isoflurane	◆	◆	◆	◆
Ketamine	◆	◆	◆	◆
Nitrous oxide	◆	◆	◆	◆
Propofol	◆	◆	■	■
Thiopental	◆	◆	◆	◆
Tizanidine	◆	◆	◆	◆
Analgesics				
Aceclofenac	◆	◆	◆	◆
Alfentanil	◆	◆	◆	◆
Aspirin	◆	◆	◆	◆
Buprenorphine	◆	◆	◆	◆
Celecoxib	◆	◆	◆	◆
Codeine	◆	◆	◆	◆
Dexketoprofen	◆	◆	◆	◆
Dextropropoxyphene	◆	◆	◆	◆
Diamorphine	◆	◆	◆	◆
Diclofenac	◆	◆	◆	◆
Diffunisal	◆	◆	◆	◆
Dihydrocodeine	◆	◆	▲	▲
Etoricoxib	◆	◆	◆	◆
Fentanyl (Prescribed)	◆	◆	◆	◆
Flurbiprofen	◆	◆	◆	◆
Hydrocodone	◆	◆	◆	◆
Hydromorphone	◆	◆	◆	◆
Ibuprofen	◆	◆	◆	◆
Indometacin	◆	◆	◆	◆
Ketoprofen	◆	◆	◆	◆
Mefenamic acid	◆	◆	◆	◆
Meloxicam	◆	◆	◆	◆
Metamizole (Dipyrone)	◆	◆	■	■
Methadone	◆	◆	◆	◆
Morphine	◆	◆	◆	◆
Naproxen	◆	◆	◆	◆
Oxycodone	◆	◆	◆	◆
Paracetamol (Acetaminophen)	◆	◆	▲	■
Pethidine (Meperidine)	◆	◆	◆	◆
Piroxicam	◆	◆	◆	◆
Tapentadol	◆	◆	◆	◆
Tramadol	◆	◆	◆	▲
Anthelmintics				
Albendazole	◆	◆	◆	◆
Ivermectin	◆	◆	◆	◆
Nicosamide	◆	◆	◆	◆
Oxamniquine	◆	◆	◆	◆
Praziquantel	◆	◆	◆	◆
Pyrantel	◆	◆	◆	◆
Antiarrhythmics				
Amiodarone	■	◆	▲	■
Bepiridil	◆	◆	◆	■
Digoxin	◆	◆	◆	■
Disopyramide	◆	◆	◆	■
Dofetilide	◆	◆	◆	■
Dronedarone	◆	◆	◆	■
Flecainide	◆	◆	◆	■
Lidocaine (Lignocaine)	◆	◆	◆	◆
Mexiletine	◆	◆	◆	◆
Propafenone	◆	◆	◆	◆
Quinidine	◆	◆	▲	■
Vernakalant	◆	◆	◆	◆
Antibacterials				
Amikacin	◆	◆	◆	◆
Amoxicillin	◆	◆	◆	◆
Ampicillin	◆	◆	◆	◆
Azithromycin	■	◆	◆	■
Aztreonam	◆	◆	◆	◆
Bedaquiline	■	◆	◆	■
Benzylpenicillin	◆	◆	◆	◆
Bezlotoxumab	◆	◆	◆	◆
Capreomycin	◆	◆	◆	◆
Cefaclor	◆	◆	◆	◆
Cefadroxil	◆	◆	◆	◆
Cefalexin	◆	◆	◆	◆
Cefazolin	◆	◆	◆	◆
Cefixime	◆	◆	◆	◆
Cefotaxime	◆	◆	◆	◆
Cefradine	◆	◆	◆	◆
Ceftaroline	◆	◆	◆	◆
Ceftazidime	◆	◆	◆	◆
Ceftriaxone	◆	◆	◆	◆
Cefuroxime	◆	◆	◆	◆
Chloramphenicol	◆	◆	■	▲
Ciprofloxacin	■	◆	◆	■
Clarithromycin	◆	◆	◆	■
Clavulanic acid	◆	◆	◆	◆
Clindamycin	◆	◆	▲	◆

Key to symbols

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■	Potential clinically significant interaction that is likely to require additional monitoring, alteration of drug dosage or timing of administration
▲	Potential interaction likely to be of weak intensity. Additional action/monitoring or dosage adjustment is unlikely to be required
◆	No clinically significant interaction expected

Notes

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- Predicted interactions are based on known metabolic pathways and routes of clearance.
- Caution is required in patients with hepatic impairment as this may also increase drug levels and require dose modification.
- Where advice differs between countries, the charts reflect the more cautious option.

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	LEN	PEM	REG	SOR
Antibacterials continued				
Clofazimine	◆	◆	●	◆
Cloxacillin	◆	◆	◆	◆
Dapsone	◆	◆	◆	◆
Delamanid	■	◆	◆	■
Ertapenem	◆	◆	◆	◆
Erythromycin	■	◆	◆	■
Ethambutol	◆	◆	◆	◆
Flucloxacillin	◆	◆	◆	◆
Gentamicin	◆	◆	◆	◆
Imipenem	◆	◆	◆	◆
Isoniazid	◆	◆	◆	◆
Levofloxacin	■	◆	◆	■
Linezolid	◆	◆	▲	◆
Lymecycline	◆	◆	◆	◆
Meropenem	◆	◆	◆	◆
Methenamine	◆	◆	◆	◆
Metronidazole	◆	◆	▲	◆
Moxifloxacin	●	◆	■	●
Nitrofurantoin	◆	◆	◆	◆
Norfloxacin	◆	◆	◆	◆
Ofloxacin	■	◆	◆	■
Penicillin V	◆	◆	◆	◆
Piperacillin	◆	◆	◆	◆
Pivmecillinam	◆	◆	◆	◆
Pyrazinamide	◆	◆	◆	◆
Rifabutin	◆	◆	◆	◆
Rifampicin	◆	◆	●	●
Rifapentine	◆	◆	●	●
Rifaximin	◆	◆	▲	▲
Spectinomycin	◆	◆	◆	◆
Streptomycin	◆	◆	◆	◆
Sulfadiazine	◆	◆	◆	◆
Tazobactam	◆	◆	◆	◆
Telithromycin	■	◆	●	■
Temocillin	◆	◆	◆	◆
Tetracyclines	◆	◆	◆	◆
Ticarillin	◆	◆	◆	◆
Trimethoprim/Sulfamethoxazole	◆	◆	◆	◆
Troleandomycin	◆	◆	●	◆
Vancomycin	◆	◆	■	◆
Anticoagulant, Anti-platelet and Fibrinolytic				
Acenocoumarol	◆	◆	■	■
Anagrelide	◆	◆	■	◆
Apixaban	◆	◆	■	▲
Clopidogrel	◆	◆	■	◆
Dabigatran	◆	◆	■	▲
Dalteparin	◆	◆	■	◆
Danaparoid	◆	◆	■	◆
Dipyridamole	◆	◆	■	▲
Edoxaban	◆	◆	■	◆
Eltrombopag	◆	◆	■	▲
Enoxaparin	◆	◆	■	◆
Fluidione	◆	◆	■	■
Fondaparinux	◆	◆	■	◆
Heparin	◆	◆	■	◆
Natalizumab	▲	◆	▲	◆
Phenprocoumon	◆	◆	■	■
Prasugrel	◆	◆	■	◆
Rivaroxaban	◆	◆	■	▲
Streptokinase	◆	◆	■	◆
Ticagrelor	◆	◆	■	▲
Ticlopidine	◆	◆	■	◆
Tinzaparin	◆	◆	■	◆
Warfarin	■	◆	■	■
Anticonvulsants				
Carbamazepine	◆	◆	●	●
Clonazepam	◆	◆	◆	◆
Eslicarbazepine	◆	◆	●	●
Ethosuximide	◆	◆	◆	◆
Gabapentin	◆	◆	◆	◆
Lacosamide	◆	◆	◆	◆
Lamotrigine	◆	◆	◆	◆
Levetiracetam	◆	◆	◆	◆
Oxcarbazepine	◆	◆	●	●
Perampanel	◆	◆	◆	◆
Phenobarbital	◆	◆	●	●
Phenytoin	◆	◆	●	●
Pregabalin	◆	◆	◆	◆
Primidone	◆	◆	●	●
Retigabine	◆	◆	◆	◆
Rufinamide	◆	◆	◆	◆
Sultiame	◆	◆	◆	◆

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Anticonvulsants (continued)				
Tiagabine	◆	◆	◆	◆
Topiramate	◆	◆	◆	◆
Valproic acid (Divalproex)	◆	◆	■	▲
Vigabatrin	◆	◆	◆	◆
Zonisamide	◆	◆	◆	◆
Antidepressants				
Agomelatine	◆	◆	◆	◆
Amitriptyline	■	◆	◆	■
Bupropion	◆	◆	◆	◆
Citalopram	■	◆	◆	■
Clomipramine	■	◆	◆	■
Desipramine	■	◆	◆	■
Desvenlafaxine	◆	◆	◆	◆
Dosulepin	■	◆	◆	■
Doxepin	▲	◆	◆	▲
Duloxetine	◆	◆	◆	◆
Escitalopram	■	◆	◆	■
Fluoxetine	◆	◆	◆	◆
Fluvoxamine	▲	◆	◆	▲
Imipramine	■	◆	◆	■
Lithium	■	◆	◆	■
Maprotiline	■	◆	◆	■
Mianserin	■	◆	◆	■
Milnacipran	◆	◆	◆	◆
Mirtazapine	■	◆	◆	■
Moclobemide	●	◆	◆	●
Nefazodone	◆	◆	●	◆
Nortriptyline	■	◆	◆	■
Paroxetine	▲	◆	◆	▲
Sertraline	■	◆	◆	■
Tianeptine	◆	◆	◆	◆
Trazodone	■	◆	◆	■
Trimipramine	■	◆	◆	■
Venlafaxine	●	◆	◆	●
Vortioxetine	◆	◆	◆	◆
Antidiabetics				
Acarbose	◆	◆	◆	◆
Albiglutide	◆	◆	◆	▲
Alogliptin	◆	◆	◆	▲
Canagliflozin	◆	◆	■	■
Dapagliflozin	◆	◆	■	■
Dulaglutide	◆	◆	◆	▲
Empagliflozin	◆	◆	■	■
Exenatide	◆	◆	◆	▲
Glibenclamide (Glyburide)	◆	◆	◆	▲
Gliclazide	◆	◆	◆	▲
Glimepiride	◆	◆	◆	▲
Glipizide	◆	◆	◆	▲
Insulin	◆	◆	◆	◆
Linagliptin	◆	◆	▲	▲
Liraglutide	◆	◆	◆	▲
Lixisenatide	◆	◆	◆	▲
Metformin	◆	◆	◆	▲
Nateglinide	◆	◆	◆	▲
Pioglitazone	◆	◆	◆	▲
Repaglinide	◆	◆	◆	▲
Rosiglitazone	◆	◆	◆	▲
Saxagliptin	◆	◆	◆	▲
Sitagliptin	◆	◆	◆	▲
Tolbutamide	◆	◆	◆	▲
Vildagliptin	◆	◆	◆	▲
Antifungals				
Amphotericin B	▲	▲	▲	■
Anidulafungin	◆	◆	◆	◆
Caspofungin	◆	◆	◆	◆
Fluconazole	■	◆	●	■
Flucytosine	▲	▲	▲	▲
Griseofulvin	◆	◆	◆	◆
Isavuconazole	◆	◆	●	■
Itraconazole	■	◆	●	■
Ketoconazole	■	◆	●	■
Miconazole	◆	◆	◆	◆
Nystatin	◆	◆	◆	◆
Posaconazole	■	◆	●	■
Terbinafine	◆	◆	◆	◆
Voriconazole	■	◆	●	■

	LEN	PEM	REG	SOR
Antihistamines				
Astemizole	■	◆	◆	■
Bilastine	◆	◆	◆	◆
Cetirizine	◆	◆	◆	◆
Chlorphenamine	◆	◆	◆	◆
Desloratadine	◆	◆	◆	◆
Diphenhydramine	▲	◆	◆	▲
Doxylamine	◆	◆	◆	◆
Ebastine	◆	◆	◆	◆
Fexofenadine	◆	◆	◆	▲
Hydroxyzine	●	◆	◆	●
Levocetirizine	◆	◆	◆	◆
Loratadine	◆	◆	◆	◆
Promethazine	■	◆	◆	■
Terfenadine	●	◆	◆	●
Antimigraine Agents				
Almotriptan	◆	◆	◆	◆
Dihydroergotamine	◆	◆	◆	◆
Eletriptan	◆	◆	◆	◆
Erenumab	◆	◆	◆	◆
Ergotamine	◆	◆	◆	◆
Fremanezumab	◆	◆	◆	◆
Frovatriptan	◆	◆	◆	◆
Galcanezumab	◆	◆	◆	◆
Methylergonovine	◆	◆	◆	◆
Naratriptan	◆	◆	◆	◆
Pizotifen	◆	◆	◆	◆
Rizatriptan	◆	◆	◆	◆
Sumatriptan	◆	◆	◆	◆
Zolmitriptan	◆	◆	◆	◆
Antiprotozoals				
Amodiaquine	◆	◆	◆	◆
Artemether	●	◆	◆	●
Artemisinin	●	◆	◆	●
Artesunate	●	◆	◆	●
Atovaquone	◆	■	◆	◆
Chloroquine	■	◆	◆	■
Dihydroartemisinin	●	◆	◆	●
Doxycycline	◆	◆	◆	◆
Halofantrine	■	◆	◆	■
Hydroxychloroquine	■	◆	◆	■
Lumefantrine	●	◆	◆	●
Mefloquine	■	◆	◆	■
Nitazoxanide	◆	◆	◆	◆
Pentamidine	■	◆	◆	■
Primaquine	■	◆	◆	■
Proguanil	◆	◆	◆	◆
Pyrimethamine	◆	◆	◆	◆
Quinine	■	◆	◆	■
Sodium stibogluconate	◆	◆	◆	◆
Sulfadoxine	◆	◆	◆	◆
Antipsychotics/neuroleptics				
Amisulpride	■	◆	◆	■
Aripiprazole	■	◆	◆	■
Asenapine	■	◆	◆	■
Chlorpromazine	■	◆	◆	■
Chlorprothixene	■	◆	◆	■
Clozapine	■	▲	▲	■
Flupentixol	●	◆	◆	●
Fluphenazine	●	◆	◆	●
Haloperidol	●	◆	◆	●
Iloperidone	●	◆	◆	●
Levomepromazine	■	◆	◆	■
Lurasidone	■	◆	▲	■
Olanzapine	■	◆	◆	■
Paliperidone	■	◆	◆	■
Perazine	▲	◆	◆	▲
Periciazine	■	◆	◆	■
Perphenazine	■	◆	◆	■
Pimozide	●	◆	◆	●
Pipotiazine	■	◆	◆	■
Prochlorperazine	■	◆	◆	■
Quetiapine	■	◆	◆	■
Risperidone	■	◆	◆	■
Sulpiride	■	◆	◆	■
Thioridazine	●	◆	◆	●
Tiapride	■	◆	◆	■
Trifluoperazine	▲	◆	◆	▲
Ziprasidone	●	◆	◆	●
Zuclopentixol	●	◆	◆	●

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Antivirals				
Aciclovir	◆	◆	◆	◆
Amantadine	▲	◆	◆	▲
Brincidofovir	▲	▲	◆	◆
Brivudine	◆	◆	◆	◆
Cidofovir	▲	▲	◆	◆
Favipiravir	◆	◆	◆	◆
Foscarnet	■	◆	◆	■
Molnupiravir	◆	◆	◆	◆
Nirmatrelvir/ritonavir	◆	◆	◆	◆
Osetamivir	◆	◆	◆	◆
Palivizumab	◆	◆	◆	◆
Remdesivir	▲	◆	◆	▲
Rimantadine	◆	◆	◆	◆
Sotrovimab	◆	◆	◆	◆
Tecovirimat	◆	◆	▲	▲
Tixagevimab/cilgavimab	◆	◆	◆	◆
Valaciclovir	◆	◆	◆	◆
Zanamivir	◆	◆	◆	◆
Anxiolytics/Hypnotics/Sedatives				
Alprazolam	◆	◆	◆	◆
Amobarbital	◆	◆	●	●
Bromazepam	◆	◆	◆	◆
Bromperidol	■	◆	◆	●
Buspirone	◆	◆	◆	◆
Clobazam	◆	◆	◆	◆
Clorazepate	◆	◆	◆	◆
Clotiapine	■	◆	◆	■
Diazepam	◆	◆	◆	◆
Estazolam	◆	◆	◆	◆
Flurazepam	◆	◆	◆	◆
Lorazepam	◆	◆	◆	◆
Lormetazepam	◆	◆	◆	◆
Midazolam (oral)	◆	◆	◆	◆
Midazolam (parenteral)	◆	◆	◆	◆
Oxazepam	◆	◆	◆	◆
Quazepam	◆	◆	◆	◆
Temazepam	◆	◆	◆	◆
Triazolam	◆	◆	◆	◆
Zaleplon	◆	◆	◆	◆
Zolpidem	◆	◆	◆	◆
Zopiclone	◆	◆	◆	◆
Beta Blockers				
Atenolol	▲	◆	▲	◆
Bisoprolol	▲	◆	▲	▲
Carvedilol	▲	◆	■	▲
Celiprolol	▲	◆	▲	▲
Labetalol	▲	◆	▲	▲
Metoprolol	▲	◆	▲	◆
Nebivolol	▲	◆	▲	◆
Oxprenolol	▲	◆	■	▲
Pindolol	▲	◆	▲	▲
Propranolol	▲	◆	▲	▲
Sotalol	■	◆	▲	■
Timolol	▲	◆	▲	▲
Bisphosphonates				
Alendronic acid	▲	◆	◆	▲
Clodronate	◆	◆	◆	◆
Ibandronic acid	▲	◆	◆	▲
Pamidronate	◆	◆	◆	◆
Risedronate	▲	◆	◆	▲
Bronchodilators				
Formoterol	◆	◆	◆	◆
Indacaterol	◆	◆	◆	◆
Ipratropium bromide	◆	◆	◆	◆
Montelukast	◆	◆	◆	◆
Omalizumab	◆	◆	◆	◆
Reslizumab	◆	◆	◆	◆
Salbutamol	◆	◆	◆	◆
Salmeterol	◆	◆	◆	◆
Theophylline	◆	◆	◆	◆
Tiotropium	◆	◆	◆	◆
Calcium Channel Blockers				
Amlodipine	▲	◆	▲	◆
Diltiazem	▲	◆	▲	◆
Felodipine	▲	◆	▲	▲
Nicardipine	▲	◆	▲	◆
Nifedipine	▲	◆	▲	◆
Nisoldipine	▲	◆	▲	◆
Nitrendipine	▲	◆	▲	◆
Verapamil	▲	◆	▲	◆

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	LEN	PEM	REG	SOR
Cancer Therapies				
Abiraterone	■	◆	◆	■
Acalabrutinib	◆	▲	▲	◆
Anastrozole	◆	◆	◆	◆
Avelumab	◆	◆	◆	◆
Axitinib	◆	■	◆	◆
Belantamab mafodotin	▲	▲	▲	▲
Bevacizumab	◆	■	▲	◆
Blinatumomab	◆	■	▲	◆
Bortezomib	◆	■	◆	◆
Bosutinib	■	■	▲	■
Brentuximab vedotin	◆	■	▲	◆
Capecitabine	■	■	◆	◆
Carboplatin	◆	■	▲	■
Cetuximab	◆	◆	◆	◆
Chlorambucil	◆	■	▲	◆
Cisplatin	◆	■	▲	■
Cyclophosphamide	◆	▲	▲	◆
Daratumumab	◆	■	▲	◆
Dasatinib	■	■	◆	■
Dinutuximab beta	▲	▲	▲	◆
Doxorubicin	▲	■	▲	■
Durvalumab	▲	▲	▲	◆
Erlotinib	◆	◆	◆	◆
Elotuzumab	▲	◆	◆	▲
Estramustine	◆	◆	◆	◆
Etoposide	◆	■	■	■
Everolimus	▲	●	▲	■
Exemestane	◆	◆	◆	◆
Fludarabine	◆	■	▲	◆
Gefitinib	◆	■	■	◆
Gemcitabine	◆	■	▲	◆
Idarubicin	◆	■	▲	◆
Imatinib	◆	■	■	◆
Ipilimumab	◆	■	▲	◆
Irinotecan	◆	■	■	■
Isatuximab	▲	◆	◆	◆
Ixazomib	◆	■	▲	◆
Lapatinib	■	■	■	■
Letrozole	◆	◆	◆	◆
Medroxyprogesterone (oncology)	◆	◆	◆	◆
Mercaptopurine	◆	■	▲	◆
Mesna	◆	■	■	■
Methotrexate	◆	■	■	■
Mitoxantrone	◆	■	■	◆
Mogamulizumab	◆	◆	◆	◆
Nilotinib	■	■	■	■
Niraparib	◆	■	▲	◆
Nivolumab	◆	■	◆	◆
Obinutuzumab	◆	■	◆	◆
Ofatumumab	◆	■	▲	◆
Olaratumab	◆	■	◆	◆
Oxaliplatin	■	■	▲	■
Paclitaxel	◆	■	▲	■
Panitumumab	◆	◆	◆	◆
Pertuzumab	▲	▲	▲	◆
Ramucirumab	▲	◆	▲	◆
Rituximab	◆	■	▲	◆
Ruxolitinib	▲	▲	▲	▲
Sacituzumab govitecan	▲	▲	●	●
Sunitinib	■	■	▲	■
Tamoxifen	▲	◆	◆	▲
Temsirolimus	◆	●	◆	◆
Trastuzumab	▲	▲	▲	◆
Trastuzumab deruxtecan	▲	▲	▲	◆
Trastuzumab emtansine	◆	■	◆	▲
Vinblastine	◆	■	▲	◆
Vincristine	◆	■	▲	◆
Vinorelbine	◆	■	◆	▲

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	LEN	PEM	REG	SOR
Contraceptives				
Conjugated estrogens (HRT)	◆	◆	◆	◆
Desogestrel (POP)	■	◆	◆	◆
Desogestrel/ethinylestradiol (COC)	■	◆	◆	◆
Dienogest	■	◆	◆	◆
Drospirenone (POP)	■	◆	◆	◆
Drospirenone/estradiol (HRT)	◆	◆	◆	◆
Drospirenone/ethinylestradiol (COC)	■	◆	◆	◆
Dydrogesterone/estradiol (HRT)	◆	◆	◆	◆
Ethinylestradiol	■	◆	◆	◆
Etonogestrel (implant)	■	◆	◆	◆
Etonogestrel (vaginal ring)	■	◆	◆	◆
Gestodene/ethinylestradiol (COC)	■	◆	◆	◆
Levonorgestrel (COC)	■	◆	◆	◆
Levonorgestrel (Emergency Contraception)	■	◆	◆	◆
Levonorgestrel (HRT)	◆	◆	◆	◆
Levonorgestrel (implant)	■	◆	◆	◆
Levonorgestrel (IUD)	■	◆	◆	◆
Levonorgestrel (POP)	■	◆	◆	◆
Medroxyprogesterone (depot)	■	◆	◆	◆
Medroxyprogesterone (oral)	■	◆	◆	◆
Medroxyprogesterone/conjugated estrogens (HRT)	◆	◆	◆	◆
Medroxyprogesterone/estradiol (HRT)	◆	◆	◆	◆
Micronized progesterone (HRT)	◆	◆	◆	◆
Norelgestromin/ethinylestradiol (patch)	■	◆	◆	◆
Norethisterone (Norethindrone) (POP)	■	◆	◆	◆
Norethisterone (Norethindrone)/estradiol (HRT)	◆	◆	◆	◆
Norethisterone (Norethindrone)/ethinylestradiol (COC)	■	◆	◆	◆
Norethisterone (Norethindrone)/mestranol (COC)	■	◆	◆	◆
Norgestimate/ethinylestradiol (COC)	■	◆	◆	◆
Norgestrel/conjugated estrogens (HRT)	◆	◆	◆	◆
Norgestrel/ethinylestradiol (COC)	■	◆	◆	◆
Testosterone	◆	◆	◆	◆
Erectile Dysfunction Agents				
Sildenafil	◆	◆	◆	◆
Tadalafil	◆	◆	◆	◆
Vardenafil	◆	◆	◆	◆

	LEN	PEM	REG	SOR
Gastrointestinal Agents				
Aluminium hydroxide	◆	◆	◆	◆
Alverine citrate	◆	◆	◆	◆
Antacids	◆	◆	◆	◆
Aprepitant	◆	◆	■	◆
Bisacodyl	◆	◆	◆	◆
Cimetidine	◆	◆	▲	◆
Cisapride	■	◆	◆	■
Cyclizine	◆	◆	◆	◆
Dantron	◆	◆	◆	◆
Domperidone	●	◆	◆	●
Droperidol	●	◆	◆	●
Esomeprazole	◆	◆	◆	◆
Famotidine	▲	◆	◆	▲
Granisetron	■	◆	◆	■
Hyoscine	◆	◆	◆	◆
Ispaghula husk	◆	◆	◆	◆
Lactulose	◆	◆	◆	◆
Lansoprazole	◆	◆	◆	◆
Linaclotide	◆	◆	◆	◆
Loperamide	◆	◆	◆	◆
Lubiprostone	◆	◆	◆	◆
Macrogol	▲	◆	▲	▲
Mebeverine	◆	◆	◆	◆
Mesalazine	◆	◆	◆	◆
Methylcellulose	◆	◆	◆	◆
Metoclopramide	■	◆	◆	■
Naloxegol	◆	◆	◆	◆
Omeprazole	◆	◆	◆	◆
Ondansetron	■	◆	◆	■
Pantoprazole	◆	◆	◆	◆
Prucalopride	◆	◆	◆	◆
Rabeprazole	◆	◆	◆	◆
Ranitidine	◆	◆	◆	◆
Senna	◆	◆	◆	◆
Simeticone	◆	◆	◆	◆
Sulfasalazine	◆	◆	●	▲
Trimebutine	◆	◆	◆	◆
HCC Therapies				
Lenvatinib		▲	▲	▲
Pembrolizumab	▲		▲	▲
Regorafenib	▲	▲		■
Sorafenib	▲	▲	■	
Hepatitis B Drugs				
Adefovir	◆	◆	◆	◆
Entecavir	◆	◆	◆	◆
Lamivudine	◆	◆	◆	◆
Peginterferon alfa-2a	▲	▲	▲	▲
Peginterferon alfa-2b	▲	▲	▲	▲
Telbivudine	◆	◆	◆	◆
Tenofovir alafenamide (TAF)	◆	◆	◆	▲
Tenofovir-DF	◆	◆	◆	▲
Hepatitis C Drugs				
Daclatasvir	◆	◆	◆	◆
Elbasvir/Grazoprevir	◆	◆	▲	■
Glecaprevir/Pibrentasvir	◆	◆	■	◆
Ledipasvir/Sofosbuvir	◆	◆	■	◆
OBV/PTV/r	◆	◆	●	■
OBV/PTV/r + Dasabuvir	◆	◆	●	■
Ribavirin	▲	■	▲	▲
Simeprevir	◆	◆	▲	◆
Sofosbuvir (SOF)	◆	◆	◆	◆
SOF/Velpatasvir	◆	◆	■	◆
SOF/Velpatasvir/Voxilaprevir	◆	◆	■	◆
Hepatitis D Entry Inhibitor				
Bulevirtide	◆	◆	◆	◆

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	LEN	PEM	REG	SOR
Herbals/Supplements/Vitamins				
Aloe vera	◆	◆	◆	◆
Ascorbic acid (Vitamin C)	◆	◆	◆	◆
Black cohosh (<i>A. racemosa</i>)	◆	◆	◆	◆
Cat's claw (<i>U. tomentosa</i>)	◆	◆	●	◆
Colecalciferol (Vitamin D3)	◆	◆	◆	◆
Cyanocobalamin (B12)	◆	◆	◆	◆
Diosmin	◆	◆	▲	◆
Echinacea	◆	◆	▲	◆
Eucalyptus globulus	◆	◆	■	◆
Folic acid	◆	◆	◆	◆
Garlic	◆	◆	▲	▲
Ginger (<i>Z. officinale</i>)	◆	◆	■	◆
Ginkgo biloba	◆	◆	◆	◆
Ginseng	◆	◆	◆	◆
Goldenseal (<i>H. canadensis</i>)	◆	◆	■	◆
Grape seed extract	◆	◆	●	◆
Grapefruit juice	◆	◆	■	◆
Green tea (<i>C. sinensis</i>)	◆	◆	▲	◆
Homeopathic remedies	◆	◆	◆	◆
Inula racemosa	◆	◆	■	◆
Iodine	◆	◆	◆	◆
Ferrous sulphate	◆	◆	◆	◆
Kava kava (<i>P. methysticum</i>)	◆	◆	■	◆
Milk thistle	◆	◆	◆	◆
Retinol (Vitamin A)	◆	◆	◆	◆
Riboflavin (Vitamin B2)	◆	◆	◆	◆
Serenoa repens	◆	◆	●	◆
St John's wort	◆	◆	●	●
Thiamine (Vitamin B1)	◆	◆	◆	◆
Turmeric (curcumin)	◆	◆	▲	◆
Valerian	◆	◆	◆	◆
Vitamin E	◆	◆	◆	◆
HIV Drugs				
Entry/Integrase Inhibitors				
Albuvirtide	◆	◆	◆	◆
Bictegravir/FTC/TAF	◆	◆	◆	▲
Cabotegravir (oral)	◆	◆	◆	◆
Cabotegravir/rilpivirine (LA)	▲	◆	◆	▲
Dolutegravir	◆	◆	◆	◆
Dolutegravir/rilpivirine	▲	◆	▲	▲
Elvitegravir/cobi/FTC/TAF	◆	◆	●	◆
Elvitegravir/cobi/FTC/TDF	◆	◆	●	▲
Enfuvirtide	◆	◆	◆	◆
Fostemsavir	▲	◆	◆	▲
Ibalizumab-uiyk	◆	◆	◆	◆
Maraviroc	◆	◆	◆	◆
Raltegravir	◆	◆	▲	◆
NNRTIs				
Dapivirine	◆	◆	◆	◆
Doravirine	◆	◆	◆	◆
Doravirine/3TC/TDF	◆	◆	◆	▲
Efavirenz	■	◆	●	●
Etravirine	◆	◆	●	●
Nevirapine	◆	◆	●	●
Rilpivirine	▲	◆	◆	▲
Rilpivirine/FTC/TAF	▲	◆	◆	▲
NRTIs				
Abacavir	◆	◆	◆	◆
Didanosine	◆	◆	◆	◆
Emtricitabine (FTC)	◆	◆	◆	◆
Emtricitabine + TAF	◆	◆	◆	▲
Emtricitabine + TDF	◆	◆	◆	▲
Lamivudine	◆	◆	◆	◆
Stavudine	◆	◆	◆	◆
Tenofovir-DF	◆	◆	◆	▲
Zidovudine	▲	◆	▲	▲
Protease Inhibitors				
Atazanavir alone	■	◆	●	■
Atazanavir/cobicistat	■	◆	●	■
Atazanavir + ritonavir	■	◆	●	■
Darunavir/cobicistat	◆	◆	●	◆
Darunavir/cobi/FTC/TAF	◆	◆	●	◆
Darunavir + ritonavir	◆	◆	●	■
Fosamprenavir	◆	◆	●	■
Indinavir	◆	◆	●	◆
Lopinavir	■	◆	●	■
Ritonavir	■	◆	●	■
Tipranavir	■	◆	●	■

	LEN	PEM	REG	SOR
Hypertension/Heart Failure Agents				
Acebutolol	▲	◆	▲	◆
Aliskiren	▲	◆	▲	▲
Ambrisentan	▲	◆	■	■
Amiloride	▲	◆	▲	◆
Azilsartan	▲	◆	▲	◆
Benazepril	▲	◆	▲	▲
Bendroflumethiazide	▲	◆	▲	◆
Bosentan	▲	◆	■	■
Bumetanide	▲	◆	▲	◆
Candesartan	▲	◆	▲	◆
Captopril	▲	◆	▲	◆
Chlorthalidone	▲	◆	▲	◆
Chlortalidone	▲	◆	▲	◆
Cilazapril	▲	◆	▲	◆
Clevidipine	▲	◆	▲	◆
Clonidine	▲	◆	▲	◆
Doxazosin	▲	◆	▲	◆
Enalapril	▲	◆	▲	◆
Eplerenone	▲	◆	▲	◆
Epoprostenol	▲	◆	▲	◆
Eprosartan	▲	◆	▲	◆
Fosinopril	▲	◆	▲	◆
Furosemide	▲	◆	■	▲
Hydralazine	▲	◆	▲	◆
Hydrochlorothiazide	▲	◆	▲	◆
Iloprost	▲	◆	▲	◆
Indapamide	▲	◆	▲	■
Irbesartan	▲	◆	▲	▲
Isradipine	▲	◆	▲	◆
Ivabradine	■	◆	▲	■
Lacidipine	■	◆	▲	■
Lercanidipine	▲	◆	▲	◆
Lisinopril	▲	◆	▲	◆
Losartan	▲	◆	▲	◆
Macitentan	▲	◆	▲	◆
Methyldopa	▲	◆	▲	◆
Metolazone	▲	◆	▲	◆
Moxonidine	▲	◆	▲	◆
Olmesartan	▲	◆	▲	◆
Perindopril	▲	◆	▲	◆
Prazosin	▲	◆	■	◆
Quinapril	▲	◆	▲	◆
Ramipril	▲	◆	▲	◆
Ranolazine	■	◆	▲	■
Rilmenidine	▲	◆	▲	◆
Riociguat	▲	◆	▲	◆
Sacubitril/valsartan	▲	◆	▲	◆
Selexipaq	▲	◆	▲	◆
Sildenafil	▲	◆	▲	◆
Spironolactone	▲	◆	▲	◆
Tadalafil	▲	◆	▲	◆
Telmisartan	▲	◆	▲	◆
Torsemide	▲	◆	▲	◆
Trandolapril	▲	◆	▲	◆
Treprostinil	▲	◆	▲	◆
Valsartan	▲	◆	▲	◆
Xipamide	▲	◆	▲	◆
Zofenopril	▲	◆	▲	◆

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Illicit/Recreational				
Alcohol	◆	◆	◆	◆
Amphetamine	◆	◆	◆	◆
Cannabis	◆	◆	◆	◆
Carfentanil	◆	◆	◆	◆
Cocaine	●	◆	◆	●
Ecstasy (MDMA)	●	◆	◆	●
Etizolam	◆	◆	◆	◆
Fentanyl (Recreational)	◆	◆	◆	◆
GHB (Gamma-hydroxybutyrate)	◆	◆	◆	◆
Heroin	◆	◆	◆	◆
LSD (Lysergic acid diethylamide)	◆	◆	◆	◆
Mephedrone	◆	◆	◆	◆
Methamphetamine	◆	◆	◆	◆
Phencyclidine (PCP)	◆	◆	◆	◆
Immunosuppressants				
Adalimumab	◆	▲	▲	◆
Alemtuzumab	◆	●	◆	◆
Anakinra	▲	▲	▲	▲
Azathioprine	▲	●	▲	▲
Baricitinib	▲	▲	▲	▲
Basiliximab	◆	●	◆	◆
Belimumab	◆	◆	◆	◆
Bimekizumab	◆	◆	◆	◆
Brodalumab	◆	●	◆	◆
Canakinumab	▲	▲	▲	▲
Ciclosporin	◆	●	●	▲
Eculizumab	◆	●	◆	◆
Etanercept	◆	●	◆	◆
Fingolimod	◆	●	◆	◆
Golimumab	▲	▲	▲	▲
Guselkumab	◆	◆	◆	◆
Infliximab	▲	▲	▲	▲
Lenalidomide	◆	●	◆	◆
Mycophenolate	▲	●	■	▲
Pirfenidone	◆	●	◆	◆
Ravulizumab	◆	◆	◆	◆
Risankizumab	◆	◆	◆	◆
Sarilumab	▲	▲	▲	▲
Secukinumab	◆	◆	◆	◆
Siltuximab	▲	◆	▲	▲
Sirolimus	▲	●	▲	■
Tacrolimus	■	●	●	■
Tildrakizumab	◆	◆	◆	◆
Tocilizumab	▲	▲	▲	▲
Tralokinumab	◆	◆	◆	◆
Upadacitinib	▲	▲	▲	▲
Ustekinumab	◆	◆	◆	◆
Vedolizumab	◆	◆	◆	◆
Lipid Lowering Agents				
Alirocumab	◆	◆	◆	◆
Atorvastatin	◆	◆	■	■
Bezafibrate	◆	◆	◆	◆
Evolocumab	◆	◆	◆	◆
Ezetimibe	◆	◆	▲	▲
Fenofibrate	◆	◆	◆	◆
Fish oils	◆	◆	◆	◆
Fluvastatin	◆	◆	■	◆
Gemfibrozil	◆	◆	◆	◆
Lovastatin	◆	◆	◆	◆
Pitavastatin	◆	◆	◆	▲
Pravastatin	◆	◆	◆	▲
Rosuvastatin	◆	◆	■	▲
Simvastatin	◆	◆	■	▲

	LEN	PEM	REG	SOR
Other Drugs				
Acamprosate	◆	◆	◆	◆
Acetazolamide	◆	◆	◆	◆
Acitretin	◆	◆	◆	◆
Activated charcoal	◆	◆	◆	◆
Allopurinol	◆	■	◆	◆
Atomoxetine	■	◆	◆	■
Atropine	◆	◆	◆	◆
Baclofen	◆	◆	◆	◆
Bamlanivimab	◆	◆	◆	◆
Benralizumab	◆	◆	◆	◆
Betahistine	◆	◆	◆	◆
Bimatoprost	◆	◆	◆	◆
Biperiden	◆	◆	◆	◆
Brinzolamide	◆	◆	◆	◆
Bromocriptine	◆	◆	◆	◆
Calcitonin	◆	◆	◆	◆
Calcium carbimide	◆	◆	◆	◆
Calcium resonium	◆	◆	◆	◆
Cannabidiol (CBD)	◆	◆	◆	◆
Carbimazole	◆	◆	◆	◆
Carisoprodol	◆	◆	◆	◆
Casirivimab/imdevimab	◆	◆	◆	◆
Cilostazol	■	◆	◆	■
Clomifene	◆	◆	◆	◆
Colchicine	◆	◆	◆	◆
Colestyramine	▲	◆	■	▲
Conivaptan	◆	◆	●	◆
Convalescent plasma (COVID-19)	◆	◆	◆	◆
COVID-19 vaccines	◆	◆	◆	◆
Crizanlizumab	◆	◆	◆	◆
Cyclobenzaprine	◆	◆	◆	◆
Cyproterone acetate	●	●	●	●
Cytisine	◆	◆	◆	◆
Darbepoetin	◆	◆	◆	◆
Deferiprone	◆	◆	◆	◆
Denosumab	◆	◆	◆	◆
Dexamfetamine	◆	◆	◆	◆
Dextromethorphan	◆	◆	◆	◆
Disulfiram	◆	◆	◆	◆
Donepezil	■	◆	◆	■
Dorzolamide	◆	◆	◆	◆
Dupilumab	◆	◆	◆	◆
Eliglustat	▲	◆	◆	▲
Emicizumab	◆	◆	◆	◆
Epoetin alfa	◆	◆	◆	◆
Etelcalcetide	◆	◆	◆	◆
Febuxostat	◆	◆	◆	◆
Filgrastim	◆	◆	◆	◆
Flibanserin	◆	◆	◆	◆
Gadopentetate (gadolinium)	◆	◆	◆	◆
Glycerol phenylbutyrate	◆	◆	◆	◆
Goserelin	◆	◆	◆	◆
Influenza vaccine	◆	◆	◆	◆
Interferon beta	▲	▲	▲	▲

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Key to symbols

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Notes

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Interactions with HCC Therapies

Charts revised March 2023. Full information available at www.hep-druginteractions.org

Page 7 of 6

Please note that if a drug is not listed it cannot automatically be assumed it is safe to coadminister.

LEN, lenvatinib; PEM, pembrolizumab; REG, regorafenib; SOR, sorafenib.

	LEN	PEM	REG	SOR
Other Drugs Continued				
Isosorbide mononitrate	▲	◆	▲	◆
Isotretinoin	◆	◆	◆	◆
Lanadelumab	◆	◆	◆	◆
Lanreotide	◆	◆	◆	◆
Leuproline acetate	▲	◆	◆	▲
Levothyroxine	■	◆	◆	◆
Lofexidine	■	◆	◆	■
Lumacaftor/Ivacaftor	◆	◆	●	●
Magnesium	◆	◆	◆	◆
Melatonin	◆	◆	◆	◆
Memantine	▲	◆	◆	■
Mepolizumab	◆	◆	◆	◆
Methylphenidate	◆	◆	◆	◆
Minoxidil	◆	◆	▲	▲
Modafinil	◆	◆	■	■
Nafidrofuryl	◆	◆	◆	◆
Nalmefene	◆	◆	◆	◆
Naloxone	◆	◆	◆	◆
Naltrexone	◆	◆	▲	▲
Neostigmine	◆	◆	◆	◆
Nicorandil	◆	◆	◆	◆
Nusinersen	■	◆	◆	■
Ocrelizumab	◆	◆	◆	◆
Orlistat	▲	◆	▲	▲
Penicillamine	◆	◆	◆	◆
Pentoxifylline	◆	◆	◆	◆
Phenylephrine	◆	◆	◆	◆
Pilocarpine	◆	◆	◆	◆
Piracetam	◆	◆	◆	◆
Potassium	◆	◆	◆	◆
Protamine sulphate	◆	◆	◆	◆
Pseudoephedrine	◆	◆	◆	◆
Pyridostigmine	◆	◆	◆	◆
Raloxifene	◆	◆	▲	▲
Ranibizumab	◆	◆	◆	◆
Romosozumab	◆	◆	◆	▲
Sevelamer	▲	◆	▲	▲
Strontium ranelate	◆	◆	◆	◆
Thalidomide	◆	■	▲	◆
Tranexamic acid	◆	◆	◆	◆
Triptorelin	▲	◆	◆	▲
Varenicline	◆	◆	◆	◆

	LEN	PEM	REG	SOR
Oxytocics				
Ergometrine (ergonovine)	◆	◆	◆	◆
Mifepristone	◆	◆	◆	◆
Misoprostol	◆	◆	◆	◆
Parkinsonism Agents				
Benzotropine	◆	◆	◆	◆
Carbidopa	◆	◆	◆	◆
Orphenadrine	◆	◆	◆	◆
Pramipexole	◆	◆	◆	◆
Procyclidine	◆	◆	◆	◆
Rasagiline	◆	◆	◆	◆
Ropinirole	◆	◆	◆	◆
PBC Agents				
Obeticholic acid	◆	◆	◆	◆
Ursodeoxycholic acid	◆	◆	◆	◆
Steroids				
Beclometasone	◆	●	◆	◆
Betamethasone	◆	●	◆	◆
Budesonide	◆	●	◆	◆
Ciclesonide	◆	●	◆	◆
Clobetasol (topical)	◆	◆	◆	◆
Clobetasone (topical)	◆	◆	◆	◆
Dexamethasone ≤16 mg	◆	■	▲	◆
Dexamethasone >16 mg	◆	■	●	■
Fludrocortisone	◆	●	◆	◆
Flunisolide	◆	●	◆	◆
Fluticasone	◆	●	◆	◆
Hydrocortisone (topical)	◆	◆	◆	◆
Methylprednisolone	◆	●	◆	◆
Mometasone	◆	●	◆	◆
Prednicarbate	◆	◆	◆	◆
Prednisone	◆	●	◆	▲
Triamcinolone	◆	●	◆	◆
Urological Agents				
Alfuzosin	■	◆	◆	■
Desmopressin	◆	◆	◆	◆
Dutasteride	◆	◆	◆	◆
Finasteride	◆	◆	◆	◆
Mirabegron	▲	◆	◆	▲
Silodosin	◆	◆	◆	■
Solifenacin	■	◆	◆	■
Tamsulosin	◆	◆	◆	◆
Tolterodine	■	◆	◆	■

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