

**TITLE: ANTIRETROVIRAL DOSING AND OPPORTUNISTIC INFECTION
PROPHYLAXIS GUIDELINE – ADULT PATIENTS:**

These recommendations were developed by the NewYork-Presbyterian Hospital – Columbia and Weill Cornell Medical Centers' Division of Infectious Diseases and Department of Pharmacy to aid prescribers and pharmacy personnel in the selection, dosing, and monitoring of antiretroviral medications and medications for the prophylaxis of opportunistic infections in HIV-infected adults.

APPLICABILITY:

Prescribers, nurses, and pharmacists

PROCEDURE:

See pages 2 and 3

NYP Guidelines for Opportunistic Infection Prophylaxis in HIV-Infected Adults*

Prophylaxis	Pneumocystis Pneumonia (PCP)		Mycobacterium avium Complex (MAC)		Toxoplasmosis		Cryptococcosis	
	Primary	Secondary	Primary	Secondary	Primary	Secondary	Primary	Secondary
Preferred Agent(s)	TMP/SMZ ^{1,2} 1 double strength (DS) tab daily (preferred) OR TMP/SMZ ^{1,2} 1 single strength (SS) tab daily OR TMP/SMZ ^{1,2} 1 double strength (DS) tab TIV	TMP/SMZ ^{1,2} 1 double strength (DS) tab daily (preferred) OR TMP/SMZ ^{1,2} 1 single strength (SS) tab daily	Azithromycin 1200 mg weekly OR Clarithromycin ⁴ 500 mg bid	Clarithromycin ⁴ 500 mg q12hr + ethambutol 15 mg/kg daily OR Azithromycin 500 mg daily + ethambutol 15 mg/kg daily	TMP/SMZ ^{1,2} 1 double strength (DS) tab daily (preferred) OR TMP/SMZ ^{1,2} 1 single strength (SS) tab daily	Sulfadiazine 500-1000 mg q6hr + pyrimethamine 25-50 mg daily + leucovorin 10-25 mg daily	Not recommended	Fluconazole 200-400 mg daily
Alternative Agent(s)	Dapsone ⁵ 100 mg daily OR Aerosolized pentamidine ⁶ 300 mg monthly via Respigard II™ OR Atovaquone ³ 1500 mg daily				Dapsone ⁵ 50 mg daily + pyrimethamine 50 mg weekly + leucovorin 25 mg weekly OR Dapsone ⁵ 200 mg weekly + pyrimethamine 75 mg weekly + leucovorin 25 mg weekly OR Atovaquone ³ 1500 mg daily + pyrimethamine 25 mg daily + leucovorin 10 mg daily	Clindamycin 600 mg po q 8 hrs + pyrimethamine 25-50 mg daily + leucovorin 10-25 mg daily OR Atovaquone ³ 750 mg q6-12 hrs + pyrimethamine 25 mg daily + leucovorin 10 mg daily		Itraconazole ⁷ solution 200 mg daily
Initiate Prophylaxis	CD4 < 200 cells/microliter OR History of oral candidiasis May consider if: CD4 < 14% OR History of AIDS-defining illness	Prior PCP	CD4 < 50 cells/microliter	Documented disseminated disease	CD4 < 100 cells/microliter AND Toxoplasma IgG antibody positive	Prior toxoplasmic encephalitis		Documented disease
Discontinue	CD4 > 200 cells/microliter for ≥ 3 months ± viral load ≤ 50 copies/mL		CD4 > 100 cells/microliter for ≥ 3 months ± HIV viral load ≤ 50 copies/mL	Lifelong OR CD4 > 100 cells/microliter for ≥ 6 months if MAC treatment completed for 12 months with no signs and symptoms ± HIV viral load ≤ 50 copies/mL	CD4 > 200 cells/microliter for ≥ 3 months ± HIV viral load ≤ 50 copies/mL	Lifelong or can consider when CD4 > 200 cells/microliter for > 6 months if treatment completed and no signs and symptoms ± HIV viral load ≤ 50 copies/mL. Discontinuation is based on limited data. Consider MRI of brain first.		Lifelong or can consider when CD4 > 200 cells/microliter for ≥ 6 months, if Crypto treatment completed, and no signs and symptoms ± HIV viral load ≤ 50 copies/mL
Notes	¹ TMP/SMZ (trimethoprim/sulfamethoxazole): Do NOT use in sulfa allergic patients. Major CYP 2C9 and 3A4 substrate and moderate 2C8/9 inhibitor (major drug interaction with warfarin) ² TMP/SMX & Dapsone: May cause hemolytic anemia in pts with G6PD deficiency. Pregnancy: Because of theoretical concerns of possible teratogenicity associated with drug exposures (TMP/SMZ and dapsone) during the first trimester, health care providers might choose to withhold prophylaxis during the first trimester. In such cases, aerosolized pentamidine can be considered because of its lack of systemic absorption and the resultant lack of exposure of the developing embryo to the drug ³ Atovaquone: Administer with food ⁴ Clarithromycin: Major CYP 3A4 substrate and strong CYP 3A4 inhibitor (Concentration may be increased when administered with ritonavir or lopinavir/ritonavir. Concentration may be decreased when administered with efavirenz or nevirapine). Pregnancy: Consider azithromycin instead of clarithromycin. ⁵ Rifabutin: Major CYP 3A4 substrate and strong inducer (Multiple drug interactions with antiretrovirals). ⁶ Itraconazole: Avoid grapefruit juice. Solution should be taken on an empty stomach. ⁷ Fluconazole: May cause marked increases in rifabutin concentrations when given concomitantly.							

*Please note the above recommendations are general guidelines. Patient-specific considerations must always be taken. Consult an Infectious Diseases/HIV Specialist for assistance.

ADULT ANTIRETROVIRAL DOSING AND OPPORTUNISTIC INFECTION PROPHYLAXIS GUIDELINE 2011 - 2012

RECOMMENDATIONS FOR ANTIRETROVIRAL DOSING

RECOMMENDATIONS FOR OPPORTUNISTIC INFECTION PROPHYLAXIS

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Approved by the Anti-Infective Subcommittee
Approved by the Formulary & Therapeutics Committee
LAST UPDATED 2/15/11

References:

- Panel on Antiretroviral Guidelines for Adults and Adolescents. Guidelines for the use of antiretroviral agents in HIV-1-infected adults and adolescents. Department of Health and Human Services. January 10, 2011; 1-166. Available at <http://www.aidsinfo.nih.gov/ContentFiles/AdultandAdolescentGL.pdf>. Accessed 2/15/11.
- Guidelines for Prevention and Treatment of Opportunistic Infections in HIV-Infected Adults and Adolescents. National Institutes of Health (NIH), the Centers for Disease Control and Prevention (CDC), and the HIV Medicine Association of the Infectious Diseases Society of America (HIVMA/IDSA). April 10, 2009; 1-216. Available at http://aidsinfo.nih.gov/contentfiles/Adult_OI_041009.pdf. Accessed 2/15/11.

It is emphasized that concepts relevant to HIV management evolve rapidly. The Panel has a mechanism to update recommendations on a regular basis, and the most recent information is available on the AIDSinfo Web site (<http://AIDSinfo.nih.gov>)

NYL GUIDELINES FOR THE DOSING OF ANTIRETROVIRALS**

Nucleoside/Nucleotide Reverse Transcriptase Inhibitors (NRTI)										
Formulary Drug and Dosage Forms	Adult Dosing (CrCl > 50mL/min)	Renal Impairment CrCl (mL/min)					Drug Specific Drug Interactions†	Administration	Pregnancy Category	
		30-50	10-30	< 10	HD	PD				CRRT
Abacavir (ABC, Ziagen®) 300 mg tabs • 20 mg/mL soln	300 mg Q12h OR 600 mg Q24h Child-Pugh score 5-6: 200 mg Q12h (≥ 60 kg) 400 mg Q24h	No dosage adjustments					None identified	Take without regard to food. EIOH increases ABC levels 41%	C	
Didanosine (ddI, Videx®) 125, 200, 250, 400 mg enteric coated tabs	With tenofovir and > 60 kg: 250 mg Q24h (< 60 kg) 250 mg Q24h With tenofovir and < 60 kg: 200 mg Q24h	200 mg Q24h 125 mg Q24h 125 mg Q24h	125 mg Q24h	75 mg Q24h	125 mg Q24h	ANTIRETROVIRALS: Stavudine: Do NOT coadminister, increased risk of serious adverse events • Tenofovir: Do NOT coadminister • Tiplivanir/ritonavir: Separate administration by > 2 hrs OTHER: Atazanavir: Do NOT coadminister due to increased didanosine-associated toxicities • Contraindicated: Do NOT coadminister with Raltegravir (RAL): Separate by 2 hours • Ribavirin: CONTRAINDICATED, due to risk of fatal hepatic failure and other serious didanosine toxicities	Take 1/2 an hour before or 2 hours after meals	B		
Emtricitabine (FTC, Emtriva®) 200 mg caps • 10 mg/mL soln	200 mg Q24h	200 mg Q48h	200 mg Q72h	200 mg Q96h	200 mg Q48-72h	None identified	Take without regard to meals	B		
Lamivudine (3TC, Epivir®) 150, 300 mg tabs • 10 mg/mL soln	150 mg Q12h OR 300 mg Q24h	150 mg Q24h	100 mg Q24h	50 mg Q24h	25 mg Q24h	150 mg Q24h	None identified	Take without regard to meals	C	
Stavudine (d4T, Zerit®) 15, 20, 30, 40 mg caps • 1 mg/mL soln	> 60 kg: 40 mg Q12h (< 60 kg) 30 mg Q12h	20 mg Q24h 15 mg Q12h	No data	15 mg Q24h	No data	None identified	Take without regard to meals	C		
Tenofovir (TDF, Viread®) 300 mg tabs	300 mg Q24h	300 mg Q48h	300 mg Q72h	300 mg Q7 days	No data	OTHER: Cidofovir, ganciclovir, valganciclovir: Increased levels when coadministered, monitor tenofovir toxicity	Take without regard to meals	B		
Zidovudine (AZT or ZDV, Retrovir®) 100 mg caps • 300 mg tabs • 10 mg/mL soln	300 mg Q12h	300 mg Q12h		100 mg Q8h		ANTIRETROVIRALS: Tiplivanir/ritonavir: Decreased zidovudine levels, dosing recommendations not established OTHER: Methadone: Monitor for zidovudine-related adverse effects • Ribavirin: Do NOT coadminister. If coadministered, closely monitor virologic response	Take without regard to meals	C		
Protease Inhibitors (PI)										
Renal or Hepatic Dose Adjustment										
Class Drug Interactions										
Drug/Regimen Specific Drug Interactions†										
Atazanavir (ATV, Reyataz®) 150, 200, 300 mg caps	Atazanavir 400 mg Q24h OR Atazanavir/ritonavir 300/100 mg Q24h With tenofovir or efavirenz: Atazanavir/ritonavir 300/100 mg Q24h	Dialysis patients: Treatment naïve: Atazanavir/ritonavir 300/100 mg Q24h • Treatment-experienced: Not recommended Child-Pugh score: 7 – 9: Atazanavir 300 mg Q24h • Child-Pugh score > 9: Not recommended					Anticonvulsants (carbamazepine, phenobarbital, phenytoin): Consider alternative anticonvulsant or monitor anticonvulsant/antiretroviral levels, consider ritonavir-boosting • Benzodiazepines (alprazolam, diazepam, midazolam, triazolam): Do NOT coadminister • Bosentan: Initiate bosentan 62.5 mg Q24-48h; if on ritonavir discontinue bosentan > 36h prior to initiation, restart after 10 day bosentan 62.5 mg Q24-48h • Clarithromycin: Consider alternative agent, if coadministered decrease clarithromycin dose by 50% • Colchicine: gout flairs 0.6 mg x 1 dose, then 0.3 mg at 1 h once • Itraconazole & ketoconazole: Potential bi-directional inhibition, use caution, monitor for toxicity & virologic response • Lamotrigine: Potential decrease of lamotrigine by 50%, titrate to response • Methadone: Titrate methadone as needed • Rifabutin: Decrease to rifabutin 150 - 300 mg TIW and monitor rifabutin levels Rifampin: Do NOT coadminister • Salmeterol: Do NOT coadminister • Sildenafil, tadalafil, vardenafil: Use lowest possible dose, CONTRAINDICATED for PAH • Statins: Avoid simvastatin/lovastatin, other statins use lowest possible dose • Voriconazole: Do NOT coadminister • Warfarin: Monitor INR, may require warfarin dose titration	ANTIRETROVIRALS: Didanosine: Separate > 2 hours. Take atazanavir with food and didanosine on an empty stomach • Etravirine OR Indinavir: Do NOT coadminister • Nevirapine: Do NOT coadminister, if coadministered atazanavir/ritonavir 300/100 mg Q24h, consider atazanavir levels • Tenofovir: Increased tenofovir levels, monitor tenofovir toxicity OTHER: Calcium Channel Blockers: Use caution, consider ECG monitoring • Diltiazem: Decrease dose by 50% when initiating atazanavir • Hormonal contraceptives: Use lowest effective dose • Iranzacan: Do NOT coadminister • H2-antagonists: Ritonavir boosted-atazanavir, maximum of famotidine 40 mg Q12h. Administer simultaneously and/or administer atazanavir/ritonavir > 10 hrs after famotidine • Treatment-experienced with tenofovir and H2-antagonists: Atazanavir/ritonavir 400/100 mg Q24h • Posaconazole: Significant increase of atazanavir level, monitor for atazanavir toxicity • Proton-Pump Inhibitor: Do NOT coadminister • Amplified/buffered medications: Space 1 hr prior or 2 hrs after atazanavir	Take with meals or a snack. Avoid antacids	B
Darunavir (DRV, Prezista®) 300, 600 mg tabs	Treatment naïve: Darunavir/ritonavir 800/100 mg Q24h PI-experienced: Darunavir/ritonavir 600/100 mg Q12h No resistance: Darunavir/ritonavir 800/100 mg Q24h	Use caution in patients with hepatic impairment					ANTIRETROVIRALS: Tenofovir: Increased tenofovir levels, monitor tenofovir toxicity OTHER: Anticonvulsants (carbamazepine, phenobarbital, phenytoin): Do NOT coadminister • Antidepressants (paroxetine and sertraline): Monitor for depressive symptoms due to decrease in antidepressant levels • Hormonal contraceptives: Use alternative or additional birth control methods	Take with food	B	
Fosamprenavir (FPV, Lexiva®) 700 mg tabs • 50 mg/mL susp	Treatment naïve: Fosamprenavir 1400 mg Q12h OR Fosamprenavir/ritonavir 1400/100-200 mg Q24h OR 700/100 mg Q12h • PI-experienced: Fosamprenavir/ritonavir 700/100 mg Q12h	Child-Pugh score 5 – 6: (Treatment-naïve) Fosamprenavir 700 mg Q12h • (PI-experienced) Fosamprenavir 700 mg Q12h + ritonavir 100 mg Q24h Child-Pugh score 7 – 9: (Treatment-naïve) Fosamprenavir 700 mg Q12h • (PI-experienced) Fosamprenavir 450 mg Q12h + ritonavir 100 mg Q24h Child-Pugh score 10–15: (Treatment-naïve) Fosamprenavir 350 mg Q12h • (PI-experienced) Fosamprenavir 300 mg Q12h + ritonavir 100 mg Q24h					ANTIRETROVIRALS: Delavirdine OR Etravirine: Do NOT coadminister • Etravirine: Fosamprenavir/ritonavir 1400/300 mg Q24h OR 700/100 mg Q12h OTHER: Anticonvulsants (carbamazepine, phenobarbital, phenytoin): Consider alternative anticonvulsant or use ritonavir-boosted fosamprenavir • H2-antagonists: If coadministered space administration by 2 hours, monitor virologic response, consider ritonavir boosting • Flecainide: Do NOT coadminister • Hormonal contraceptives: Do NOT coadminister • Propofolone: Do NOT coadminister • Rifabutin: Unboosted-fosamprenavir-decrease to rifabutin 150 mg Q24h or 300 mg 3 times weekly	Take without regard to meals	C	
Indinavir (IDV, Crivivan®) 200, 400 mg caps	800 mg Q8h Indinavir/ritonavir 800/100-200 mg Q12h	Mild to moderate hepatic insufficiency secondary to cirrhosis: Indinavir 600 mg Q8h					ANTIRETROVIRALS: Delavirdine: Indinavir 600 mg Q8h • Etravirine: Do NOT coadminister, use caution with boosted-indinavir and consider indinavir levels • Etravirine OR Nevirapine: Indinavir 1000 mg Q8h OR consider ritonavir boosting OTHER: Amiodarone: Do NOT coadminister • Itraconazole or ketoconazole: Maximum of 200 mg Q12h, indinavir 600mg Q8h • Rifabutin: Decrease to rifabutin 150 mg Q24h or 300 mg 3 times weekly and increase unboosted-indinavir 1000 mg Q8h • Rifampin: Do NOT coadminister • Vitamin C (> 1 g/day): Avoid use or monitor virologic response.	Take 1 hour prior or 2 hours after meals	C	
Lopinavir/ritonavir (LPV/r, Kaletra®) 200/50 mg tabs • 400/100 mg/5 mL soln	Treatment naïve: Lopinavir/ritonavir 400/100 mg Q12h OR 800/200 mg Q24h • Treatment-experienced: Lopinavir/ritonavir 400/100 mg Q12h With efavirenz: Lopinavir/ritonavir 600/150 mg Q12h	No dosage adjustments					ANTIRETROVIRALS: Nevirapine OR Etravirine: Lopinavir/ritonavir 500/150 mg Q12h • Etravirine: Coadminister with caution OTHER: Carbamazepine: Monitor carbamazepine levels, use caution • Flecainide: Do NOT co-administer • Phenytoin: Avoid concurrent use or monitor lopinavir and phenytoin levels • Propofolone: Do NOT coadminister • Hormonal contraceptives: Use alternative/additional birth control • Valproic acid: Monitor VPA levels, lopinavir toxicities • Voriconazole: Do NOT coadminister	Take oral suspension with food	C	
Nelfinavir (NFV, Viracept®) 250, 625 mg tabs • 50 mg/mL powder	1250 mg Q12h or 750 mg Q8h	Use with caution in patients with hepatic impairment					ANTIRETROVIRALS: Etravirine OR Tiplivanir: Do NOT coadminister • Fosamprenavir OR Lopinavir/ritonavir: Insufficient data OTHER: Hormonal contraceptives: Use alternative or additional birth control methods • Proton-Pump Inhibitor: Do NOT coadminister • Rifabutin: Decrease to rifabutin 150 mg 3 times weekly and nelfinavir 1250 mg Q12h	Take with meals or a snack	B	
Ritonavir (RTV, Norvir®) 100 mg tabs • 80 mg/mL soln Please note caps and tabs are not bioequivalent according to the FDA	As sole PI (rarely utilized): Ritonavir 600 mg Q12h • As Booster: Ritonavir 100 - 400 mg divided 1-2 doses	No dosage adjustments					OTHER: Amiodarone: Do NOT coadminister • Diazepam: Use with caution, may need to decrease diazepam dose • Datidipine: Do NOT coadminister • Flecainide: Do NOT coadminister • Lidocaine: Do NOT coadminister • Propofolone: Do NOT coadminister • Quinidine: Do NOT coadminister • Trazodone: Do NOT coadminister	Take with food	B	
Saquinavir (SQV, Invirase®) 200 mg caps • 500 mg tabs	Saquinavir/ritonavir 1000 mg/100 mg Q12h	Use with caution in patients with hepatic impairment					ANTIRETROVIRALS: Etravirine: Do NOT coadminister • Abacavir OR Zidovudine: Dosing not established • Didanosine: Administer > 2 hours apart • Protease Inhibitors (PI): Do NOT coadminister with any PI EXCEPT ritonavir booster OTHER: Amiodarone: Do NOT coadminister • Flecainide: Do NOT coadminister • Itraconazole & Fluconazole: Maximum of 200 mg Q24h, use caution • Loperamide: Avoid concurrent use • Propofolone: Do NOT coadminister • Quinidine: Do NOT coadminister • Voriconazole: Use with caution • Tiplivanir (contains alcohol): Avoid disulfiram & metronidazole	Take within 2 hours of a meal. Avoid grapefruit juice	B	
Tiplivanir (TPV, Aptivus®) 250 mg caps • 100 mg/mL soln	Tiplivanir/ritonavir 500/200 mg Q12h	Caution in patient with mild hepatic impairment. Child-Pugh Class B & C: CONTRAINDICATED					ANTIRETROVIRALS: Delavirdine & all PI regimens EXCEPT tiplivanir: Maraviroc 150 mg Q12h • Tiplivanir OR Nevirapine: Maraviroc 300 mg Q12h • Efavirenz: Maraviroc 300 mg Q12h • OTHER: Clarithromycin, ketoconazole, Maraviroc 150 mg Q12h • Anticonvulsants (i.e. carbamazepine, phenobarbital, phenytoin): Use alternative anticonvulsant or increase maraviroc 600 mg Q12h • Rifampin: NOT recommended if necessary consider maraviroc 600 mg Q12h if concurrent with CYP inhibitor use 300 mg Q12h • Voriconazole: No data, monitor toxicity	Take with food, 2 hours before or 1 hour after antacids	C	
Non-Nucleoside Reverse Transcriptase Inhibitors (NNRTI)										
Delavirdine (DLV, Rescriptor®) 100, 200 mg tabs	400 mg Q8h	No dosage adjustments					ANTIRETROVIRALS: Fosamprenavir: Do NOT coadminister OTHER: Anticonvulsants (carbamazepine, phenobarbital, phenytoin): CONTRAINDICATED • Methadone: Increase methadone levels, monitor for toxicity, reduce methadone dose as necessary • Rifabutin: Do NOT coadminister • Rifampin: CONTRAINDICATED	Take without regard to meals	C	
Efavirenz (EFV, Sustiva®) 600 mg tabs • 50, 200 mg caps	600 mg at bedtime	No dosage adjustments					Clarithromycin: Use alternative agent or monitor for clarithromycin efficacy • Erectile dysfunction agents (sildenafil, tadalafil, vardenafil): Use lowest possible dose • Statins: Monitor lipids profile and toxicities • Posaconazole & Voriconazole: Monitor for NNRTI toxicity and antiulcer outcome • Warfarin: Monitor INR with coadministration, may require adjustment of warfarin dose	Take on an empty stomach	D	
Nevirapine (NVP, Viramune®) 200 mg tabs • 10 mg/mL susp	200 mg Q24h x14 days, then 200 mg Q12h	No dosage adjustments					ANTIRETROVIRALS: Atazanavir/ritonavir: Do not coadminister, consider checking atazanavir levels OTHER: Calcium Channel Blockers: Titrate CCB to clinical response • Ketoconazole: Do NOT coadminister • Methadone: Opiate withdrawal common, monitor for withdrawal and increase methadone as necessary • Rifampin: Do NOT coadminister	Take without regard to meals	B	
Etravirine (ETV, Intenceo®) 100 mg tabs	200 mg Q12h	No dosage adjustments					ANTIRETROVIRALS: Atazanavir +/- ritonavir, Fosamprenavir +/- ritonavir, Indinavir, Nelfinavir, sole-PI Ritonavir, OR Tiplivanir: Do NOT coadminister • Indinavir/ritonavir: Coadminister with caution, consider indinavir levels • Lopinavir/ritonavir: Coadminister with caution OTHER: Antiarrhythmics: Decreased antiarrhythmic levels, use caution • Anticonvulsants (carbamazepine, phenobarbital, phenytoin): Do NOT coadminister • Clopidogrel: Do NOT coadminister • Dexamethasone: Monitor virologic response, especially with long-term use • Diazepam: Increased levels with coadministration, decrease diazepam dose as appropriate • Fluconazole: increase ETV level by ~8%, use with caution • Immunosuppressives (cyclosporine, sirolimus, tacrolimus): Decreased immunosuppressive levels, adjust immunosuppression per levels • Methadone: Opiate withdrawal, adjust methadone as necessary • Rifabutin: Use 300 mg Q24h, do NOT coadminister with etravirine and ritonavir boosted PI • Rifampin: Do NOT coadminister	Take after a meal	B	
Fusion Inhibitor										
Enfuvirtide (T20, Fuzeon®) 90 mg/mL inj	90 mg SQ Q12h	No dosage adjustments					None identified	Rotate site of injection	B	
Chemokine Receptor 5 (CCR5) Antagonist										
Maraviroc (MVC, Seltenry®) 150, 300 mg tabs	150 mg Q12h with strong CYP3A4 inhibitors 300 mg Q12h 800 mg Q12h with CYP3A4 inducers	No dosage adjustments					ANTIRETROVIRALS: Delavirdine & all PI regimens EXCEPT tiplivanir: Maraviroc 150 mg Q12h • Tiplivanir OR Nevirapine: Maraviroc 300 mg Q12h • Efavirenz: Maraviroc 300 mg Q12h • OTHER: Clarithromycin, ketoconazole, Maraviroc 150 mg Q12h • Anticonvulsants (i.e. carbamazepine, phenobarbital, phenytoin): Use alternative anticonvulsant or increase maraviroc 600 mg Q12h • Rifampin: NOT recommended if necessary consider maraviroc 600 mg Q12h if concurrent with CYP inhibitor use 300 mg Q12h • Voriconazole: No data, monitor toxicity	Take without regard to meals	B	
Integrase Inhibitor										
Raltegravir (RAL, Isentress®) 400 mg tabs	400 mg Q12h	No dosage adjustments					OTHER: Rifampin: increase to raltegravir 800 mg Q12h and monitor for virologic response	Take without regard to meals	C	
Combination Formulations										
Atripla® (EFV 600 mg + FTC 200 mg + TDF 300 mg tab): 1 tablet at bedtime								Take on an empty stomach	D	
Combivir® (3TC 150 mg + ZDV 300 mg tab): 1 tablet Q12h								Take without regard to meals	C	
Epzicom® (3TC 300 mg + ABC 600 mg tab): 1 tablet Q24h								Take without regard to food.	C	
Trizivir® (ABC 300 mg + ZDV 300 mg + 3TC 150 mg tab): 1 tablet Q12h		Not Recommended. Consider utilizing individual dosage forms					See individual agents	EIOH increases ABC levels 41% C	C	
Truvada® (FTC 200 mg + TDF 300 mg tab): 1 tablet Q24h								Take without regard to meals	B	

**This is intended to be used as a guide to help ensure appropriate dosing and administration of antiretrovirals throughout a patient's hospitalization. An antiretroviral regimen should NOT be initiated and/or changed without direct consultation with an Infectious Diseases/HIV Specialists. † Recommended doses for management of drug interactions are for patient with normal renal and hepatic function

NewYork-Presbyterian Hospital
Sites: All Centers
Guideline: Medication Use Manual
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RESPONSIBILITY:

Joint Subcommittee on Anti-Infective Use

REFERENCES:

- 1.) Panel on Antiretroviral Guidelines for Adults and Adolescents. Guidelines for the use of antiretroviral agents in HIV-1-infected adults and adolescents. Department of Health and Human Services. January 10, 2011; 1-166. Available at <http://www.aidsinfo.nih.gov/ContentFiles/AdultandAdolescentGL.pdf>. Accessed 2/15/11.
- 2.) Guidelines for Prevention and Treatment of Opportunistic Infections in HIV-Infected Adults and Adolescents. National Institutes of Health (NIH), the Centers for Disease Control and Prevention (CDC), and the HIV Medicine Association of the Infectious Diseases Society of America (HIVMA/IDSA). April 10, 2009; 1-216. Available at http://aidsinfo.nih.gov/contentfiles/Adult_OI_041009.pdf. Accessed 2/15/11.

GUIDELINE DATES:

Issued: August 2008
Reviewed: May2010
Revised: March 2011
Medical Board Approval: May 2011