Combivir is an Antiretroviral Agent, Reverse Transcriptase Inhibitor (Nucleoside) used in the treatment of HIV-1 infection. The combination of zidovudine and lamivudine is believed to act synergistically to inhibit reverse transcriptase via DNA chain termination after incorporation of the nucleoside analogue as well as to delay the emergence of mutations conferring resistance.

**Pre-Authorization Criteria:**
treatment of HIV infections when therapy is warranted based on clinical and/or immunological evidence of disease progression.

**Note:**
VCHCP requires that Combivir be prescribed by an Immunology Clinic physician with current American Academy of HIV Medicine (AAHIVM) certification or a physician boarded in Infectious Disease.

**Dosing: Adult:**
Treatment of HIV infection: Oral: 1 tablet twice daily. (150mg/300mg tablet). Because this is a fixed-dose combination product, avoid use in patients requiring dosage reduction including children <30 kg, renally-impaired patients with a creatinine clearance <50 mL/minute, hepatic impairment, or those patients experiencing dose-limiting adverse effects.

**Dosing: Pediatric:**
Adolescents ≥30 kg: Refer to adult dosing.

**Dosing: Renal Impairment:**
Cl\textsubscript{cr} <50 mL/min: Fixed-dose combination lamivudine/zidovudine is not recommended; use individual components for patients requiring dose adjustments.

**Dosing: Hepatic Impairment:**
Fixed-dose combination lamivudine/zidovudine is not recommended; use individual components for patients requiring dose adjustments.

**Dosage Forms: U.S.**
Excipient information presented when available (limited, particularly for generics); consult specific product labeling.
Tablet, oral: Lamivudine 150 mg and zidovudine 300 mg
Combivir®: Lamivudine 150 mg and zidovudine 300 mg [scored]

Generic Equivalent Available: U.S. -Yes

**Contraindications:**
Hypersensitivity to lamivudine, zidovudine, or any component of the formulation

**Adverse Reactions:**
See individual agents.
Other Severe Less Common Reactions: fat redistribution, hematologic toxicity, lactic acidosis, hepatomegaly, myopathy, rhabdomyolysis, pancreatitis, peripheral neuropathy, Stevens-Johnson syndrome, erythema multiforme, toxic epidermal necrolysis, immune reconstitution syndrome, autoimmune disorders.

**Concurrent drug therapy issues:**
Duplicate therapy: Concomitant use of other zidovudine- or lamivudine-containing products should be avoided.
Emtricitabine: Concomitant use of emtricitabine-containing products should be avoided; cross-resistance may develop.
Interferon alfa: Use with caution in combination with interferon alfa with or without ribavirin in HIV/HBV coinfected patients; monitor closely for hepatic decompensation, anemia, or neutropenia; dose reduction or discontinuation of interferon and/or ribavirin may be required if toxicity evident.

**U.S. BOX WARNING:**
Hematologic Toxicity: zidovudine-associated neutropenia and severe anemia, especially in patients with advanced HIV
Myopathy: symptomatic myopathy and myositis associated with prolonged zidovudine use
Lactic Acidosis/Severe Hepatomegaly: lactic acidosis and severe hepatomegaly with steatosis, including fatal cases, associated with nucleoside analogue use alone or in combination; suspend treatment if clinical or laboratory findings suggest lactic acidosis or hepatotoxicity
Hepatitis B Exacerbation: severe acute HBV exacerbations in HBV/HIV co-infected pts when discontinue lamivudine; monitor hepatic function closely for at least several months in HBV/HIV co-infected patients who discontinue lamivudine; initiate anti-HBV treatment if needed

**References:**

2. [www.uptodate.com](http://www.uptodate.com): Zidovudine and lamivudine: Drug information
3. [www.epocrates.com](http://www.epocrates.com): Combivir Drug information
**REVISION HISTORY:**

Date Reviewed/No Updates: 1/13/15 by C. Sanders, MD  
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Date Reviewed/No Updates: 1/23/18 by C. Sanders, MD; R. Sterling, MD  
Date Approved by P&T Committee: 1/23/18

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