

1 PAGE SUMMARY: SOFOSBUVIR-VELPATASVIR-VOXILAPREVIR (SOF-VEL-VOX or Vosevi™) COMBO FOR HCV

Used for: Chronic hepatitis C, Genotypes 1 – 6 (“pan-genotypic”).

Dosing: one pill once daily, orally, for 12 weeks.

Targets: **sofosbuvir** is a nucleotide NS5B polymerase inhibitor; **velpatasvir** is an NS5A protein inhibitor; and **voxilaprevir** is an NS3/4A protease inhibitor.

Efficacy: 91% - 100%, depending on population (Genotype, cirrhosis vs. none, treatment naïve vs. failures)

Pricing: For a comparative “cost per course of therapy according to genotype” see

<https://www2.gov.bc.ca/assets/gov/health/health-drug-coverage/pharmacare/sofosbuvir-velpatasvir-voxilaprevir-3547-info.pdf> (pages 3-5). Summary:

- For **all genotypes**, SOF-VEL-VOX is priced the same as sofosbuvir+velpatasvir (SOF-VEL or Eplclusa™), made by the same company. Thus the use of SOF-VEL (+/- ribavirin) may fade.
- For **GT1a and GT1b**, SOF-VEL-VOX is significantly more expensive than the 8-week version of glecaprevir+pibrentasvir (GP or Mavyret™).
- For **GT1b only**, SOF-VEL-VOX is significantly more expensive than the ribavirin-free version of elbasvir+grazoprevir (EBR-GZR or Zepatier™).
- For **GT 2 - 6**, SOF-VEL-VOX’s only competitor price-wise would be the 8-week version of glecaprevir+pibrentasvir (GP or Mavyret™) which is significantly less.
- NOTE: The 8-week version of GP is used for GT 1, 2, 4-6; with no cirrhosis and who are either treatment-naïve, or were treated with pegylated interferon + ribavirin + sofosbuvir (PRS).

Areas of unmet or underserved medical need which are covered well by Gilead’s sofosbuvir+velpatasvir+voxilaprevir (SOF-VEL-VOX) combo:

- **Re-treatment within 12 weeks without ribavirin, for most who fail DAA treatment:**
 - GT1a with NS5B-inhibitor experience
 - GT1a or GT1b with NS5A-inhibitor experience
 - GT 3 with any DAA-experience (re-treatment of cirrhotics may require ribavirin added)
 - GT 4, 5, and 6 with any DAA experience
 - Patients with baseline resistance-associated substitutions (RASs)
- **Compensated cirrhosis (no ascites, no varices, no hepatic encephalopathy, Child-Pugh scores 5-6):** Cure rates same or similar to non-cirrhotics.

Safety and Adverse events (side-effects) commonly reported included mostly minor cases of headache, fatigue, diarrhea, or nausea. Adding voxilaprevir increases the frequency of nausea and diarrhea. **Drug-drug interactions** are common with SOF-VEL-VOX so use with other drugs must be monitored carefully, especially those with HIV, heart disease (particularly bradycardia), and advanced liver disease. **Serious risk of Hepatitis B Virus reactivation** means all patients should be tested for HBV prior to treatment and monitored if needed.

Co-infections: Safety and efficacy has not yet been established for HCV patients co-infected with either HBV or HIV, and it is likely that drugs commonly taken with these diseases may have to be withdrawn or substituted during HCV treatment.

For more information, see: <http://www.newswire.ca/news-releases/gilead-receives-approval-in-canada-for-voxevi-sofosbuvirvelpatasvirvoxilaprevir-for-re-treatment-of-certain-patients-with-chronic-hepatitis-c-virus-hcv-infection-640869053.html> and <https://www.ahcmmedia.com/articles/141371-sofosbuvir-velpatasvir-and-voxilaprevir-tablets-voxevi>