



Laboratory Monitoring for Adverse Effects of ART

June 2021

Table 1: Minimum Laboratory Monitoring Frequency With Initiation of or Change in ART for Patients <50 Years Old and Without Chronic Comorbidities [a] (Rating: A3)

| Laboratory Test | Year 1 of ART (initiation or change) | | | After 1 Year on ART Regimen | |
|--|--------------------------------------|----------|-----------------|-----------------------------|-----------------|
| | Baseline | 3 Months | 12 Months | Every 6 Months | Annual |
| Hepatic panel (AST, ALT, alkaline phosphates, total bilirubin) | All | All | All | — | All |
| Random blood glucose | All | All | All | — | — |
| Complete blood count [b] | All | With ZDV | With ZDV | With ZDV | — |
| eGFR [c] | All | All | With TAF or TDF | — | With TAF or TDF |
| Test for proteinuria (urinalysis or protein-to-creatinine ratio), glucosuria, serum phosphorus | With TAF or TDF | — | With TAF or TDF | — | With TAF or TDF |

Abbreviations: ALT, alanine aminotransferase; ART, antiretroviral therapy; AST, aspartate aminotransferase; eGFR, estimated glomerular filtration rate; TAF, tenofovir alafenamide fumarate; TDF, tenofovir disoproxil fumarate; ZDV, zidovudine.

Notes:

- a. More frequent monitoring may be required for patients >50 years old and patients with chronic comorbidities.
- b. See the NYSDOH AI guideline [Comprehensive Primary Care for Adults With HIV](#).
- c. Patients with decreased eGFR at baseline or those taking concomitant nephrotoxic drugs may need more frequent monitoring of renal function. See the guideline section [Screening for Organ-Specific Adverse Events > Nephrotoxicity](#) for more information.