

NRTI Mutations:None

NNRTI Mutations:None

RT Other Mutations:

P510A

100%
cons=28,705

•

K512Q

100%
cons=35,071

•

S513SG

91.77%
cons=35,714

•

S519N

100%
cons=35,845

•

Q520K

99%
cons=35,842

•

K527G

99%
cons=35,585

•

E529D

100%
cons=35,364

•

V531I

99%
cons=35,322

•

A534S

100%
cons=35,238

•

A554N

100%
cons=41,538

Nucleoside Reverse Transcriptase Inhibitors		Non-nucleoside Reverse Transcriptase Inhibitors	
abacavir (ABC)	Susceptible	doravirine (DOR)	Susceptible
zidovudine (AZT)	Susceptible	efavirenz (EFV)	Susceptible
stavudine (D4T)	Susceptible	etravirine (ETR)	Susceptible
didanosine (DDI)	Susceptible	nevirapine (NVP)	Susceptible
emtricitabine (FTC)	Susceptible	rilpivirine (RPV)	Susceptible
lamivudine (3TC)	Susceptible		
tenofovir (TDF)	Susceptible		

No drug resistance mutations were found for NRTI.

No drug resistance mutations were found for NNRTI.

INSTI Major Mutations:None

INSTI Accessory Mutations:

Q95K

99%
cons=11,312

•

S153A

100%
cons=15,120

IN Other Mutations:

E11D

100%
cons=43,580

•

K14R

99%
cons=45,678

•

S24N

99%
cons=33,308

•

V31VI

91.12%
cons=32,411

•

K42KR

91.12%
cons=25,361

•

K46R

99%
cons=17,303

•

I60IL

91.83%
cons=12,209

•

I72V

100%
cons=10,011

•

K111R

100%
cons=4,615

•

T112I

100%
cons=4,615

•

I113V

100%
cons=4,615

•

T124A

100%
cons=4,323

•

T125A

100%
cons=5,514

•

G134N

100%
cons=7,308

•

K136Q

99%
cons=7,308

•

V201I

100%
cons=35,780

•

S230K

10%
cons=17,536

•

L234I

99%
cons=27,261

•

S283G

100%
cons=16,116

Integrase Strand Transfer Inhibitors	
bictegravir (BIC)	Susceptible
cabotegravir (CAB)	Susceptible
dolutegravir (DTG)	Susceptible
elvitegravir (EVG)	Potential Low-Level Resistance
raltegravir (RAL)	Potential Low-Level Resistance

IN comments

Accessory

- Q95K is a non-polymorphic INSTI-selected mutation. Alone, it has little if any effect on INSTI susceptibility.
- S153Y/F are very rare mutations selected in vitro by EVG, DTG, BIC, and CAB. Alone they reduce EVG susceptibility about 5-fold and DTG, CAB, and BIC susceptibility about 2-fold. S153A is a rare mutation that alone does not appear to reduce INSTI susceptibility.

Drug resistance mutation scores of INSTI:

Rule	BIC	CAB	DTG	EVG	RAL
Q95K	0	0	0	10	10