P-570

Infectious Disease Physician Office-Based HIV Program Results in Successful Adherence of Therapy in Patients Receiving Long-Acting Cabotegravir and Rilpivirine

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KEY FINDINGS & CONCLUSIONS

- An ID physician office-based CAB+RPV LA program resulted in high levels of injection adherence.
- The program was standardized to onboard patients for CAB+RPV LA treatment, including education, order management and laboratory follow-up.
- Patients achieved 98% adherence, much higher than the average of 50%.
- 100% of patients eligible for follow-up achieved viral suppression.
- These results demonstrate that CAB+RPB LA administered through a standardized ID office-based program is highly effective in managing HIV-1.

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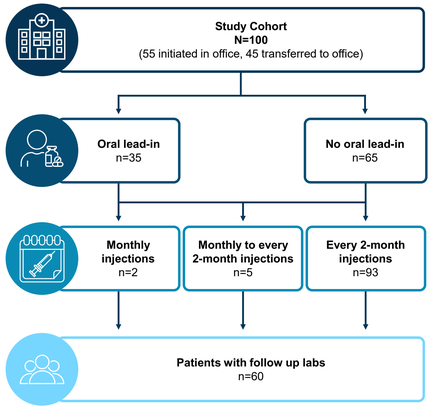
Introduction

- Cabotegravir/Rilpivirine is a long acting, injectable, complete HIV regimen given monthly or every other month by a healthcare provider.
- The long-acting (LA) formulation of cabotegravir (CAB) and rilpivirine (RPV) demonstrated efficacy in Phase 3 studies and was approved in the US for HIV-1 in 2021.[1-4]
- CAB+RPV LA works continuously to keep patients undetectable through adherence to a chosen target treatment date.[5]
- Onboarding of therapy and drug access for patients has proven challenging for physicians.
- We describe real-world implementation of a standardized Infectious Disease (ID) office-based CAB+RPV LA program with evaluation of adherence and virologic effectiveness.

Methods

- The ID in-office CAB+RPV LA program was implemented in July 2023 in a national network of ID practices.
- The program involved creation of standardized processes for drug orders, clinical evaluation, payor approvals, nurse and provider training and appointment management.
- The first 100 patients treated in the ID in-office program were analyzed for outcomes and adherence.
- Patients who were treated elsewhere prior to the ID in-office onboarding were included as well as those initiating treatment through the ID in-office program.
- Data collected included demographics, HIV-1 therapies prior to CAB+RPV LA , baseline laboratory data, medication administration dates, and follow-up laboratory indices.
- Baseline disease characteristics were evaluated from November 2021 to March 2024, including prior settings of care.
- Persistence and adherence were evaluated from the initiation of therapy in the ID in-office program from July 2023 to July 2024.
- Persistence was defined as the percent of patients remaining on therapy at study completion in July 2024.
- Adherence was defined as injections received +/- 7 days from target date.

Participant Flow



Cohort Demographics

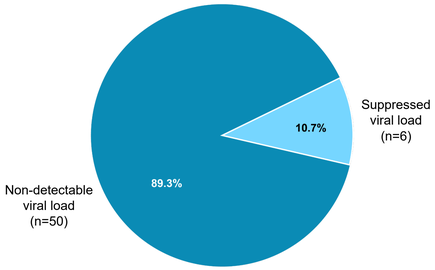
Characteristic	Results N=100
Age (years), median (IQR)	49.0 (39.0-59.0)
Sex, n (%)	
Female	19 (19.0)
Male	81 (81.0)
Weight (kg), median (IQR)	89.2 (80.4-101.4)
Body Mass Index (kg/m^2), median (IQR)	29.2 (27.1-31.9)
Comorbidities, n (%)	
History of syphilis	20 (20.0)
Psychiatric disorder[a]	9 (9.0)
Kaposi's sarcoma	3 (3.0)
Hepatic impairment	3 (3.0)
History of HCV infection	3 (3.0)
History of HBV infection	2 (2.0)
Site of therapy initiation, n (%)	
ID Physician office	55 (55.0)
Transfer of care to ID physician office	45 (45.0)
Physician office region, n (%)	
South	69 (69.0)
Midwest	26 (26.0)
West	5 (5.0)

Disease & Treatment History

Characteristic	Results N=100
Duration of HIV disease (years), median (IQR)	7.0 (4.0-13.0)
Number of previous oral regimens, median (IQR)	1.0 (1.0-2.0)
Type of oral regimens prior to CAB+RPV LA, n (%)	
Bictegravir/emtricitabine/tenofovir alafenamide	43 (43.0)
Abacavir/dolutegravir/lamivudine	23 (23.0)
Dolutegravir/lamivudine	17 (17.0)
Elvitegravir/cobicistat/emtricitabine/tenofovir	17 (17.0)
Efavirenz/emtricitabine/tenofovir	14 (14.0)
Emtricitabine/rilpivirine/tenofovir alafenamide	7 (7.0)
Dolutegravir/rilpivirine	5 (5.0)
Elvitegravir/cobicistat/tenofovir disoproxil fumarate/emtricitabine	4 (4.0)
Other regimens (combination/single)[b]	13 (13.0)

Baseline HIV-1 RNA viral load, mean (SD):
<20 (13) copies/ml
Baseline CD4 count, mean (SD):
798 (379) cells/μL

Follow-Up Laboratory Data



- 60 patients had follow-up labs, 56 patients had a follow-up HIV-1 RNA viral load
- Median time to follow-up lab was 84 days after first in-office injection

Follow-up HIV-1 RNA viral load, mean (SD):
<20 (10) copies/ml
Follow-up CD4 count, mean (SD):
775 (354) cells/μL

Therapy Characteristics

Initiation: Reasons for switch to CAB+RPV LA from oral antiretrovirals were:
- Improved compliance over daily oral medication (82%)
- Convenience (18%)

Social determinants of health: The determinants assessed, and the results were:
- Ability to afford medications (99%) and transportation to appointments (100%)

94% Persistent to therapy

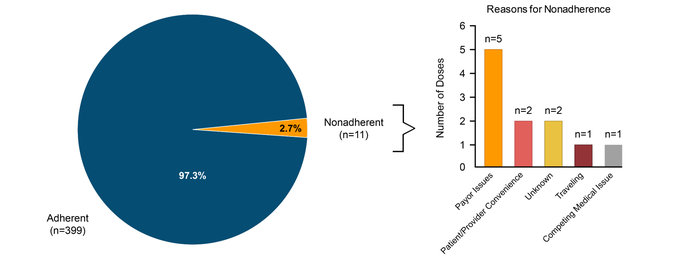
- Mean duration of therapy was 202 days (SD: 74) with the in-office program and only 6 patients (6%) discontinuing after a mean duration of 91 days (SD: 71)

Reasons for Discontinuation	Results N=100, n (%)
Adverse event (rash)	2.0 (2.0)
Payor denial	1.0 (1.0)
Financial hardship	1.0 (1.0)
Patient choice	1.0 (1.0)
Patient expired	1.0 (1.0)

Adherence

98% Adherent to schedule

410 Injections from July 2023-July 2024



Discussion

This study provides real-world data on patient adherence and virological effectiveness of CAB+RPV LA for treatment of HIV-1 in an ID in-office program.
- The majority did not use oral lead in and most also received every 2-month injections.
- Follow up labs were completed for most patients in approximately 3 months.
- Viral load was consistent post-initiation of CAB+RPV LA to that at baseline prior to initiation.
- Persistence to therapy was 94% for the in-office program, with few discontinuations.
- Adherence to schedule was 98%, with payor issues being the most common reason for missed doses.

Limitations
- Historical information was not available for all patients transferring care to the ID in-office program.
- Patients were included who initiated in-office therapy through March 2024 with many not eligible for follow-up laboratory results.

Abbreviations, Footnotes

Abbreviations: IQR=interquartile range; ID=Infectious Disease; HBV=hepatitis B virus; HCV=hepatitis C virus.
[a]Includes depression (n=5), mood disorder (n=3), schizophrenia (n=1).
[b]Other includes: darunavir/cobicistat/tenofovir alafenamide/emtricitabine (2), rilpivirine/tenofovir disoproxil fumarate/emtricitabine (2), darunavir/cobicistat/abacavir/lamivudine (1), darunavir/cobicistat/dolutegravir (1), darunavir/ritonavir/dolutegravir (1), lopinavir/ritonavir/lamivudine/zidovudine(1), tenofovir alafenamide/emtricitabine/dolutegravir (1), dolutegravir/darunavir/cobicistat/doravirine (1), abacavir/lamivudine/fosamprenavir/ritonavir (1), dolutegravir/tenofovir disoproxil fumarate/emtricitabine (1), zidovudine/lamivudine/indinivir/ritonavir (1).

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