

HIV pre-exposure prophylaxis medication adherence within Walgreens local specialty pharmacies is significantly higher compared to other class of trade pharmacies

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BACKGROUND

- HIV pre-exposure prophylaxis (PrEP) has been shown to reduce sexual transmission of HIV by more than 90% when taken regularly.¹⁻³
- Walgreens local specialty pharmacies (LSPs) manage complex chronic health conditions in communities across the country. LSPs provide personalized, comprehensive pharmacy care to support HIV PrEP use and adherence.

OBJECTIVES

- To compare adherence of HIV PrEP users at Walgreens LSPs to the adherence of HIV PrEP users at pharmacies in other classes of trade within retail (CoT; including food stores, mass merchandisers, independent, or other chain stores).

METHODS

- Study Design:* Retrospective cohort design using data from IQVIA's™ longitudinal retail prescription database from Jan 2017 to Dec 2017.
- Study Population:* Patients ages 18 or older who filled the combined formulation of emtricitabine and tenofovir disoproxil fumarate for at least 90 days in the period.
- Study Criteria:* HIV PrEP users exclusive to Walgreens LSPs were compared to a propensity matched cohort of PrEP users exclusive to other CoT retail pharmacies.
- Outcome measures:* Logistic regression and a generalized linear model were used to compare adherence, measured as modified proportion of days covered (mPDC), between the two cohorts.

RESULTS

- After 1:1 propensity matching, there were N=3,114 HIV PrEP users in both cohorts. Propensity matching criteria included patient age group; patient new/existing Truvada use; pharmacies' PrEP script volume, pharmacies' ARV and total script volume; and pharmacies' Census region.
- The formula for modified PDC (mPDC) takes into account length of therapy:

$$mPDC = \frac{\text{days with medication in period}}{(\text{last fill date} + \text{days supply}) - \text{first fill date}}$$

RESULTS (CONT.)

- The percent of users with an mPDC≥90% was significantly higher in Walgreens LSP compared to other CoT retail pharmacies (OR=1.39; p<.0001). (**Figure 1**)
- The majority (84.5%) of PrEP users at Walgreens LSPs achieved mPDC≥80% and this was significantly higher in Walgreens LSPs compared to other CoT retail pharmacies (OR=1.25; p<.0001). (**Figure 1 & Figure 2**)
- HIV PrEP users exclusive to Walgreens LSPs had a mean mPDC (M=95.1%) that was significantly higher than HIV PrEP users exclusive to other CoT retail pharmacies (p=.0001; M=93.7%).

Figure 1. Odds ratios by PrEP adherence thresholds for Walgreens local specialty pharmacies vs. other class of trade retail pharmacies

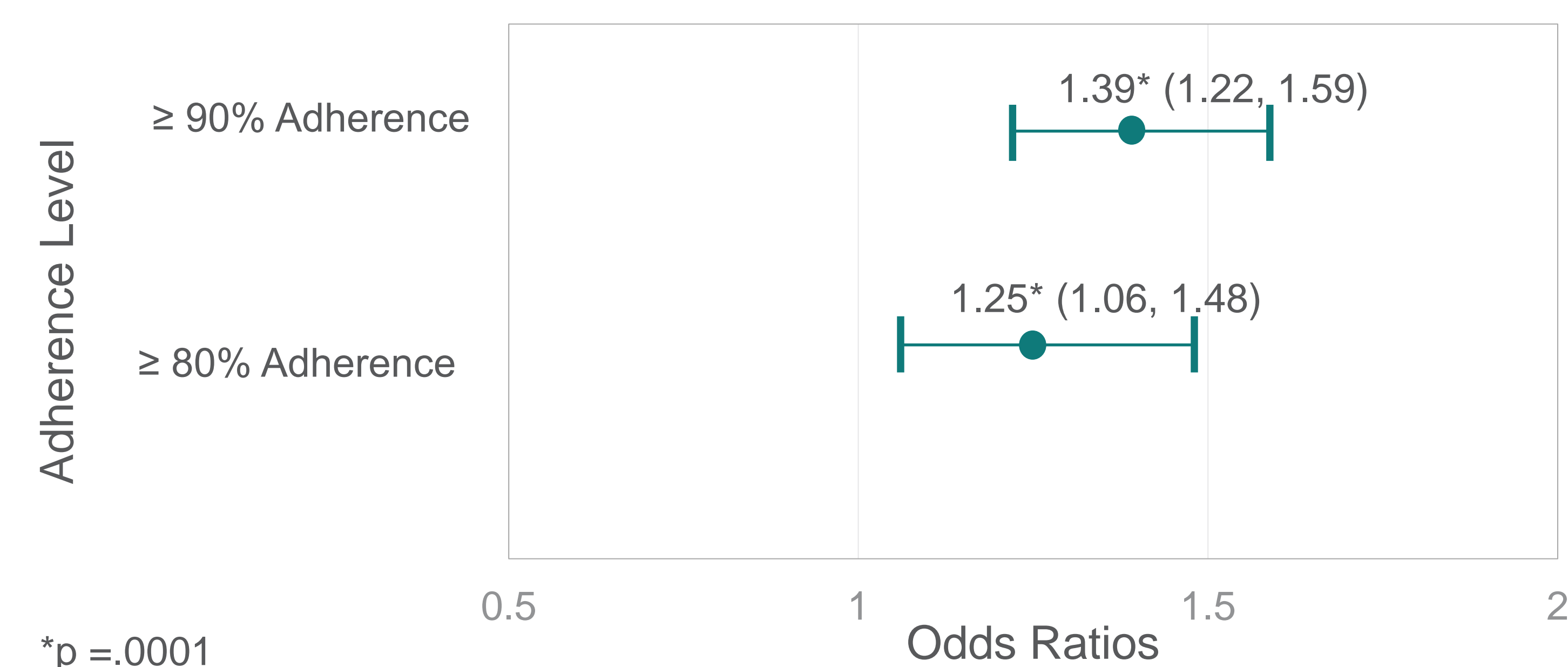
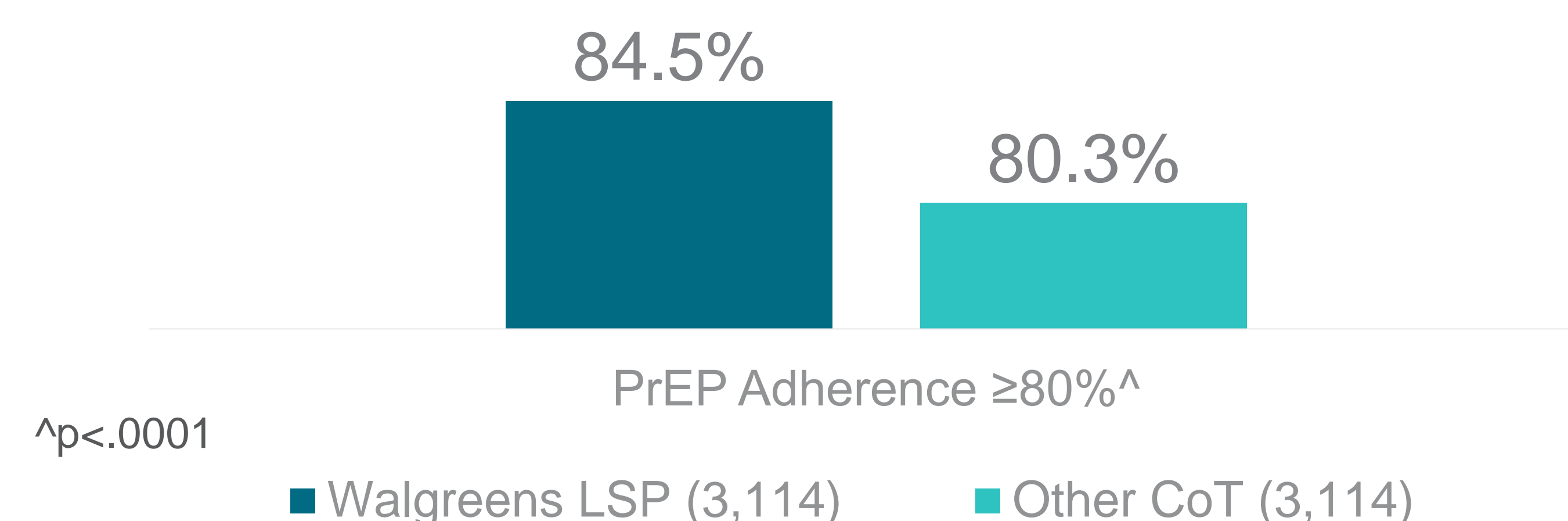


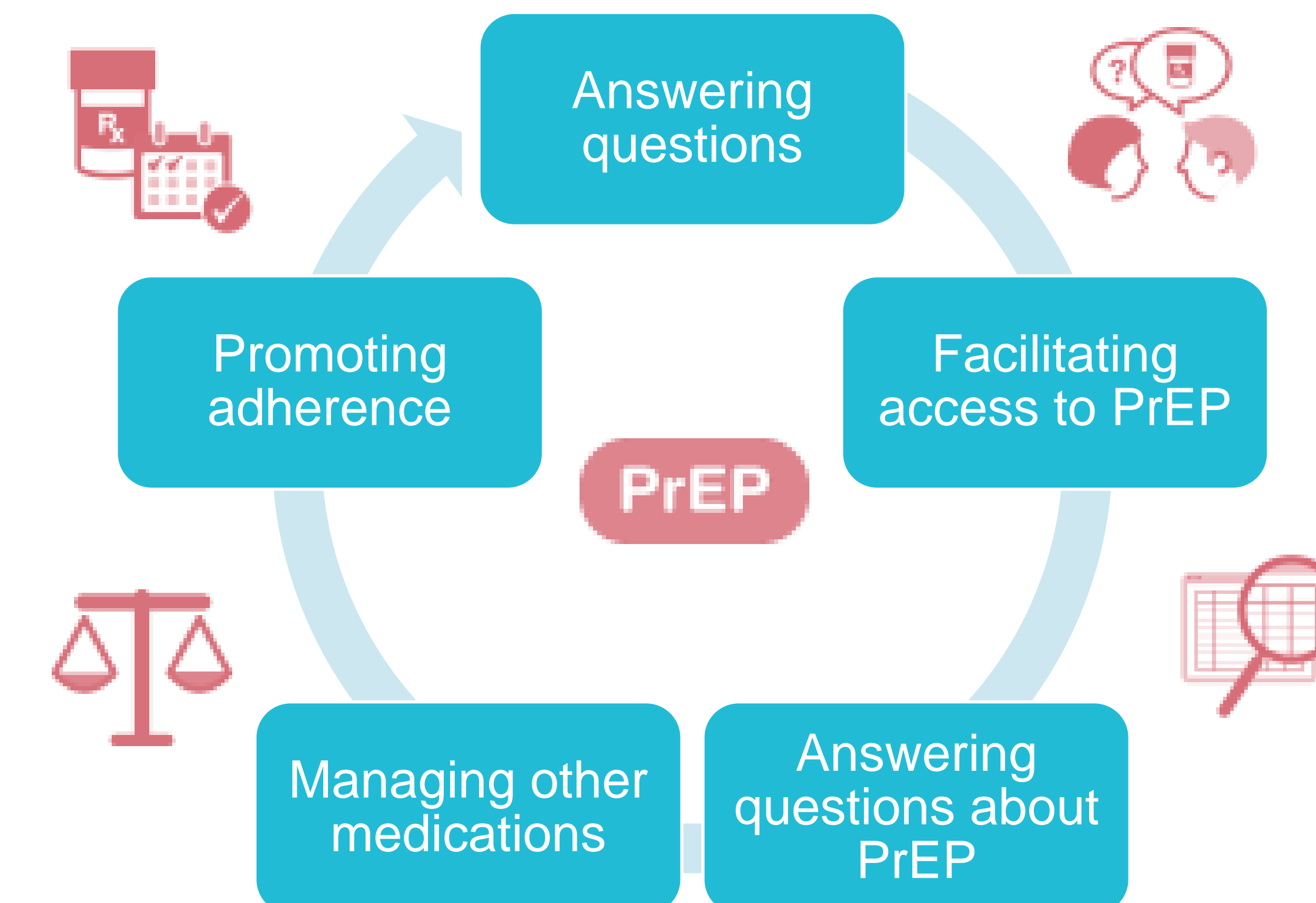
Figure 2. Proportion of PrEP users ≥80% adherence threshold by propensity matched cohort



CONCLUSIONS

- Walgreens LSPs demonstrated higher mean mPDC and more users achieved ≥80% and ≥90% adherence thresholds on HIV PrEP medication compared to other CoT retail pharmacies.
- Walgreens LSPs have experience in providing PrEP services, access to treatment, copay assistance, and financial assistance, which may help improve adherence on HIV PrEP.
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Figure 3. Walgreens Pharmacy Services



IMPLICATIONS FOR PRACTICE

- Traditional PDC adherence calculations may warrant modifications to consider variations in length of therapy commonly observed in PrEP users.
- Healthcare providers may consider coordinating their services with pharmacies to help PrEP users stay adherent to their prescribed regimes.

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