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Launch of the JIAS Supplement “Differentiated service delivery – beyond HIV treatment for integration and other health needs”

Aligning HIV treatment and hypertension clinic visits and dispensing as a first step toward service delivery integration in South Africa



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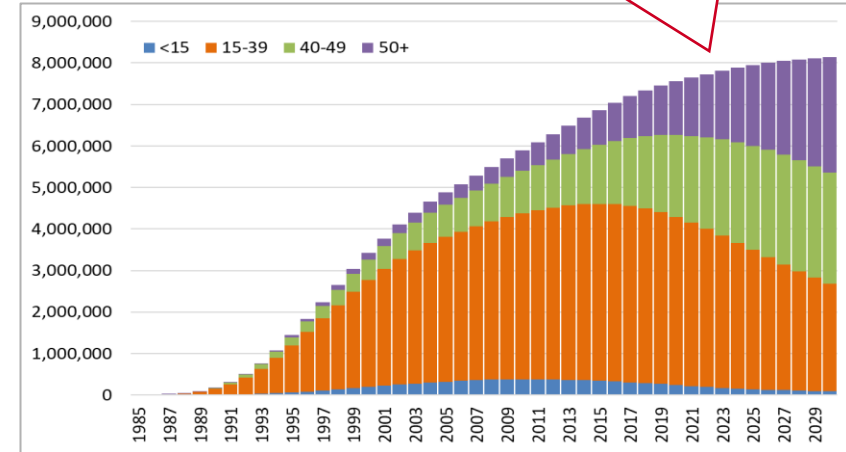


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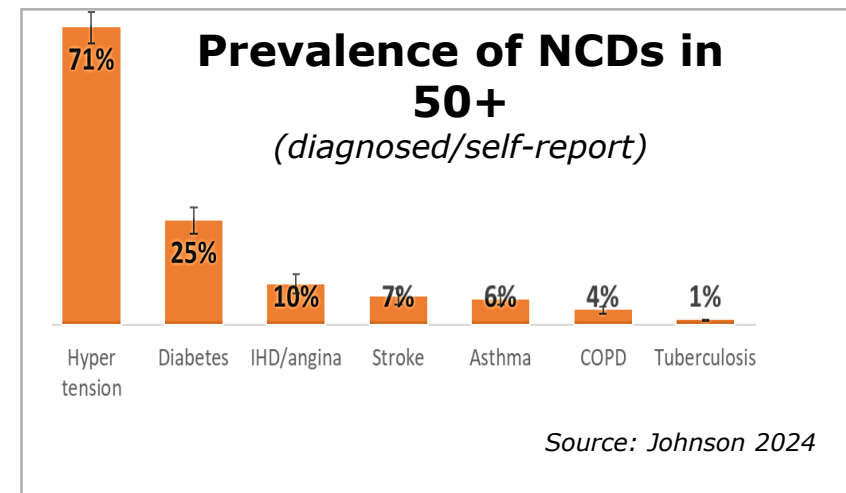
Background

By 2030, 67% of people living with HIV will be aged 40+ years, and 35% will be aged 50+ years

- South Africa has 7.8 million people living with HIV, and 5.5 million on ART.
- Over 15% of adults on ART have been diagnosed with hypertension (HTN).
- Global and national guidelines emphasize integrating HIV and chronic disease.



AIM: To assess alignment between ART and HTN medication during facility-based visits and dispensing intervals as an indicator of integration progress.



Differentiated service delivery for antiretroviral therapy in South Africa

ART client eligibility for low-intensity differentiated service delivery (DSD):

- Documented viral load suppression (<50 copies/mL)
- Sufficient experience on treatment (min 6 months)

Three main DSD models:

- Facility-based medication pickup points (Fac-PuP)
- Community-based/external medication pickup points (Ex-PuP)
- Adherence clubs (less common)
- The CCMDD program supports these models

Clients remain in conventional care if:

- Not eligible for DSD
- Do not wish to enroll
- Not offered enrollment due to facility/provider limitations

- South Africa's DSD models provide medications for HIV, HTN, and many other chronic conditions.
- For HIV, currently 2-3 month dispensing and 6 monthly clinic visits.



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Study objectives and outcomes

1

Proportion of aligned clinic visits

- Ratio of aligned ART/HTN clinic visits (both services at same clinic on same day) to total clinic visits during study period

2

Alignment of medication dispensing durations

- Compared dispensing durations for ART and HTN medications at visits where both ART and HTN meds were dispensed

3

Factors affecting numbers of healthcare interactions

- Adjusted risk ratios for lower and higher visit burdens using available client and facility characteristics



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Methods



Study
design

- **Cross-sectional ART client survey** (Sept 2022-Apr 2023)
 - Linked to paper and electronic medical record
 - 12-month observation period from the most recent visit



Study
population

- **Adult ART clients** (>18 years)
 - ≥ 6 months of experience on ART
 - ≥ 1 medication collection visit under the current model of care



Location

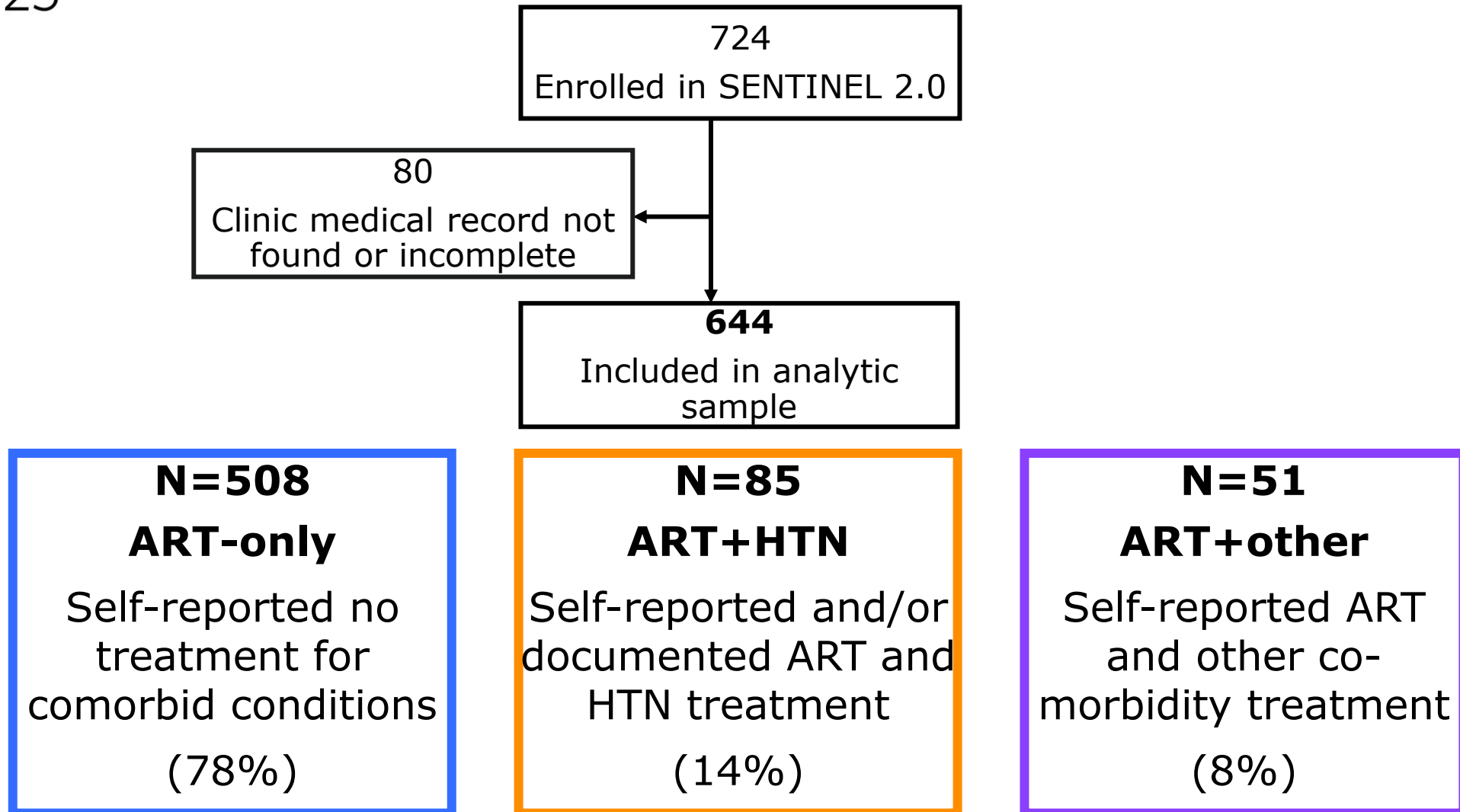
- **18 primary clinics** in 3 provinces in South Africa
 - Gauteng, Mpumalanga, and KwaZulu Natal
 - Mix of urban and rural facilities



Data
collection

- **Included clinic and off-site medication collection visits**
 - Paper ART client files
 - Manual (paper) scripts and electronic SyNCH records (Central Chronic Medicines Dispensing Distribution, CCMDD)

Analytic sample





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MEDIAN AGE 42 YEARS



76% FEMALE



54% EMPLOYED



52% ≥ GRADE 12 EDUCATION

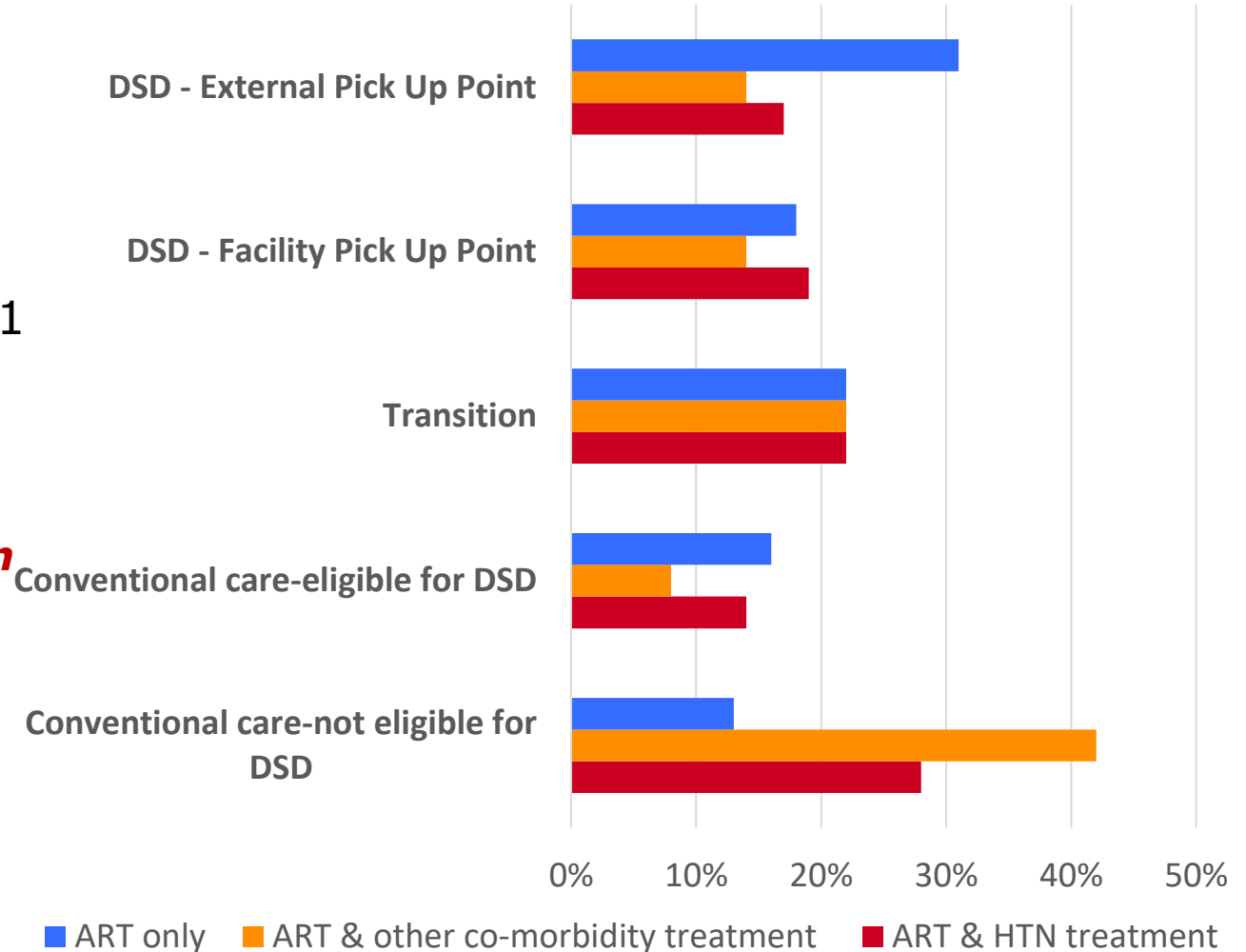
N=644

Results (1) – Demographics and DSD models used

- HTN was the most common comorbidity; 81 clients (13% of the overall cohort) self-reported HTN treatment.

Of these, 16 also reported receiving treatment for another condition in addition to HIV and HTN.

- 94% reported always combining ART and HTN clinic visits.
- 95% reported always picking up ART and HTN medications together.





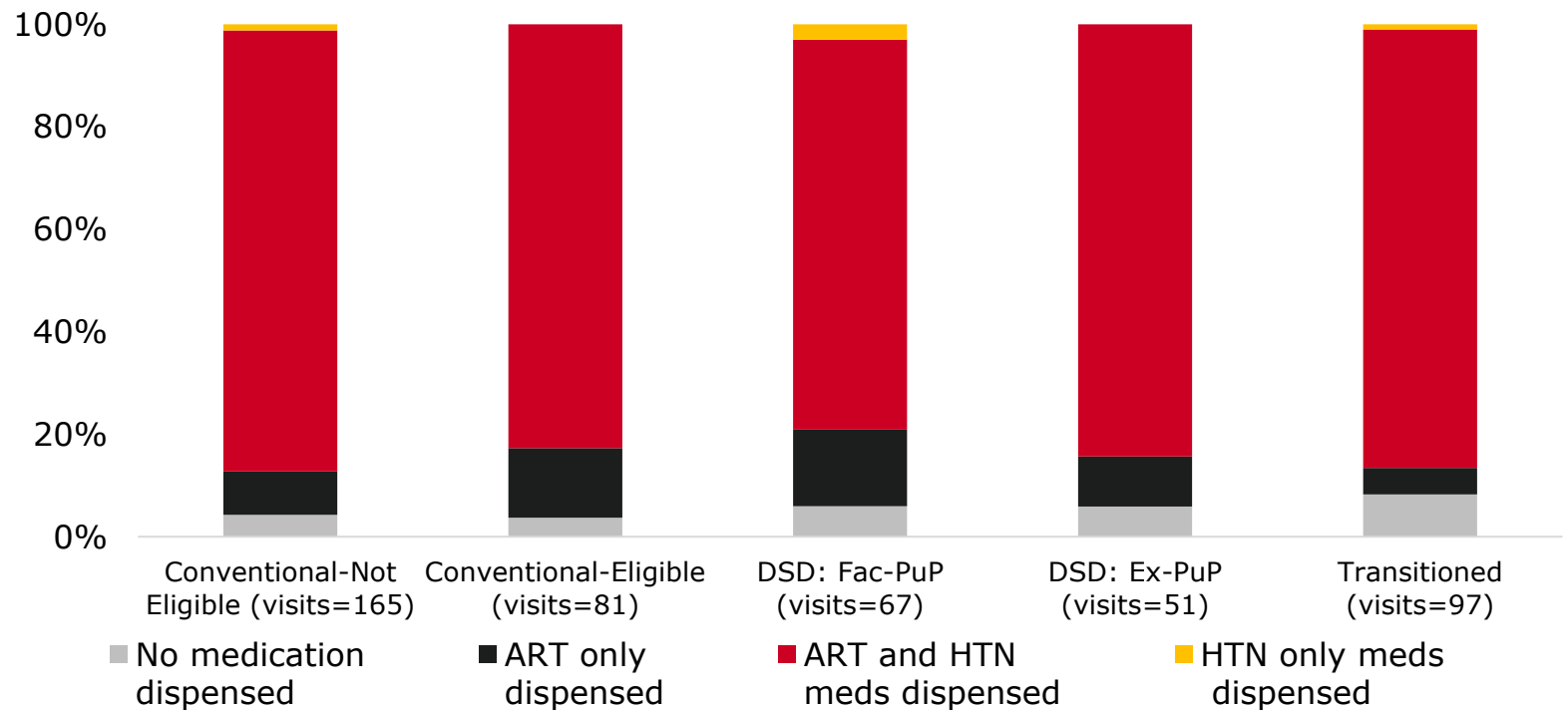
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Across all models of care categories, the majority of facility visits for clients receiving both ART and HTN medications were aligned.

86% for conventional not eligible
82% for conventional-eligible
70% for Fac-PuP
84% for Ex-PuP
86% for transitioned

Results (2) - ART+HTN clients received both ART and HTN medications at 83% of visits

ART and hypertension medication dispensing visits
N=85 individuals; N=477 visits





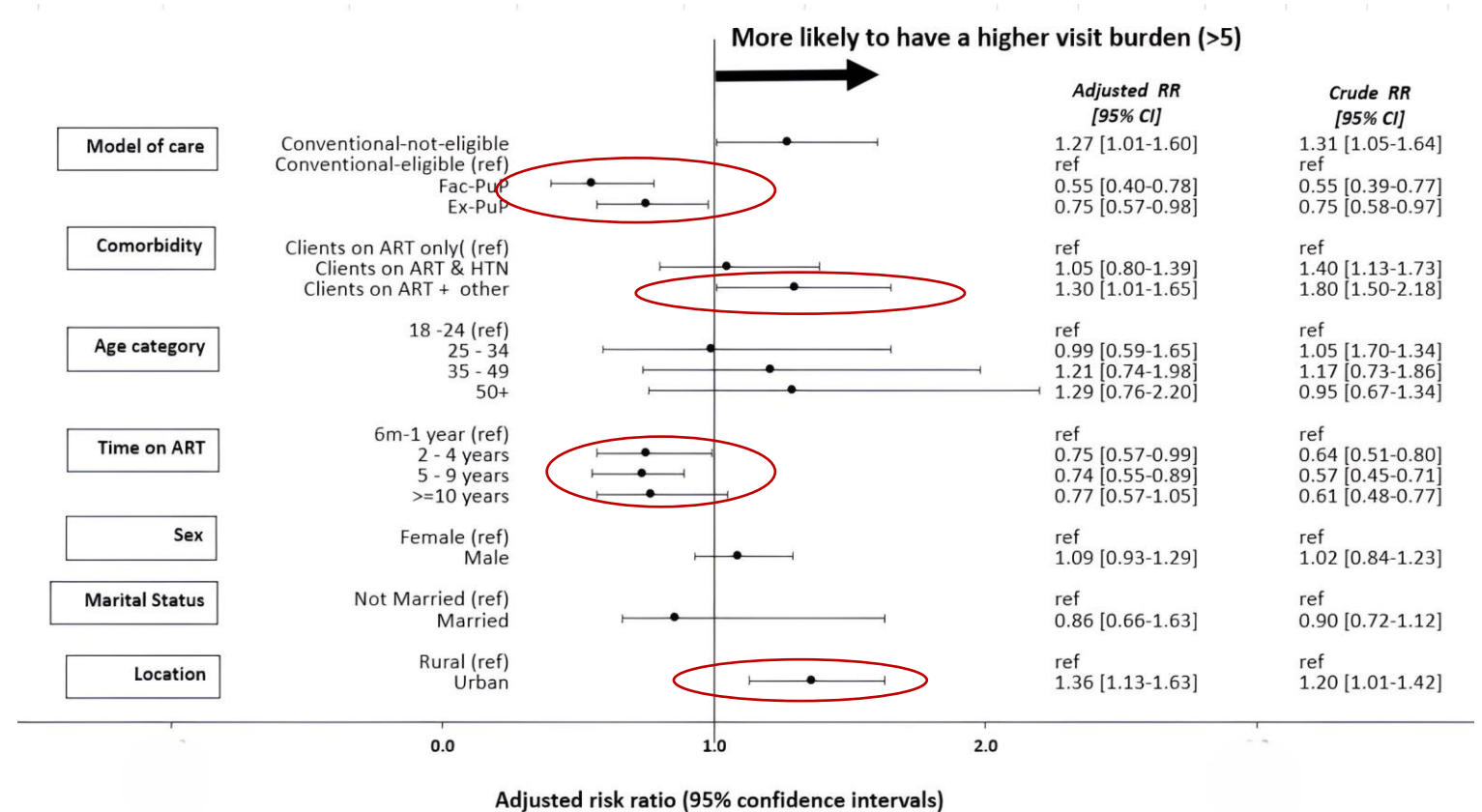
Results (3) - No significant difference in visit burden between ART-only and ART+HTN groups

Lower visit burden:

- Facility and external pick-up point DSD models
- Clients with more years on ART

Higher visit burden:

- Clients on ART with other comorbidities
- Clients in urban areas





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Discussion

- South Africa's high level of alignment of visits and dispensing durations demonstrates significant progress towards integrated service delivery.
- Alignment of treatment visits and medication dispensing for stable ART clients with co-morbidities is achievable.
- Reducing visit burden may reduce interruptions and disengagement from care.
- Having a single, unified patient record (showing both HIV and non-HIV care) is crucial for effectively managing multiple chronic conditions.



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Next steps

- Examine alignment between HIV care and other chronic conditions or services beyond HTN (family planning, diabetes, etc.)
- Compare HIV and HTN outcomes for ART-only and ARV+HTN clients (viral suppression for HIV, control for HTN)
- Propose models for further integrating service delivery for ART and HTN
 - Approaches for routine, co-located screening for hypertension within HIV care settings.
 - Joint adherence and engagement support for multiple conditions
- Evaluate systems for integrated monitoring and follow-up using tools like digital health platforms and shared appointment schedules.



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