

## MEDICATION ADHERENCE (MA) REVIEW METHODS

The [Prevention Research Synthesis \(PRS\) Project](#) efficacy review process for identifying HIV **Medication Adherence (MA)** evidence-based interventions (EBIs) is conducted using systematic procedures for searching and reviewing the intervention research literature. The information presented below describes the search strategy for identifying relevant articles, study eligibility criteria for inclusion in the review, and study coding procedures for evaluating the quality of the evidence. A detailed overview of the PRS search strategy is available in the article [Developing a comprehensive search strategy for evidence based systematic reviews](#) in the open access journal *Evidence Based Library and Information Practice*.

Once included in the review, the PRS [MA efficacy criteria](#) are used to determine if an HIV medication adherence intervention is Best-Evidence or Good-Evidence.

### MA Search Strategy

Using a comprehensive and systematic search strategy, the PRS team developed a cumulative database of the HIV, AIDS, and STD prevention research literature. This cumulative database is continually updated using both automated and manual searches conducted annually to keep the HIV/AIDS and STD behavioral prevention literature up to date.

The automated search component involves searching the following electronic bibliographic databases: CINAHL, EMBASE, MEDLINE, and PsycINFO for articles focusing on HIV/AIDS, antiretroviral therapy or treatment, and adherence.

The manual search reviews journals (see below) to identify articles not yet indexed in the electronic databases. These journals are inclusive across the five PRS reviews that are currently being conducted (i.e., Linkage to, Retention in, and Re-engagement in HIV Care (LRC), Risk Reduction (RR), Medication Adherence (MA), Structural Interventions (SI), PrEP Interventions (PrEP), and the Overview of Reviews Project (ORP)). As of September 2020, the journal list totals 28 titles. The list of journals changes according to published reports found through the PRS process. Each year the PRS database is surveyed to determine which journals retrieve the most relevant citations for each Efficacy Review. The hand search list of journals is modified to reflect recent publishing trends, and therefore the list of journals may change on a year-to-year basis. Quarterly, PRS team members screen all issues of the journals published within the 3 previous months to locate relevant articles. In addition, PRS also examines the reference lists of published articles, HIV/AIDS Internet listservs, and unpublished manuscripts submitted by study authors.

For each eligible intervention study, the PRS database is searched to identify all articles reporting descriptive or outcome data from the same intervention. All articles describing the same intervention study are considered linked reports and are included in the review process for that study. Additional details about these search strategies and procedures can be obtained by [contacting PRS](#).

## MA Study Eligibility

Articles identified through the systematic search are screened to determine eligibility for the PRS Medication Adherence Efficacy review. To be included in this review, studies **must meet each** of the following inclusion criteria:

- HIV Medication Adherence Intervention with:
  - Educational/behavioral component OR
  - Treatment delivery methods or monitoring devices to facilitate adherence
- Published or accepted for publication in a peer-reviewed journal
- Conducted in the United States or a U.S. territory **OR** conducted outside of the U.S. *and* is a randomized controlled trial
- Outcome evaluation report with a comparison arm
- Report any of the following relevant outcome data:
  - Behavioral measures of adherence: electronic monitoring device (e.g., MEMs caps), pill count, pharmacy refill, self-report
  - Biologic measure of adherence: HIV viral load

Interventions that focus on the following types of prevention are **not** currently included in the PRS medication adherence efficacy review:

- Interventions comparing treatment efficacy or adherence outcomes of different medication treatment regimens

## MA Study Coding Procedures

Pairs of trained content analysts independently code each eligible study using the PRS MA efficacy criteria. This coding includes all linked articles reporting information on the same intervention study. All discrepancies between coder pairs are reconciled.

If the study does not report critical information needed to determine intervention efficacy, the PRS team contacts the principal investigator of the study to obtain the missing information or to seek additional clarification. The final efficacy determination for each study is reached by PRS team consensus.

## PRS Manual Search Journal List (n = 28)

AIDS	JAIDS Journ of Acq Immune Deficiency Syndromes
AIDS and Behavior	Journal of HIV/AIDS & Social Services
AIDS Care	Journal of Substance Abuse Treatment
AIDS Education and Prevention	Journal of the Association of Nurses in AIDS Care
AIDS Patient Care and STDs	Journal of the International AIDS Society
American Journal of Public Health	Lancet HIV
BMC Infectious Diseases	PLoS Medicine
BMJ Open	PLoS ONE
Clinical Infectious Diseases	Public Health Reports
Cochrane Database of Systematic Reviews	Sexual Health
Current HIV/AIDS Reports	Sexually Transmitted Diseases
Current Opinion in HIV and AIDS	Sexually Transmitted Infections
HIV Medicine	Systematic Reviews
International Journal of STD & AIDS	Tropical Medicine & International Health

Additional details about the MA Chapter or the [Prevention Research Synthesis \(PRS\) Project](#) can be obtained by [contacting PRS](#).

