Collaborative Management of PTSD Treatment through Smartphone Apps: What Is Available and Accessible?

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INTRODUCTION

By integrating smartphones into standard treatment, clinicians may potentially improve treatment quality, expedite its processes, and reduce barriers to access.

- Smartphone apps can complement PTSD treatment in a variety of ways.¹⁻²
- e.g. Homework tools, psychoeducation

Recent research has shown that apps are a feasible method for enhancing standard treatment for PTSD.¹⁻²
- 55% of veterans receiving inpatient treatment to PTSD reported owning a smartphone.
- 80% reported interest in at least one potential use of an app as part of their treatment.

VA clinicians trained in evidence-based treatment for PTSD generally find treatment integration of smartphone apps to be feasible³⁻⁴.

There are few comprehensive resources available to find information on smartphone apps that can be used in collaboration with standard treatment for PTSD.

METHOD

Systematic Review of Publically Available Smartphone App Information

This study utilized an extensive web search to locate as many relevant smartphone apps for individual treatment of PTSD as possible with a variety of web locations and search criteria.

Web search for relevant apps:
- Search Engines:
  - e.g., Google.com
  - Google Web Search
- Other Sources:
  - e.g., Reddit.com
  - App Rating Sites:
  - e.g., MacWorld.com
  - Government Mobile App Sites:
  - e.g., CheckMeds.RI.gov

Search terms included either “App” or “Apps” and the following:
- Words related to PTSD
- e.g., PTSD
- Symptoms of PTSD
- e.g., Anger
- Treatments specific to PTSD
- e.g., Cognitive Processing Therapy
- Social support for PTSD
- e.g., PTSD social support

113 apps were found and included in this review

- Treatment Integration: Of these, only two apps were designed explicitly for integration with standard treatment
- CPT Coach
  - Companion to standard CPT treatment
  - Allows for clinicians and patients to create and adjust homework assignments
- Explicitly not for standalone treatment
  - Includes psychoeducation, homework forms, reminders, and adherence tracking
- PE Coach
  - Companion to standard PE treatment
  - Allows for clinicians and patient to create and adjust homework assignments
  - In-session recording for homework use
  - Includes psychoeducation, homework forms, reminders, and adherence tracking
- Clinician-manual available

The web search used to find relevant apps for this study may have missed relevant apps to this study

Apps specific to other conditions that still could still be useful for someone with PTSD, or in treatment for PTSD may have been excluded
- Apps for disorders whose symptoms overlap with PTSD (e.g., depression apps to treat insomnia)

Information collected was only as current as the time of data collection.
- Variables are subject to update

Limitations
- Metrics used were those made publicly available
- Number of reviews and rating score may not represent the full extent of app usage.

RESULTS

Variation:
- Apps collected were from a variety of sources.
- Emergent themes were added during data collection (e.g., Anger)

Use:
- 111 of the apps were designed to be stand-alone in what utilities they offered.
- Some apps for PTSD treatment in other apps (e.g., PTSD Coach)
- Symptom management, mood tracking, psychoeducation, etc.

Cost:
- Cost of almost all apps were free or inexpensive to download

Ratings:
- Mindfulness/relaxation apps were the most abundant, highly rated, and frequently rated.
- Most mindfulness/relaxation apps offered the same features (e.g., meditation exercises)

Conclusions & Implications

While there are several smartphone apps that offer stand-alone clinical utility, very few apps include components specific to treatment integration.
- Given the potential benefits to combining smartphone apps in treatment, these results may imply that apps are an underexploited method of increasing access and continuity of care past regularly scheduled office visits
- There may be limitations to access some apps (e.g., software requirements)
- This review did not find any apps in development that are being built specifically for treatment integration

The challenge of this conclusion is to determine how to best integrate information from apps into on-going treatment