

The Effect of a Music-Assisted Analgesia Protocol on Pain Management for Adult Hospital Patients: A Pilot Study



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PURPOSE

The purpose of this pilot study will be to test the effect of a music-assisted analgesic protocol (MAAP) on perceived pain and opioid medication use in the hospital setting.

BACKGROUND

- Pain is the most common reason people seek medical care and there is a need to develop more non-pharmacological pain management techniques to reduce opioid medication use.
- Clinical protocols in music therapy provide targeted and consistent outcomes to bolster the scientific evidence for music therapy effectiveness.
- Robust scientific evidence supporting a step-by-step protocol that outlines the
 procedures performed by a music therapist is required for medical insurance
 reimbursement (Iwamasa, 2023). Reimbursement for music therapy services
 promotes access for individuals who will most benefit from the treatment
 (Simpson, 2015).

"Pain is an unpleasant sensory and emotional experience associated with, or resembling that associated with, actual or potential tissue damage."

-IASP (2011, para 5)

Phase 1: Retrospective EMR analysis

Phase 2: Develop MAAP

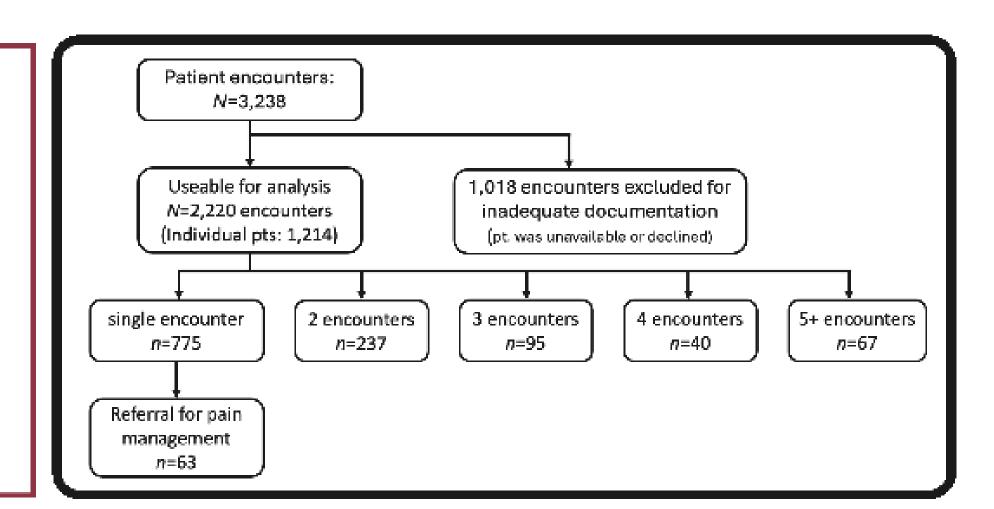
Phase 3: Test MAAP in clinical setting

Phase 1: Retrospective Analysis of Medical Music Therapy for Adult Patients

- Analysis of electronic medical records (EMR) for adult patients that received music therapy during a two-year period (Jan 2021 to Dec 2022) at a regional hospital in the Southeastern United States.
- Analysis used to inform MAAP (Phase 2)

RESULTS

- Referral to music therapy for pain management (*n*=63) was the 5th most common referral reason.
- Spearman's rank correlation indicated a significant positive relationship between referral for pain management and the use of the iso-principle technique, $(r_s(62) = .1505, p < .001)$.
- Spearman's rank correlation indicated a significant positive relationship between referral for pain management and therapist reported pain management outcomes (r_s (62) = .3703, p < .001).



DISCUSSION

- Music therapists at this hospital routinely use the iso-principle as an intervention for pain management and report positive outcomes.
- The most frequently reported intervention used for all patients was receptive music listening, which is non-specific.
- Referrals for anxiety/agitation (*n*=136) and mood/depression (*n*=78) were more frequently referred for music therapy than pain management.
- Factors such as anxiety and depression can exacerbate pain and are often mistaken for symptoms of each other (Means-Christensen et al., 2008).

Phase 2: Development of Music-Assisted Analgesic Protocol (MAAP)

- Based on the retrospective study results, the MAAP includes procedures that incorporates the iso-principle, where the therapist provides live preferred music that mediates a patient's affective state from high to low or low to high.
- Therapists reassesses patient pain from behavioral pain scale.
- Phase 3, clinical research will be a randomized crossover design.

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