

# Pain Reprocessing Therapy: A literature Review

## Background

Pain Reprocessing Therapy (PRT) offers a fresh perspective on chronic pain management. This therapeutic approach entails guided reassessment of pain sensations in various contexts, coupled with interventions targeting psychosocial factors that could intensify pain perception. Moreover, PRT integrates methods to bolster positive emotions and cultivate self-compassion (Ashar et al., 2022).

## Materials and Methods

This literature review will delve into the current research being performed on the novel field of PRT and compare it to extant mind-body therapies that aim to improve chronic pain. This literature review employed PubMed, Google Scholar, and ScienceDirect databases, utilizing search queries related to Pain Reprocessing Therapy (PRT) and other established mind-body therapies for pain. Relevant search terms included "Pain reprocessing therapy," "Mind-body pain therapy," "Forms of chronic pain," and "Central sensitization." Only papers published between 2000 and the current year were considered, and only those with full-text availability were included in the review.

## References

Domenichiello AF, Ramsden CE. The silent epidemic of chronic pain in older adults. *Prog Neuropsychopharmacol Biol Psychiatry*. 2019 Jul 13;93:284-290. doi: 10.1016/j.pnpbp.2019.04.006. Epub 2019 Apr 17. PMID: 31004724; PMCID: PMC6538291.

Dahlhammer J, Lucas J, Zelaya C, et al. Prevalence of Chronic Pain and High-Impact Chronic Pain Among Adults — United States, 2016. *MMWR Morb Mortal Wkly Rep* 2018;67:1001-1006. DOI: <http://dx.doi.org/10.15585/mmwr.mm6736a2>.

Ashar YK, Gordon A, Schubiner H, Ujoi C, Knight K, Anderson Z, Carlisle J, Polisky L, Geuter S, Flood TF, Kragel PA, Dimidjian S, Lumley MA, Wager TD. Effect of Pain Reprocessing Therapy vs Placebo and Usual Care for Patients With Chronic Back Pain: A Randomized Clinical Trial. *JAMA Psychiatry*. 2022 Jan 1;79(1):13-23. doi: 10.1001/jamapsychiatry.2021.2669. PMID: 34586357; PMCID: PMC8482298.

Garland EL, Brintz CE, Hanley AW, Roseen EJ, Atchley RM, Gaylord SA, Faurot KR, Yaffe J, Fiander M, Keefe FJ. Mind-Body Therapies for Opioid-Treated Pain: A Systematic Review and Meta-analysis. *JAMA Intern Med*. 2020 Jan 1;180(1):91-105. doi: 10.1001/jamainternmed.2019.4917. PMID: 31682676; PMCID: PMC6830441.

Bushnell MC, Ceko M, Low LA. Cognitive and emotional control of pain and its disruption in chronic pain. *Nat Rev Neurosci*. 2013 Jul;14(7):502-11. doi: 10.1038/nrn3516. Epub 2013 May 30. PMID: 23719569; PMCID: PMC4465351.

Apkarian AV, Bushnell MC, Treede RD, Zubieta JK. Human brain mechanisms of pain perception and regulation in health and disease. *Eur J Pain*. 2005 Aug;9(4):463-84. doi: 10.1016/j.ejpain.2004.11.001. Epub 2005 Jan 21. PMID: 15979027.



## Outcomes

The initial randomized control study on Pain Reprocessing Therapy (PRT) demonstrated statistically significant improvement in lower back pain compared to placebo or usual care (Ashar et al., 2022), with pain levels dropping approximately 2.5 points on a 10-point scale. Patients were subjected to 8 one-hour sessions in order to achieve these results, which remained consistent at a 1-year follow-up. However, the study's limitations included a small sample size of only 50 individuals in the control arm and a homogeneous study group.

## Conclusions

Initial findings in the field of PRT suggest significant implications for understanding and treating primary chronic back pain (CBP). Modifying beliefs that induce fear and avoidance regarding the causes and perceived threat of pain holds promise for delivering substantial and enduring pain relief to individuals with primary CBP.

## Future Considerations

Future research in the field of PRT will require enhancements in sample size, generalizability, and inclusion of other forms of chronic pain. Current research with improved generalizability is currently in process with results to come.

