



I10 An Update on Female Arsonists: A Systematic Review

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Learning Overview: After attending this presentation, attendees will understand the recent developments in the understanding of the key psychopathologies and characteristics of female arsonists during this decade and explore the differences between previous research and more recent studies.

Impact on the Forensic Science Community: This presentation will impact the forensic science community by presenting key aspects of the latest research in female arsonists and emphasizing the unique nature of female arsonists and the challenging aspects of understanding and treating them.

Background: The psychiatric literature regarding arson, fire setting, and pyromania is quite rich. However, despite key differences between male and female arsonists, there are relatively few studies directly investigating female arsonists or gender-related differences among fire setters. At present, there is only one review article on this topic, published in 2010. This study sought to perform a systematic review of the literature and determine whether there has been any evolution in the understanding of this topic since 2010.

Methods: Two independent reviewers conducted the literature search using the electronic databases MEDLINE®, Web of Science®, and PsycINFO®. The search was limited from January 1, 2010, to January 1, 2018. Study selection, data analysis, and reporting were conducted according to the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) guidelines. Extracted data included the authors, year of publication, country of study population, study type, sample size, sample characteristics, gender, fire-setter status of the study population, age, definition of fire-setting behavior, and characteristics of female fire setters identified.

Results: A total of 270 articles were identified and seven were selected for review. Despite a large variation in methodology, including national surveys, case-control, and retrospective studies, most of the studies demonstrated consistent findings. Female arsonists are often victims of abuse, family disorganization, and low socioeconomic status. Studies published prior to 2010 describe depression and psychosis as key psychopathologies. More recent studies demonstrate a high proportion of substance abuse and personality disorders among female arsonists compared to male arsonists. There is also a higher prevalence of psychotic disorders when compared to non-fire setters.

Conclusions: Female arsonists are a unique patient population, distinct from both male arsonists and non-arsonist female offenders. This study reviews the existing literature and reveals that there has been some evolution in the understanding of female arsonists, although studies published before and after 2010 are mostly consistent. Hopefully, this knowledge will improve the understanding of female arsonists and help guide further research. Using the data collected from this systematic review, more detailed analyses could be performed in the future for a more detailed characterization of the literature.

Female, Arson, Systematic