“Break the Sound Barrier”: The Utilization of “White Noise” in the Emergency Radiology Workplace

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PURPOSE

We aim to discuss the positive effects of white noise by creating a soothing and calm environment in the emergency radiology workplace, thereby reducing patient anxiety and maximizing radiologists’ productivity.

BACKGROUND

White noise can be a useful tool in radiology settings to foster a peaceful and focused work environment for healthcare workers. With noise pollution from machine beeping and alarms, white noise can be used to mask these external sounds to cultivate calm, reduce patient anxiety, and improve focus in the workplace.

Background white noise confers many benefits for both the patient and radiology healthcare professions.

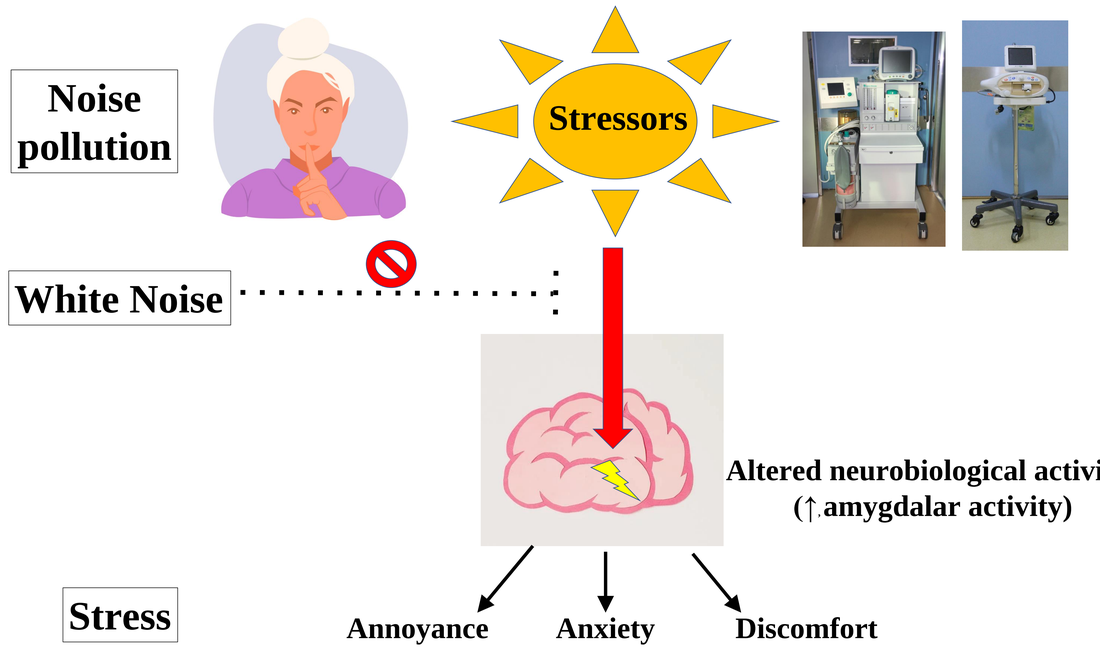
METHOD

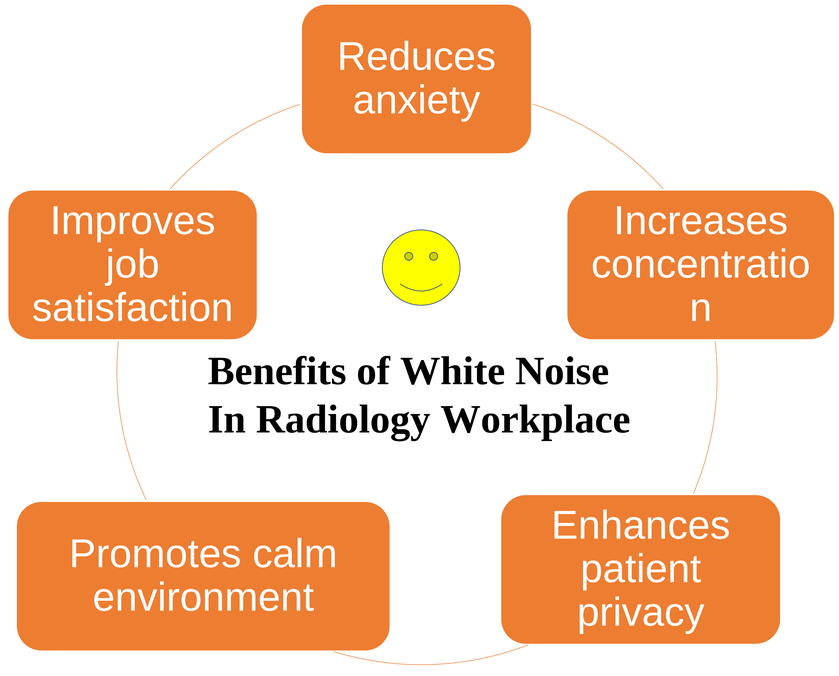
Radiology procedures can be stressful for patients and white noise can be an effective tool in mitigating its effects. Further, to maintain complete discretion and patient privacy, white noise may be helpful in attenuating personal conversations and sounds that may be overheard by others outside the imaging room.

White noise resembles sounds of all audible frequencies in equal amounts, which promote a sense of calm and concentration.

We will discuss the many benefits of white noise for both patients and radiology healthcare workers.

Results





Stressors (i.e. beeping monitors) alter neurobiological activity such as elevated amygdalar activity, thereby creating a physiologic stress response with the perception of annoyance, anxiety, and discomfort.

Utilization of white noise may mitigate these deleterious effects for both patients and radiology staff. Studies show that white noise may reduce anxiety, increase concentration, enhance patient privacy, promote a sense of calm within the workplace, and improves job satisfaction.

However, the sound intensity should be monitored as it may contribute to pre-existing noise pollution, thus requiring an equipoise approach to its implementation.

CONCLUSION

Overall, white noise within the emergency radiology workplace may confer several benefits both for the patient and radiology staff by reducing anxiety and promoting productivity.

REFERENCES

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