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Debunking Medical Myths: Do Blue Light Glasses Protect Your Eyes?

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DO BLUE LIGHT GLASSES PROTECT YOUR EYES?

Haya, Ethan, Yoshio, Camila, Mahnoor, and Carolyn

A MODERN PROBLEM

In recent years, more and more electronic screens are in use. These screens emit blue light which has been shown to hurt ones quality of sleep.



A STYLISH SOLUTION?

Blue light glasses aim to remedy this problem by selectively removing certain detrimental wavelengths of blue light. Blocking the blue light from reaching the retina, in theory, should reduce eye strain. (2)

DIRECT EFFECTS ON EYE STRAIN NOT SHOWN

In a double blind study (1), and a randomized control trial (4) no significant difference was found between standard clear lenses and blue light-blocking lenses on the reported eye strain of subjects.



LIMITED USE OF A BLUE BLOCKING FILTER

A study by Redondo et al., demonstrated that the use of a Blue Blocking (B-B) filter had no effect on accommodative dynamics or visual strain symptoms. Based on these findings, there is no support for the prescription of B-B filters (3).



CONCLUSION

Although blue light glasses have been marketed as a strategy to reduce digital eyestrain and improve sleep quality (2), the available evidence does not support these claims.



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3. Redondo B, Vera J, Ortega-Sánchez A, Molina R, Jiménez R. Effects of a blue-blocking screen filter on accommodative accuracy and visual discomfort. *Ophthalmic and Physiological Optics*. 2020;40(6):790-800. doi:10.1111/opo.12738

4. Rosenfield M, Li RT, Kirsch NT. A double-blind test of blue-blocking filters on symptoms of Digital Eye Strain. *Work*. 2020;65(2):343-348. doi:10.3233/wor-203086