

Outbreak of Acute Conjunctivitis in Karachi: A perfect ground for misuse of topical Antibiotics

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Dear Madam, The metropolitan city of Karachi is facing an outbreak of acute conjunctivitis, a highly contagious eye infection known as 'pink eye'.¹ About 80% of all cases of acute conjunctivitis are viral, human Adenoviruses being the most common agent. Patients usually present with acute onset of redness, discomfort, photophobia and watery discharge, often involving both eyes. Transmission is through direct contact with the ocular discharge of infected individuals.²

Tests like viral culture and PCR assays are not routinely employed due to limited accessibility and the diagnosis is primarily clinical. Treatment is mainly supportive: cold water application, lubricating eye drops and hygiene maintenance is recommended. Formal treatment guidelines are currently unavailable and no antiviral drug has been approved.² This letter aims to draw your attention to the inappropriate use of topical antibiotics during the current epidemic of acute conjunctivitis.

Self-medication, including OTC antibiotics use, is a usual spread practice in developing countries like Pakistan, where the prevalence is 95.5%.³ This is because of the easy accessibility of medicines, especially antibiotics used without prescription for many, including the common pink eye. In the UK, chloramphenicol eye drops use for acute conjunctivitis increased by 47.8% from 2005 to 2007.⁴ This has substantially increased antibiotic resistance in ocular flora; a significant increase in ocular MRSA from 30% in 2000 to 42% in 2005 was reported.⁵ Moreover, antibiotic drops available at local pharmacies are usually in combination with steroids which is not recommended due to exacerbation of potential herpetic conjunctivitis. In addition, increased antibiotic prescriptions by general practitioners have also contributed to this growing problem. This has added unnecessarily to the total health

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Submission complete: 15-09-2023

Review began: 25-12-2023

Acceptance: 18-04-2024

Review end: 20-03-2024

care finance; millions of dollars are spent every year on acute conjunctivitis in the USA.²

The most appropriate way to manage and prevent VC is patient education, including reassurance that it is a self-limiting disease and counselling regarding precautionary measures. On the national level, public service messages on television, Tele-ophthalmological services and distribution of pamphlets in hospitals, especially during the outbreak season, can help prevent its transmission and subsequent overuse of OTC antibiotics. Guidelines should be set for general practitioners to minimise antibiotic prescriptions and consider quick diagnosis by point-of-care test such as AdenoPlus. Around \$ 340 million could be saved, and 1 million cases of antibiotic treatment could be avoided by using this test.² Finally, thorough ophthalmologic examinations can help exclude other causes.

Disclaimer: None.

Conflict of interest: None.

Funding disclosure: None.

DOI: <https://doi.org/10.47391/JPMA.10902>

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Author Contribution:

AI & SK: Conception, literature search, writing, editing and referencing.