

Self-medication with antibiotics practices and related factors among the public of Pakistan

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Background

Since the last decade, self-medication with antibiotics (SMA) has become considerably common, which is a critical factor for driving antibiotic resistance. Individuals involved in SMA generally do not have adequate knowledge regarding the appropriate use, indications and dosage of these drugs.

Aims and objectives

The objective of the present study was to investigate population SMA practices, knowledge and sociodemographic factors associated with SMA in Islamabad, Pakistan.

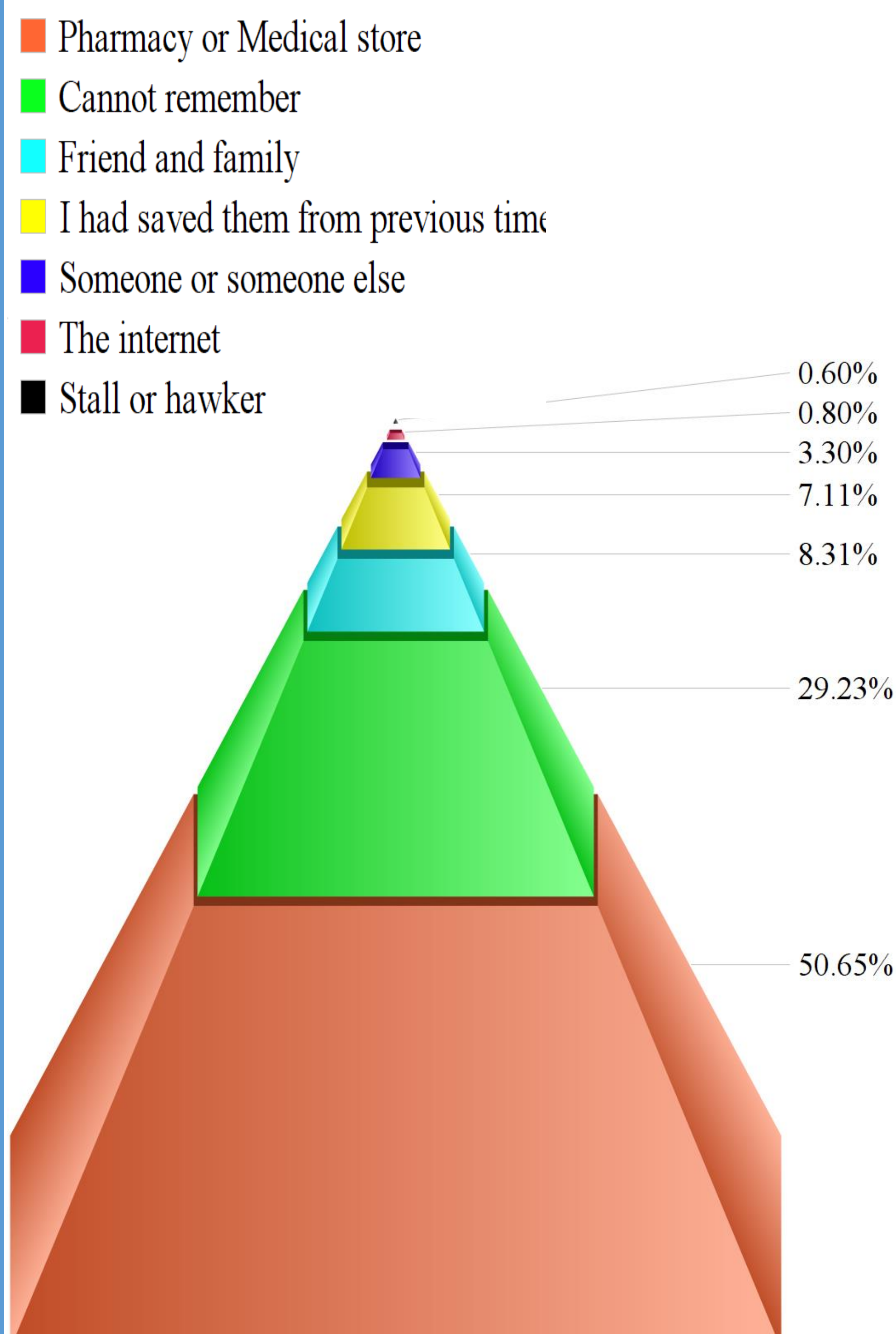
Methodology

The study has adopted a cross-sectional methodology and data collection was performed from randomly selected participants through an interview-administered questionnaire. Statistical analysis was carried out using SPSS v. 24.

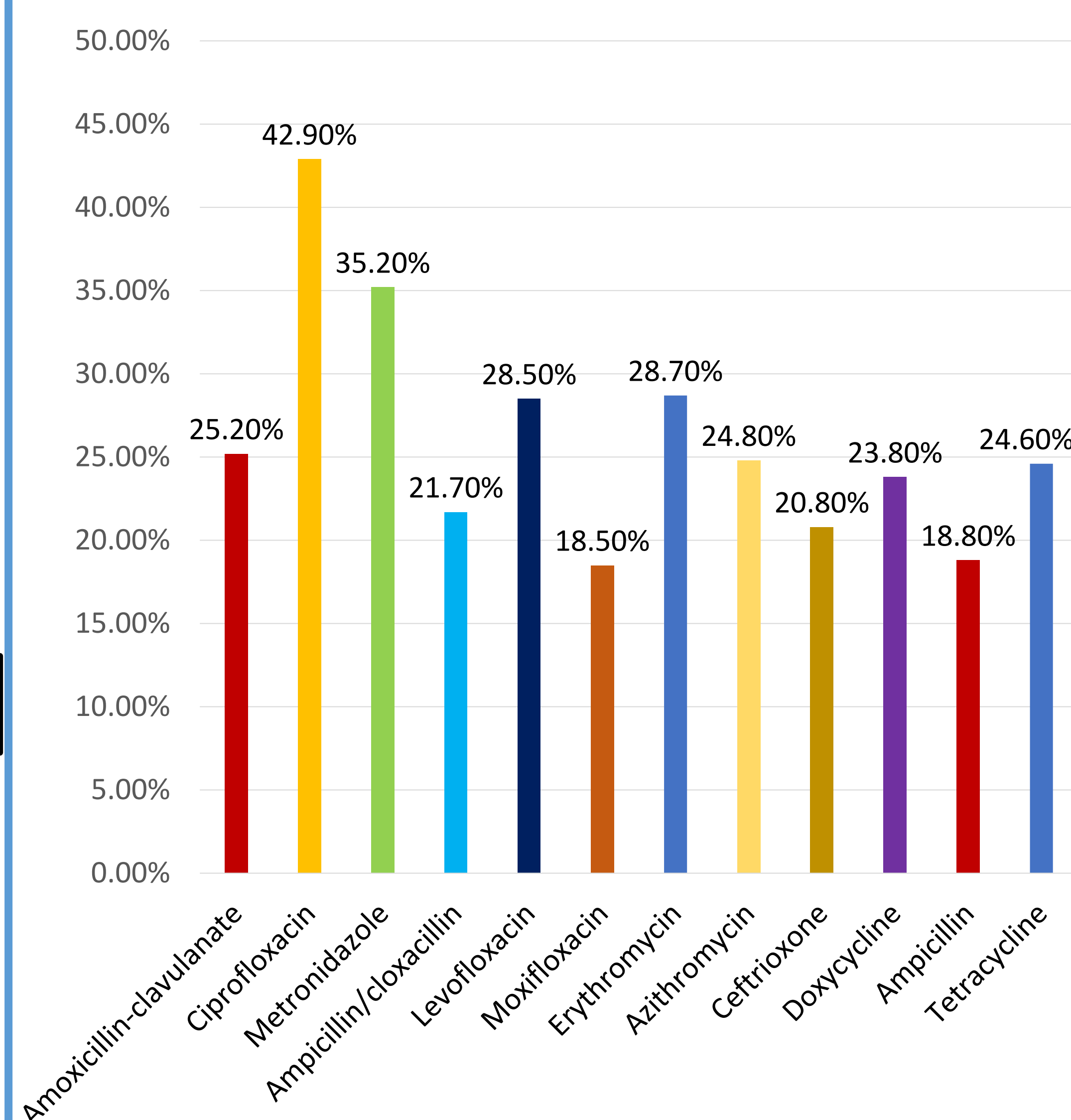
Ethical approval

Before ethical approval for this study was obtained from the ethical committee at International Islamic University Malaysia (IREC 2019-004) and Hamdard University the commencement of this study, Pakistan (HU-ERC-19-408).

Common sources for getting antibiotics



Commonly used antibiotics



Acknowledgement

Results

Out of 480 participants involved in the study, 55.6% (n=267) were male, and the total prevalence of SMA was 32.5%. Ciprofloxacin (42.9%) was the most commonly used antibiotic to treat coughs or colds, a runny nose, flu or sore throat, diarrhea or fevers, which were the relevant reasons for SMA. Findings from multivariate logistic regressions showed that predictors of SMA were male gender (95% CI: 0.383-1.005), age (95% CI: 0.317-0.953) and highest education-level (95% CI: 0.961-0.649).

Discussion and conclusion

Despite of reasonable access to healthcare facilities, people are still obtaining antibiotics without prescription, bypassing diagnostic and consultative healthcare services. Thus, the government must implement strict healthcare policies to restrict the sales of antibiotics without prescriptions, while at the same time, targeted public awareness campaigns about the proper use of antibiotics are also required.

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