

EMPIRICAL QUALITY EVALUATION OF COMMON BRANDS OF CEFTRIAXONE SODIUM INJECTION MARKETED IN THE NORTHERN REGION OF NIGERIA

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ABSTRACT

Information related to the quality of ceftriaxone (CF) sold in northern Nigeria is limited. Therefore, we aimed to evaluate the quality of different brands of CF sodium injections marketed in Kano State of Nigeria. Thirteen different brands of CF sodium for injection (three samples per brand) were obtained from patent medicines vendors (PMVs), pharmacies and a government drug store in Kano State of Nigeria. The quality of these brands was assessed using physicochemical quality-control tests (colour, appearance, labelling, pH, weight uniformity and percentage of content). The results obtained from these tests were checked for compliance with the standards specified in British Pharmacopoeia 2009 (BP 2009) and the United States Pharmacopeia 2016 (USP 2016). All 13 (100%) brands were registered with the National Agency for Food and Drug Administration and Control (NAFDAC). The samples were brands imported from other countries and passed tests for colour and pH. However, 1 of the 13 samples did not pass the labelling inspection and only 4 (30.8%) brands were found to fulfil the requirements for physical appearance. Twelve (92.3%) of the 13 evaluated brands were found to have an acceptable percentage of content within a range of 95%-105% based on BP 2009 standards. The tested brands of CF sodium injection being marketed in Kano State of Nigeria were found to have variable compliance regarding the BP 2009 and USP 2016 specifications. Therefore, there is a need for relevant regulatory agencies to embark on more post-marketing surveillance to ensure the quality of medicines in Nigeria.

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