**[Send to](https://www.ncbi.nlm.nih.gov/pubmed/?term=%22dweib%22)**

[Curr Clin Pharmacol.](https://www.ncbi.nlm.nih.gov/pubmed/?term=%22dweib%22) 2014 Feb;9(1):10-6.

**Patterns of NSAIDs use in Palestinian mid-territories: a prospective study of ambulatory patients in outpatient pharmacies.**

[Khdour MR](https://www.ncbi.nlm.nih.gov/pubmed/?term=Khdour%20MR%5BAuthor%5D&cauthor=true&cauthor_uid=23343016), [Hallak HO](https://www.ncbi.nlm.nih.gov/pubmed/?term=Hallak%20HO%5BAuthor%5D&cauthor=true&cauthor_uid=23343016), [Hejaz H](https://www.ncbi.nlm.nih.gov/pubmed/?term=Hejaz%20H%5BAuthor%5D&cauthor=true&cauthor_uid=23343016), [Shaeen M](https://www.ncbi.nlm.nih.gov/pubmed/?term=Shaeen%20M%5BAuthor%5D&cauthor=true&cauthor_uid=23343016), [Dweib M](https://www.ncbi.nlm.nih.gov/pubmed/?term=Dweib%20M%5BAuthor%5D&cauthor=true&cauthor_uid=23343016)1.

[**Author information**](https://www.ncbi.nlm.nih.gov/pubmed/?term=%22dweib%22)

**Abstract**

The out-patient pharmacies in Ramallah and Bethlehem, central Palestine, were evaluated for NSAIDs utilization and pattern of prescribing and dispensing of these commonly used medications across the whole country. In our study for this area that accounts for almost 25% of the inhabitants of all Palestine (459, 761 inhabitants according to 2011 census), we analyzed the use of NSAIDs whether were prescribed for the patient or were obtained without a prescription in the period of Sept 1(st) to Nov. 30, 2011. The number of defined daily doses, DDD/1000 inh/day, and the percentage utilization from total were determined and analyzed using the simple ATC/DDD model which was developed by WHO for assessment of quality prescribing of medications. From these data we calculated DU 90% for the drugs described in this study. Using a scale for GI toxicity and risk determination from a meta- analysis of controlled epidemiological studies, we determined the GI risk of the drugs in the study. Ketoprofen and piroxicam were found to be associated with the highest risk, on the other hand ibuprofen and diclofenac were associated with low risk of GI toxicity. The average Price/DDD was also determined for the purpose of comparison with the prices in other European countries. Our findings were both exciting and interesting with the total consumption of NSAIDs over the period of study was 31.26 DDD/1000 inh/day comparing to 51.02 DDD/1000 inh/day in the European countries included in the study. Only 5 drugs fell within DU 90% which are respectively along with their percentage NSAIDs consumption: (ibuprofen; 26.48%, diclofenac; 23.38%, etoricoxib; 21.24%, meloxiocam; 12.19%, and celecoxib; 7.16%). The drugs were obtained mostly by prescription except for the first 2 agents (ibuprofen and diclofenac) which were almost exclusively bought without a prescription as OTC with the pharmacist greatly influence their use and dispensing. The price of purchasing for the top DU 90% agents was almost twice the price in Europe for the same drugs taking into consideration the limitations of our study in determining the equipotency or the equivalency of the DDD doses in Palestine and Europe.