

## البحث الثامن

### **Acceptance of COVID-19 vaccination and associated factors in Middle East countries: a multinational study.**

**Authors:** Mohamed Masoud, Rasha Hamed Bassyouni, Wafaa Yousif Abdel-Wahed, Mohammed Ibrahim Al Hawamdeh, Fadi Mohammad Nassar, Nahla Arishi, Anez Ziad, Lubna Abdelwahab Elsidig & Nashwa Sayed Hamed.

**Alexandria Journal of Medicine, 2024; 60 (1): 1-10. DOI: 10.1080/20905068.2023.2292915**

#### **Abstract**

**Background:** Widespread use of effective and safe vaccines is the most promising method to contain the COVID-19 pandemic. This study aimed to assess the acceptance level of COVID-19 vaccination among the general population in six Middle East countries (Egypt, Jordan, Palestine, Tunisia, Sudan, and Yemen) as well as to assess factors associated with acceptance or refusal of vaccination.

**Methods:** A cross-sectional multinational study was conducted during the period from May 20 to August 8 2021. A web-based, self-administered, Google form Arabic questionnaire was used after a pilot study using 30 participants.

**Results:** The COVID-19 vaccine acceptance rate was 62.9%. The highest rate was reported among Tunisians (70%), while the lowest rate was detected among Egyptians (54.4%) and Yemenis (49%). Fear of side effects of vaccination was the main barrier to vaccination (53.1%). Meanwhile, nearly three-fifths (57.7%) of the respondents reported that vaccination would reduce the risk of infection. Logistic regression analysis stated that age >40 years, having children, being Health-Care Workers (HCWs), had higher education and higher income levels, and administering influenza vaccination were significant predictors of vaccine acceptance, as well as Jordanians, Palestinians, and Sudanese had higher probabilities of vaccine acceptance than Egyptians and Yemenis.

**Conclusion:** The acceptance rate was moderate. Fear of vaccine side effects and lack of receiving appropriate information were reported as barriers to vaccination. It is important to improve vaccine acceptance and reduce the barriers to COVID-19 vaccination.

**Keywords:** COVID-19 vaccines; vaccination; acceptance; Middle East