

# Enhancing resource utilization and improving patient experience through strategic laboratory stewardship

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Cairo, Egypt

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Overcrowding in the Emergency department (ED) is a global challenge that can lead to delays in patient management, increased patient length of stay, and increased healthcare costs. An essential part of improving patient triage is understanding risk, uncovering underlying clinical conditions and assessing the need for potential hospital admission(s). Laboratory tests have long been associated with its essential role in triage decisions. Increased testing however, can have a dramatic impact on already constrained human and economic resources, particularly if requests do not follow evidence-based criteria. By contrast, inappropriate laboratory testing could trigger additional, unnecessary, and even invasive investigations, leading to laboratory incidentalomas (i.e., lab result abnormalities detected by coincidence, without clinical symptoms or suspicion).

Since the pattern of emergency tests being requested varies across hospitals and institutions, an integrated clinical care team from Ain-Shams University, Emergency Hospital designed a novel testing approach for optimization of urgent testing. The test panel is based on a cross functional consensus between internal medicine, surgical physicians and laboratory professionals. Insights that directed the test menu included the most informative tests across the most common emergency conditions, with feasibility capacity to be performed within one hour.

ED physicians now have the choice to order from a panel of 10 tests, with individual recommendations related to evidence-based ordering. Based on the results, the decision to admit patients and/or request additional testing is made. The admission order set is a guided 20 test panel with similar test specific recommendations related to evidence-based ordering. The new process has substantially and positively improved workflow, as well as the patient experience, enabling expedited care, while also enhancing the hospital's ability to maximize the number of patients who are seen, admitted and/or safely discharged home from the ED.



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