



The value of ultrasound diagnosis in acute appendicitis.

George C Ugwu

Doncaster Royal Infirmary, United Kingdom.

Abstract:

Introduction:

The diagnosis of appendicitis relies on a thorough history and examination, and can often be challenging. Ultrasound is widely considered to be the most appropriate first line investigation; however non-diagnostic ultrasounds are not uncommon and do lead to delays in diagnosis and/or definitive treatment by creating a need for further clinical assessment.

This was a retrospective analysis of 99 patients undergoing appendicectomy, with a prior ultrasound abdomen within one week of the procedure being undertaken. Data was collected from review of patient's hospital medical records (discharge summaries, clinic letters, PACs).

Results:

99 patient aged 8-76 years were studied. Male to female ratios was 3:1. The sensitivity and specificity of ultrasound was 16% (95% CI - 7% to 29%) and 96% (95% CI - 86% to 99%) respectively with PPV of 80% and NPV of 52%. The accuracy of ultrasound diagnosis was found to be 55% (95% CI 44% to 65%). The negative appendicectomy rate was 48%.



Conclusion:

USS cannot reliably identify nor exclude appendicitis. Less than 16% of patients who had proven appendicitis (positive histology) had scans that indicated this. Almost 50% of the normal/indeterminate scans were false negatives. Furthermore, 20% of positive ultrasound reports were false-positives.

Biography

George C Ugwu, is working at Doncaster Royal Infirmary, United Kingdom.

[Webinar on Surgery; Berlin, Germany; November 19, 2020](#)

Citation: George C Ugwu,; The value of ultrasound diagnosis in acute appendicitis.; Webinar on Surgery; Berlin, Germany; November 19, 2020