## 231 Diagnostic Outcomes in Suspected Appendicitis Before and During the COVID-19 Pandemic

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**Introduction:** Routine operative treatment of appendicitis was temporarily interrupted during the COVID-19 pandemic. Non-operative management in suspected appendicitis makes a definitive diagnosis difficult. This study investigated diagnostic outcomes of suspected appendicitis patients before and during COVID-19.

**Method:** A retrospective review of patients aged 16–45 undergoing treatment for suspected appendicitis pre-COVID-19 (1st January 2019–1st January 2020) and during the COVID-19 pandemic (1st March 2020 to 31st June 2020) was performed. Patients were followed up for one year (31st June 2021) to explore diagnostic outcomes.

**Results:** At one year follow up, 206 patients were identified in the pre-COVID-19 cohort with 100% (n = 206) undergoing an appendicectomy. On histopathological examination 77.2% (n = 159) had appendicitis; 10.7% (n = 22) another pathology; 2.9% (n = 6) neuroendocrine tumour. There were 62 patients in the COVID-19 cohort in which 79% (n = 49) underwent appendicectomy (56% (n = 35) immediate appendicectomy; 23% (n = 13) interval appendicectomy). On histopathological examination 61% (n = 38) had appendicitis; 13% (n = 8) another pathology; 5% (n = 3) neuroendocrine tumour.

Of the remaining 13/62 patients, one had undergone a CT scan and colonoscopy for gastrointestinal symptoms demonstrating signs of chronic caecal inflammation treated conservatively. One underwent a CT scan alone for gastrointestinal symptoms finding no pathology. The remaining 11/62 patients had no further reported symptoms or diagnostics.

**Conclusions:** This study demonstrates that the risk of appendiceal malignancy and chronic inflammation is important in non-operative management of suspected appendicitis and establishing consistent follow up pathways is essential.