

**Aims:** First: To evaluate the diagnostic value of strain ratio (SR) and hue histogram (HH) in patients with pancreatic masses and to determine the cut-off value between pancreatic cancer and focal pancreatitis using a pancreatic tissue close to the mass as a reference area. Second: To calculate new variable HH ratio (HHR) in an attempt to improve sensitivity, specificity and accuracy of the method.

**Methods:** In a prospective single center study, 149 patients were examined: 105 with the pancreatic masses and 44 controls using Pentax EUS linear probes in combination with Hitachi platforms. SR and HH were automatically calculated by machine software. Finally, two groups were formed: Pancreatic cancer group (58 patients) and focal pancreatitis group (47 patients). All statistical analysis has been made in SPSS 14.0 (SPSS Inc., Chicago, USA).

**Conclusion:** Statistical analysis in our study showed that SR with a cut-off value of 7.59 reaches 100% sensitivity and 95% specificity with overall accuracy of 97% (confidence intervals [CI]: 92-97%) in detection of pancreatic cancer. Statistical analysis also showed that HH with a cut-off value of  $\geq 86$  reaches 100% sensitivity and just 45% specificity with overall accuracy of 66% (CI: 61-66%) in detection of pancreatic cancer. New variable HHR with cut-off  $\geq 1.153$  was slightly better with 98% sensitivity and 50% specificity, with overall accuracy of 69% (CI: 63-70%). SR showed significantly higher specificity compared with HH and HHR. More HH studies on Hitachi platforms are needed.

**Status of the presenting author:** Chief resident

**The authors declare:** No significant relationship.

## Comparison of elastography methods in patients with pancreatic masses

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**Introduction:** Endoscopic ultrasonography (EUS) quantitative elastography methods are developed for non-invasive differentiation of pancreatic masses.