"ULTRASONOGRAPHY AND MDCT WITH PATHOLOGICAL CORRELATION IN THE EVALUATION OF FOCAL HEPATIC LESIONS"

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ABSTRACT

Background and objectives:

Focal hepatic lesions are frequently encountered in hospital. To study various ultrasonographic and CT patterns of liver diseases in arriving at a specific diagnosis before surgery or biopsy and to evaluate the importance of image guided extraction of tissues and fluids for histopathological examination and to correlate the radiological diagnosis by histopathological studies.

Material methods:

A hospital based study was done among 30 patients with liver lesions who were referred to department of radiodiagnosis, SDMCMSH with the request for USG Abdomen/ MDCT Abdomen and undergo pathological study for same

Results:

In ultrasound, 16(53.3%) were metastasis, 6(20%) abscess, 4(13.3%) HCC, 2(6.7%) hydatid cyst, 1(3.3%) patient each was diagnosed with cholangiocarcinoma and focal nodular hyperplasia.

In CT, 13(43.3%) were metastasis, 6(20%) were HCC, 5(16.7%) abscess, 2(6.7%) hydatid cyst and cholangiocarcinoma., 1(3.3%) patient each was diagnosed with granulomatous disease and focal nodular hyperplasia.

In HPE, 12(40%) were metastasis, out of which metastasis were from carcinoma of stomach, adenocarcinoma, squamous cell

carcinoma of esophagus and primary carcinoma of lung. There were 5(16.7%) HCC patients, and it was well differentiated. Among patients who had abscess, 4(13.3%) had positive pus culture, 2 (6.7%) had granulomatous abscess, and 1 (3.3%) showed no pus culture growth. There were 2 (6.7%) patients of cholangiocarcinoma, 2 (6.7%) hydatid cyst and 1(3.3%) unspecified hyperplasia.

The sensitivity of diagnosing cholangiocarcinoma is 50%, abscess is 85.71 and HCC is 80%. Whereas for FNH, Metastasis and hydatid cyst it was 100%. The specificity for all the focal hepatic lesions mentioned was 100% except for metastasis which was 77.7% and accuracy was also least for this, 86.7%. The p value was statistically significant for all FLL except for cholangiocarcinoma.

The sensitivity of diagnosing abscess is 71.42%. Whereas for all other FLL it was 100%. The specificity for all the focal hepatic lesions mentioned was 100% except for metastasis which was 94.4%, HCC was 96%. The accuracy of abscess was 93.3%, metastasis and HCC was 96.7%, rest all were 100%. The p value was statistically significant for all FLL.