Cellular pathology: fine-needle aspiration cytology of metaplastic carcinoma of t...



Review Cellular Pathology: Fine-needle aspiration cytology of metaplastic carcinoma of the breast In this study, the have made a novel attempt to study the cellular components of metaplastic carcinoma of breast by histological examination of the fine needle aspirates. They short listed 19 women patients for the study from 6 different institutions with proven diagnosis of the condition with unique cytological features in the tumors in different patients. Aspirates obtained from the selected patients were subjected to a uniform staining technique and then examined microscopically to identify the cellular components. Any atypical cellular picture was graded on a three point classification system and labeled low, moderate and high. Cellular morphology was studied and differentiation between glandular, squamous and cells with spindle nuclei was recorded. In the 4 identified pure spindle cell carcinomas 3 of the cases were considered confirmed, in the squamous cell group 3 were diagnosed as malignant. In the biphasic group which included 11 cases, 6 were diagnosed as carcinoma.

As the study was dependent on fine needle aspirates, it could provide a misleading picture of the cellular components due to the location of the tumor and the cellular component extracted using only a 22 gauge needle. Washing with 50% ethanol can also reduce some of the adipose cells in the aspirate and dehydrate the cells. Moreover the number of cases selected was too few for giving any statistically significant inferences. Arriving at confirmed conclusions with such meager data can be misleading. To arrive at a significant hypothesis, the sample size has to be large. The modern methods of diagnosis like radiology and clinical pathology are non invasive

and FNAC studies need to be conducted only when absolutely essential. https://assignbuster.com/cellular-pathology-fine-needle-aspiration-cytologyof-metaplastic-carcinoma-of-the-breast/ The authors concluded that although cytological studies of aspirates show variability in cellular components, they can provide some clues for diagnosis, which seems unconvincing due to paucity of samples studied.