
473 surgically resected tumors on tissue microarrays were tested for ALK and MET expression by IHC and genomic alterations in ALK, MET, and ROS1 by FISH. Two different criteria and 3 different scoring systems were assessed.

Conclusion: In routine practice IHC could support FISH in the identification of ALK abnormalities. Further research is needed to assess the role of discordant MET results by means of IHC and FISH, as well as the relevance of tumors with increased ROS1 gene copy number. “Further research is needed.”


PBK/TOPK is a protein kinase expressed in many tumors. The authors’ results “suggest that PBK/TOPK correlates with mutant p53 and affects cell proliferation and viability as well as prognosis in lung adenocarcinoma”.


Among 187 consecutive resected adenocarcinomas, 32% harbored KRAS mutations. KRAS mutated tumors were more common in heavy smokers and more likely to show invasion of the visceral pleura compared to tumors without KRAS mutations (27% vs. 11%) and this might in part explain the worse prognosis in tumors showing KRAS mutations.


This is a review of the tumor-host microenvironment interaction in regards to the immune system with an emphasis on stimulation of the development of prognostic and predictive biomarkers.

Fairly dense article, citing lots of studies and should be of interest to those who want to learn more about the immune microenvironment of lung cancer.


The authors suggest that tumor associated macrophages in lung cancer play a central role in cancer growth and metastasis with bidirectional cross talk.
This study is done in a mouse model with lung cancer cell lines. There is lots of data that I do not understand.


   The authors determined the percentage of 52 core needle biopsies and 120 FNA specimens that contained sufficient tumor tissue for EGFR, KRAS, and ALK testing over a two-year period.

   They showed that core needle biopsy was more likely to show sufficient material for molecular testing than FNA specimens (67% vs. 46%, p=.007). They also showed that the adequacy of FNA specimens was operator-dependent (as we all know).

   This area is a moving target as we all know based partly on the skill of the operator and the advance of molecular techniques on smaller and smaller bits of material.