gutflix
GI learning, personalised

Summary

OBESITY PROMOTES PANCREATIC DUCTAL ADENOCARCINOMA BY OSTEOPONTIN-SECRETED ADIPOCYTES

Hiromi Kataoka

UEG Week Copenhagen 2023 | Poster

Pancreas

October 16, 2023

Obese adipocytes promote pancreatic cancer progression and angiogenesis through osteopontin secretion in preclinical models and human tissue analysis.

KEY POINTS

- Conditioned media from obese-derived mature adipocytes significantly increased pancreatic ductal adenocarcinoma cell growth, migration, and angiogenic capacity in both human and mouse models.
- Blocking osteopontin in obese adipocytes suppressed pancreatic cancer cell growth, migration, and angiogenic capability, and also canceled direct effects on endothelial cell migration and tube formation.
- Obese adipocytes increased AKT phosphorylation and VEGFA expression in both pancreatic cancer cells and endothelial cells, effects that were reversed by osteopontin inhibition.
- In xenograft models, neutralizing anti-osteopontin antibody significantly inhibited obesity-accelerated tumor growth.
- In human pancreatic cancer patients with obesity, high osteopontin expression in adipose tissues adjacent to tumors was significantly associated with poor prognosis.

VIEW THIS CONTENT ON GUTFLIX

https://gutflix.eu/search/d/ac9900b0-743b-11ee-9da8-0242ac140004

AI-generated summary

This summary was generated by an AI large language model based on the content transcript. It is for informational purposes only and should not be considered a substitute for clinical judgment. Always rely on your professional expertise and the full clinical context when making clinical decisions.