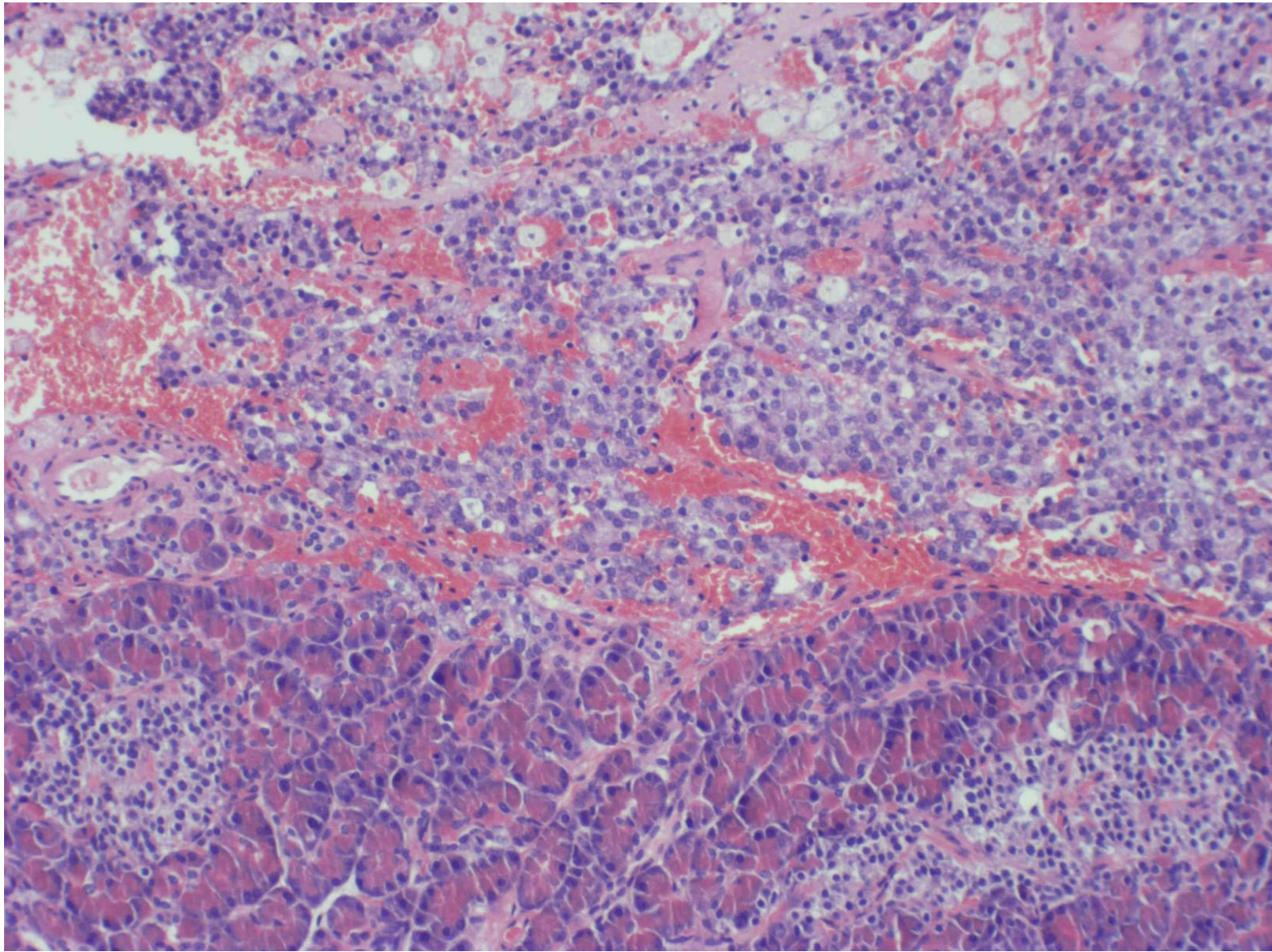


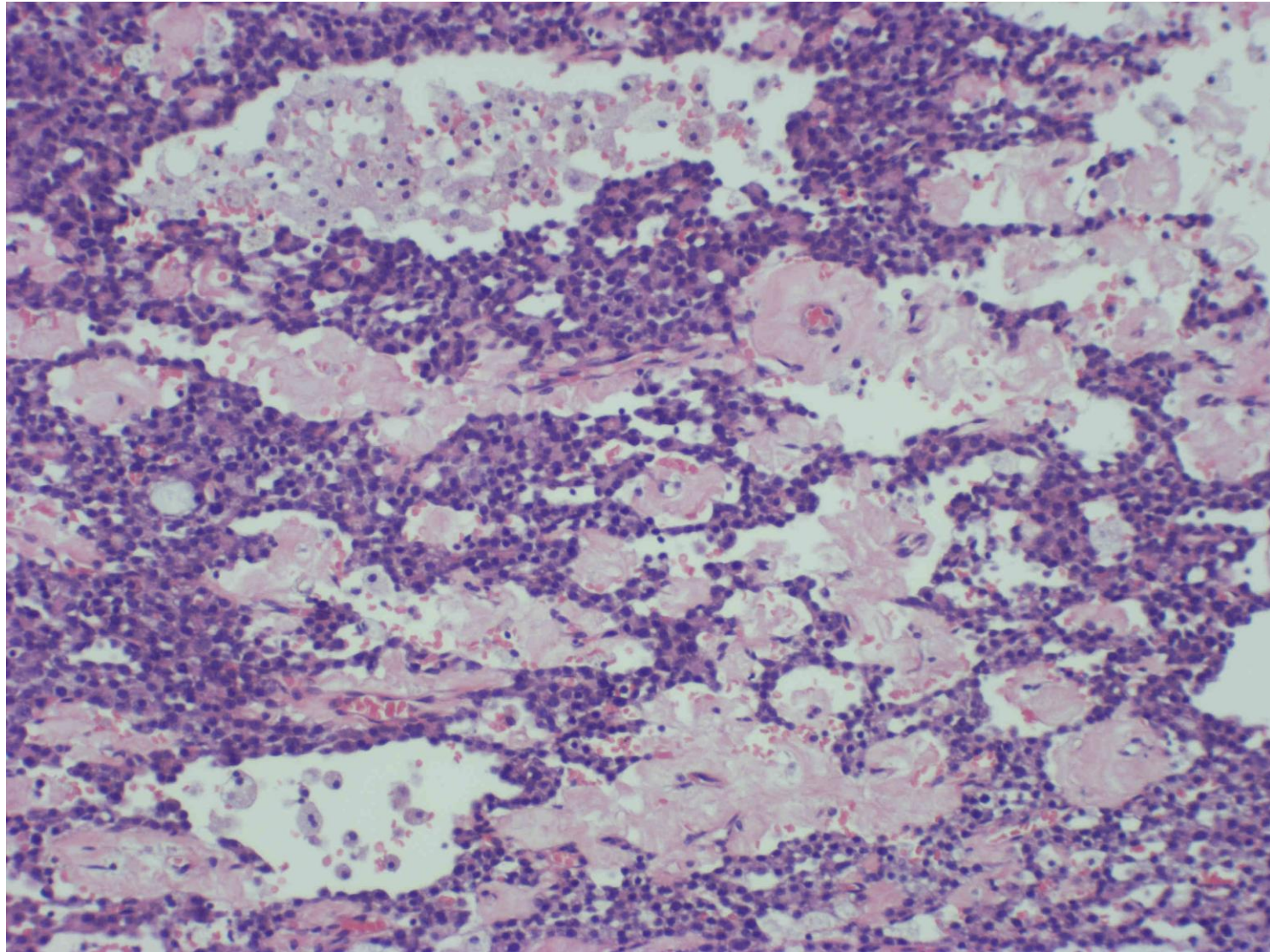
Pancreatoblastoma

Pancreatoblastoma is a rare type of pancreatic malignancy mainly seen in childhood, with a relatively favorable prognosis. The size of the solid and soft mass ranges from 2 to 20 cm in size. Microscopically, hypercellular and lobulated tumor consists of two cell types: cells with acinar differentiation and cells forming small squamoid nests. Neuroendocrine differentiation may be associated. Immunohistochemically, the tumor cells are positive for trypsin, cytokeratin (AE1-AE3/CK19/CK7/CK8), villin and α 1-AT. The squamoid nests are immunoreactive for CK5.

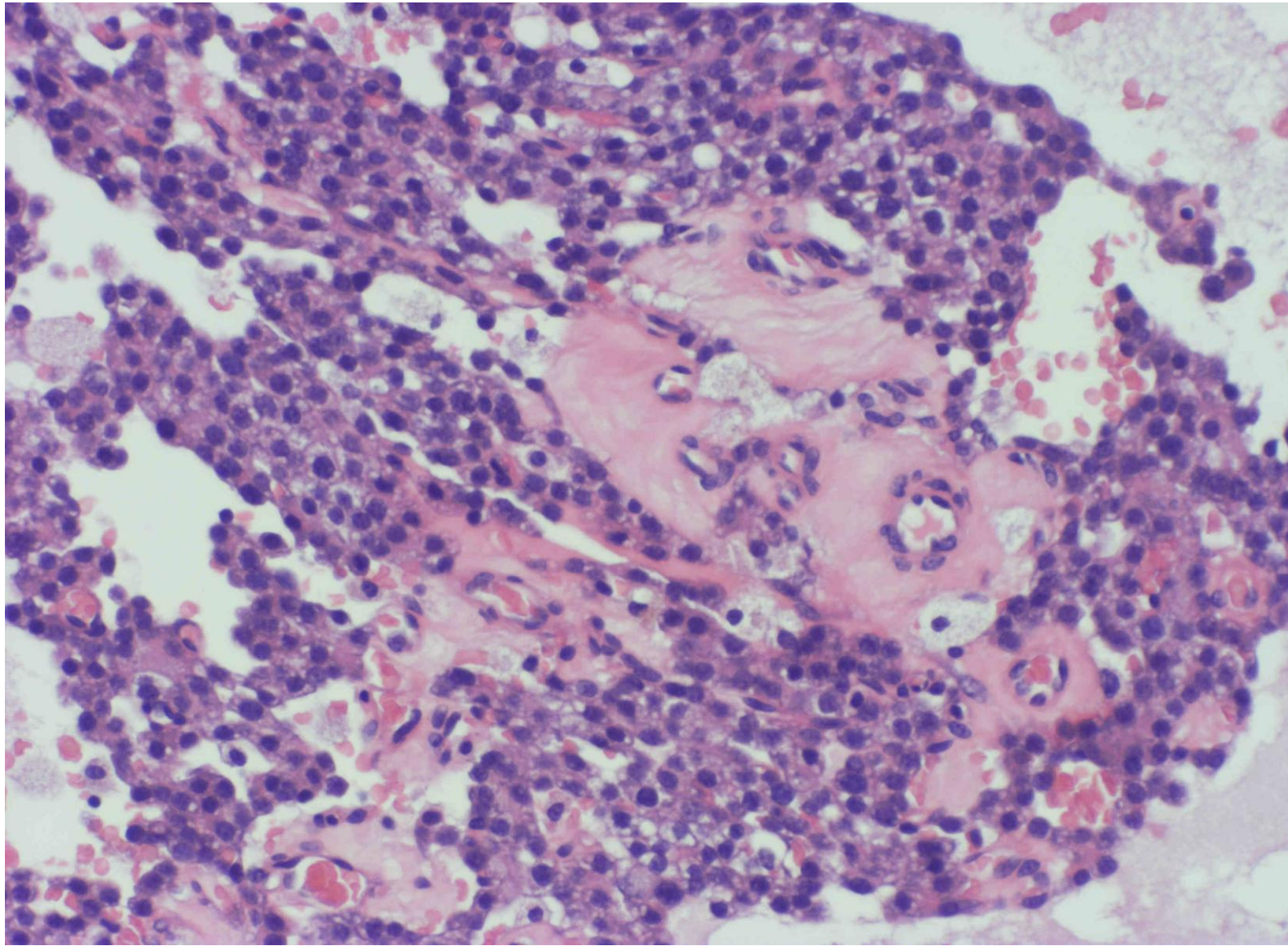
Ref.: Liu T, et al. Pancreatoblastoma in children: Clinical management and literature review. Transl Oncol 2022; 18: 101359. doi: 10.1016/j.tranon.2022.101359



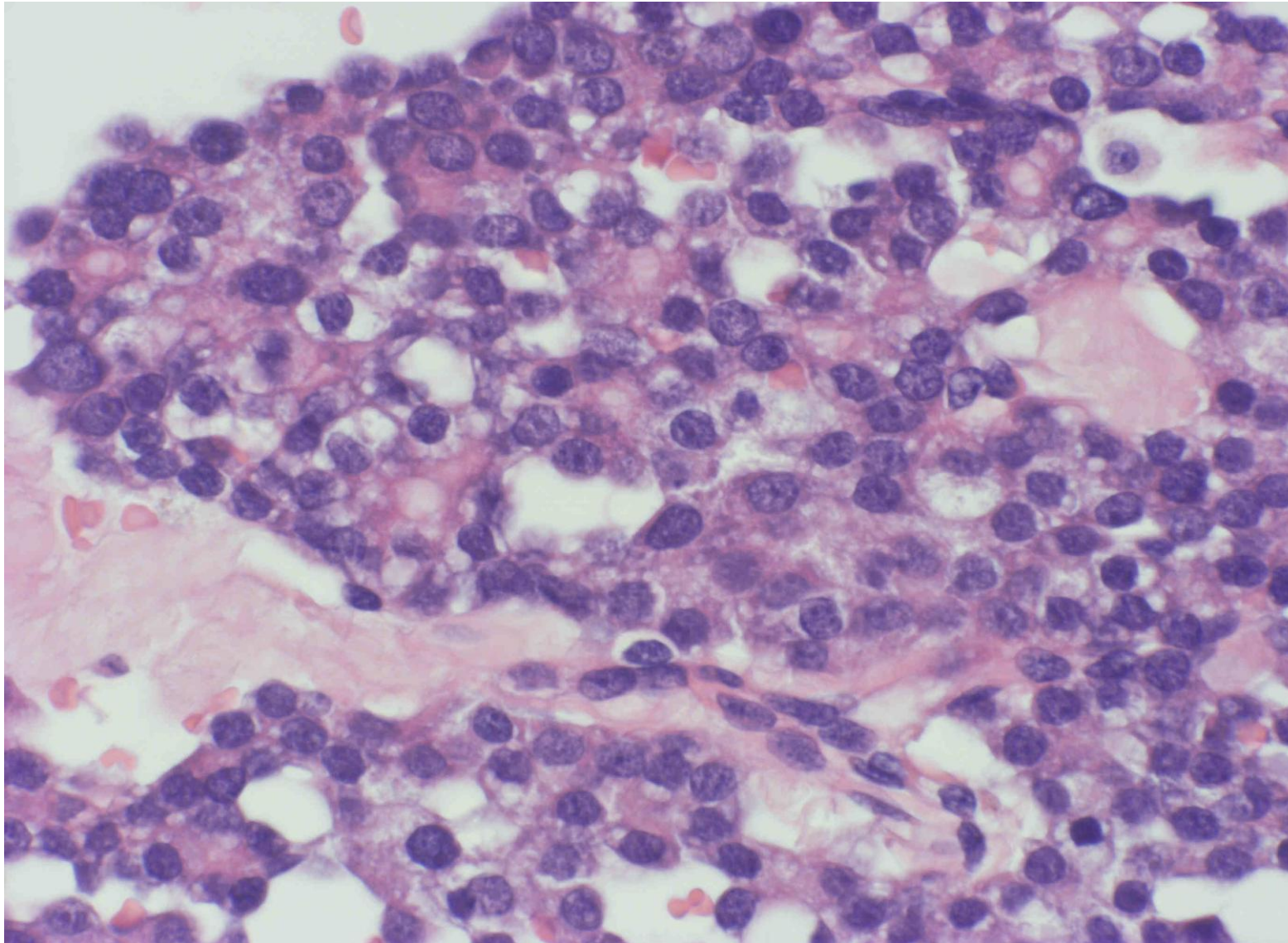
Pancreatoblastoma seen in a 3 y-o girl (H&E-1). Small-sized tumor cells are surrounded by the non-neoplastic pancreatic exocrine component.



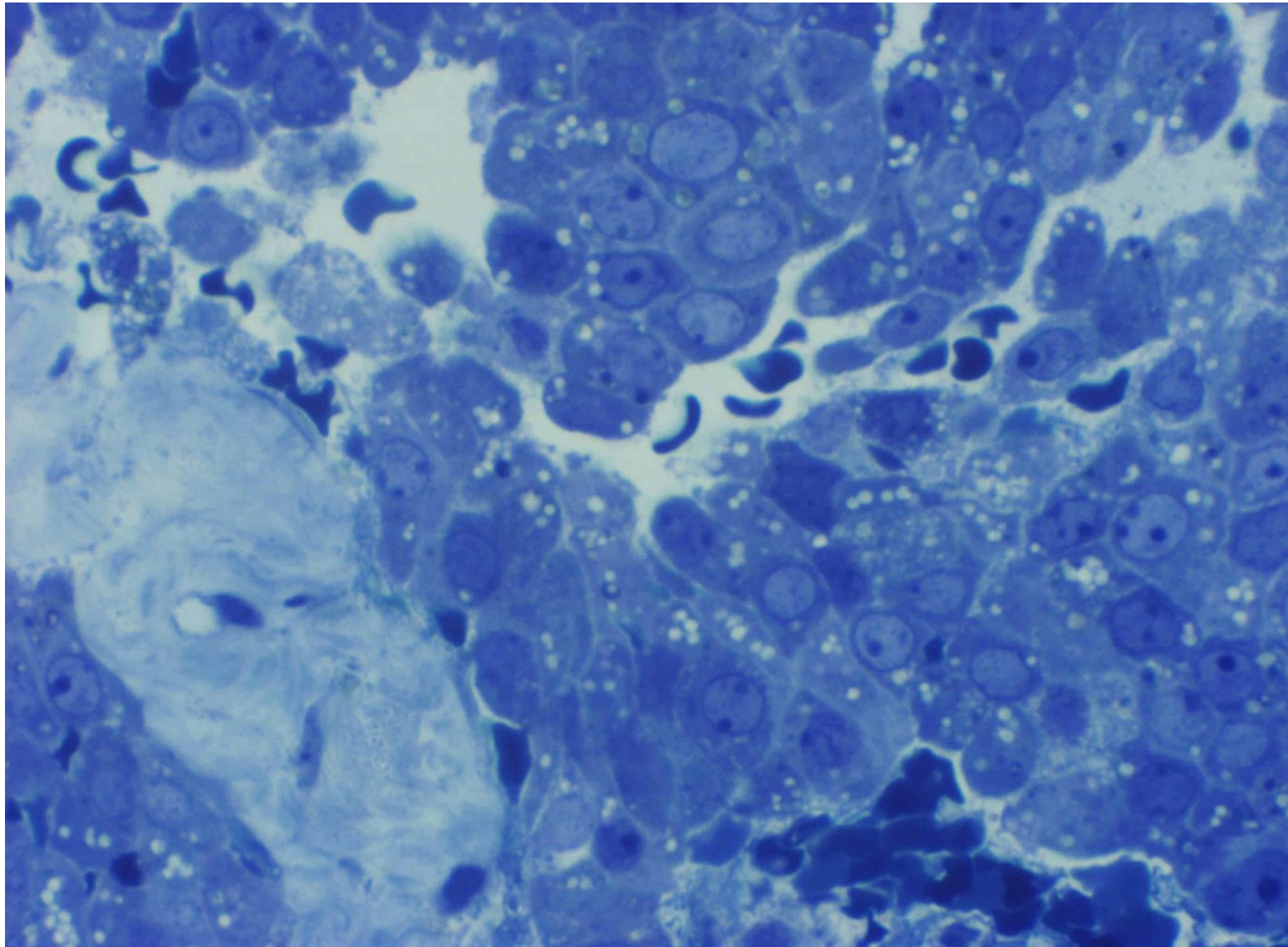
Pancreatoblastoma seen in a 3 y-o girl (H&E-2). Small-sized monomorphous tumor cells show anastomosing trabecular structures. The matrix is myxoid in appearance.



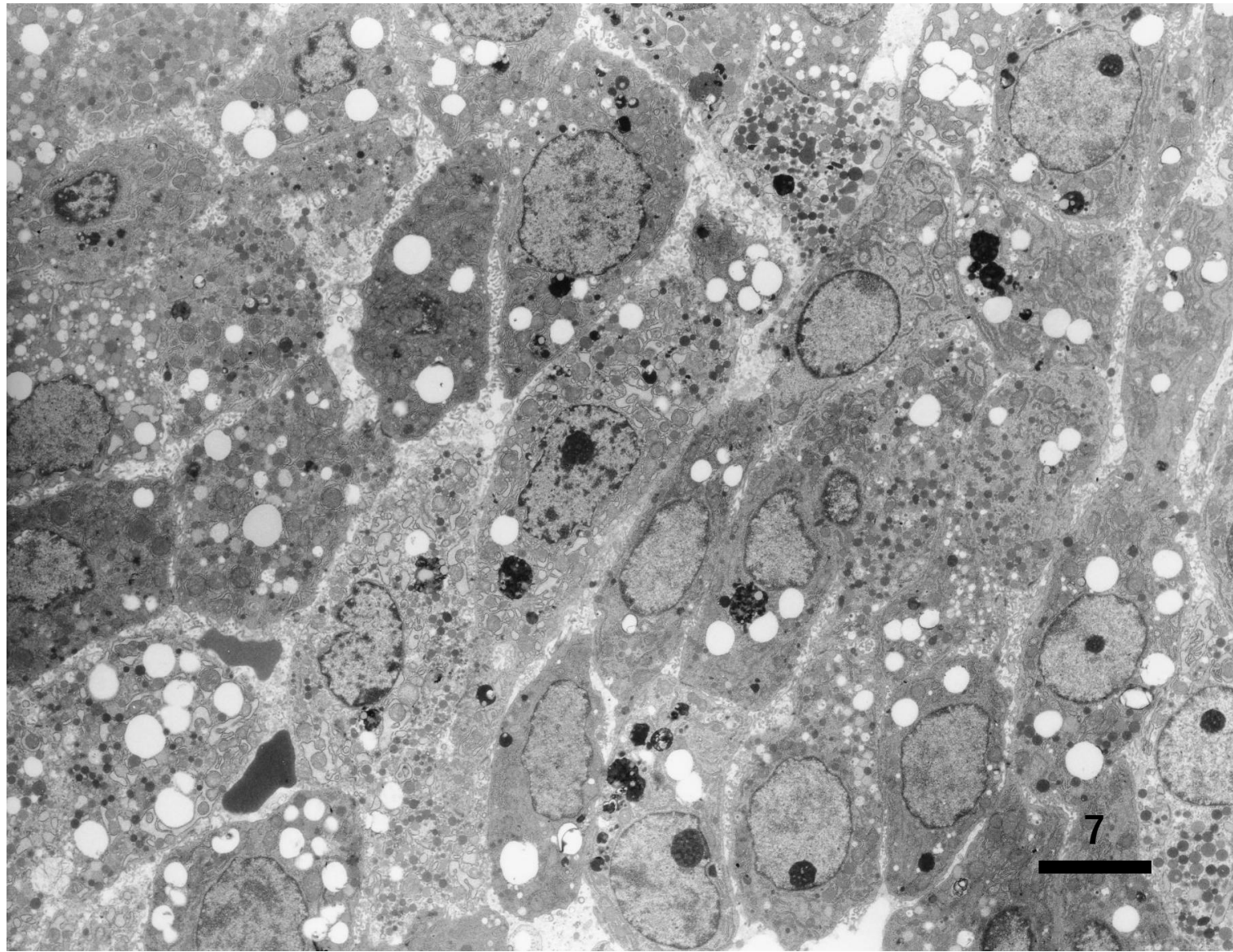
Pancreatoblastoma seen in a 3 y-o girl (H&E-3). Small-sized monomorphous tumor cells show solid growth. The tumor cells possess amphophilic granular cytoplasm. The perivascular stroma is mildly hyalinized.



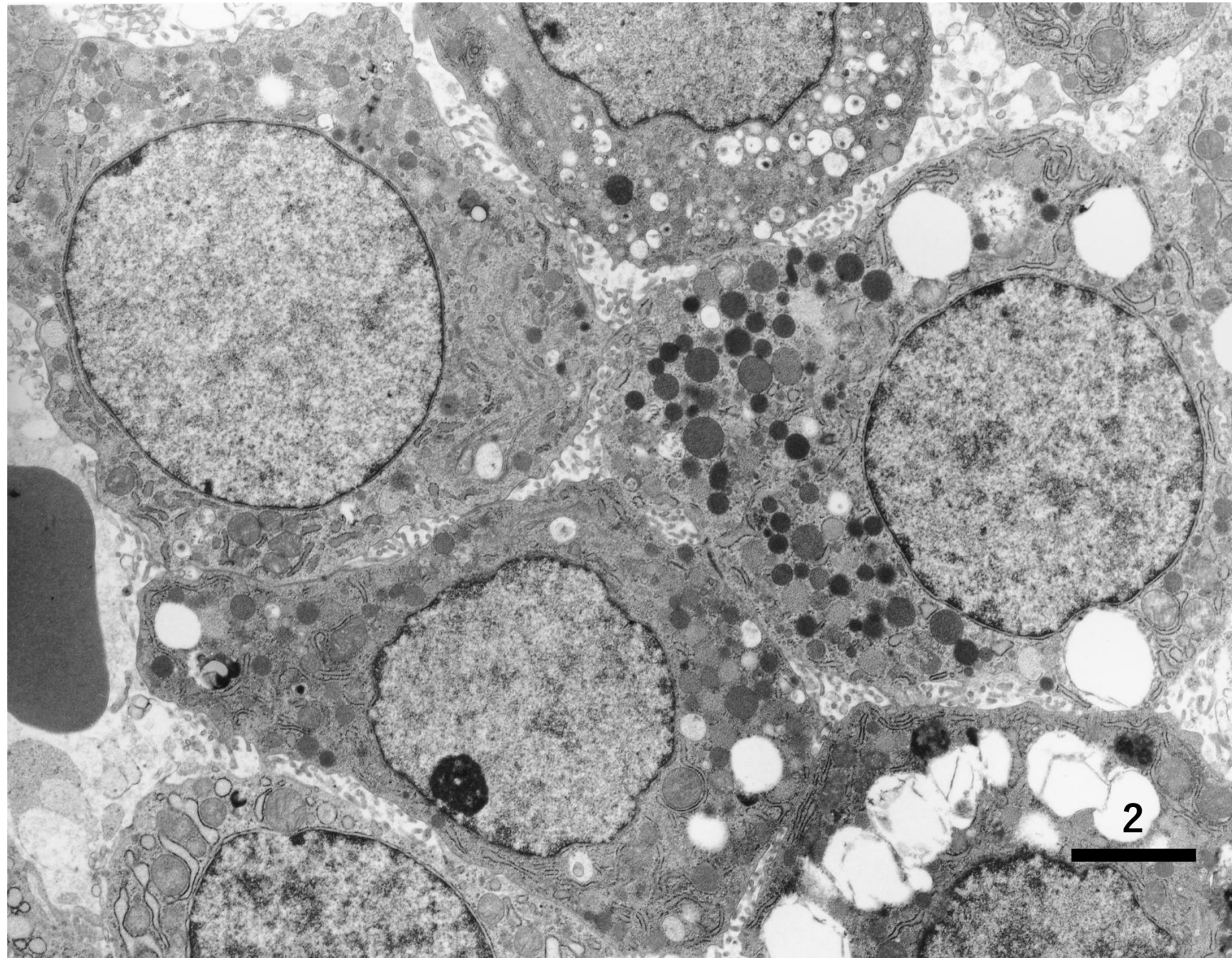
Pancreatoblastoma seen in a 3 y-o girl (H&E-4). Small-sized monomorphous tumor cells show solid growth. The tumor cells possess amphophilic granular cytoplasm. The perivascular stroma is mildly hyalinized.



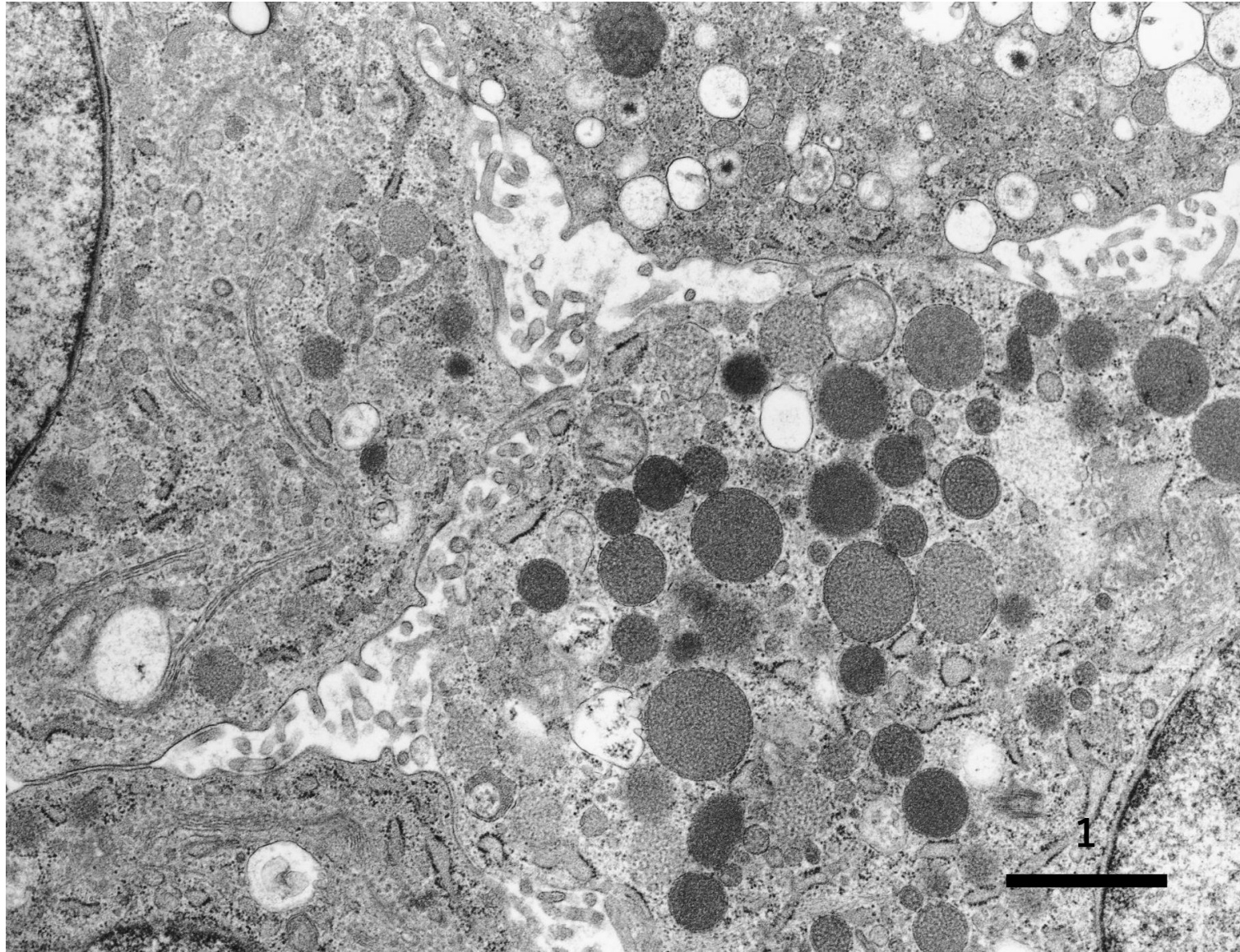
Pancreatoblastoma seen in a 3 y-o girl. Small-sized monomorphous tumor cells show solid growth. The tumor cells possess cytoplasmic fat vacuoles. The perivascular stroma is mildly hyalinized (Toluidine blue staining for EM study).



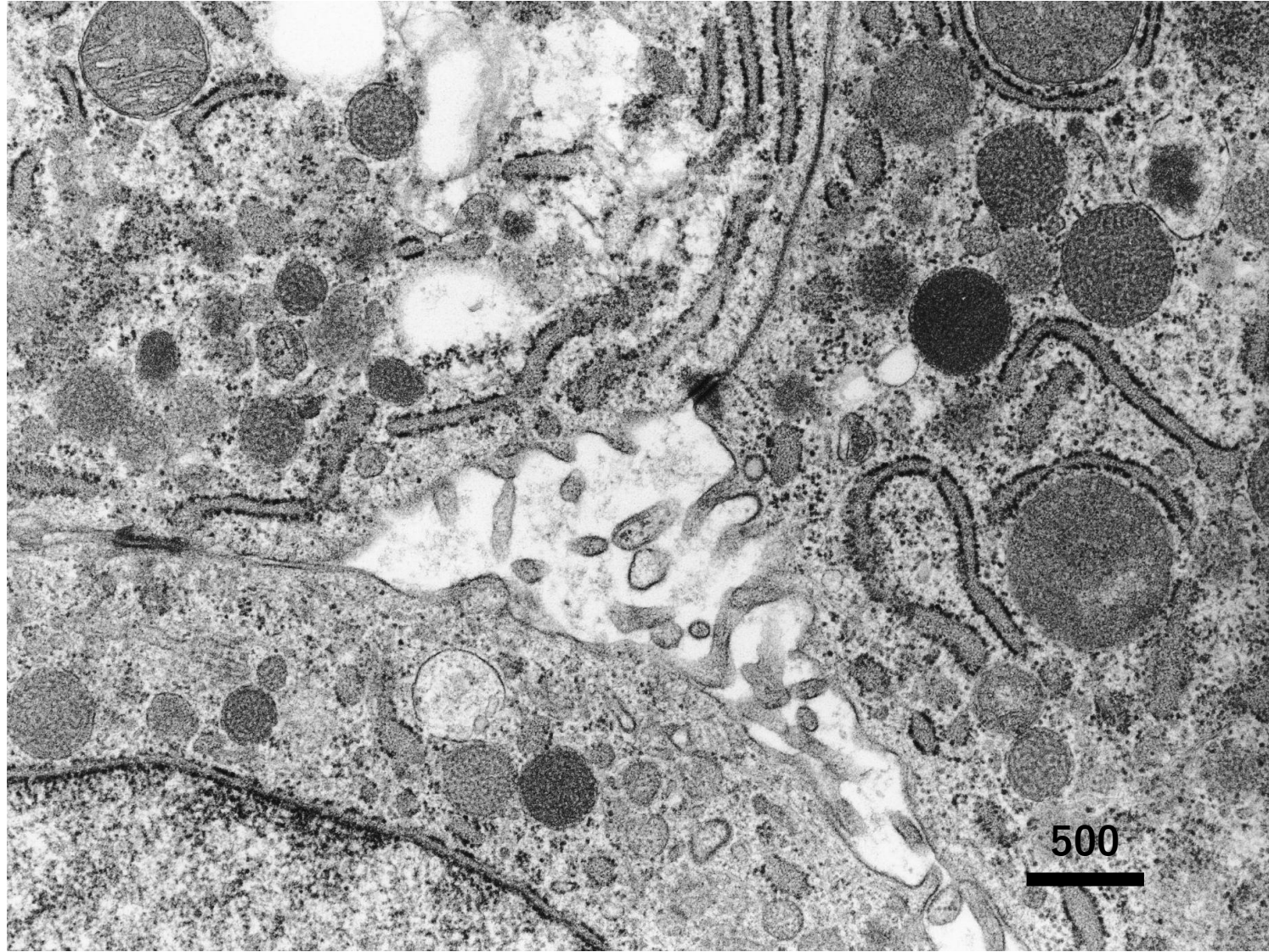
Ultrastructure of pancreatoblastoma seen in a 3 y-o girl. The monomorphous tumor cells possess round nuclei with a nucleolus. Fat vacuoles and electron-dense secretory granules are seen in the cytoplasm (EM-1).



Ultrastructure of pancreatoblastoma seen in a 3 y-o girl. The monomorphous tumor cells possess round nuclei with a nucleolus. Fat vacuoles and electron-dense secretory (exocrine) granules are seen in the cytoplasm (EM-2).



Ultrastructure of pancreatoblastoma seen in a 3 y-o girl. The tumor cells contain exocrine granules, measuring 220-730 nm (mean 400 nm). Microvillous surface is associated (EM-3).



Ultrastructure of pancreatoblastoma seen in a 3 y-o girl. The tumor cells contain exocrine granules, measuring 220-730 nm (mean 400 nm). Rough endoplasmic reticula are observed. Microvillous surface is associated (EM-4).