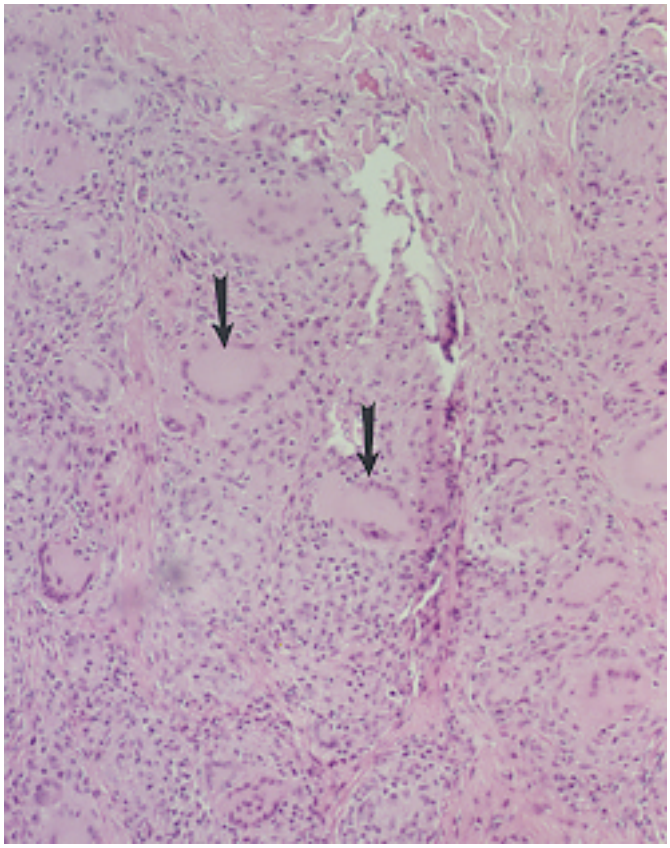
Sarcoidosis

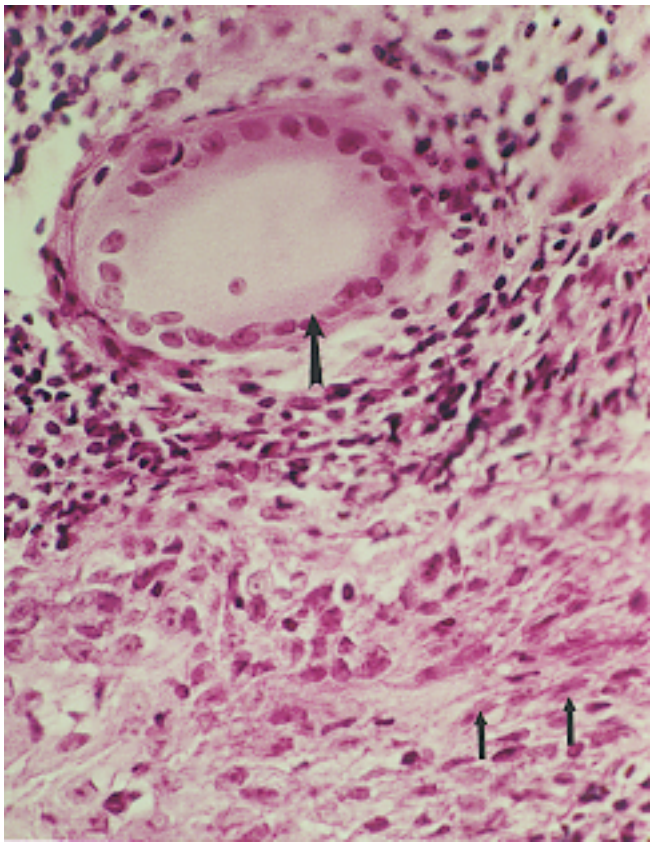
Sarcoidosis is a granulomatous (mononuclear) inflammatory disease, systemic in scope, of undetermined etiology. While lymphoid tissue is particularly involved, any organ in the head and neck area can be affected, especially lungs, skin,eyes,and salivary glands. Blacks are affected, at least in North American, ten times more often than whites.

Histopathology demonstrates granulomas composed of nodules of epithelioid histiocytes that are non-caseating (unlike tuberculosis). A mixed inflammatory reaction commonly surrounds the granulomas. Langhans type giant cells are common. Special intracytoplasmic inclusions—stellate shapes called asteroid bodies—and also Schaumann bodies (laminated basophilic calcifications) are found. A similar picture may appear in other diseases so that eventually the diagnosis may become a matter of excluding an infectious agent.

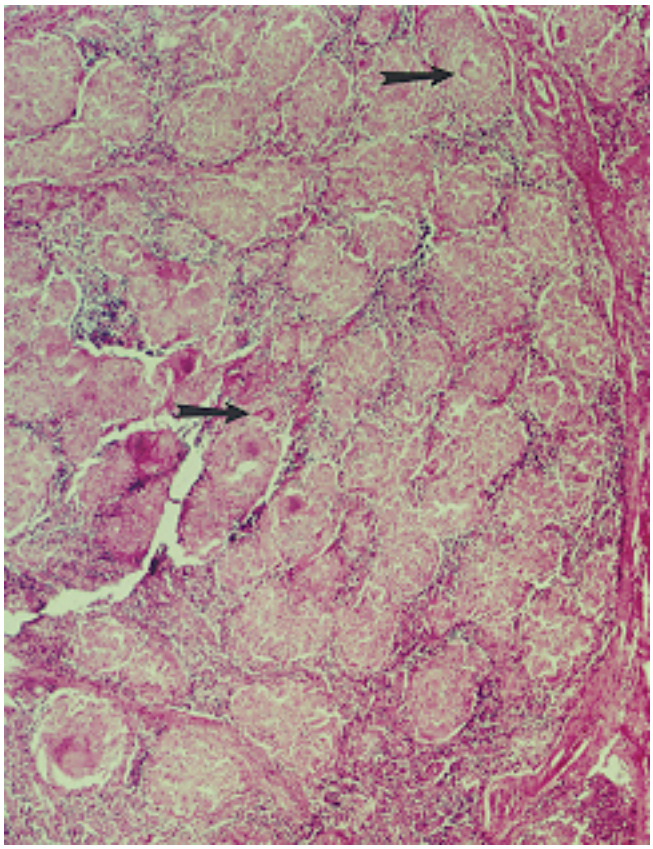
Sarcoidosis. Many Langhans giant cells (arrows) are seen surrounded by epithelioid histiocytes and an inflammatory reaction. Note absence of caseation necrosis as seen in tuberculosis.

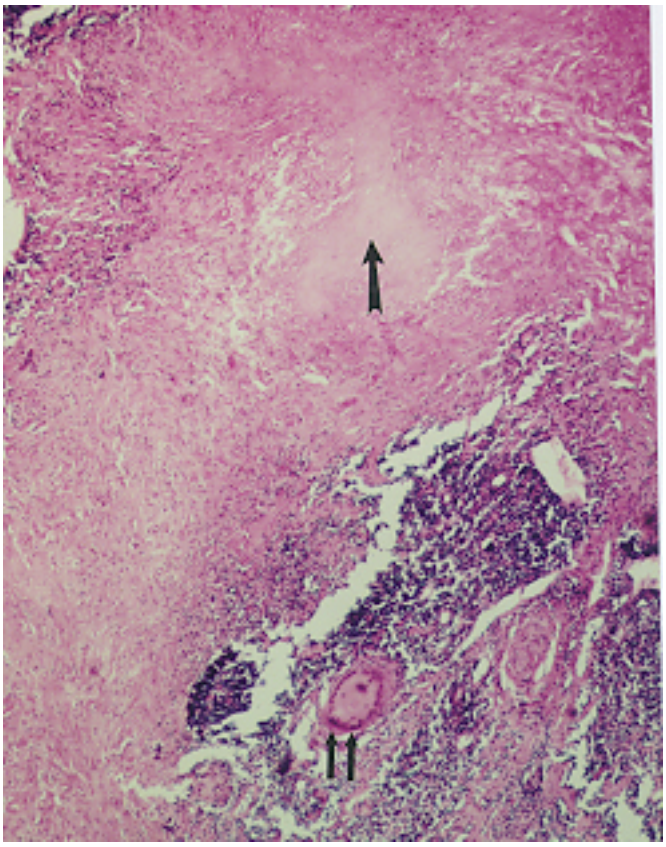


Sarcoidosis, high power, illustrating multi-nucleated Langhans giant cell (large arrow) and epithelioid cells (small arrows) and dark lymphocytes.



Sarcoidosis, lymphnode. Epithelioid follicles, some with a fibrous rim, contain Langhans giant cells (arrows). Caseation is absent.





Tuberculosis, lymphnode, for comparison. Note caseation necrosis (large arrow). Small arrows indicate Langhans giant cell.

Clinical Aspects

Biopsy of minor salivary glands of the lip will document the diagnosis of sarcoidosis in about half of cases, while parotid biopsy is said to be diagnostic ninety percent of the time. Fine-needle aspiration biopsy of the parotid is a sensitive an relatively specific technique used to accomplish this.

Some twenty percent of patients with sarcoidosis are asymptomatic and are diagnosed only incidentally by routine chest radiograph. Of those who are symptomatic, sixty percent have spontaneous resolution. Treatment with corticosteroids is successful in many of the remaining patients while ten to twenty percent may gain no relief from any treatment and five percent may die of the disease.