The Daily Dose: Study Tips for Exam and Board Preparation

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The Daily Dose: physalliferous and xanthoma cells FEEDBACK

Regarding the two cases:

- myofbroma (case 4a)
- solitary fibrous tumor (case 4b)

Comments:

CASE 4A
This was a challenging case since it appeared initially to be a pyogenic granuloma; the comment that I included communicated the presence of numerous reactive fibroblasts and as repeat specimens came over the course of about a year, I performed IHC with consideration for reactive myofibroblastic proliferations, nodular fasciitis, inflammatory myofibroblastic tumor (IMT), myofibroma (the ultimate diagnosis I made after consultation with colleagues) and even consideration for some low grade sarcomas The IHC panel suggested in the respondent comments (desmin, SMA, CD34, ALK-1, bcl2, CD99, TLE as a surrogate for the molecular change and translocation associated with synovial sarcoma, and B-catenin to exclude fibromatosis) accounts for the differential diagnosis provided in the response (IMT, leiomyoma, myofibroma, solitary fibrous tumor, synovial sarcoma and fibromatosis)

CASE 4B
Solitary fibrous tumor (SFT) is indeed a challenging lesion, particularly for the following reasons:

- it may mimic a spectrum of benign to malignant
- it may mimic many other spindle cell lesions
- the nomenclature, i.e. SFT versus hemangiopericytoma (and other pericytic tumors) has changed, especially in the sinonasal complex

The IHC panel suggested in the respondent comments (CD34, bcl2, STAT6, CD99) is reasonable for the differential diagnosis provided in the response (solitary fibrous tumor, hemangiopericytoma, synovial sarcoma).

Additional comments:

When challenged by a decision as to whether a lesion, especially a spindle cell lesion, is benign or malignant (or of intermediate behavior), it's reasonable (I think) to communicate that; my preference is toward this type of diagnostic line:

SPINDLE CELL PROLIFERATION, FAVOR <diagnosis>
or
SPINDLE CELL PROLIFERATION, FAVOR BENIGN or MALIGNANT or UNCERTAIN BEHAVIOR/MALIGNANT POTENTIAL

There are a few additional tests that may be considered in these circumstances:

- proliferation index (such as Ki-67) and follow guidelines for mitotic count (usually per 10 high power fields)
- molecular tests for translocations (such as identified in synovial sarcoma, alveolar soft part sarcoma, etc.)

For a thorough review in the easiest manor, either Enziger and Weiss' Soft Tissue Tumors or the AFIP Fascicle 20(Soft Tissue Tumors should provide the most ready reference.

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