

Silicone granulomatosis

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TO THE EDITOR:

I read with great interest the important article describing silicone breast illness as a classic example of autoimmune/inflammatory syndrome induced by adjuvant (ASIA) [1]. I would like to add from our experience another side effect of breast implant: silicone granulomatous lymphadenopathy [2].

Silicone lymphadenopathy is a rare

complication of breast implants and is often confused with metastases from breast carcinoma. Silicone breast implants have been associated with connective tissue inflammatory syndromes. Silicone is not inert, and silicone from breast implants bleeds through the surrounding envelope and is present in the surrounding capsule or may migrate to other distant locations. We presented a patient who was admitted to the hospital for investigation of prolonged fever and was eventually diagnosed with silicone granulomatous lymphadenopathy that responded to treatment with doxycycline. Granulomatous giant cell lymphadenopathy is a rare phenomenon and usually is not accompanied by systemic

inflammatory reactions. Treatment with tetracyclines may offer a medical alternative to the more common surgical management of this rare event.

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References

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2. Blum A, Abboud W, Shajrawi I, Tattour I. Prolonged fever due to silicone granulomatosis. *IMAJ* 2007; 9 (2): 121-2.

Capsule

The inner workings of tumors

One of the challenges in studying human disease is that the same condition can manifest differently across patients. However, patient variation can also be a positive thing, revealing information about the composition of diseased tissues and the relationship to disease outcome. **Bill** and colleagues used patient-to-patient variations to study how tumor microenvironments influence the progression of head and neck squamous cell carcinoma. The authors found that variations in macrophage polarity, defined by

the expression of two genes, *CXCL9* and *SPP1*, was a simple but critical feature of tumor microenvironments. The *CXCL9:SPP1* ratio could characterize the abundance of antitumor immune cells in cancer, gene expression programs in each tumor-infiltrating cell type, the regulation of communication networks that dictate tumor control or progression, and the response to immunotherapy.

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Eitan Israeli

Capsule

Clinical effects of Lewy body pathology in cognitively impaired individuals

There is poor knowledge about the clinical effects of Lewy body (LB) pathology in patients with cognitive impairment, especially when coexisting with Alzheimer's disease (AD) pathology (amyloid- β and tau). Using a seed amplification assay, **Quadalti** et al. analyzed cerebrospinal fluid for misfolded LB-associated α -synuclein in 883 memory clinic patients with mild cognitive impairment or dementia from the BioFINDER study. Twenty-three percent had LB pathology, of which only 21% fulfilled clinical criteria of Parkinson's disease or dementia with Lewy bodies at baseline. Among these LB-positive patients, 48% had AD pathology; 54% had AD pathology in the whole sample (17% of mild cognitive impairment and 24% of patients with dementia were also LB-positive). When examining

independent cross-sectional effects, LB pathology but not amyloid- β or tau, was associated with hallucinations and worse attention/executive, visuospatial, and motor function. LB pathology was also associated with faster longitudinal decline in all examined cognitive functions, independent of amyloid- β , tau, cognitive stage, and a baseline diagnosis of dementia with Lewy bodies/Parkinson's disease. LB status provides a better precision-medicine approach to predict clinical trajectories independent of AD biomarkers and a clinical diagnosis, which could have implications for the clinical management of cognitive impairment and the design of AD and LB drug trials.

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