



# Images In Medicine

## Granular Cell Tumor of Ileocecal Valve

Robert Bagdasaryan, MD, and Ramakrishna Nayak, MD

A 51 year-old man underwent colonoscopy, and a 0.7 cm sessile polyp was snared from the ileocecal valve. On microscopic examination, a submucosal unencapsulated tumor composed of plump, rounded and polygonal cells with variable nuclear size and abundant granular eosinophilic cytoplasm was found.

Immunohistochemical analysis revealed that the tumor expressed S-100 (nerve sheath tumor marker) protein as well as CD68 (marker of macrophages). All other markers, such as CD117 and CD34 (GIST) (Gastrointestinal Stromal Tumor) markers, cytokeratins (epithelial cell markers), and markers for muscle differentiation, were negative. All these findings were supportive of granular cell tumor.

Granular cell tumors (GCTs) usually arise in the tongue or dermis but can occur in virtually any anatomic site. Within the gastrointestinal tract, GCTs are most common in the esophagus. The colon is the second most common gastrointestinal site for a primary, followed in descending order by the perianal region, stomach, appendix, and small bowel. Colonic GCTs have a predilection for the right colon and rectum, and are in most cases an incidental finding. Endoscopically, they typically appear as smooth, sessile submucosal polyps, ranging in size from a few millimeters to 2 to 3 cm; they are usually covered by an intact colonic mucosa. Endoscopic polypectomy is the treatment of choice. Only 1% to 2% of granular cell tumors in extraintestinal sites behave in a malignant fashion. In the largest published series of gastrointestinal granular cell tumors, none of 75 tumors recurred or metastasized.<sup>1</sup>

### REFERENCES

1. Johnston J, Helwig EB. Granular cell tumors of gastrointestinal tract and perianal region. *Dig Dis Sci* 1981;26:807-16.
2. Enzinger FM, Weiss SW. *Soft tissue tumors, 3<sup>rd</sup> ed.* St. Louis, Mosby, 1995: 821-88.

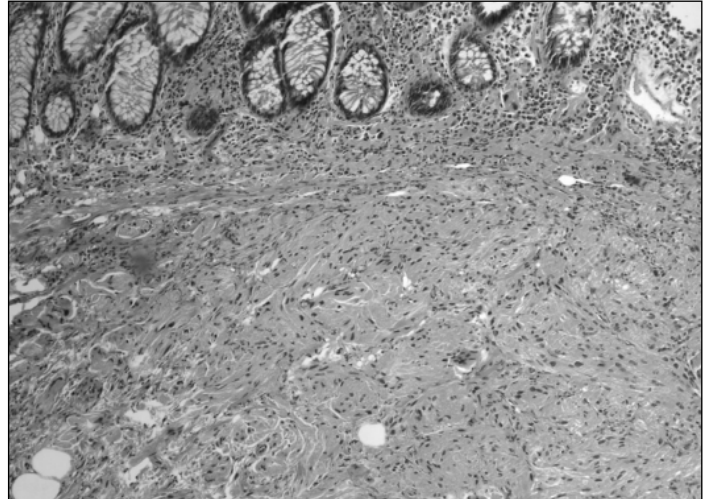
Robert Bagdasaryan, MD, and Ramakrishna Nayak, MD, are attending pathologists at the Kent County Memorial Hospital.

### Disclosure of Financial Interests

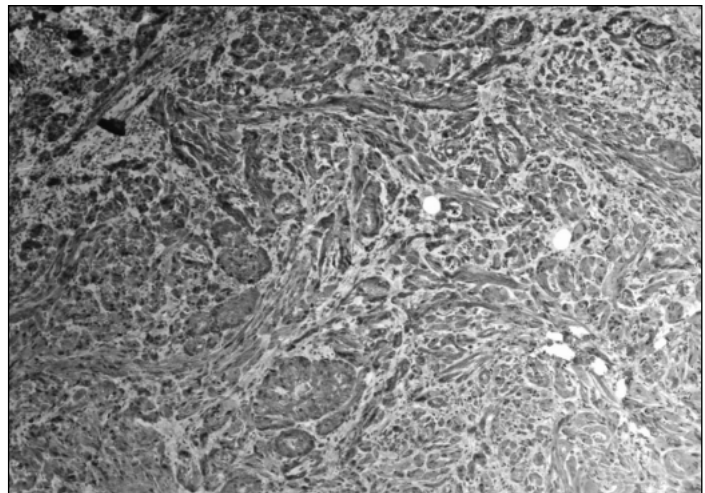
Robert Bagdasaryan and Ramakrishna Nayak have no financial interests to disclose.

### CORRESPONDENCE

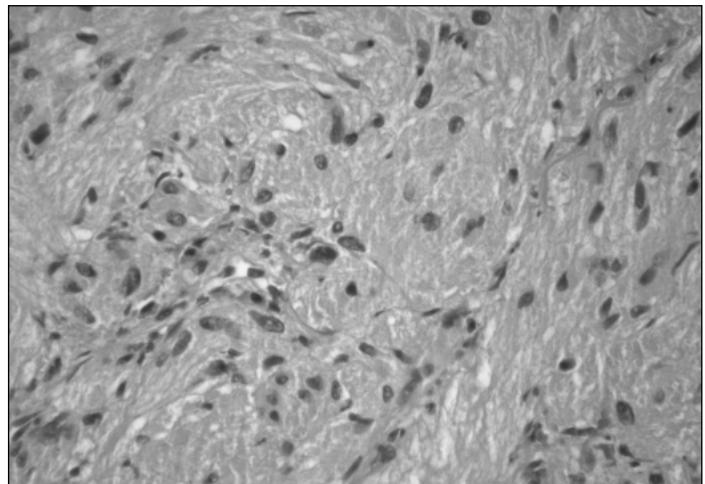
Robert Bagdasaryan, MD  
E-mail: robbagdasaryan@yahoo.com



Granular cell tumor in the submucosa



Granular cell tumor. S-100 protein expression



Granular cell tumor. High power view.