

Background

- Small bowel angioectasias (SBA) are characterized by regions of local accumulation of dilated blood vessels in the intestinal wall.
- While angioectasias can occur anywhere in the gastrointestinal tract, a significant source for obscure GI bleed is within the small bowel.
- However, the mechanism behind SBA development is not fully understood, although studies have shown that SBAs may be associated with conditions such as aortic valve stenosis, liver cirrhosis, and renal failure.

Objective

- The purpose of this study is to identify comorbid medical conditions that may be associated with SBA.

Methods

- Patients admitted to Thomas Jefferson University Hospital and Methodist Hospital with small bowel angioectasia between 2018-2022 were identified using ICD-10 coding.
- Each patient's diagnosis was confirmed via endoscopy or capsule reports.
- Patients with only gastric and/or colonic angioectasias were excluded.
- Patient demographics and comorbidities were evaluated.

Results

Comorbidity	# Of Patients	% Of total
Hypertension	331	74
Hyperlipidemia	213	48
Diabetes Mellitus	137	31
COPD	127	28
CAD	123	28
Anemia	122	27
Atrial fibrillation	115	26
Heart Failure	111	25
Chronic Kidney Disease	111	25
Cancer	103	23
GERD	99	22
OSA	71	16
Aortic Stenosis	53	12
Cirrhosis	50	11
Hypothyroidism	47	11
Stroke	45	10
ESRD	45	10
Asthma	26	6
Mitral Regurgitation	23	5
Pulmonary Hypertension	23	5

Table 1: Table 1 presents the 20 most common comorbidities found in patients with small bowel angioectasia. The number of patients with each disease is listed, along with the percentage of total patients who have the condition. The total number of patients observed was 447.

	# Of Patients	% Of total
Gender		
Male	210	47
Female	237	53
Age		
<50 years	14	3
51-60 years	46	10
61-70 years	142	32
71-80 years	149	33
81-90 years	89	20
>90 years	7	2
Race		
White	261	58
Black	151	34
Hispanic	12	3
Asian	9	2
Other/unknown	14	3

Table 2: Demographics of patients included in the study.

Conclusion

- Key comorbidities in SBA were chronicity and cardiopulmonary effects. Kidney disease and malignancy were also common.
- Heyde syndrome (aortic stenosis with angioectasias) is a known cause of GI bleed. Yet aortic stenosis was only seen in 12% of patients in this study.
- The results demonstrate that a variety of chronic diseases may be associated with angioectasia. Further research is needed to understand the risk for GI bleeding in the presence of chronic disease.