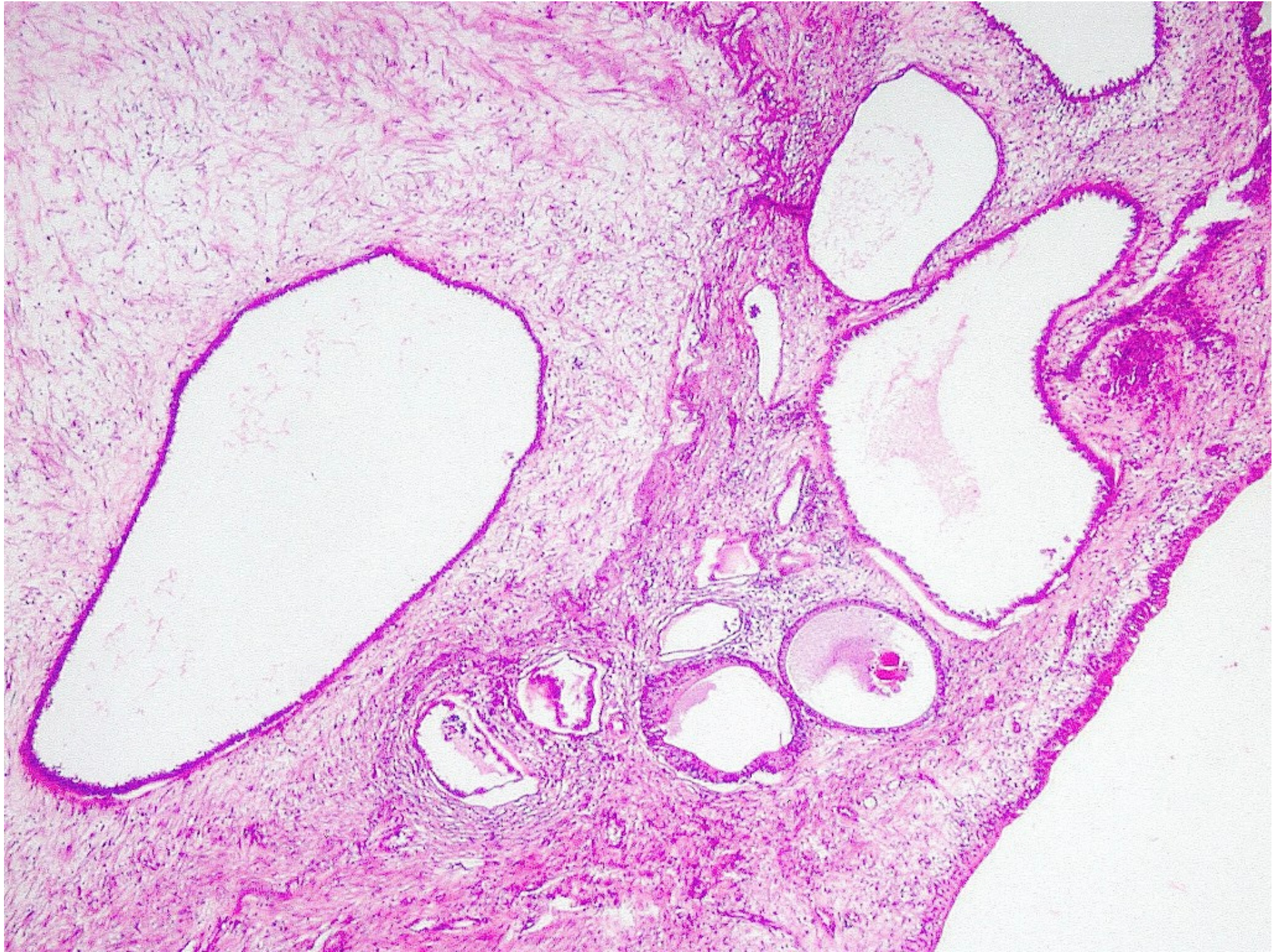


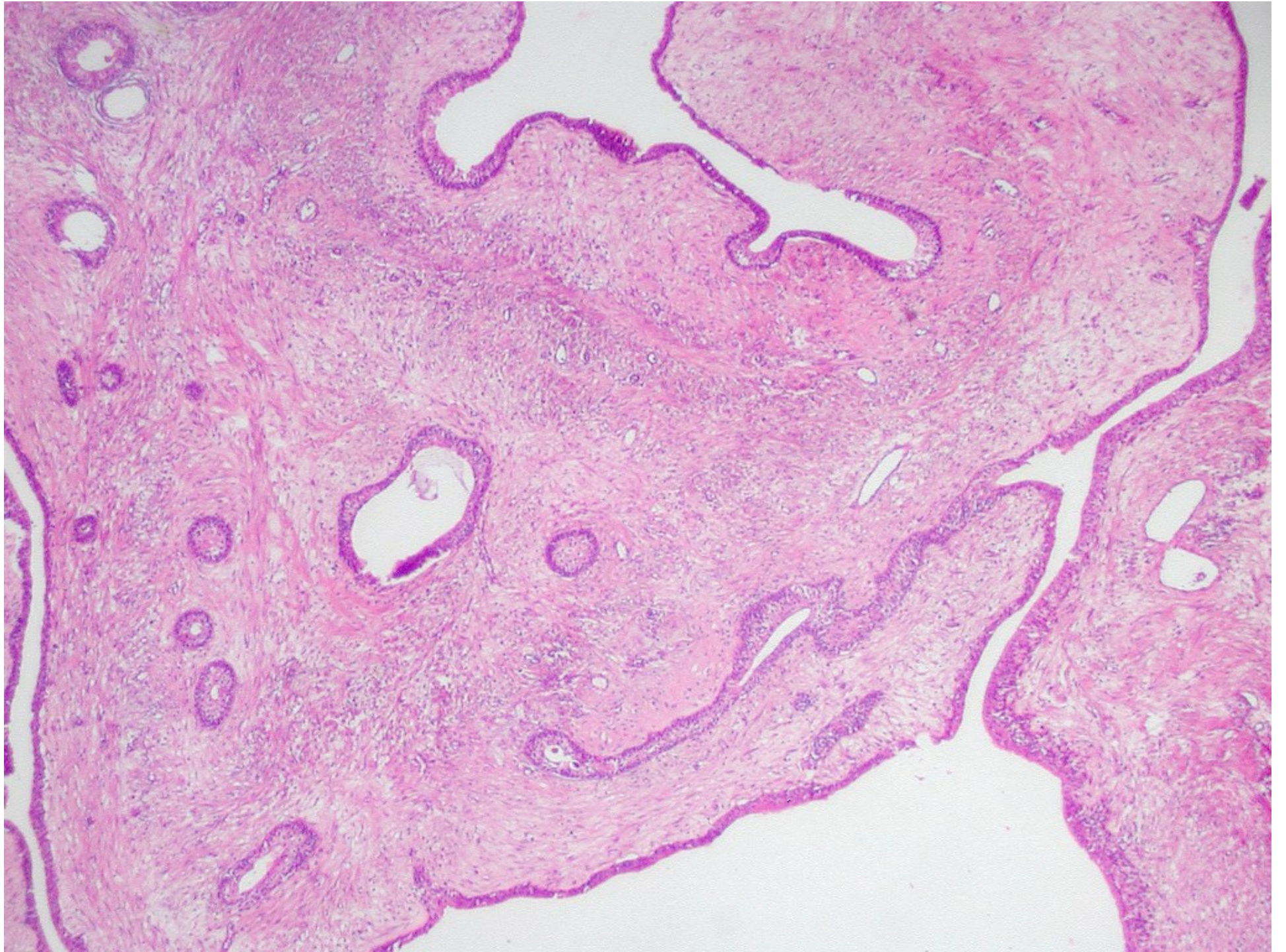
# CASO DO MÊS

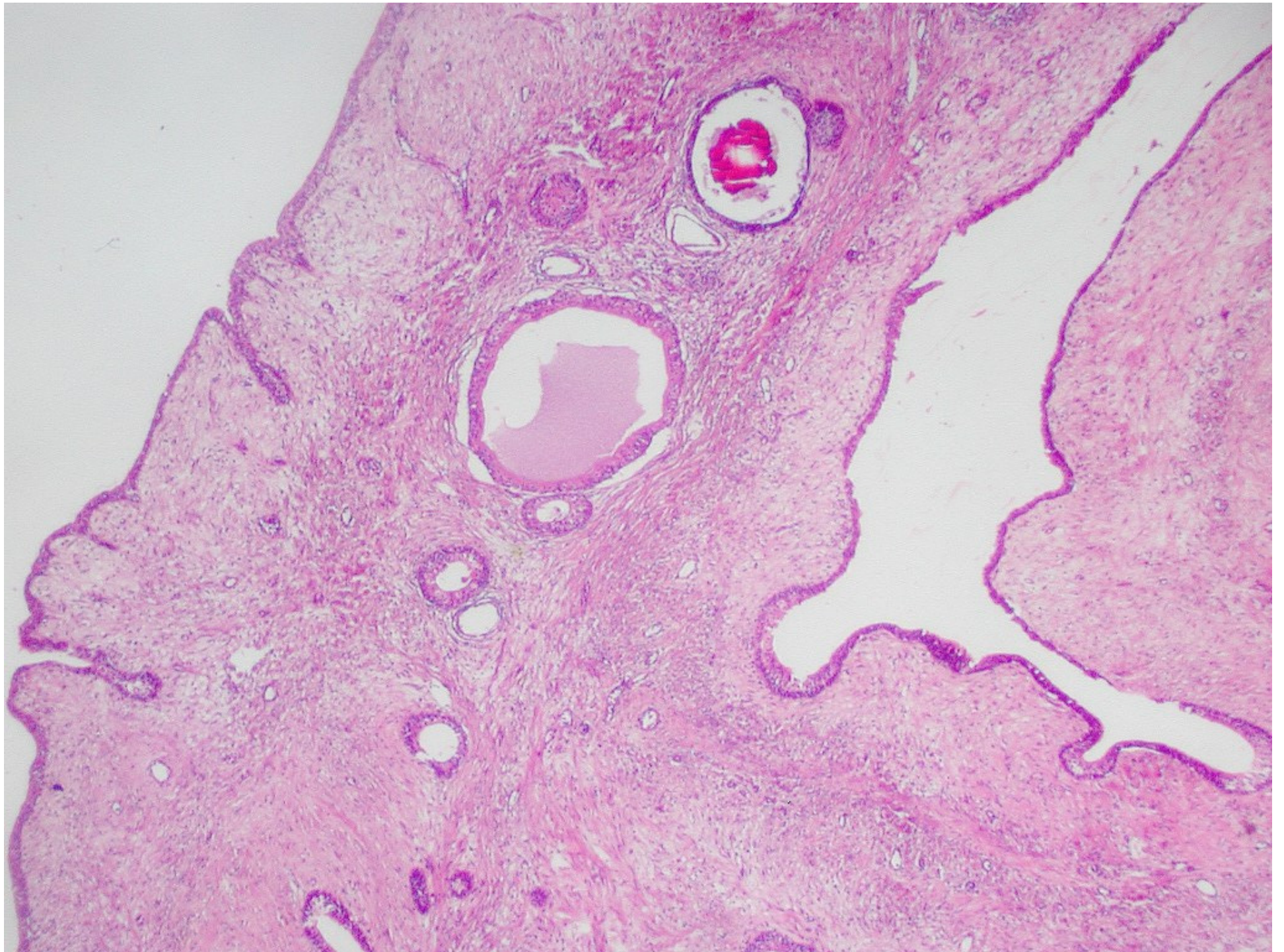
Emílio Marcelo Pereira

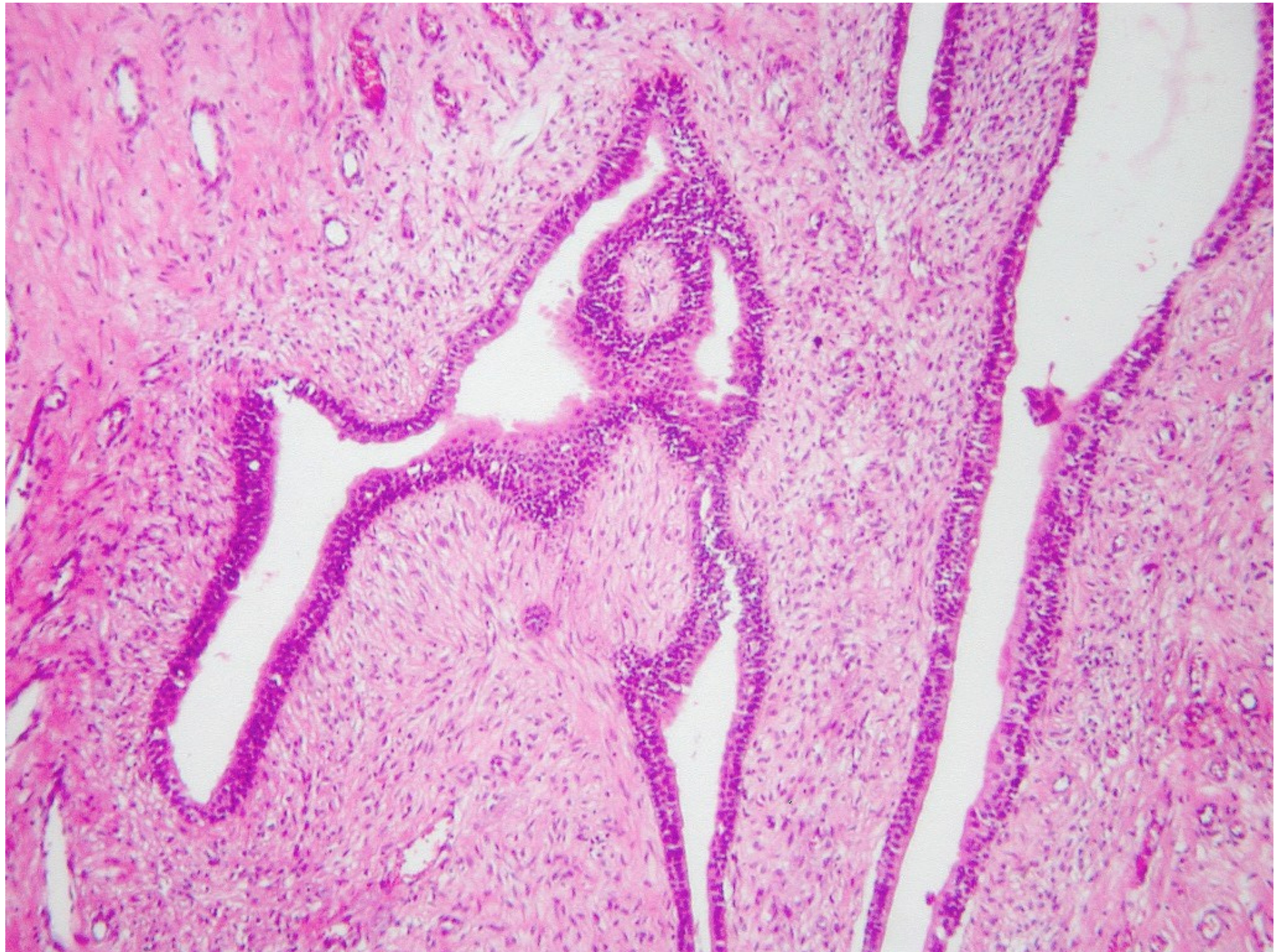
# Dados Clínicos

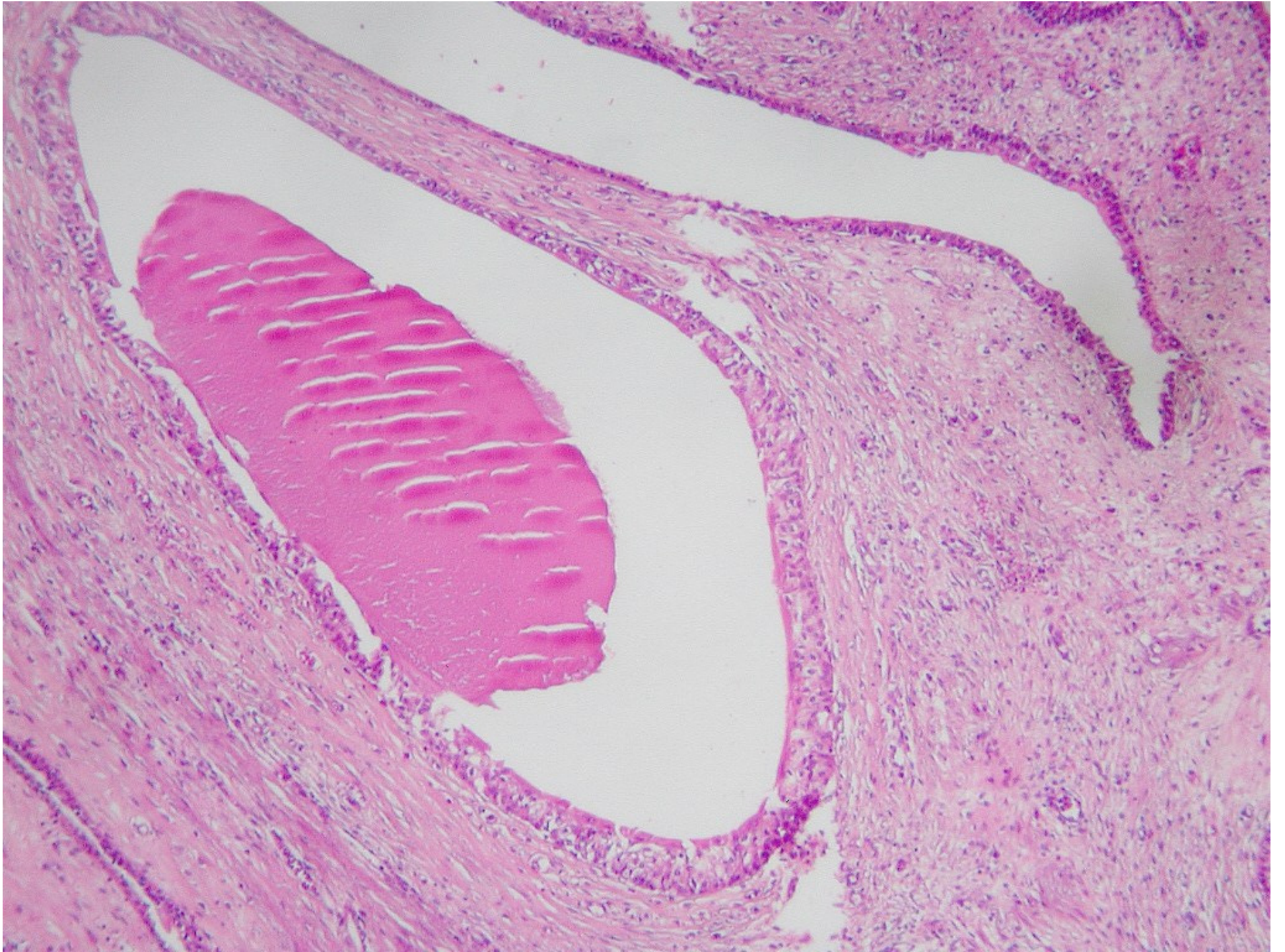
- **Paciente do sexo feminino,**
- **45 anos, tumor do rim direito, medindo 3,5 x 2,5 cm, localizado na região central do rim com extensão para a pelve renal.**

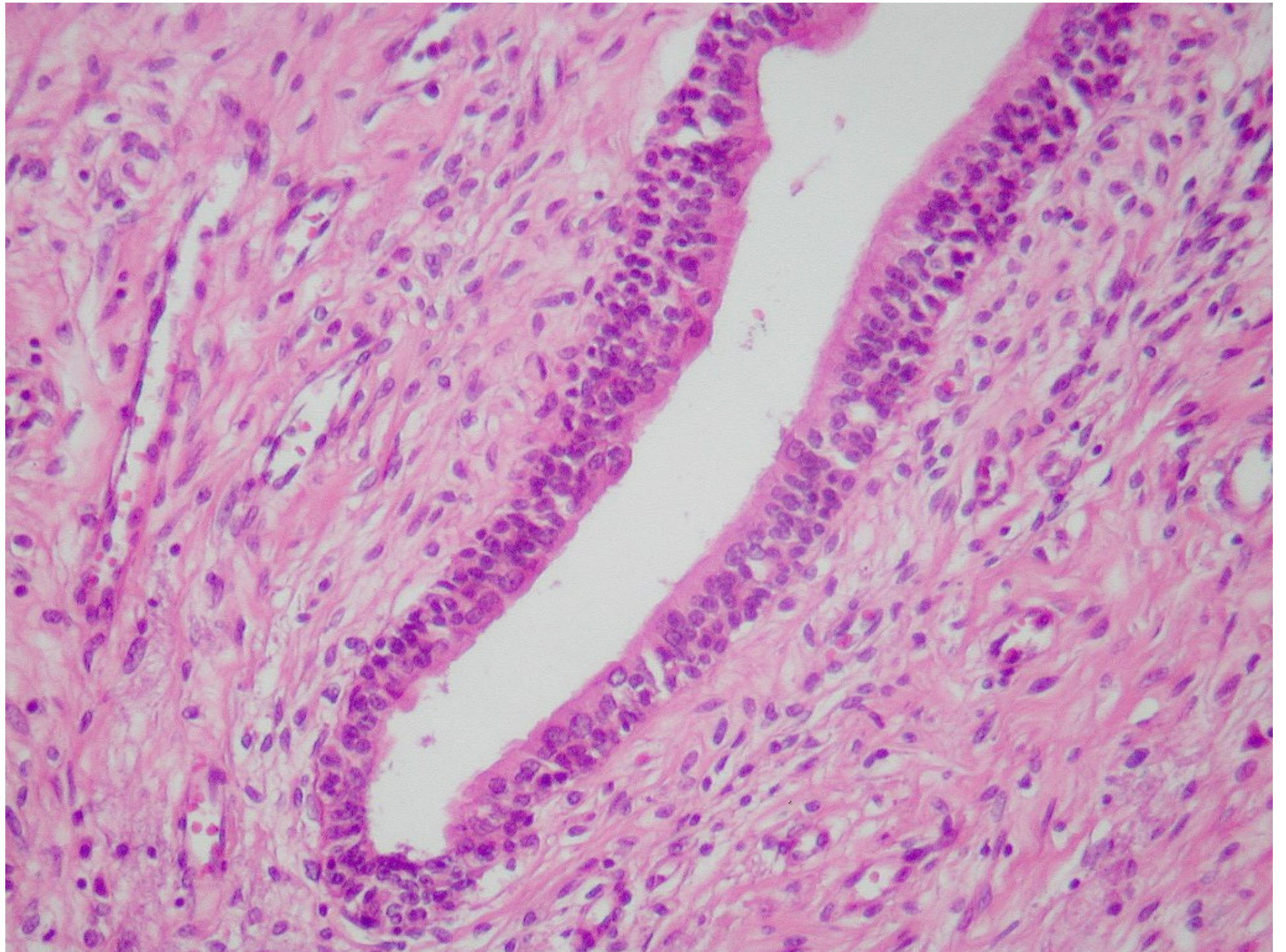




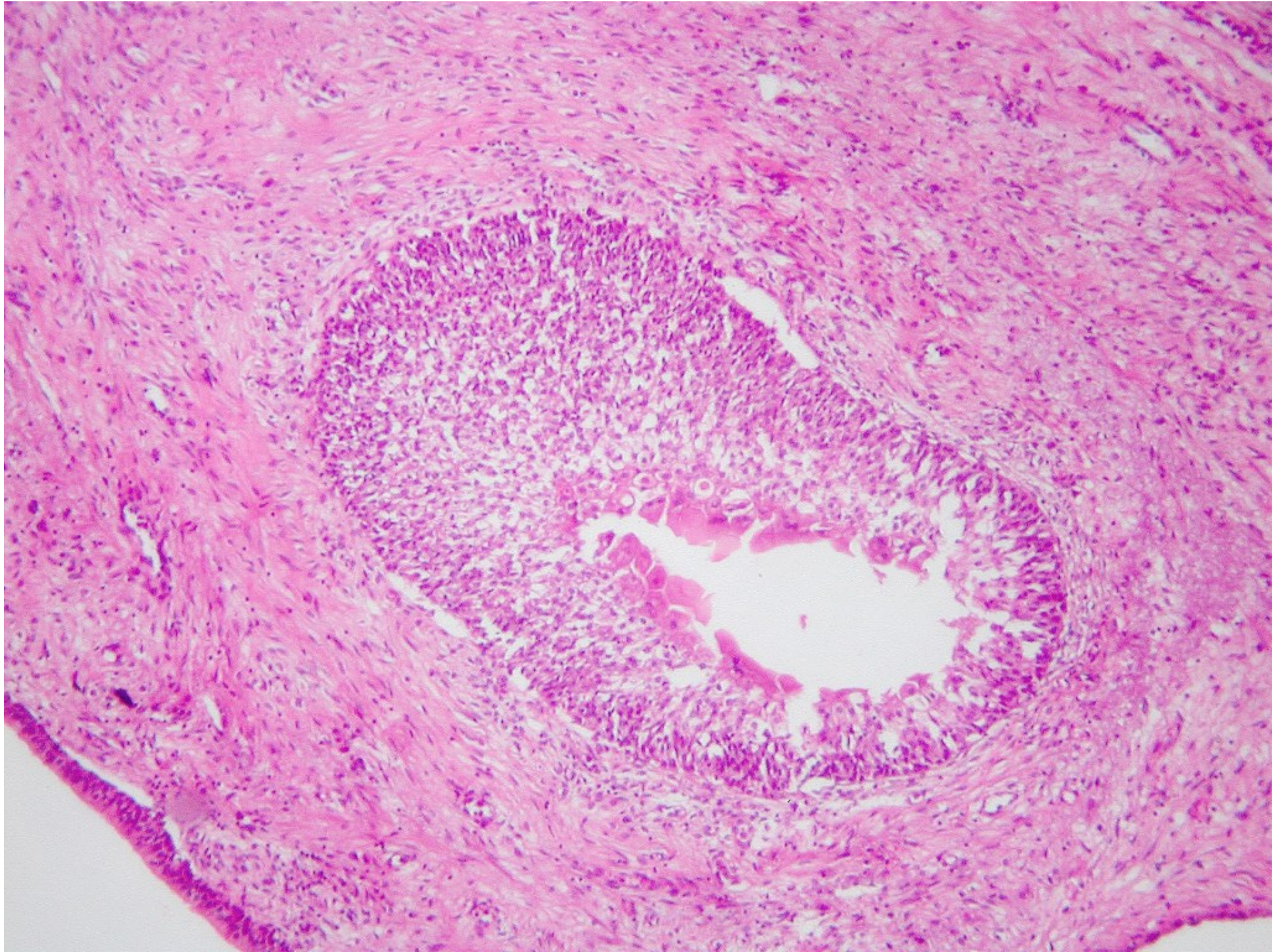


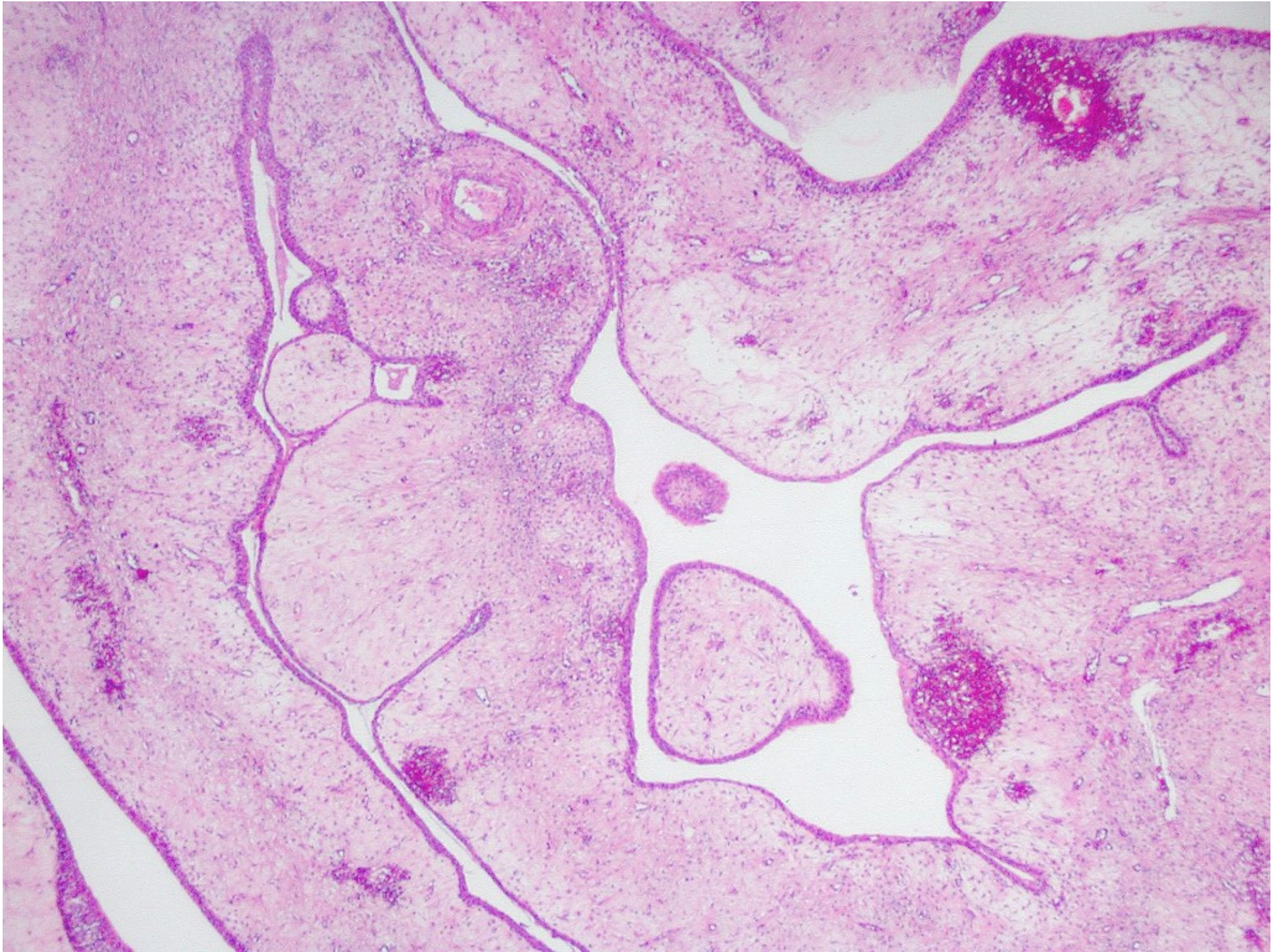


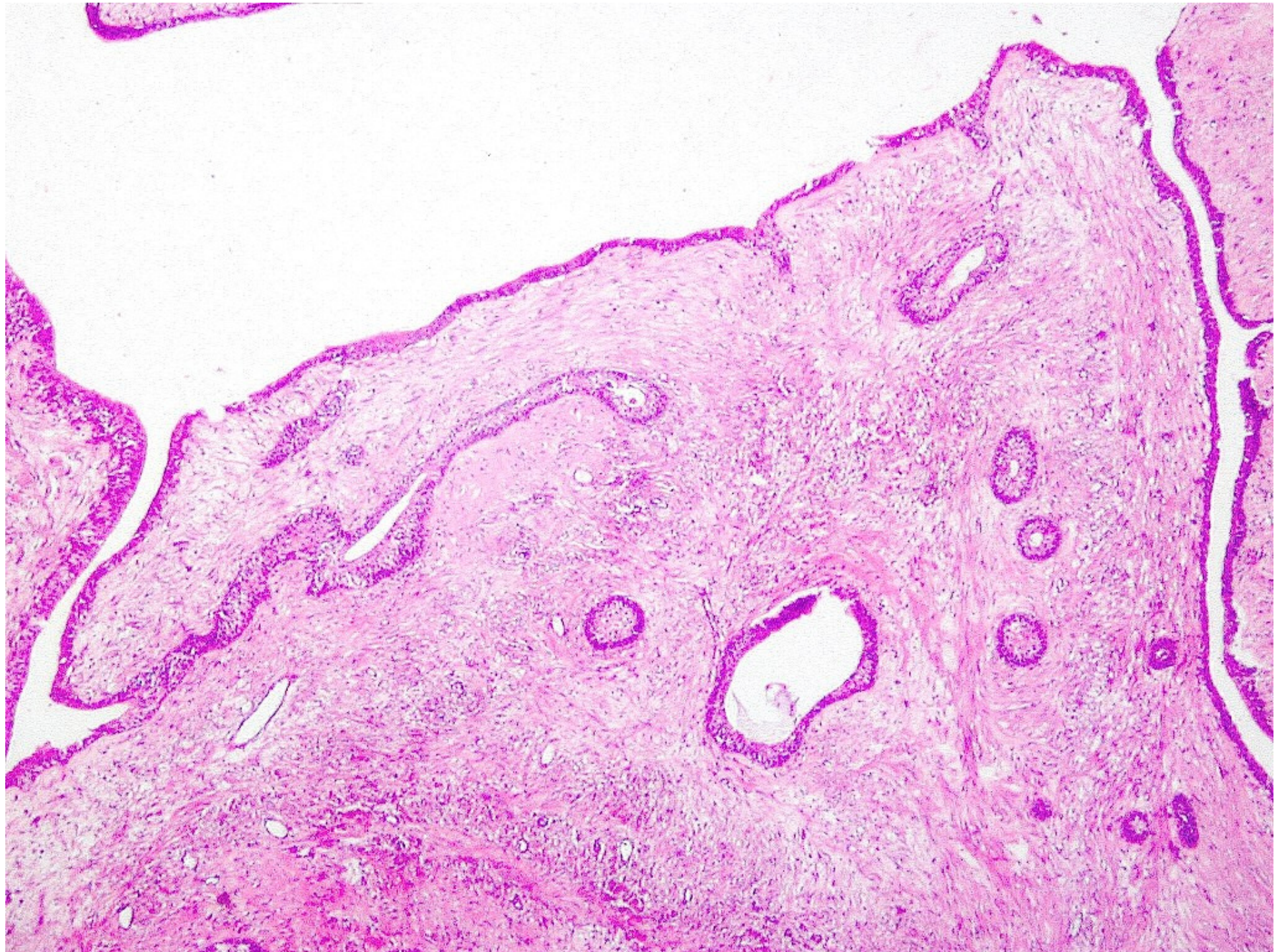


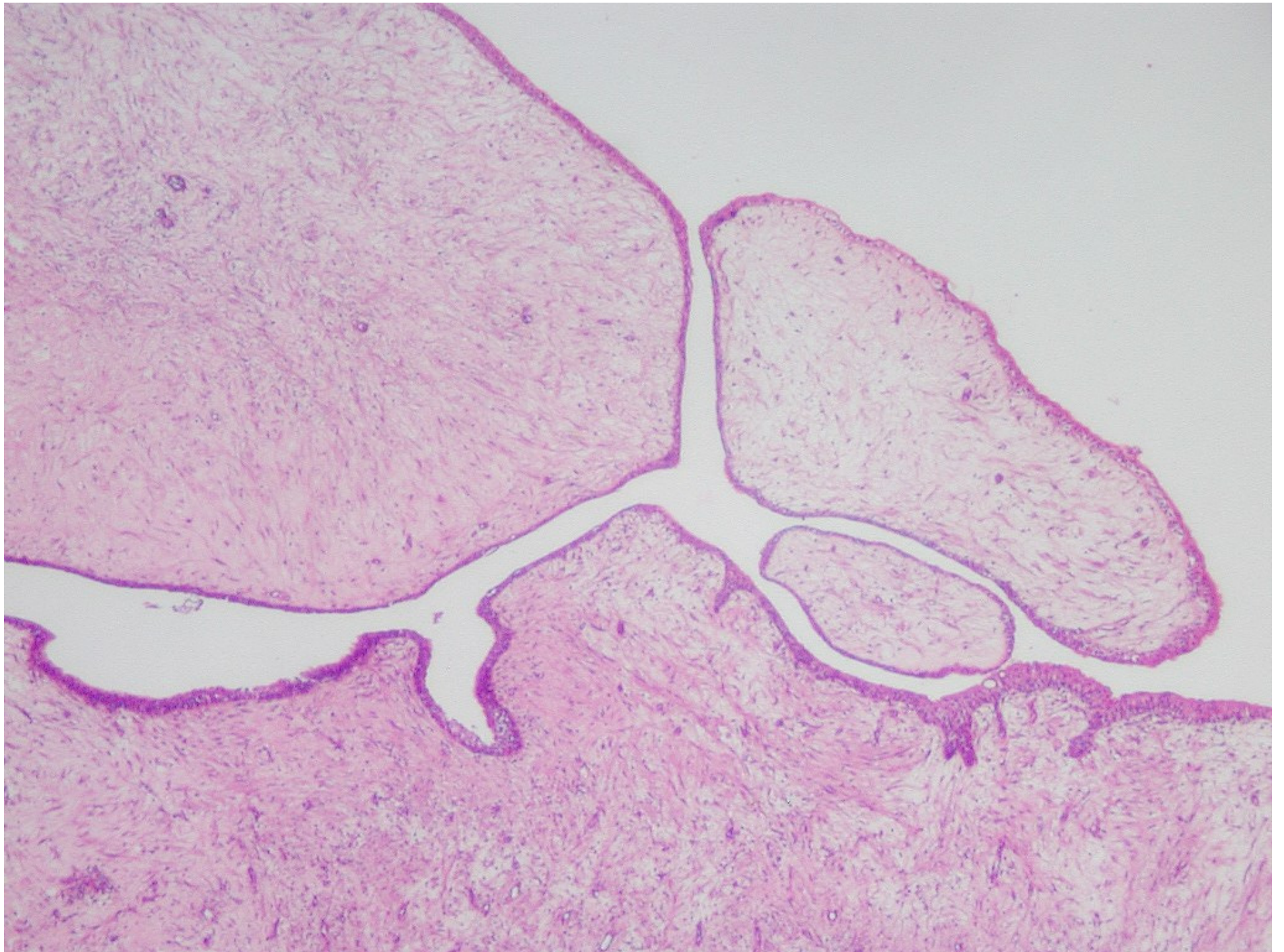


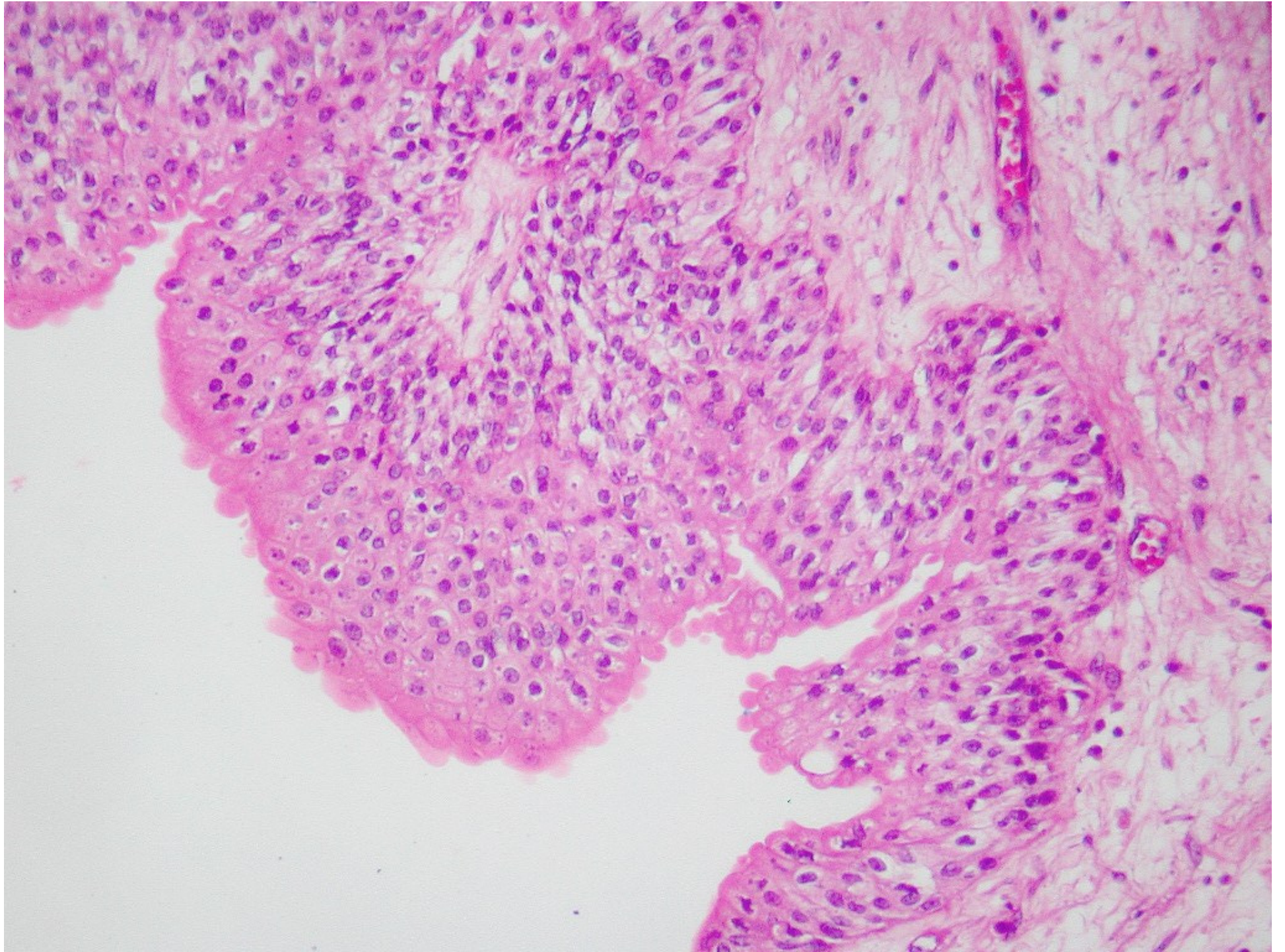


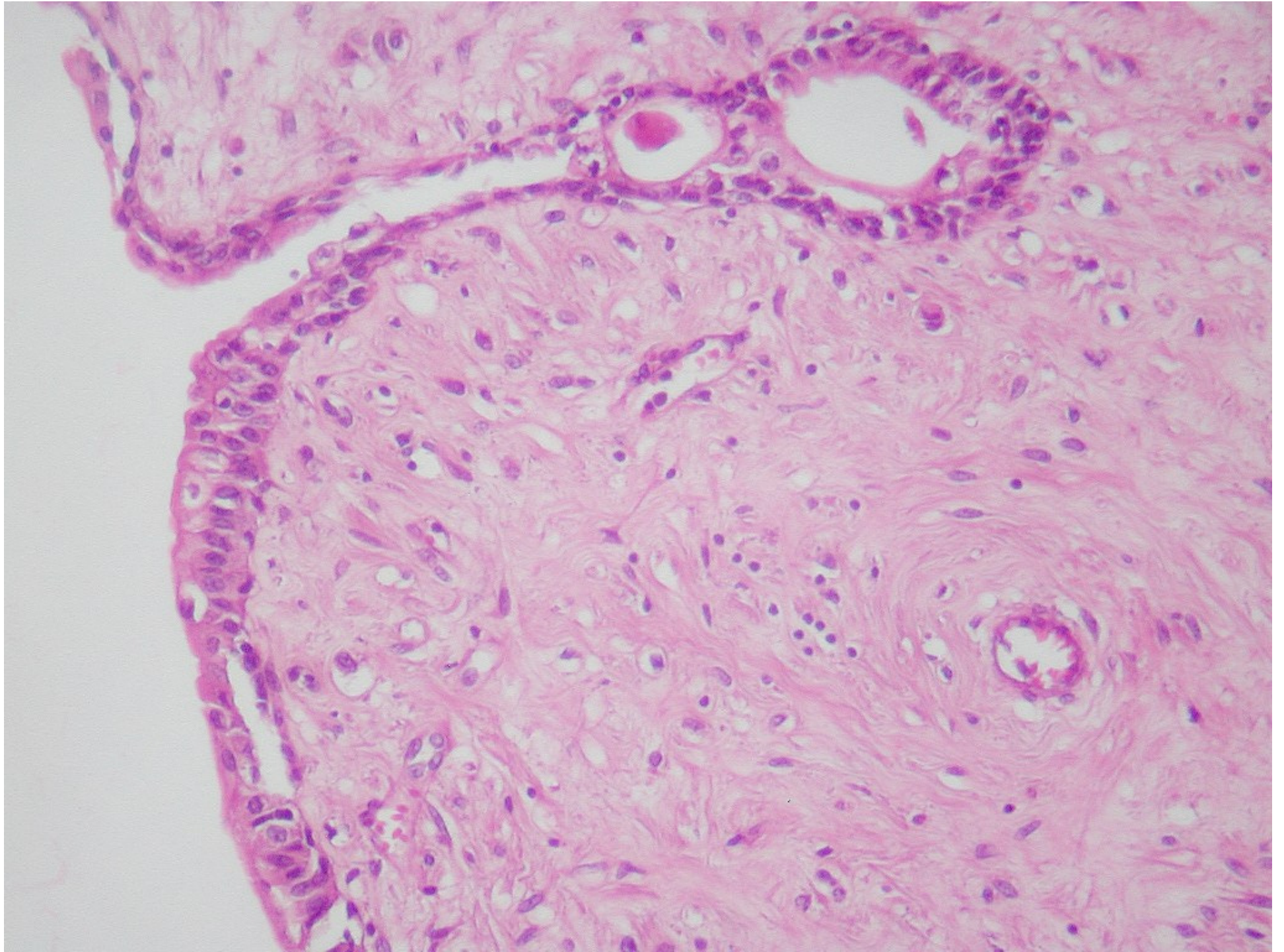


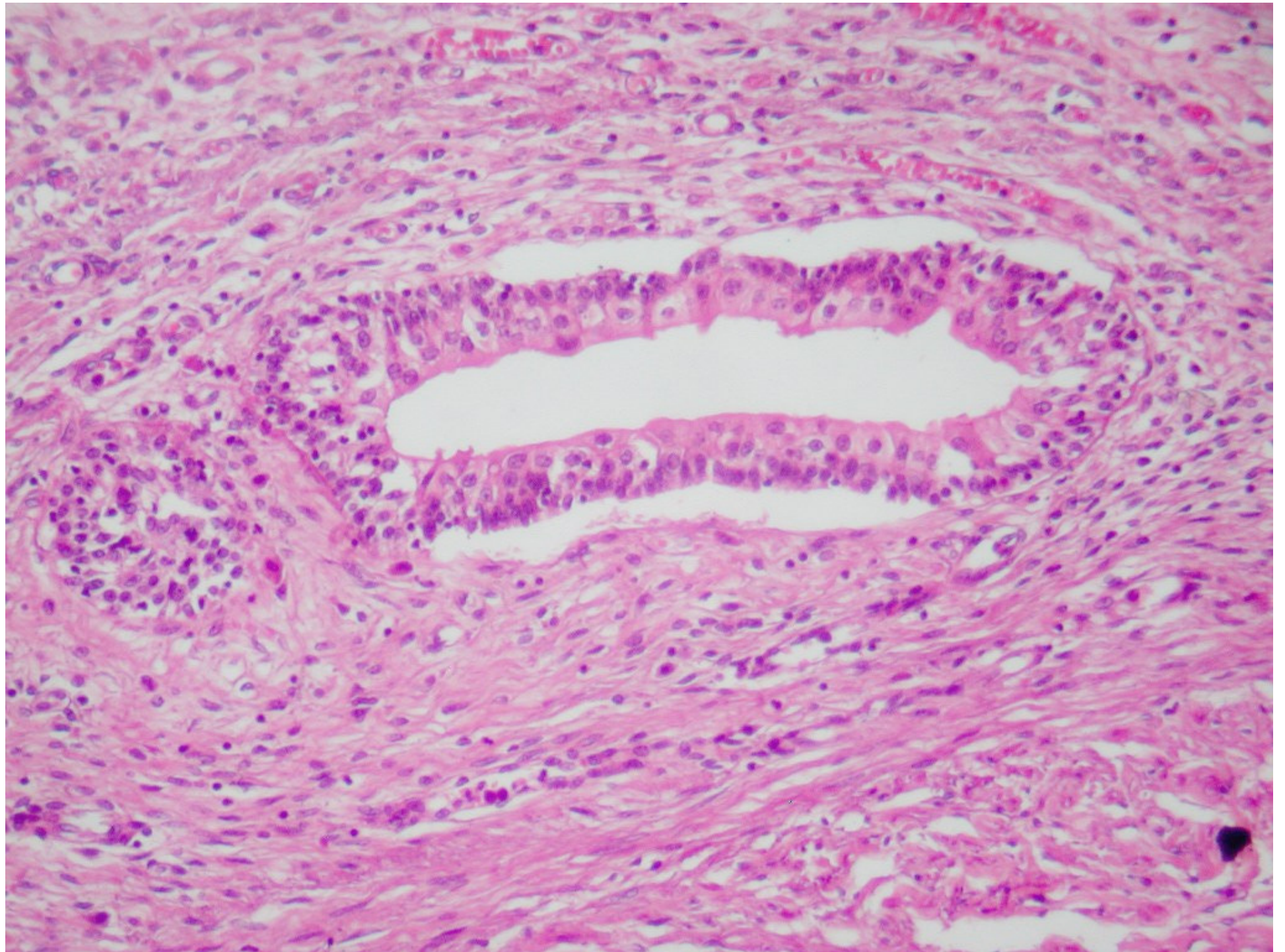


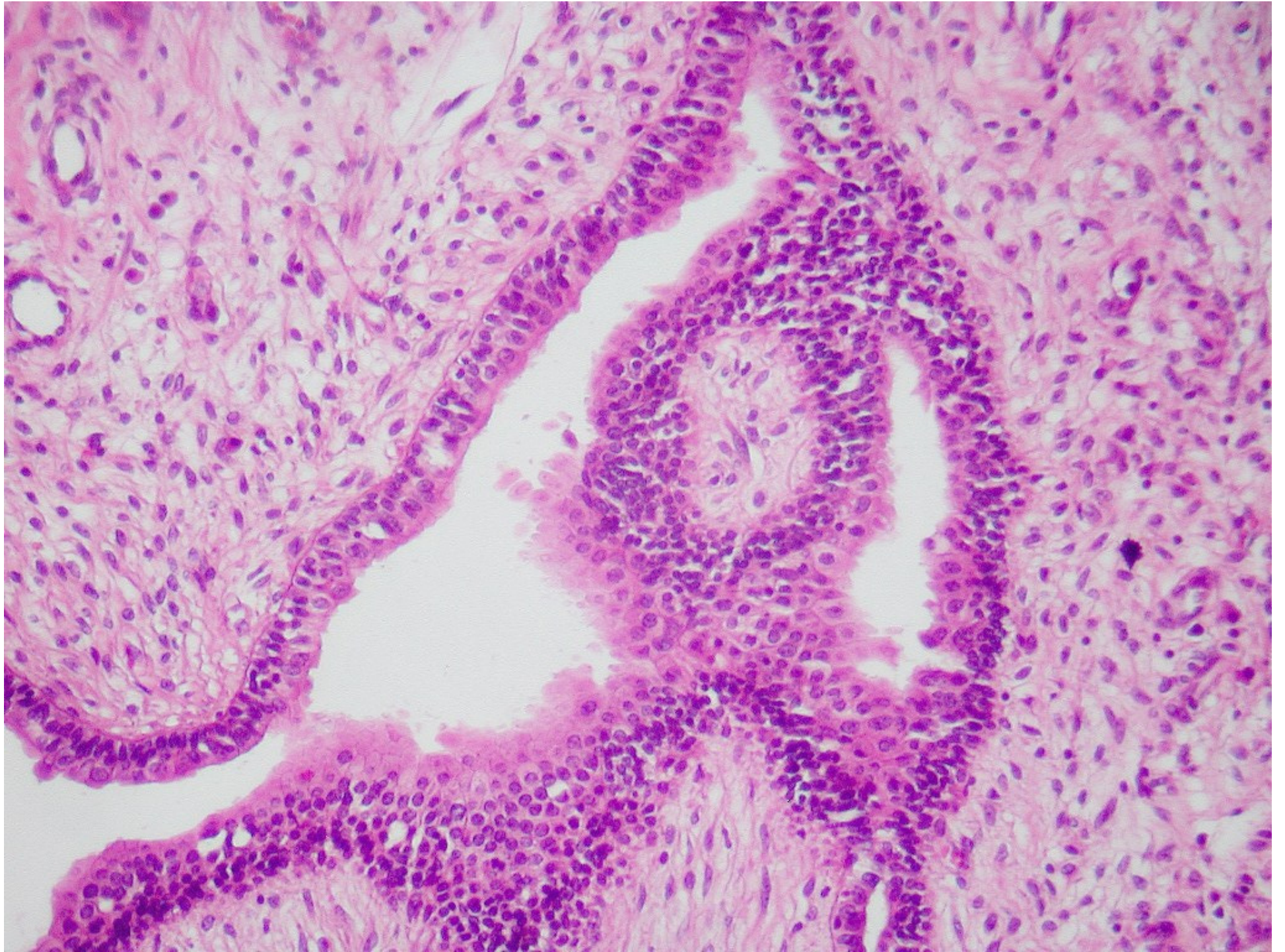




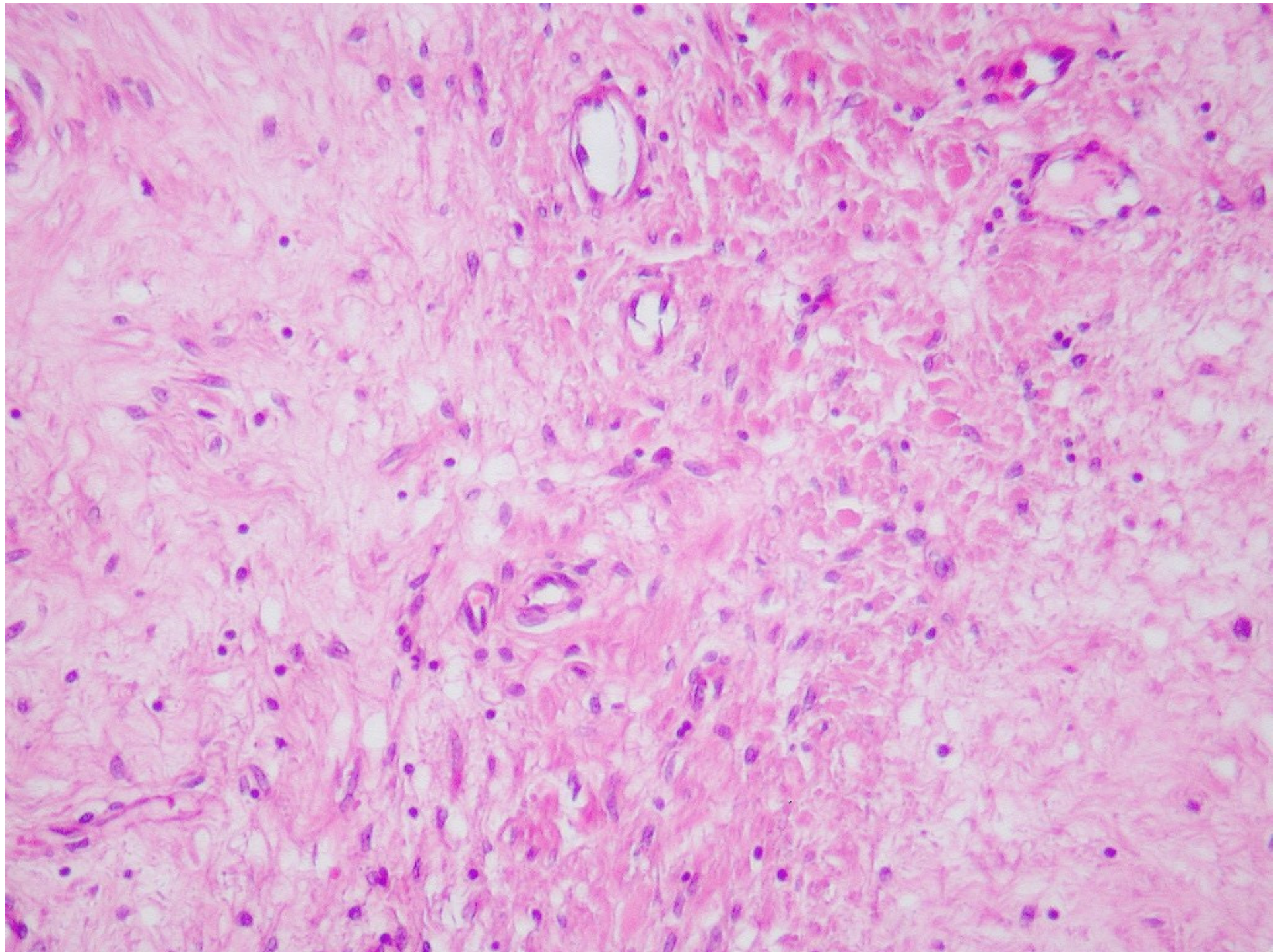












# Qual o diagnóstico???

- Nefroma cístico ?
- Angiomiolipoma com cistos ?
- Sarcoma sinovial ?
- Tumor de Wilm's ?
- Tumor misto epitelial e estromal do rim?

# **Diagnóstico**

**Tumor misto epitelial e estromal do rim**

**Block NL, Grabstald HG, Melamed MR.**  
**Congenital mesoblastic nephroma**  
**(leiomyomatous hamartoma): first adult case.**  
***J Urol* 1973;110:380–3.**

**Pawade J, Soosay GN, Delprado W, Parkinson MC, Rode J.**  
**Cystic hamartoma of the renal pelvis.**  
***Am J Surg Pathol* 1993;17:1169–75.**

**Michal M, Syrucek M.**  
**Benign mixed epithelial and stromal tumor of the kidney.**  
***Pathol Res Pract* 1998;194:445–8.**

# Mixed Epithelial and Stromal Tumor of the Kidney

N. Volkan Adsay, M.D., John N. Eble, M.D., John R. Srigley, M.D.,  
Edward C. Jones, M.D., and David J. Grignon, M.D.

*Am J Surg Pathol 24(7): 958–970, 2000.*

**TABLE 2. Clinical findings**

Case no.	Age	Sex	Clinical presentation	Hormonal history	Other tumors	Site	Size (mm)	Follow up (mos)	Original pathologic diagnosis
1	65	F	Incidental; during a work-up for metastatic breast carcinoma	TAH & BSO (20 yrs prior); Premarin for several yrs	Renal cell carcinoma; breast carcinoma	R	30	39	Cystic partially differentiated nephroblastoma
2	59	F	Abdominal pain presenting as an emergency, flu	TAH & BSO (20 yrs prior); Oral pills? for some yrs	Leiomyoma, liver cysts	R	53	81	Mesoblastic nephroma with cystic change
3	31	F	Pain in right flank associated with infection and fever	Estrogen pills >10 yrs, obesity	NK	R	40	38	Low-grade renal cell carcinoma
4	63	F	Infection in lower urinary tract, no pain	TAH & BSO Premarin for 12 yrs	NK	R	48	38	Mesoblastic nephroma (versus angiomyolipoma) with cysts
5	47	F	Incidental, during a work-up for vaginal bleeding and ovarian cyst	Benign ovarian cyst?	Benign ovarian cyst?	R	90	25	Hyalinized leiomyoma
6	59	F	Incidental, during a work-up for complications of DM	Diabetes mellitus, no sex-steroid hormones	NK	R	50	89	Benign cystic tumor of mixed tissue origin
7	62	F	Phlebitis, multiple; history of appendectomy	TAH & BSO (19 yrs prior), obesity, oral pills? for some years	Melanoma	L	95	223	Wilm's tumor
8	61	F	Pain, anemia and GI symptoms; palpable mass	TAH & BSO (17 yrs prior), estrogen pills for several years	NK	R	50	9	Benign hamartomatous lesion
9	71	M	Incidental, during a work-up for prostatic carcinoma treated with DES and lupron	DES exposure for 7 yrs and lupron for 4 yrs	Prostate cancer	R	115	12	Benign cystic lesion
10	43	F	Pain in right flank	N/A	Papillary renal adenoma	R	40	32	Multilocular cystic nephroma
11	63	F	Incidental; simple cyst that has developed into a complex mass in 8 yrs	TAH & BSO (26 yrs prior); Premarin for several yrs	NK	L	50	4	Mixed epithelial-stromal neoplasm
12	46	F	Persistent microscopic hematuria, left flank pain	TAH & BSO 3 yrs prior; no sex hormone use	NK	L	30	1	Cystic nephroma with stromal cellularity
Sum:	Mean 56	11 F 1 M	5 Pain, GU infection or hematuria 5 Incidental	2 Possible sex hormone use 6 Long-term sex hormone use 1 Vaginal bleeding, ovarian cyst 1 Diabetes mellitus 1 TAH & BSO but no hormones 1 NK		9 R 3 L	Mean 58	Mean 49	

TAH & BSO, total abdominal hysterectomy and bilateral salpingo-oophorectomy; DM, diabetes mellitus; DES, diethylstilbesterol; N/A, not available; NK, not known.

Virchows Arch (2004) 445:359–367  
DOI 10.1007/s00428-004-1060-y

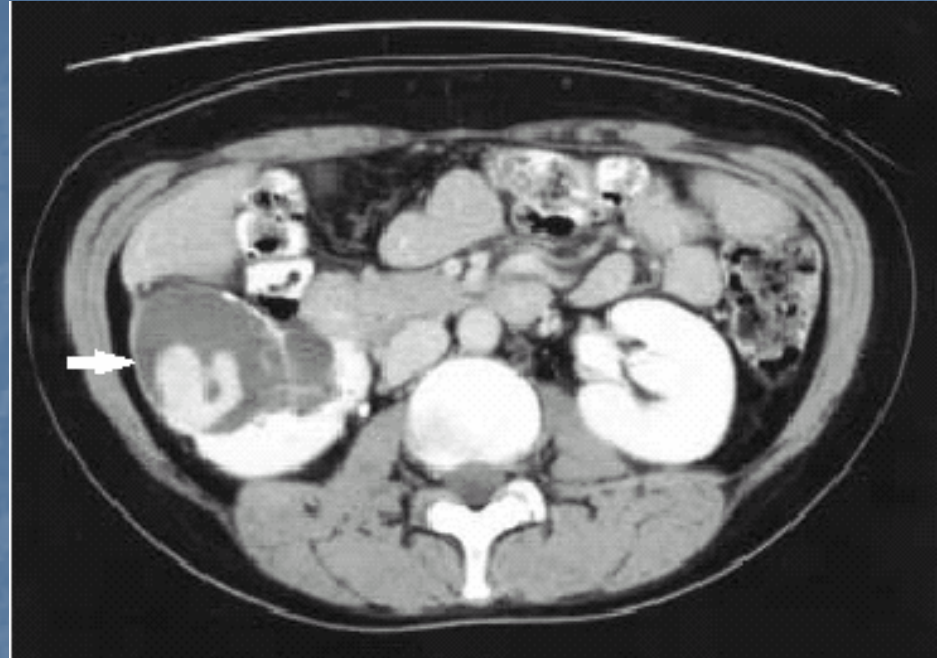
ORIGINAL ARTICLE

**Michal Michal · Ondrej Hes · Michele Bisceglia ·  
Roderick H. W. Simpson · Dominic V. Spagnolo ·  
Alberto Parma · Ludmila Boudova · Milan Hora ·  
Roman Zachoval · Saul Suster**

**Mixed epithelial and stromal tumors of the kidney.  
A report of 22 cases**

# Aspectos clínicos

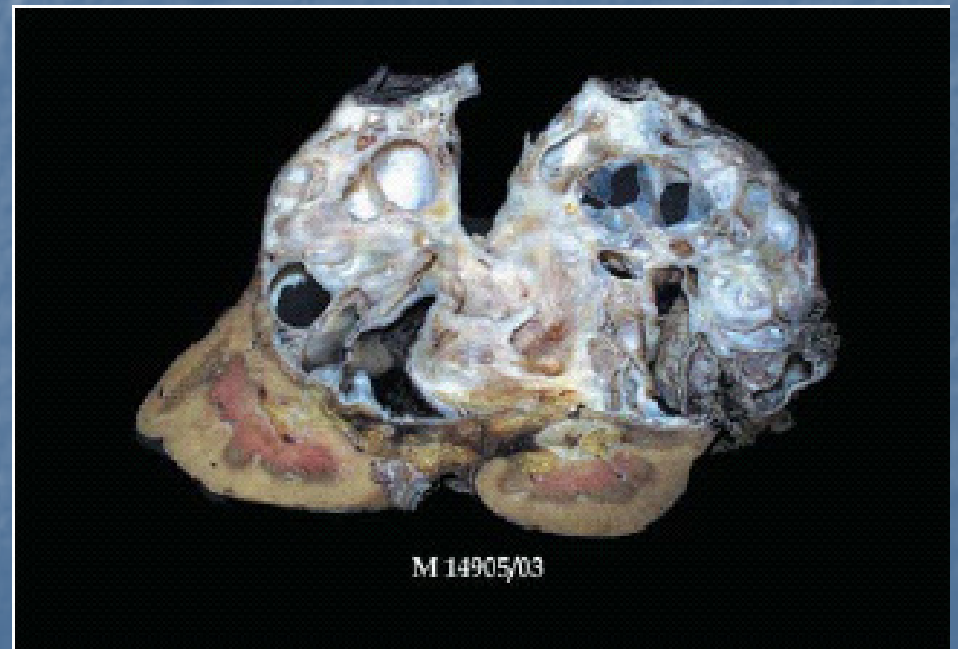
- 76 casos relatados
- 67 F – 9 M (6:1)
- Adultos
- 18 a 78 (média 46 anos)
- 1/3  $\leq$  41 anos
- massa no flanco, hematúria ou sintomas de infecção urinária
- achado em exames de imagem (25% dos casos)
- Associação com terapia estrogênica





# Aspectos macroscópicos

- sólido e cístico
- envolvimento da córtex e pirâmide medular renal
- pode “herniar” na cavidade pélvica
- componente sólido é firme e branco (lembrando leiomioma)



# Aspectos microscópicos

- arranjos complexos com elementos epiteliais e estromais

## ESTROMA

- lembra músculo liso
- tecido fibroso celular (comum)
- áreas celulares com células fusiformes tipo estroma ovariano (menos comum)
- tecido adiposo (ocasional)

# Aspectos microscópicos

## EPITÉLIO

- componente epitelial com maior variação que o estromal
- agregados de estruturas glandulares (com pequenos lúmens – células cuboidais)
- cistos com células cúbicas e colunares contendo material proteináceo (cílios)
- ilhas epiteliais em meio ao estroma
- canais ramificados revestidos por epitélio colunar
- urotélio revestindo cistos e papilas (pelve renal)
- Ausência de atipias e mitoses

# Imuno-Histoquímica

## Estroma:

- + SMA (>50% positividade forte e difusa)
- Desmina + 50% ds casos
- RE e RP + (estroma) > 80% dos casos (forte e difusa)

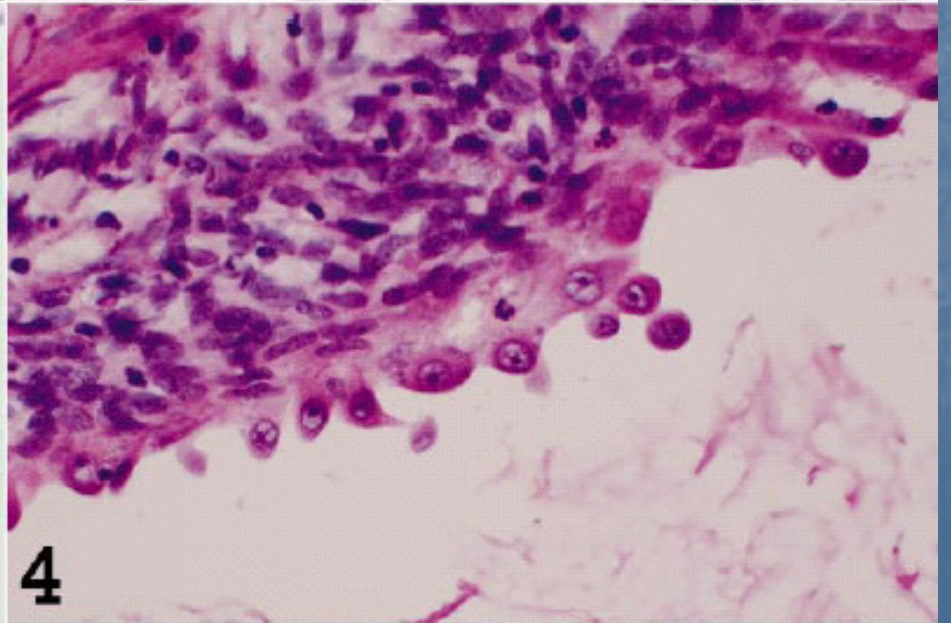
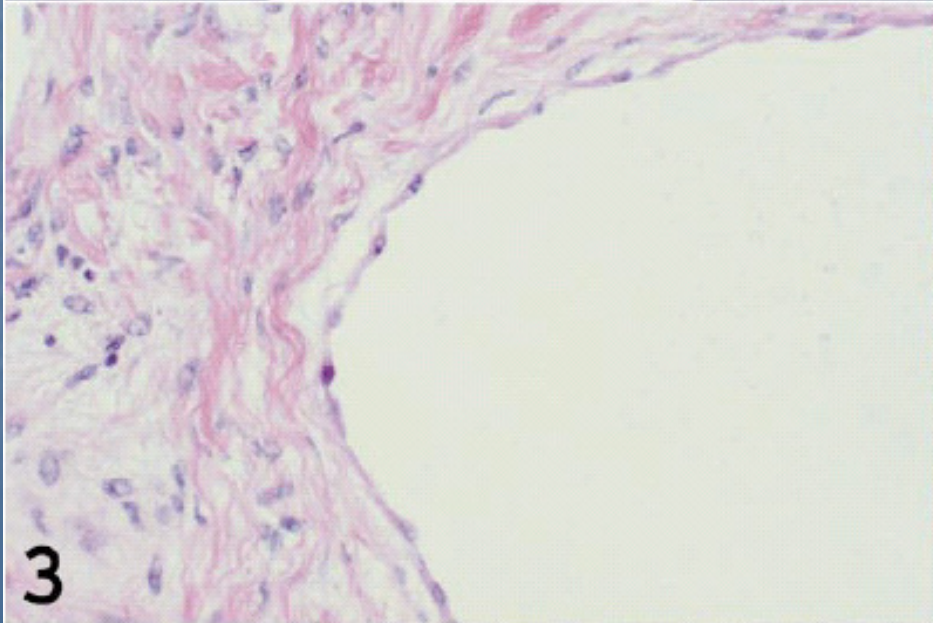
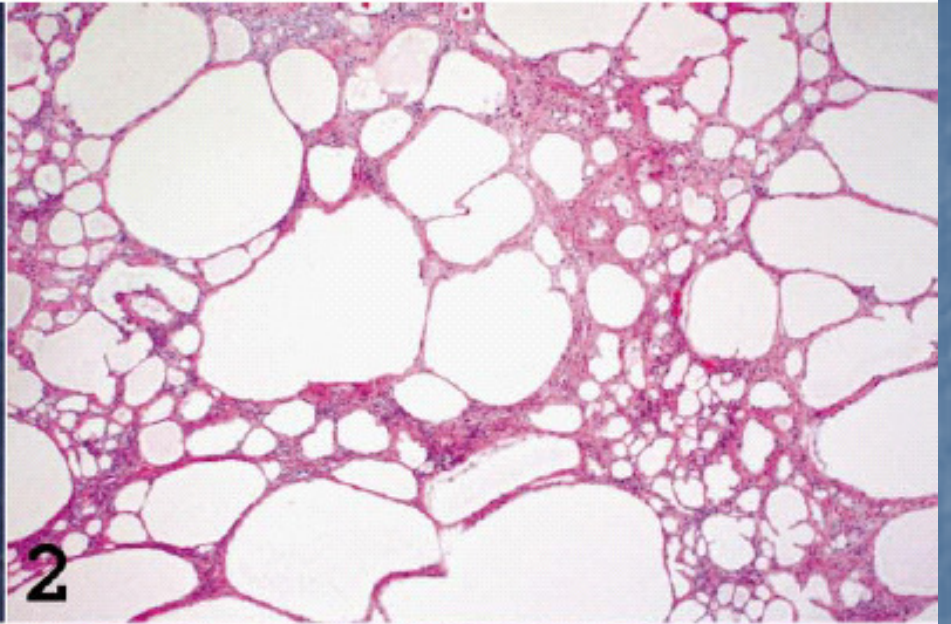
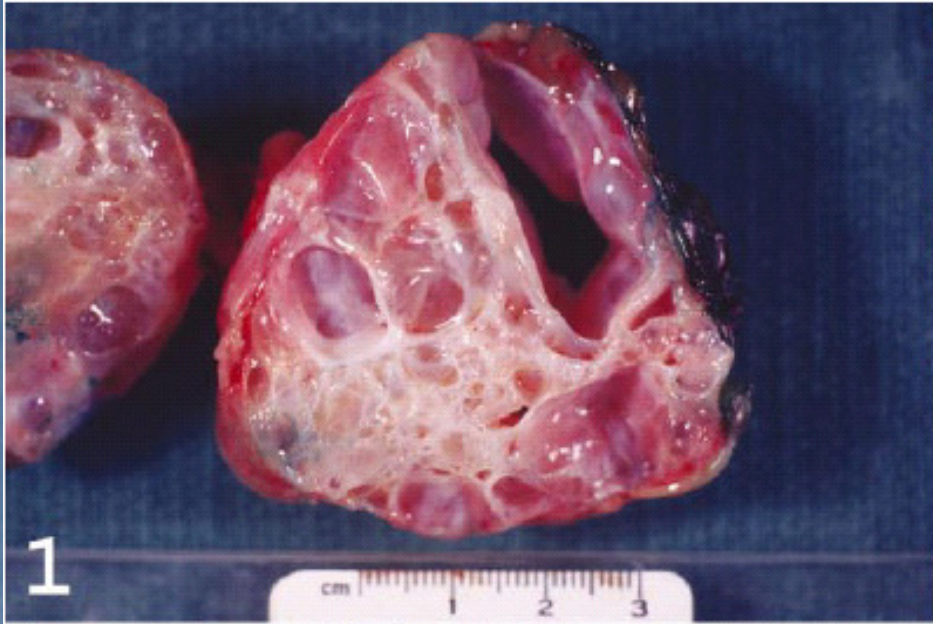
## Epitélio:

+ S-100, CK7 e CK de alto peso molecular (34BE12)

# Diagnósticos Diferenciais

- Nefroma cístico (?)
- Angiomiolipoma com cistos: + RE e RP, ausência de complexidade epitelial-estromal, HMB45, melanA e MTF +.
- Sarcoma sinovial: aspectos macroscópicos semelhantes, atipia citológica, ausência de complexidade, ausência de diferenciação muscular lisa e RE e RP neg.
- Tumor de Wilm's: NBCPD semelhanças macroscópicas, ocorre < 2anos de idade. Wilm's no adulto: blastema e mitoses

# Nefroma cístico



# DD Nefroma cístico (?)

- Alguns autores defendem que NC e "MESTK" – 1 só entidade
- Menor complexidade, composto apenas de cistos, circundado por cápsula fibrosa, cistos com epitélio achatado ou "hobnail", estroma hipocelular - celular do tipo ovariano (RE+, RP+ e Inibina+)
- 20% masc.

# Mixed Epithelial and Stromal Tumor of the Kidney and Cystic Nephroma Share Overlapping Features

## Reappraisal of 15 Lesions

*Tatjana Antic, MD; Kent T. Perry, MD; Kathleen Harrison, PhD; Polina Zaytsev, MD; Michael Pins, MD; Steven C. Campbell, MD, PhD; Maria M. Picken, MD, PhD*

**(Arch Pathol Lab Med. 2006;130:80–85)**

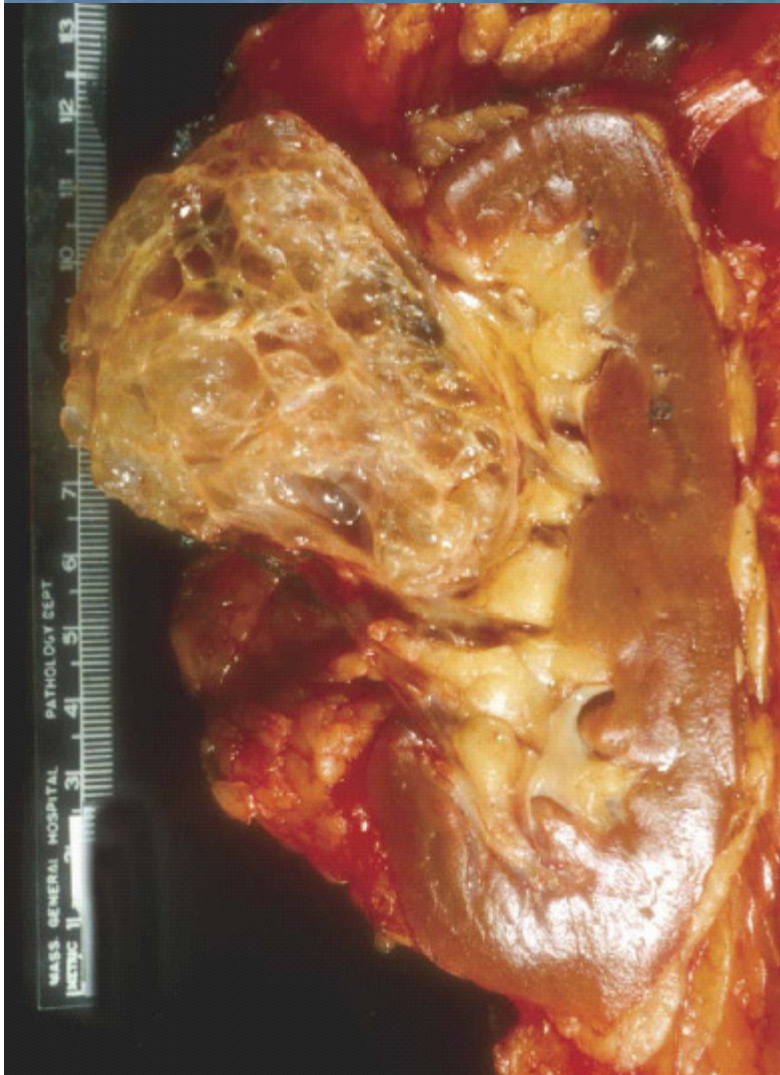


# Cystic Nephroma and Mixed Epithelial and Stromal Tumor of Kidney: A Detailed Clinicopathologic Analysis of 34 Cases and Proposal for Renal Epithelial and Stromal Tumor (REST) as a Unifying Term

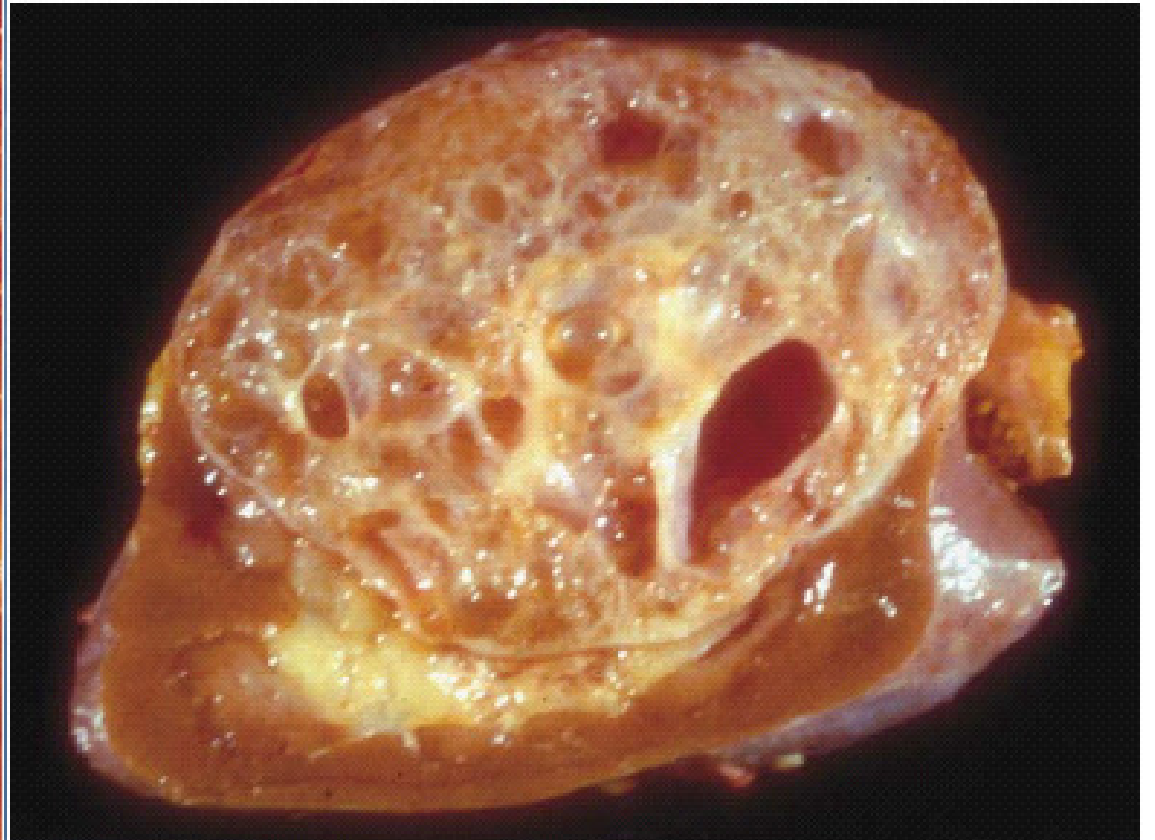
*Julia Turbiner, MD,\* Mahul B. Amin, MD,† Peter A. Humphrey, MD,‡ John R. Srigley, MD,§  
Laurence De Leval, MD,|| Anuradha Radhakrishnan, MD,† and Esther Oliva, MD\**

*(Am J Surg Pathol 2007;31:489–500)*

CN



MEST



**TABLE 2.** Comparison of Epithelial Architecture Between CN and MEST

	<b>CN: Mean (Range, Median)</b>	<b>MEST: Mean (Range, Median)</b>
Large cysts	→ 65% (20%-100%; 70%)	25% (10%-60%; 30%)
Medium to small glands	25% (0%-60%; 20%)	→ 40% (10%-70%; 40%)
Phyllodes-type glands	10% (0%-30%; 0%)	→ 35% (10%-60%; 40%)

**TABLE 3.** Comparison of Stromal Architecture Between CN and MEST

	CN	MEST
Hypercellular stroma*	→ 3/20 (15%)	→ 9/14 (64%)
Ovarian-type stroma	13/20 (65%)	13/14 (93%)
Collagenized stroma	11/20 (55%)	3/14 (21%)
Hypocellular/collagenized stroma	11/11 (100%)	2/3 (67%)
Hypercellular/collagenized stroma	0/11 (0%)	1/3 (33%)
Stromal condensation	5/20 (25%)	6/14 (43%)
Periglandular hyalinization	3/20 (15%)	4/14 (29%)
Prominent vascularity	1/20 (5%)	7/14 (50%)
Smooth muscle metaplasia	1/20 (5%)	2/14 (14%)
Calcification	7/20 (35%)	4/14 (29%)
Hemorrhage	5/20 (25%)	5/14 (36%)

\*Statistically significant result.

**TABLE 4.** Results of Immunohistochemistry in the Stromal Components of CN and MEST

**No. Positive Cases Overall %  
and Range of Positive Cells**

**CN**

**MEST**

ER\*

➡ 3/16 (19%)

➡ 8/13 (62%)

➡ 15% (5-30)

➡ 32% (20-60)

PR\*

6/15 (40%)

11/13 (85%)

34% (5-80)

65% (15-90)

CD10

8/16 (50%)

10/13 (77%)

10% (3-20)

21% (1-60)

Calretinin

7/17 (41%)

9/13 (69%)

6% (1-8)

9% (1-25)

Inhibin

5/14 (36%)

5/12 (42%)

1% (1)

5% (1-10)

\*Statistically significant result.

LETTER TO THE EDITOR

Yu Yang · Hes Ondrej · Lanjing Zhang · Jian Lu ·  
Min Lu · Hua Wang · Jie Zheng · Michal Michal

## Mixed epithelial and stromal tumor of the kidney with cervical and intestinal differentiation

