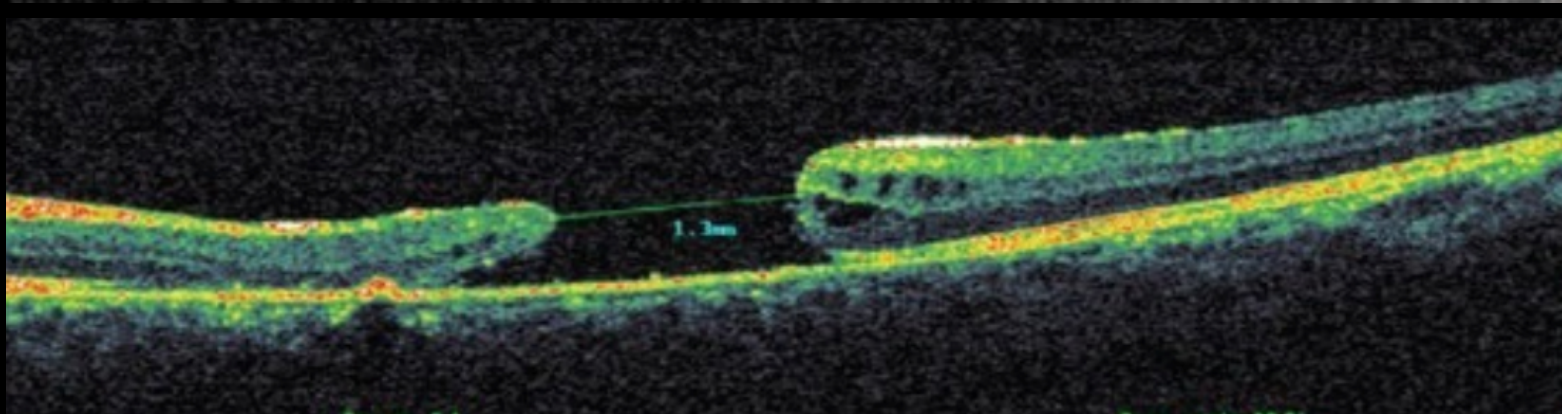
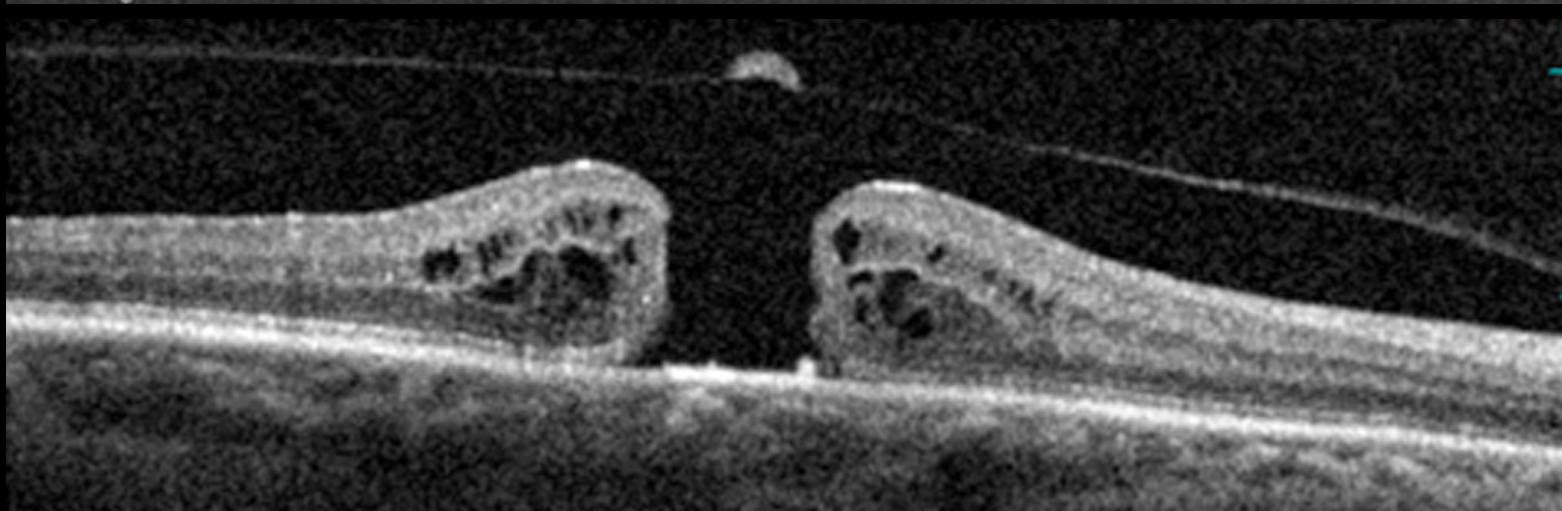
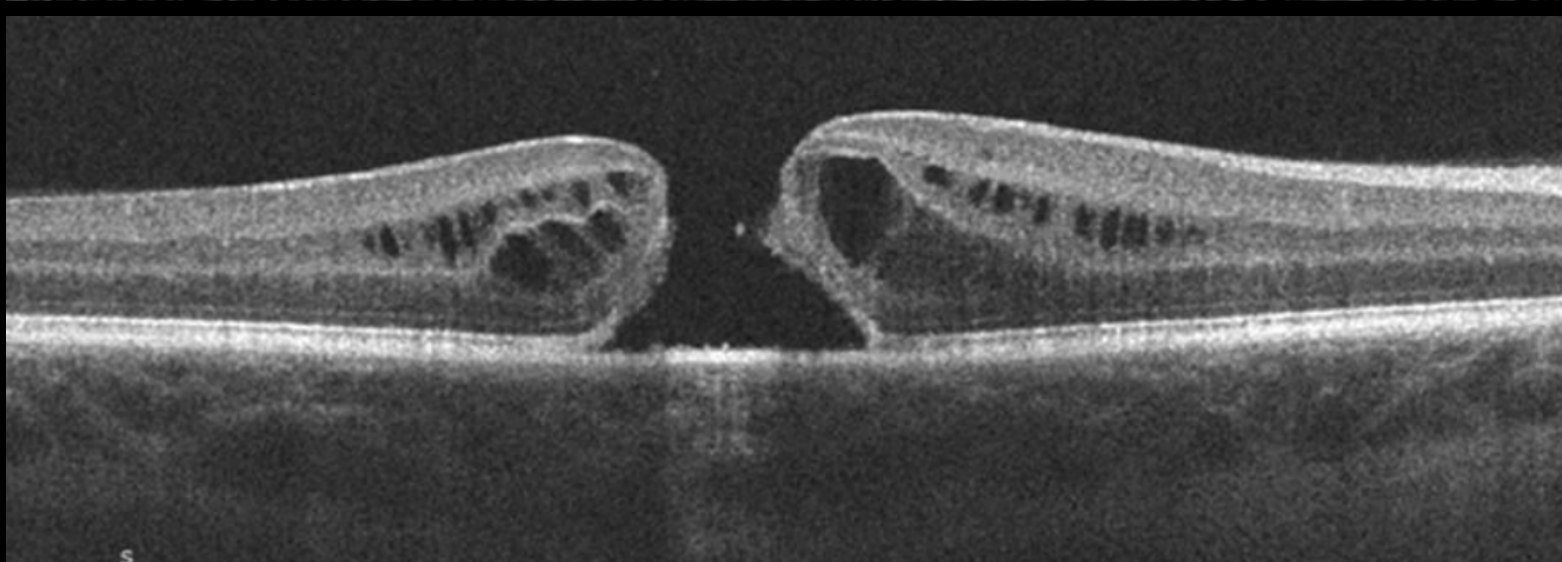
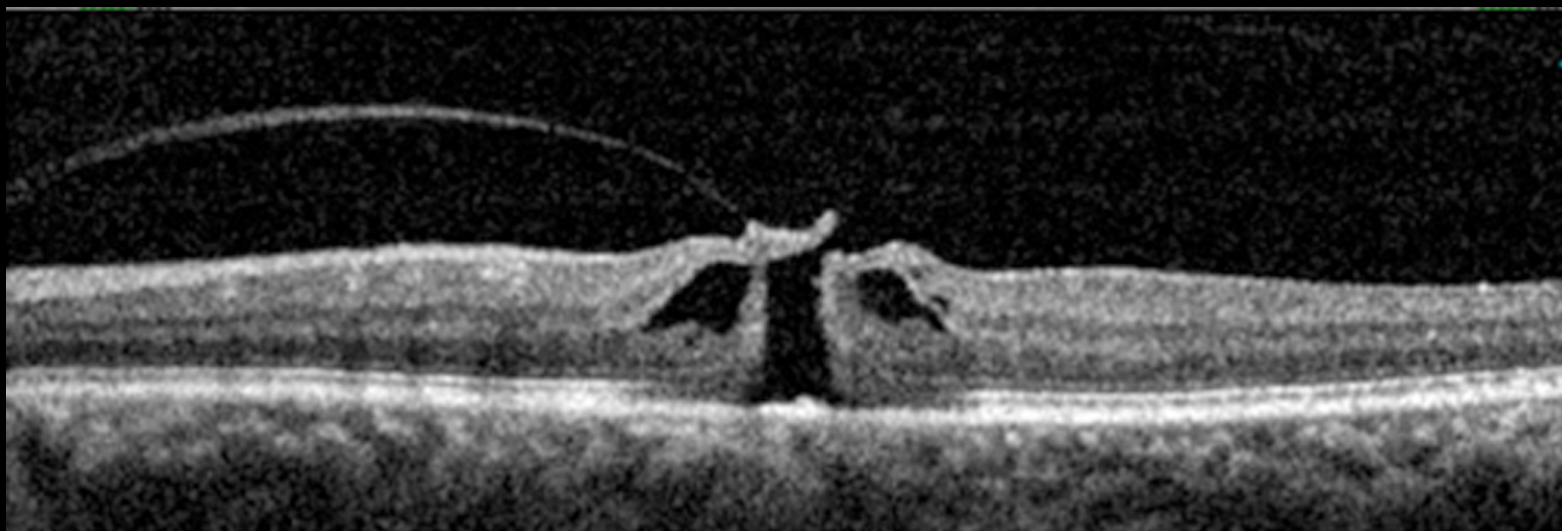




XXX LARGE

SMALL

X LARGE



Techniques for Failed Macular Hole Surgery

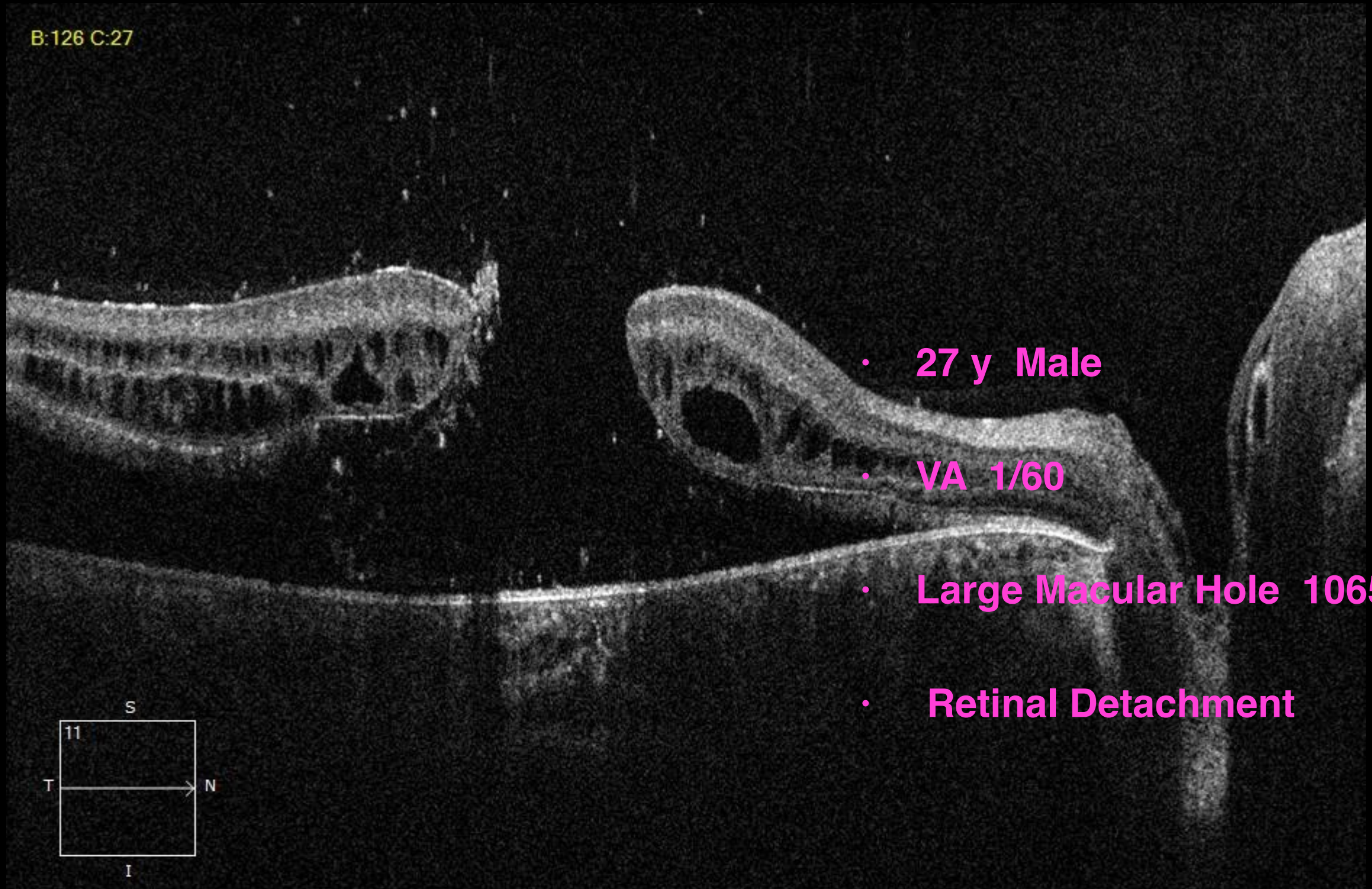
author	technique	<u>MH closure rate</u>	VA
(Ohana and Blumenkranz 1998)	laser	15 eyes 80% success	20% 20/40
(Ie, Glaser et al. 1993)	TGF-beta 2	12 eyes 100% success	48% improve BCVA
(Korobelnik, Hannouche et al. 1996)	autologous platelet concentrate	8 eyes 87,5% success	50% 20/50
(Jonas and Jager 2003)	F6H8	2 eyes 100% success	20/40
(Oz and Akduman 2003)	SSO	1 eyes	20/60
(Rizzo, Genovesi-Ebert et al. 2009)	HSO	2 eyes 100% success	20/40 20/100
(Saeed, Heimann et al. 2009)	HSO	5 eyes 60% success	20/63
(Lappas, Foerster et al. 2009)	HSO	12 eyes 92% success	20/160
(Morizane, Shiraga et al. 2014)	ILM autologous transplant	10 eyes 90% success	80% improve BCVA 20/80
(Lee et al. 2018)	ILM autologous transplant	14 eyes 100% success	20/100
(Chen SN1, Yang CM.2016)	capsular lens fragment	20 eyes 75% success	20/250
(Peng, Chen et al. 2017)	capsular lens fragment	10 eyes 90% success	20/450 2 eyes 20/63
(Grewal and Mahmoud 2016)	neurosensory retinal free flap	1 eyes	20/80
(Chun et al. 2018)	neurosensory retinal free flap	5 eyes 100% success	20/400

XXX Large

Prof. Samir El Baha, MD, PhD

Pre Op

B:126 C:27

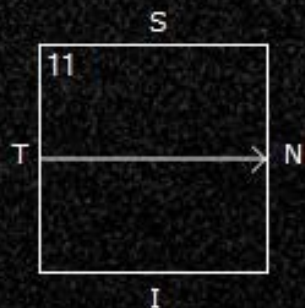


- 27 y Male

- VA 1/60

- Large Macular Hole 1065 U

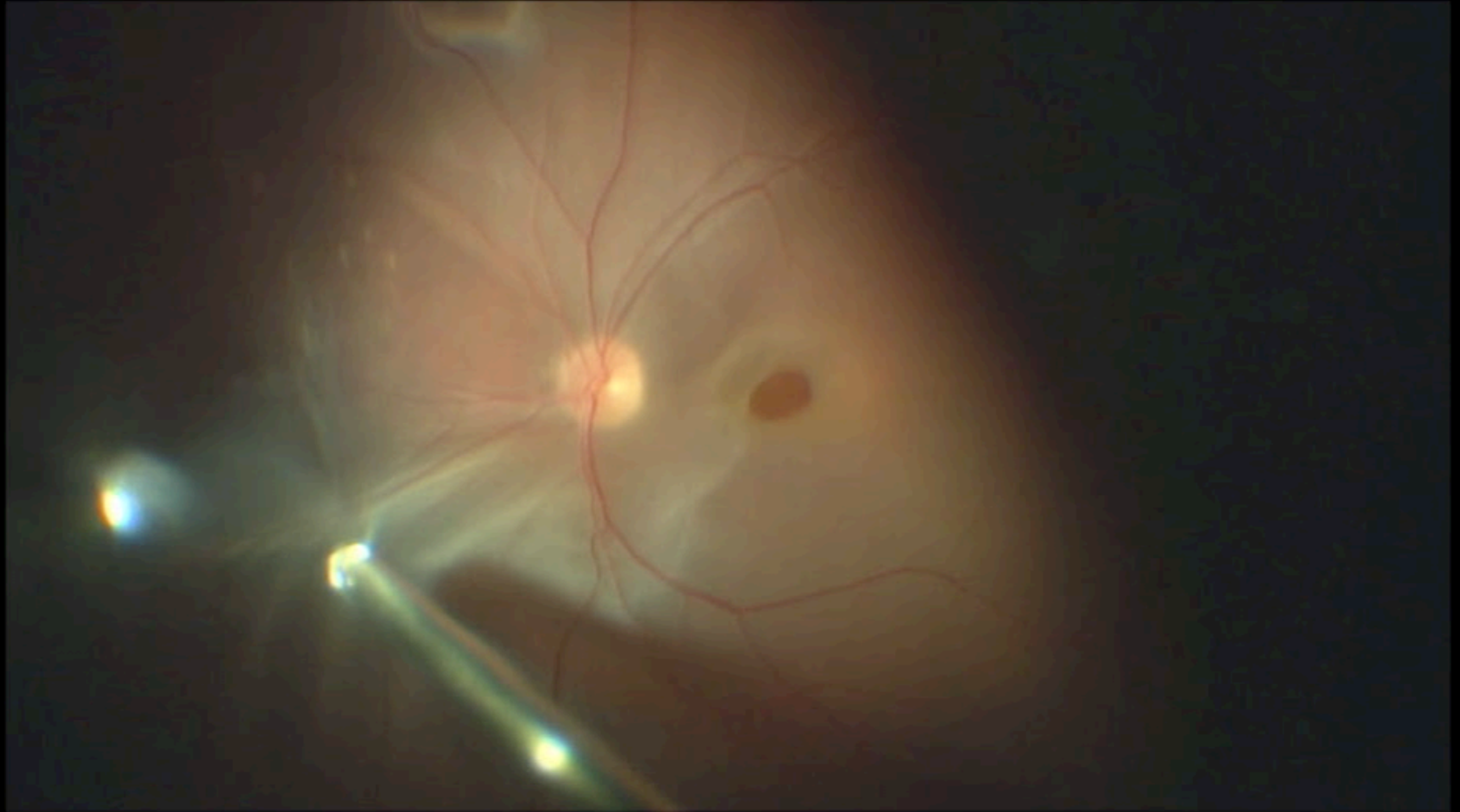
- Retinal Detachment



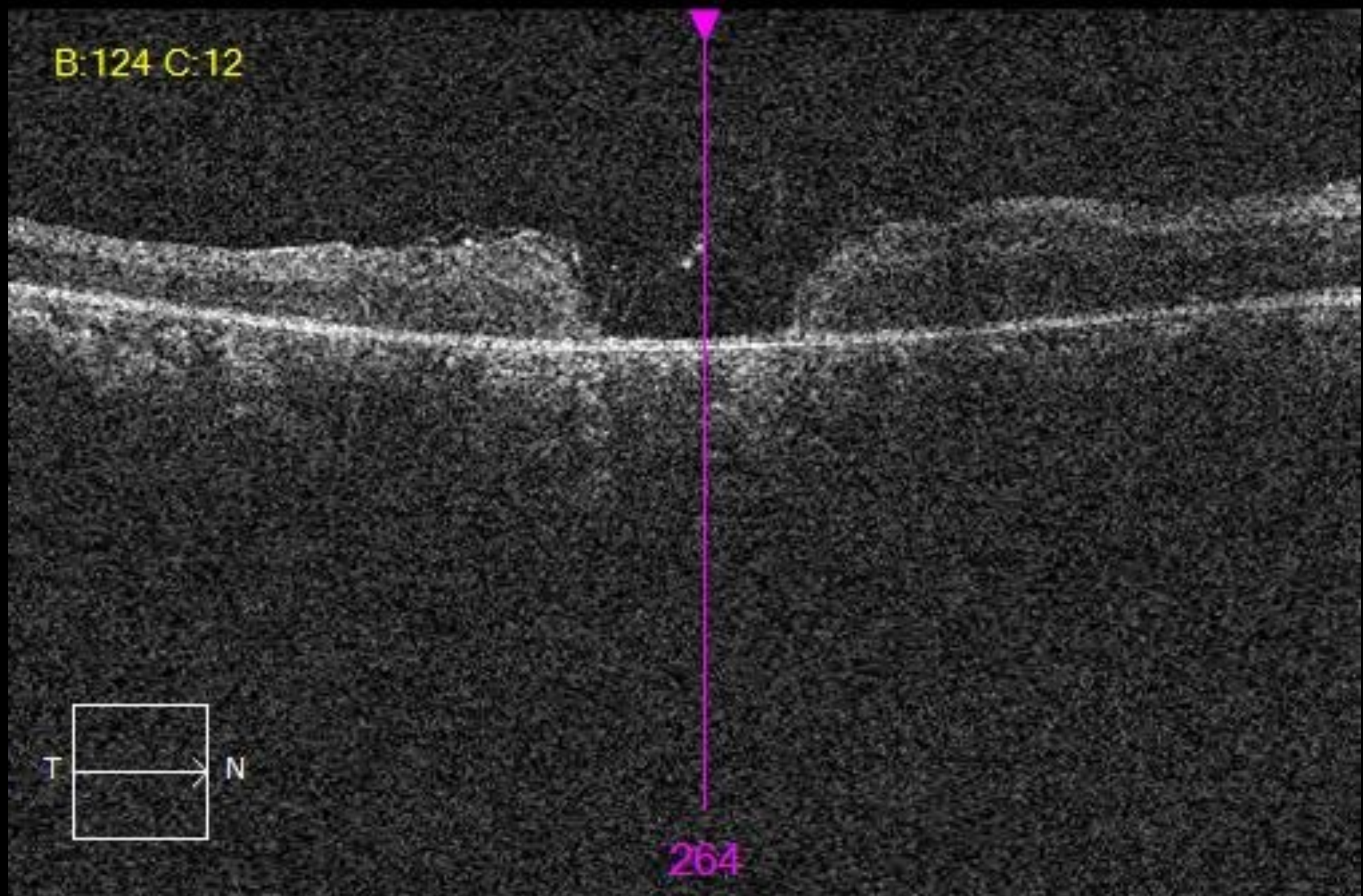
B:126 C:20

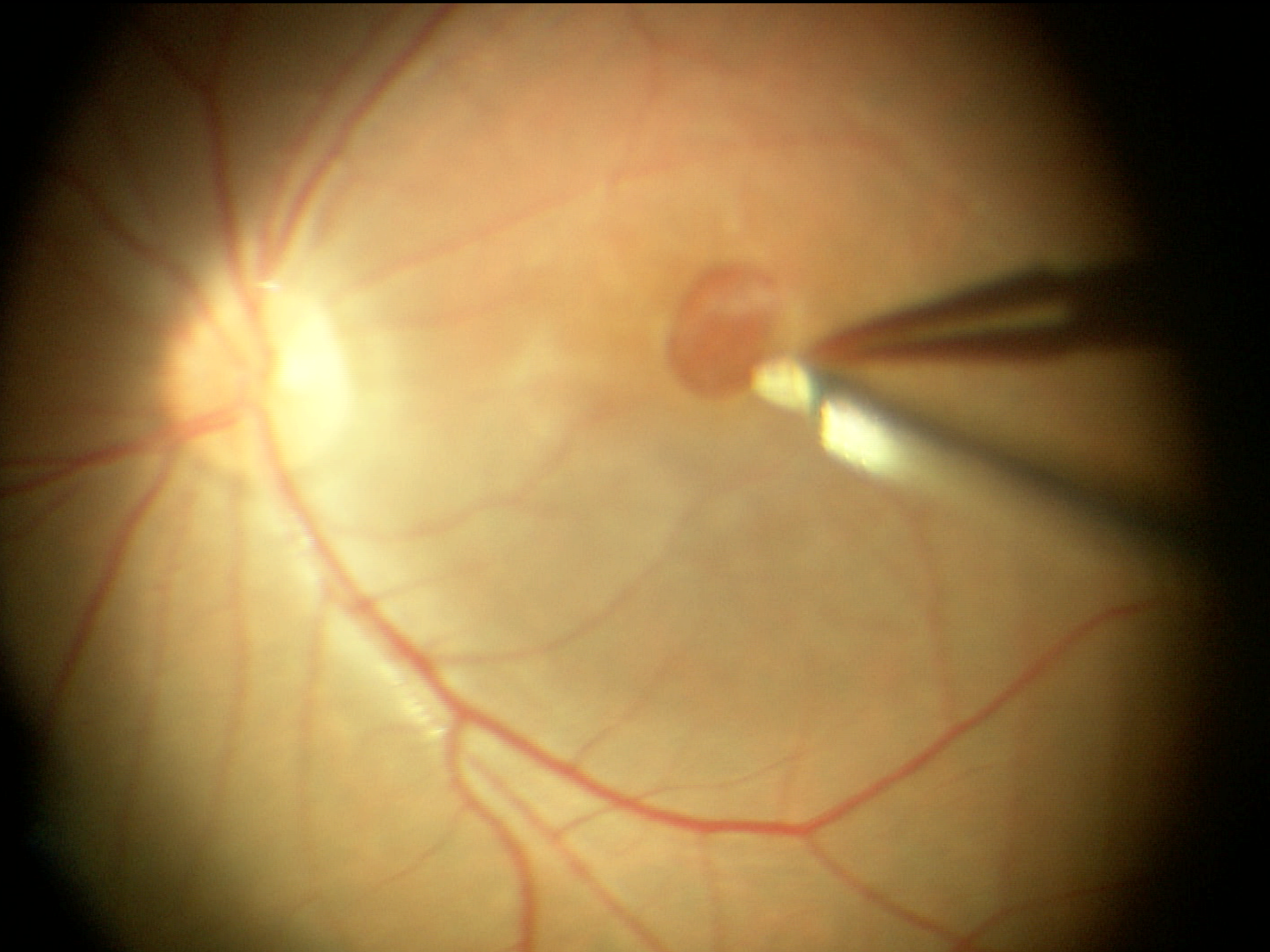
1065 μm

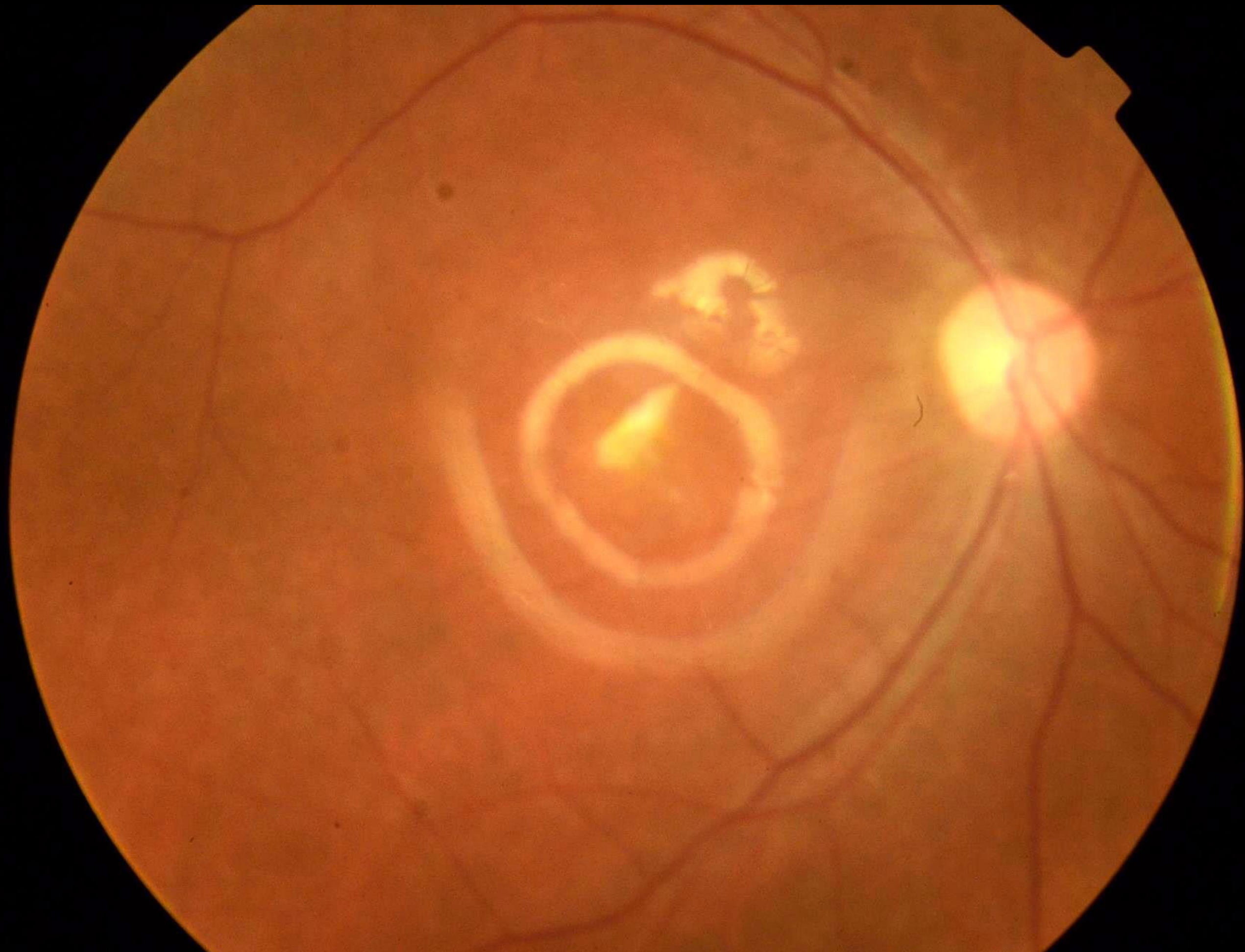




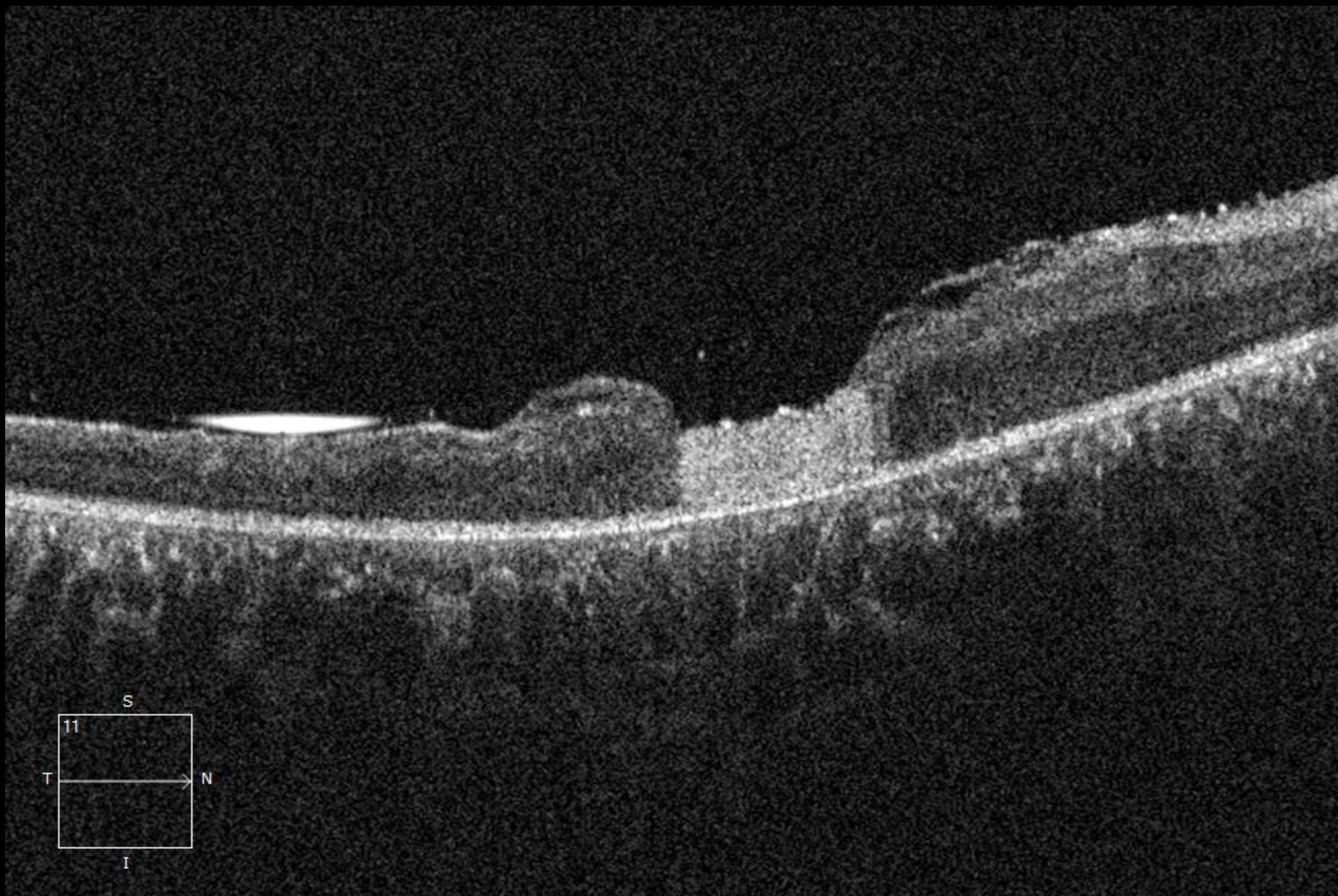
After 1 st Surgery



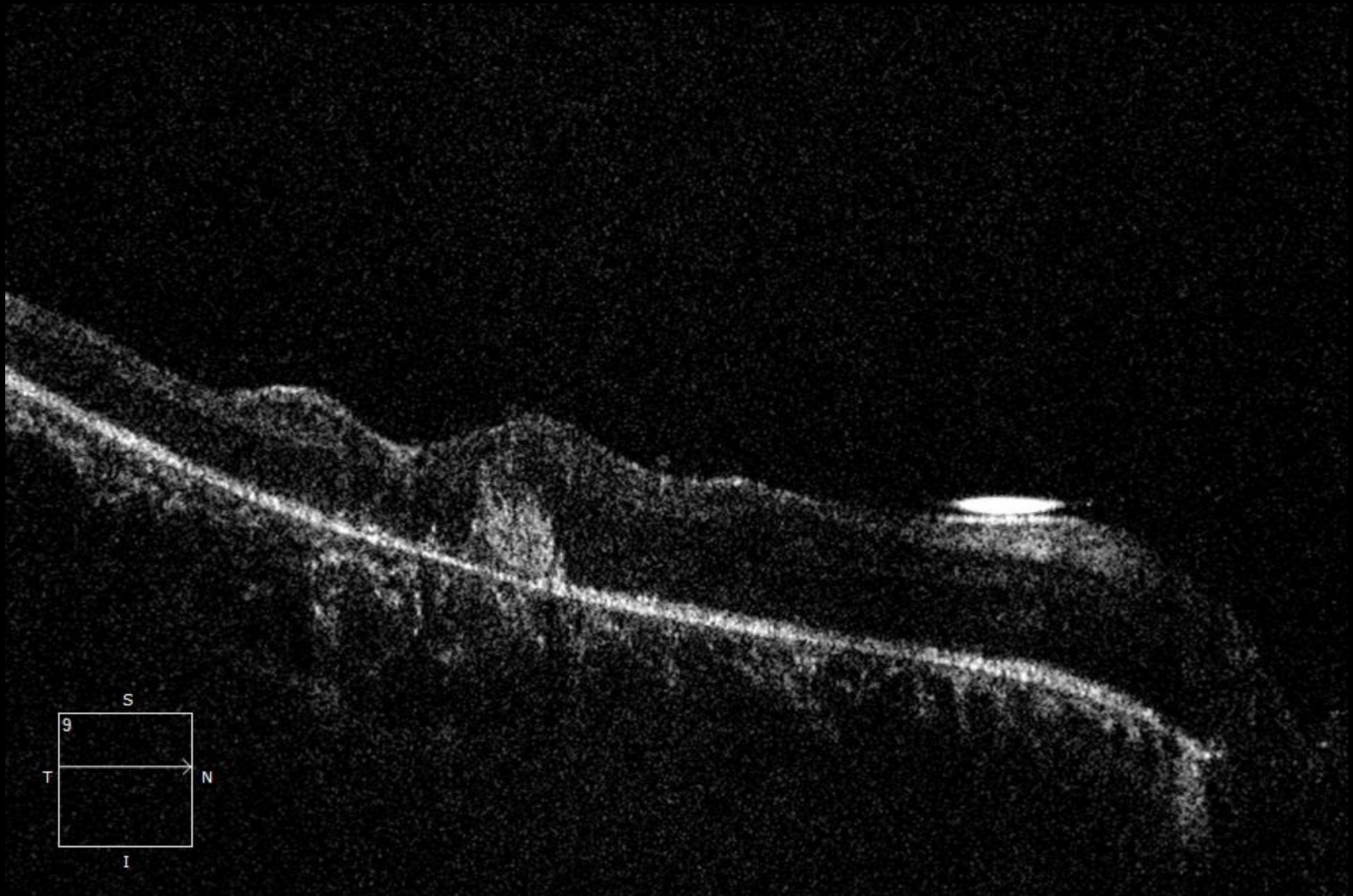




1 weeks



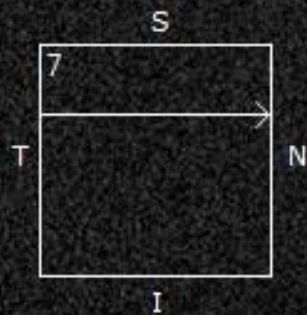
2 weeks



2 weeks

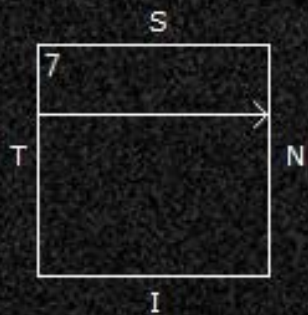
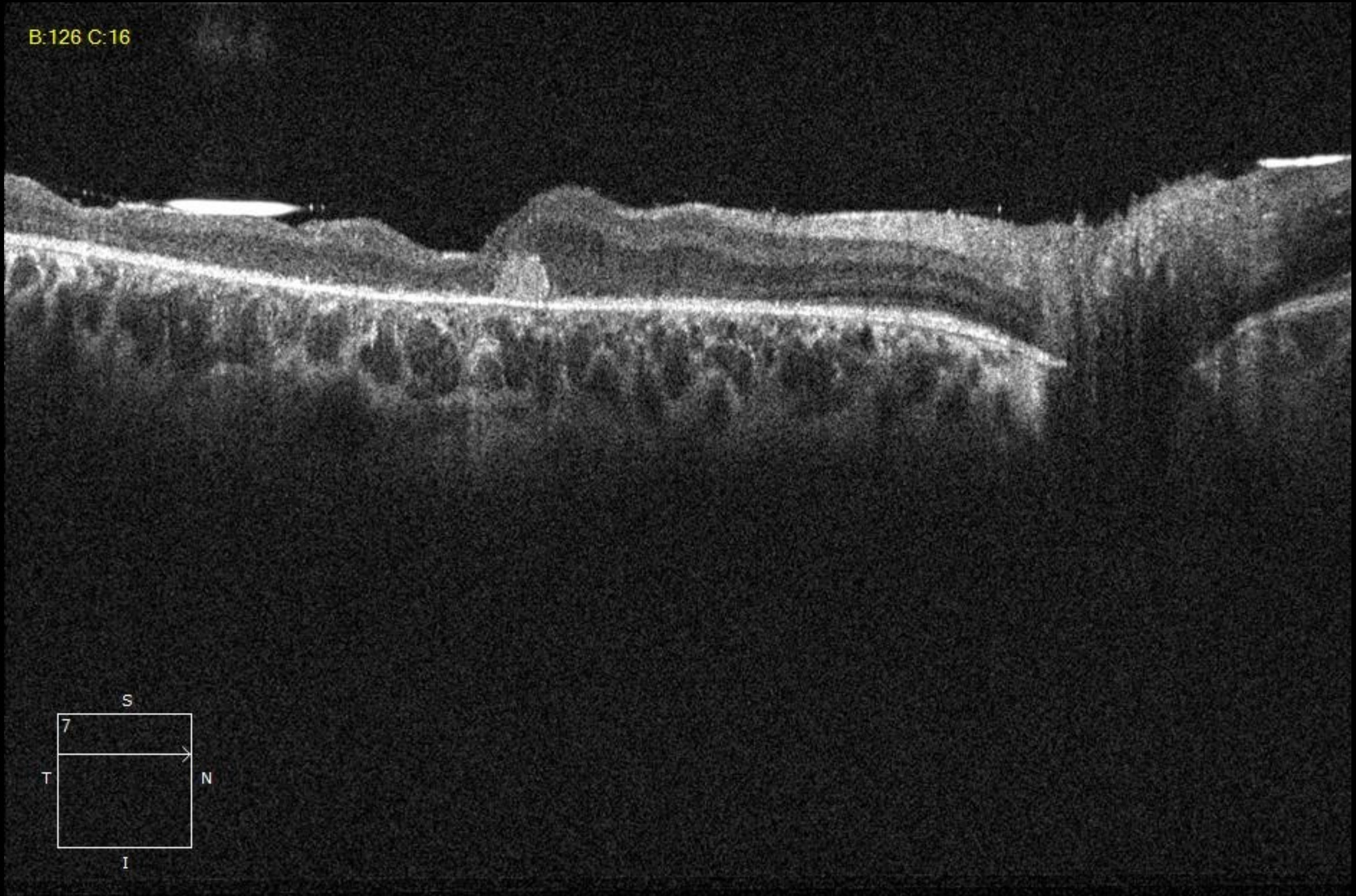
B:126 C:20

355 μm



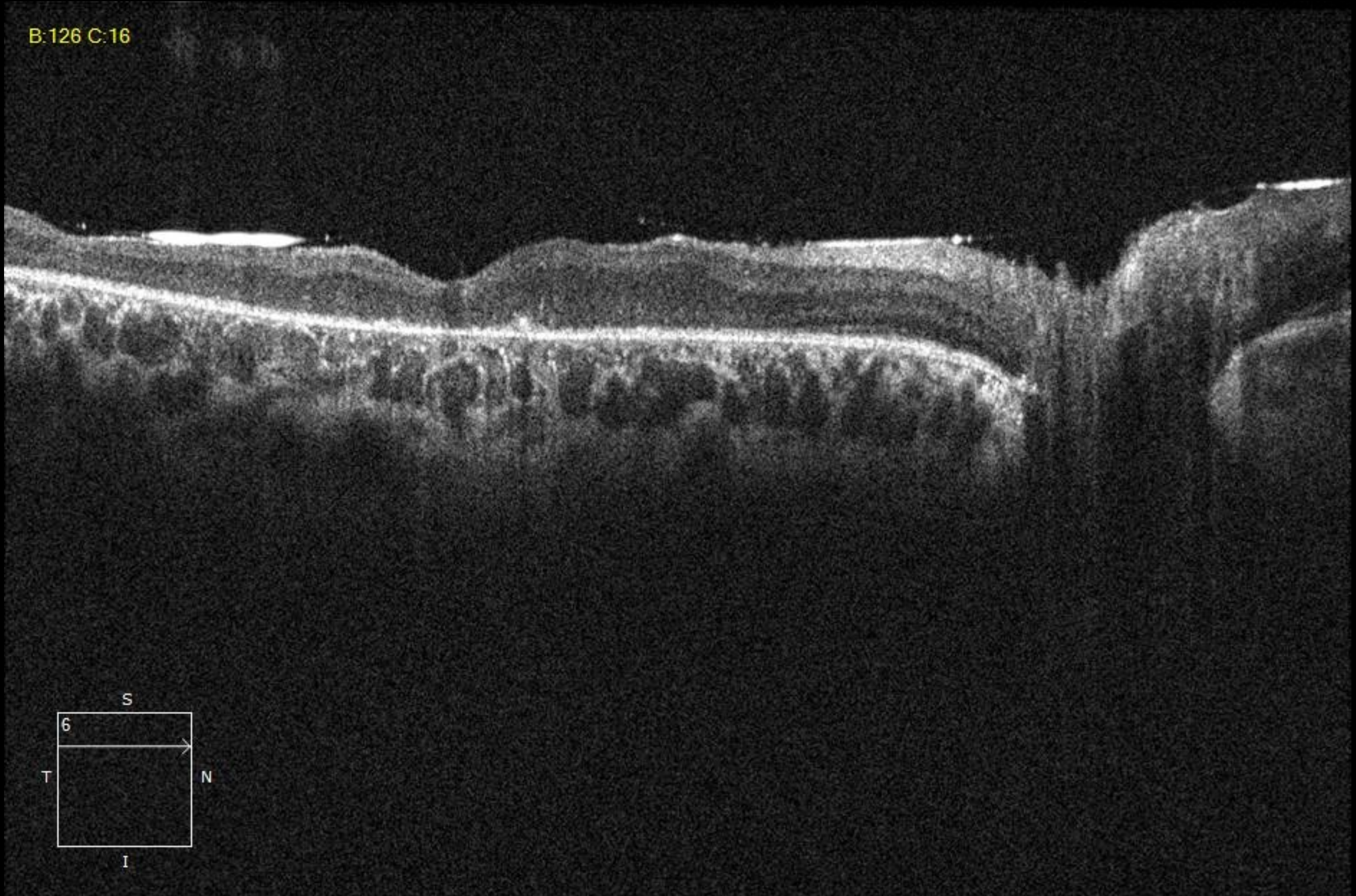
3 weeks

B:126 C:16

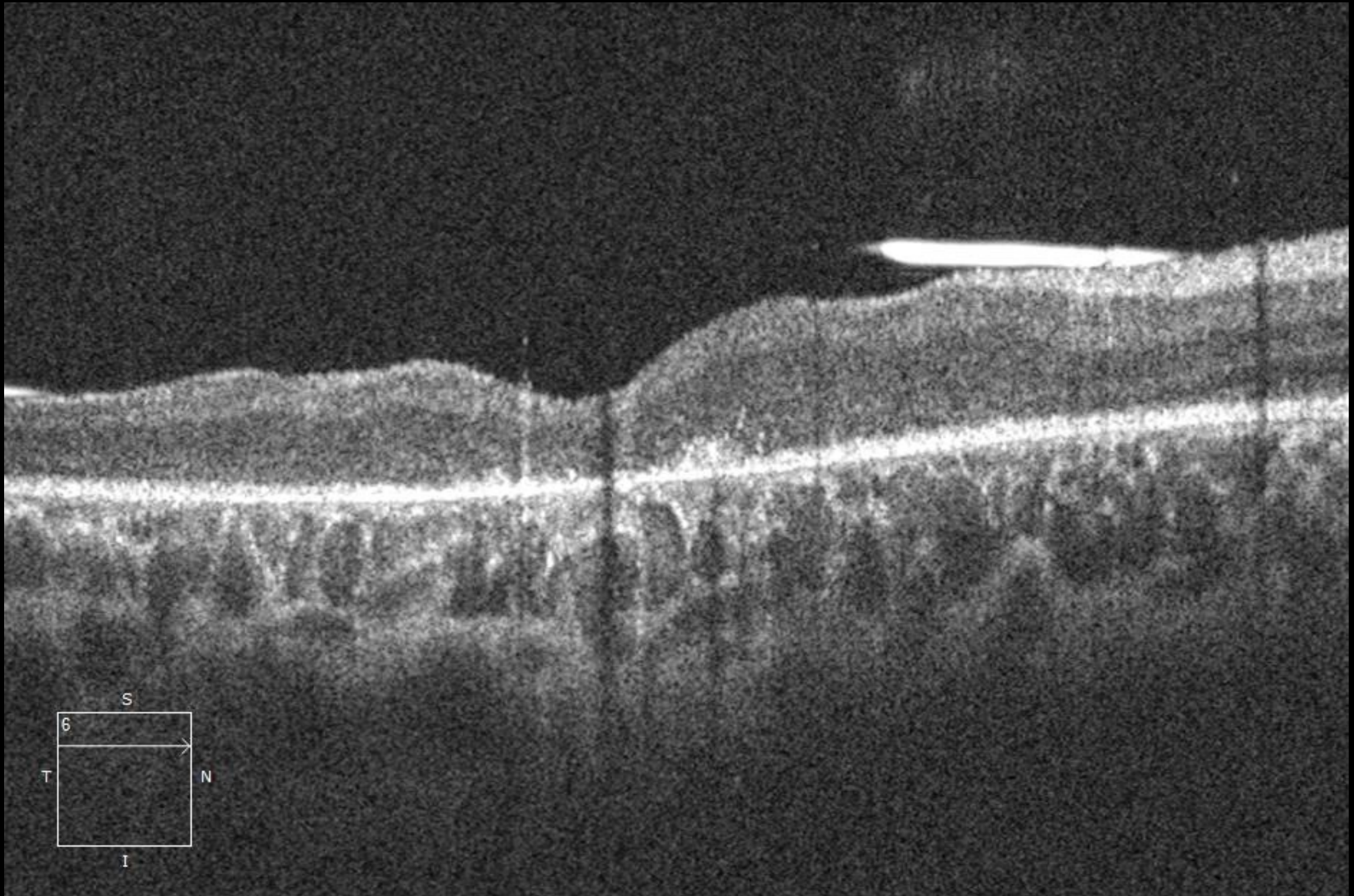


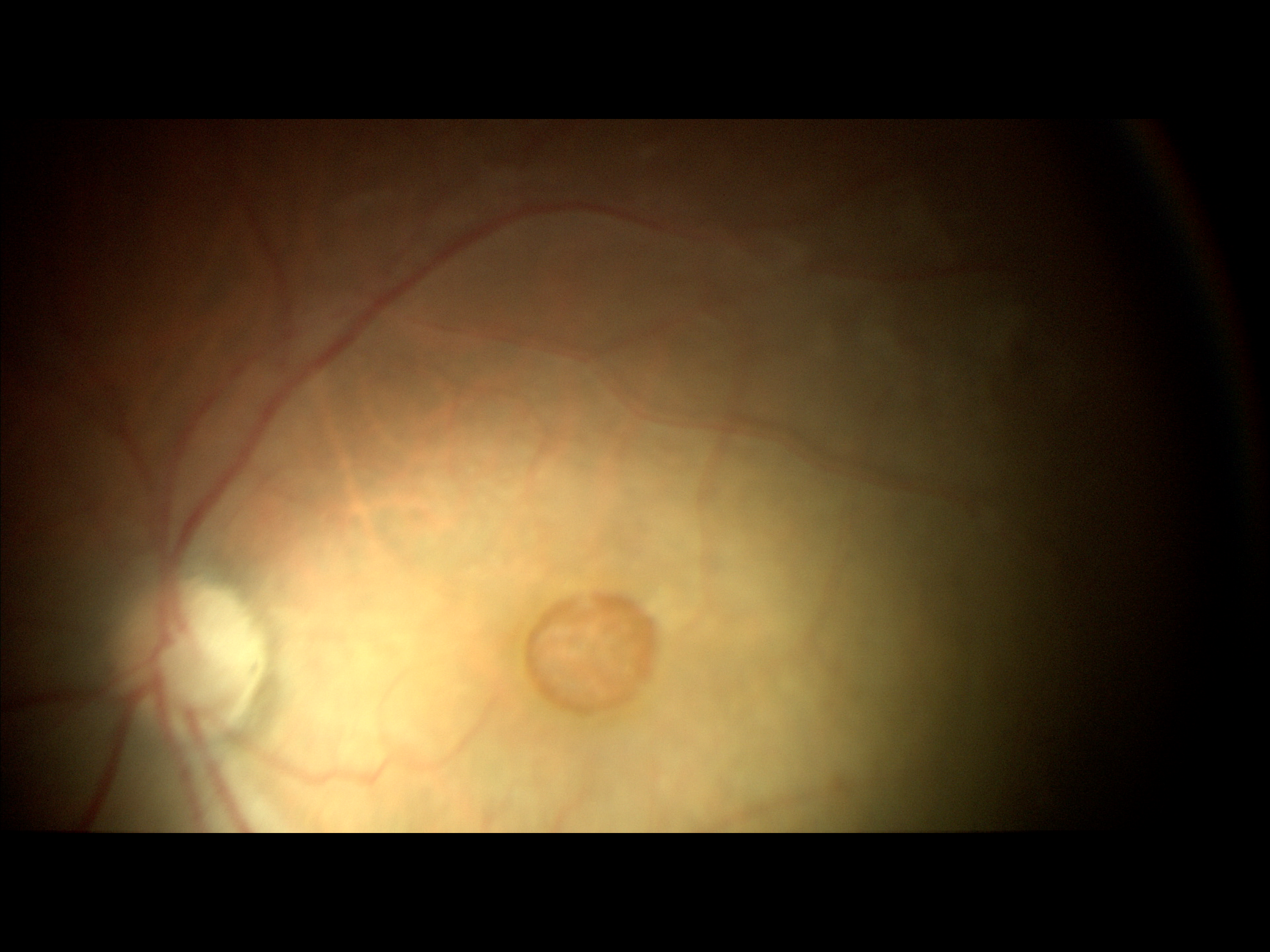
4 weeks

B:126 C:16

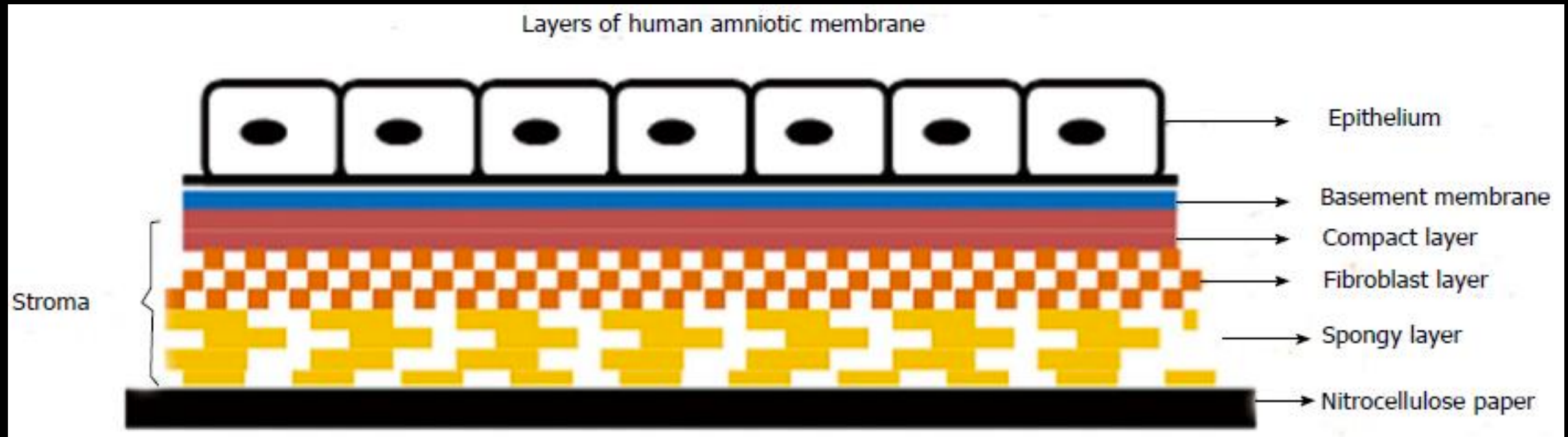


5 weeks



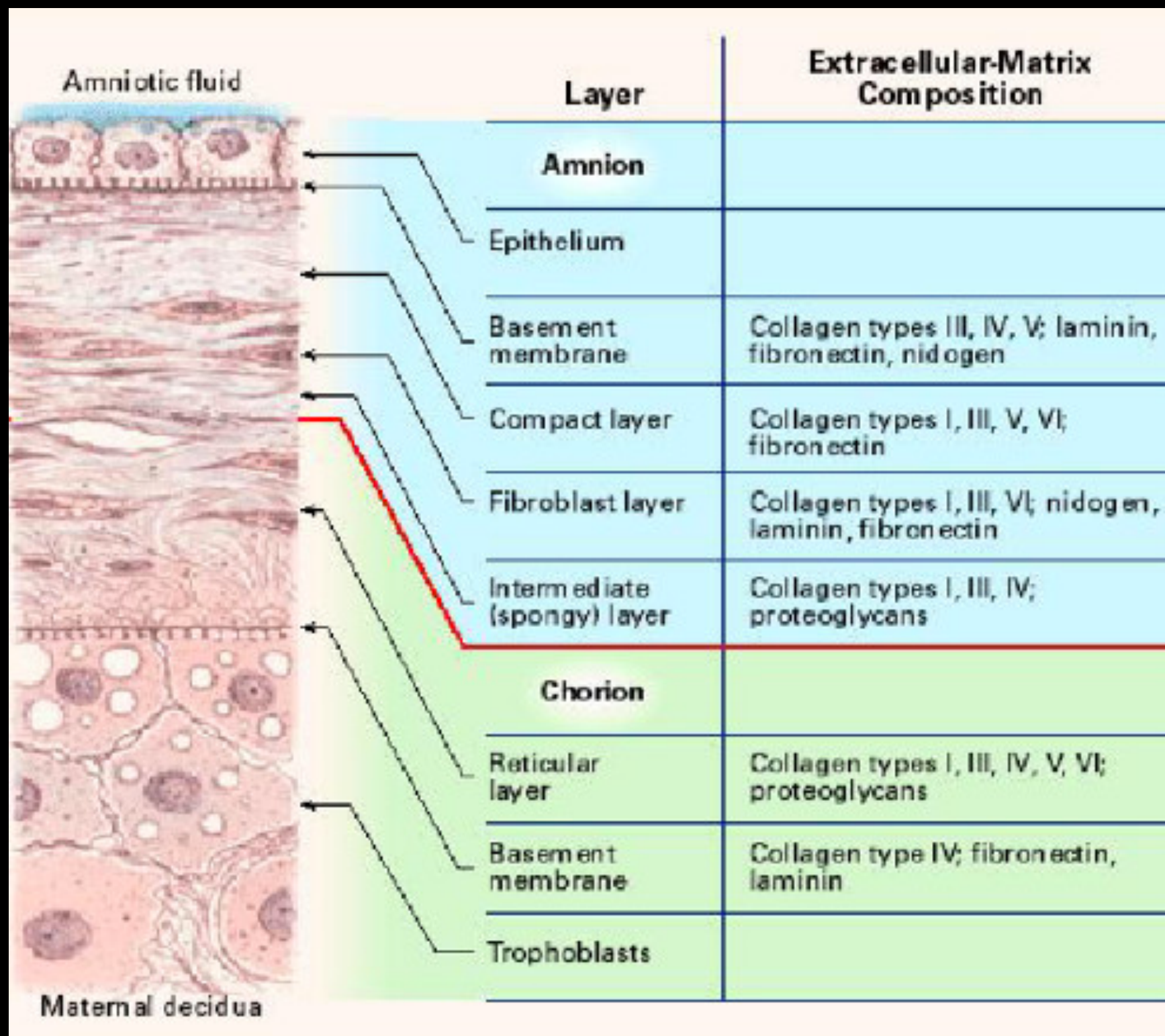


Human Amniotic Membrane (HAM)



Human amniotic membrane is the inner-most layer of the fetal membranes. It has a stromal matrix and an overlying BM with a single layer of epithelium.





HAM is intended to act as a scaffold for epithelial cells to grow. The HAM is **placed epithelial/basement membrane side up**.

Amniotic Membrane Transplantation has been successfully used on patients with

- ★ Persistent epithelial lesions
- ★ Ulceration
- ★ Symptomatic bullous keratopathy
- ★ Band keratopathy
- ★ Chemical and thermal burns
- ★ Conjunctival surface reconstruction
- ★ Ocular cicatricial pemphigoid
- ★ Steven–Johnson syndrome.

★Carmen Capeans has demonstrated (RPE) Seeded over HAM in the first 24 hours.

★RPE cells can Proliferate over HAM.

Rosenfeld PJ, Merritt J, Hernandez E, et al. Subretinal implantation of human amniotic membrane: a rabbit model for the replacement of Bruch's membrane during submacular surgery. Invest Ophthalmol Vis Sci 1999;40.

Capeans C, Pineiro A, Pardo M, et al. Amniotic membrane as support for human retinal pigment epithelium (RPE) cell growth. Acta Ophthalmol Scand 2003;81:271–277.

Retina. 2018 Oct 3.

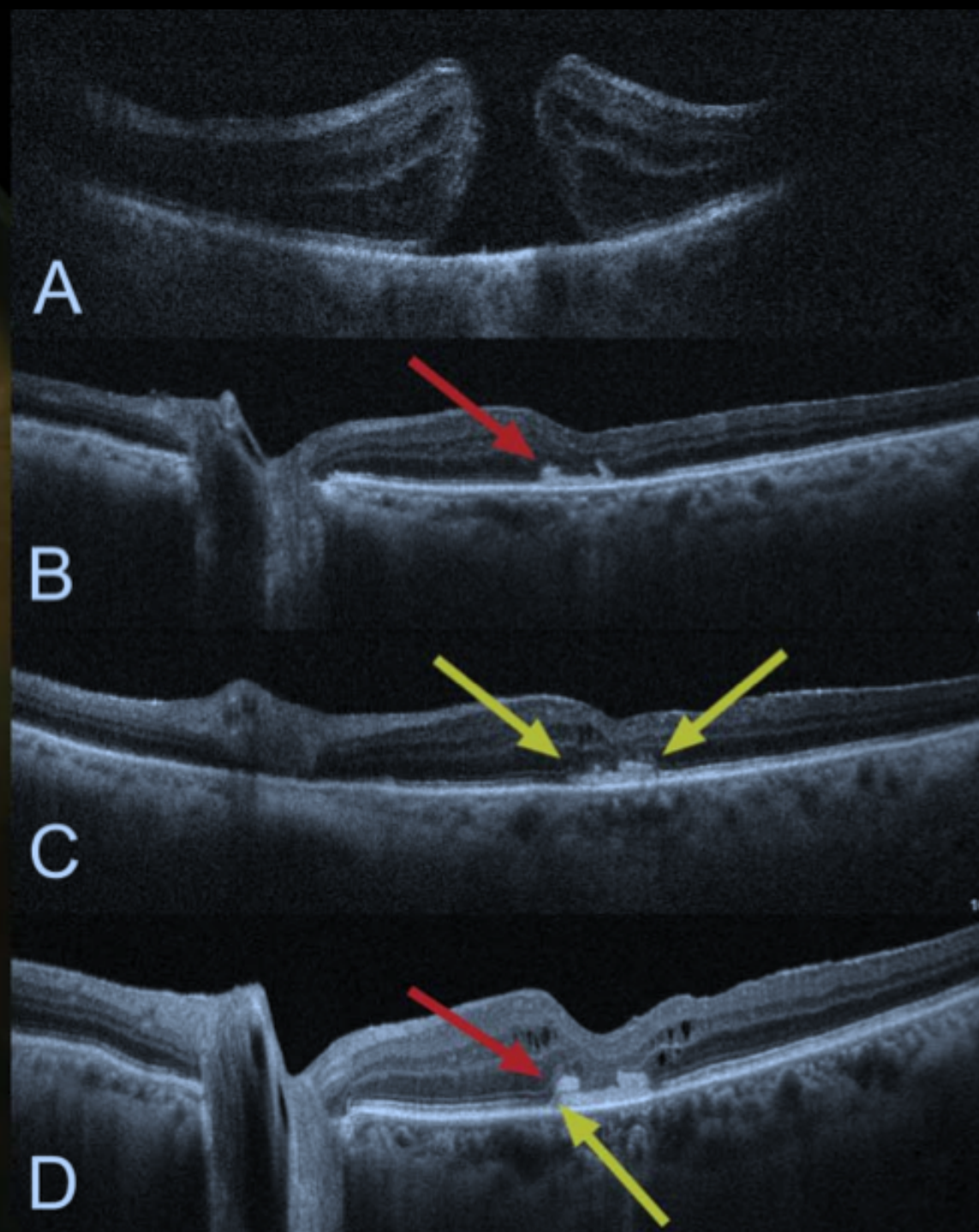
A Human Amniotic Membrane Plug to Promote Retinal Breaks Repair and Recurrent Macular Hole Closure.

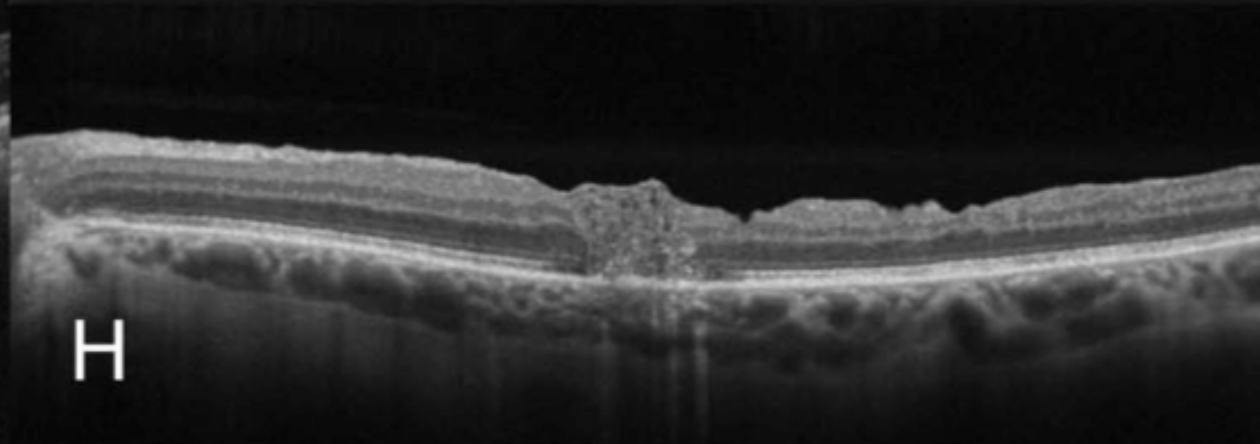
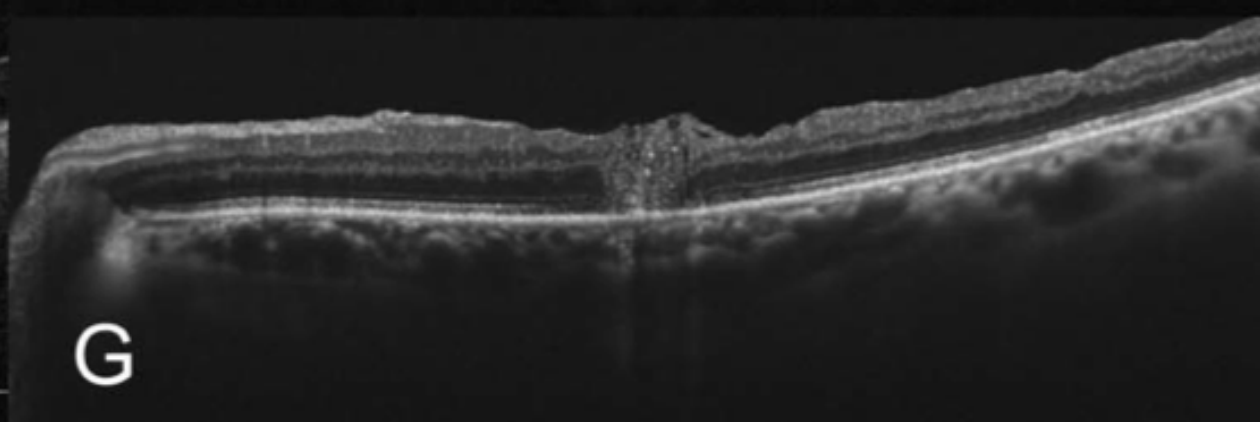
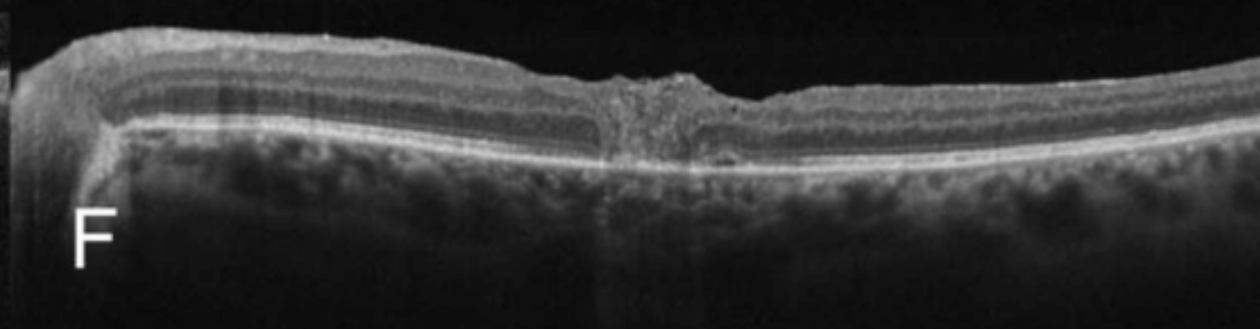
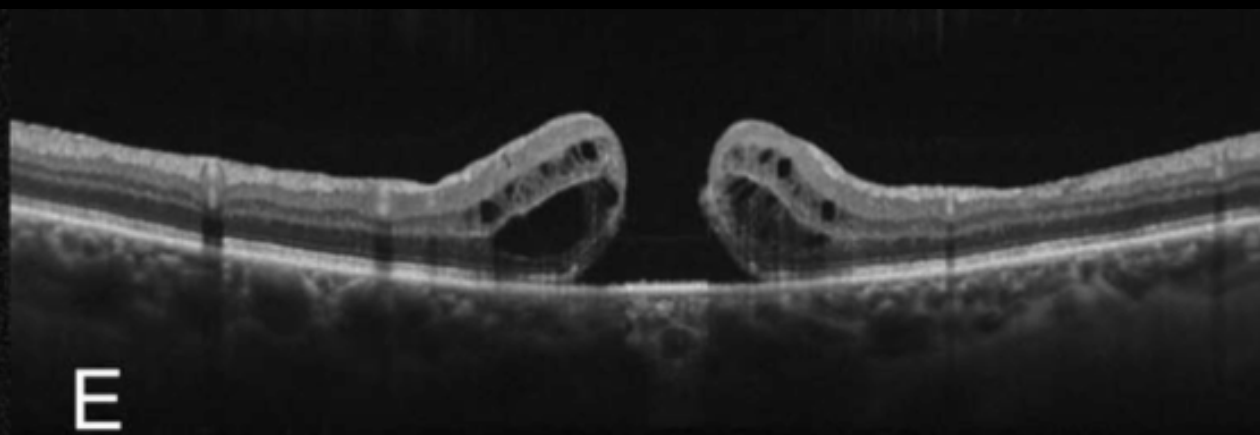
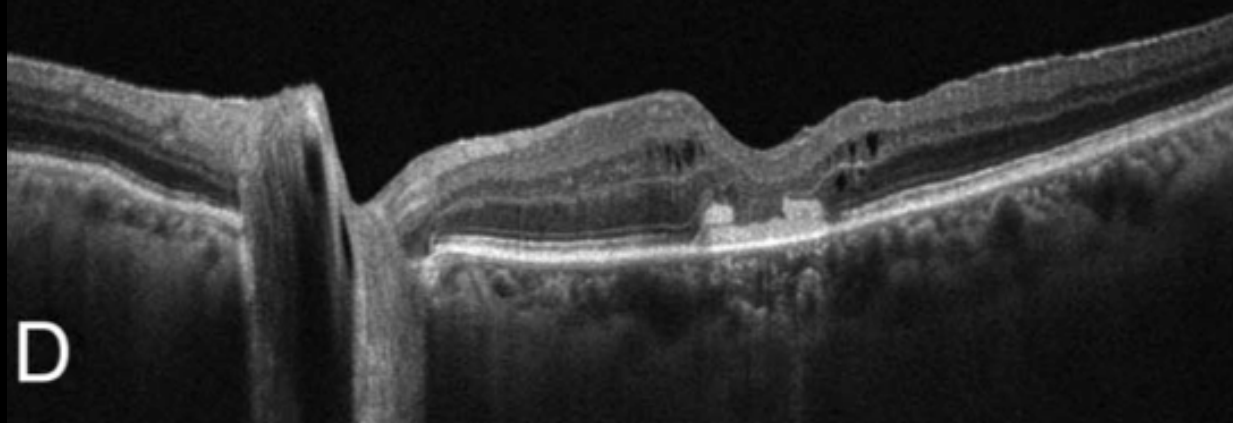
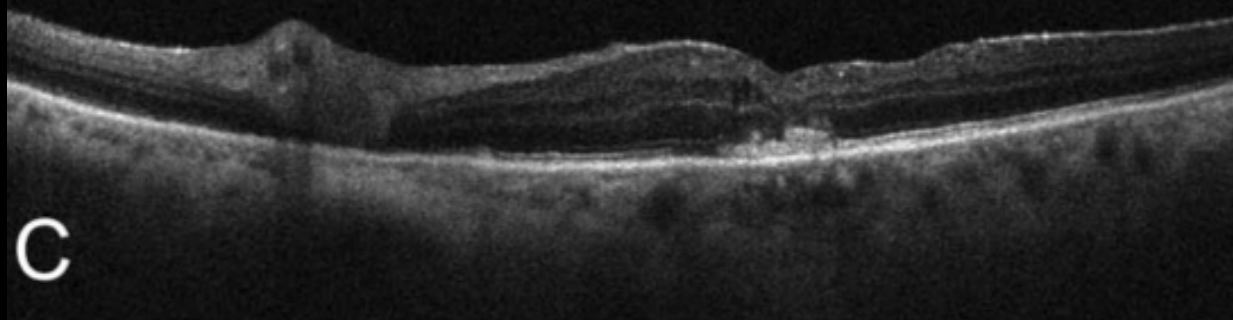
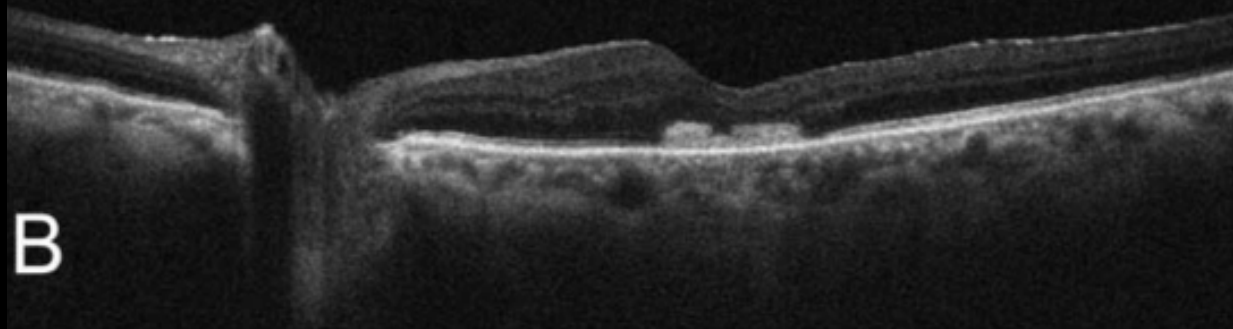
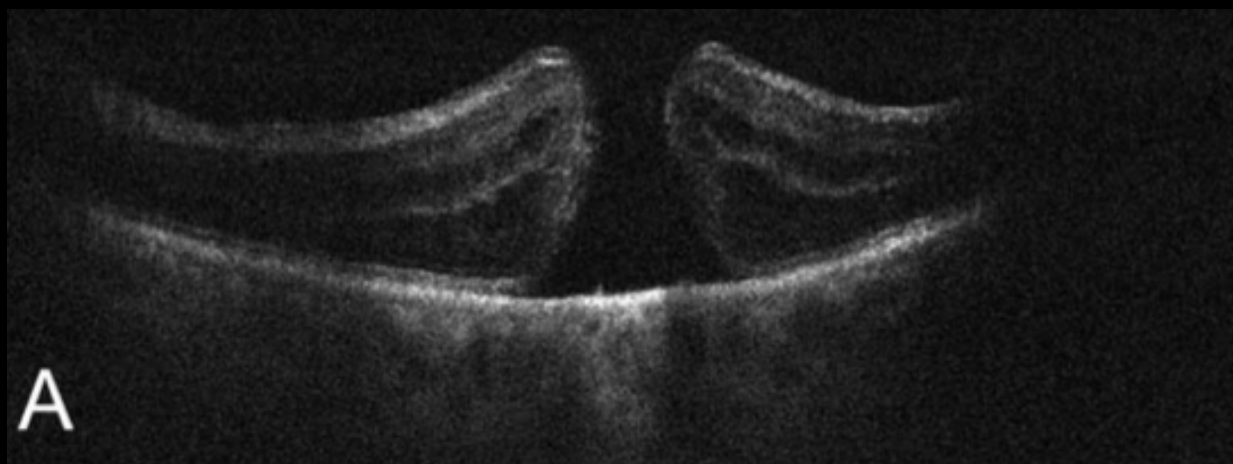
Rizzo S¹, Caporossi T, Tartaro R, Finocchio L, Franco F, Barca F, Giansanti F.

Table 1. Preoperative Demographic Data and Findings, and Results (Macular Hole Group)

Patient ID/Age (YO)/ Sex	Eye	Pathology	Previous Intervention	Follow-up Months	Lens Status	Preoperative BCVA—Snellen (LogMAR)	IOP-Pre	Final BCVA—Snellen (LogMAR)	Final IOP
1/81/M	Left	MH	PPV + GAS	10	Pseudophakic	20/400 (1.3)	16	20/63 (0.5)	16
2/78/F	Right	MH	PPV + SSO	7	Pseudophakic	20/2000 (2)	14	20/200 (1)	16
3/78/M	Left	MH	PPV + GAS	6	Phakic	20/400 (1.3)	18	20/100 (0.7)	14
4/78/F	Left	MH	PPV + GAS	6	Phakic	20/2000 (2)	16	20/63 (0.5)	15
5/54/F	Right	HM-MH	PPV + GAS	5	Pseudophakic	20/100 (0.7)	24	20/63 (0.5)	15
6/76/F	Left	MH	PPV + GAS	5	Pseudophakic	20/800 (1.6)	12	20/80 (0.6)	14
7/69/M	Right	MH	PPV + GAS	4	Phakic	20/200 (1)	14	20/40 (0.3)	19
8/42/M	Left	MH	PPV + GAS	3	Phakic	20/2000 (2)	15	20/200 (1)	15

HM-MH, high myopic macular hole; MH, macular hole; PPV, pars plana vitrectomy; SSO, standard silicon oil.





Thank You!

