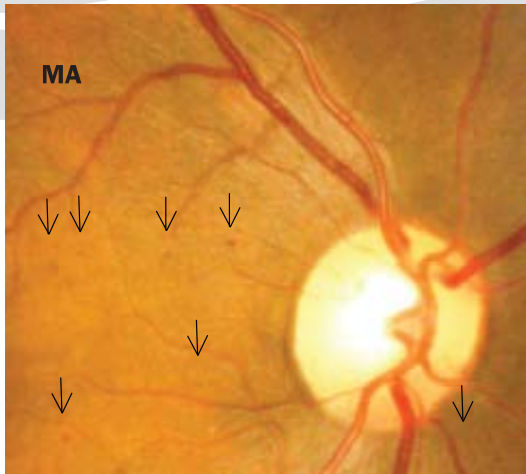


Retinal photography for diabetic retinopathy screening

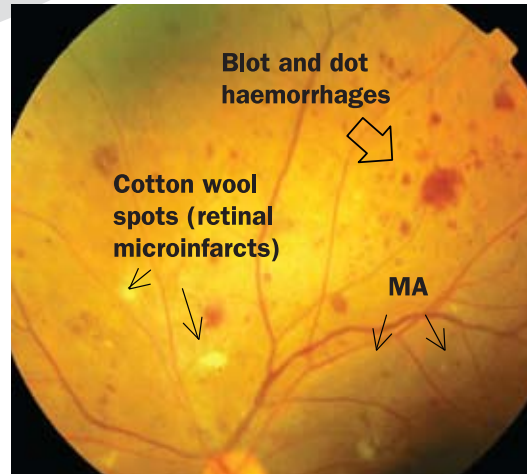
**A quick guide to reviewing diabetic retinal photographs**

**Non proliferative diabetic retinopathy (NPDR)**

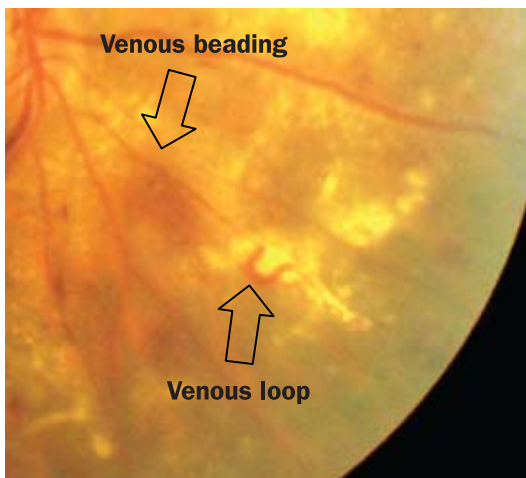


Microaneurysms (**MA**) only, affecting fewer than 4 quadrants, is "mild NPDR"

follow up

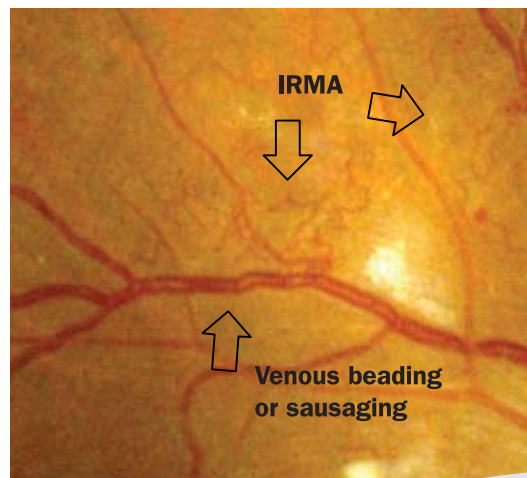


Anything more than just MA (such as intraretinal haemorrhages; **EH**, hard exudates; **CWS**, cotton wool spots) is no longer "mild NPDR"



Venous beading in more than 1 quadrant signifies severe DR

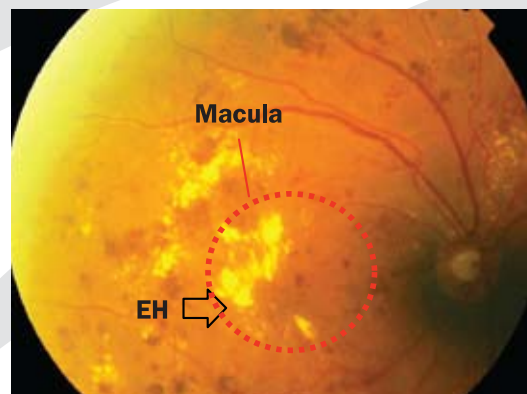
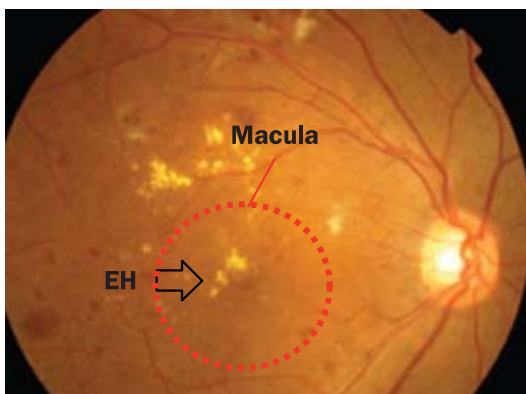
refer



Prominent intraretinal microvascular abnormality (**IRMA**) signifies severe DR

refer

**Diabetic maculopathy**

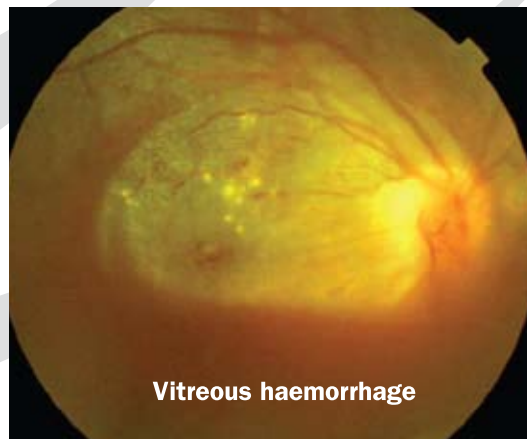
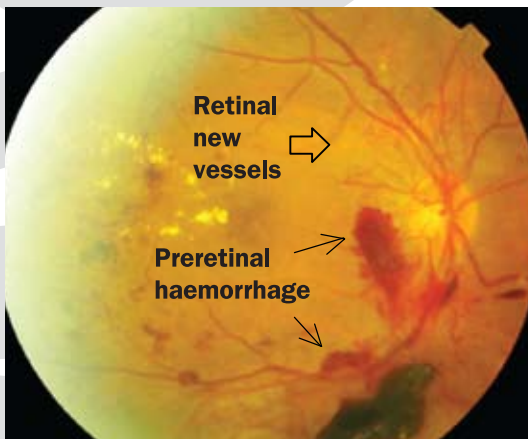


Hard exudates, microaneurysms, haemorrhages or retinal thickening at the macula.

refer

# Proliferative diabetic retinopathy (PDR)

refer urgently

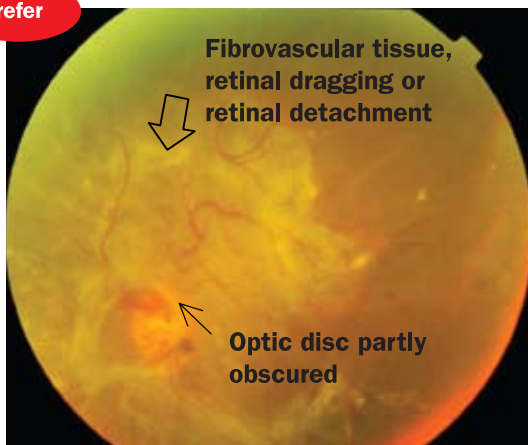


Any neovascularization, preretinal haemorrhage or vitreous haemorrhage.

Retinal new vessels may be very fine and easily-missed. The presence of preretinal or vitreous haemorrhage almost always indicates that new vessels are present, whether or not they are visible.

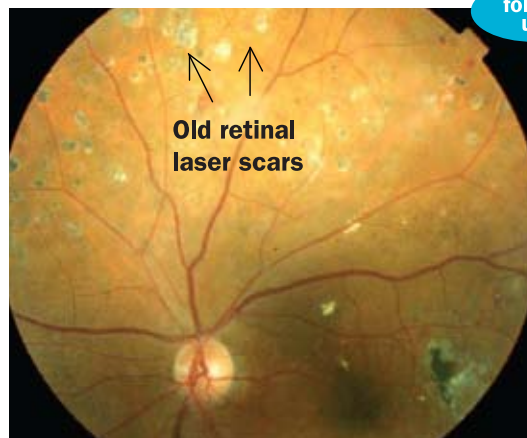
## Advanced diabetic eye disease

refer

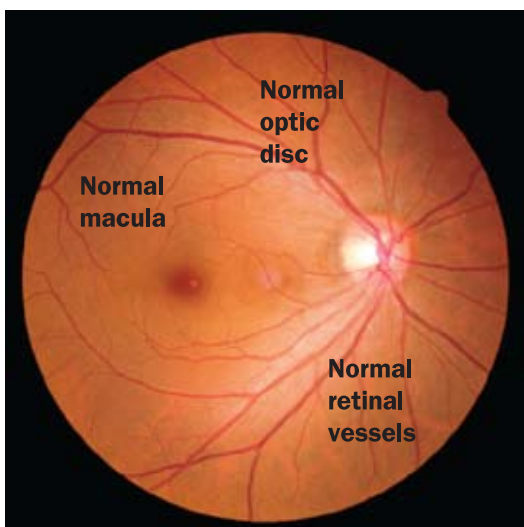


## Treated, quiescent diabetic retinopathy

follow up

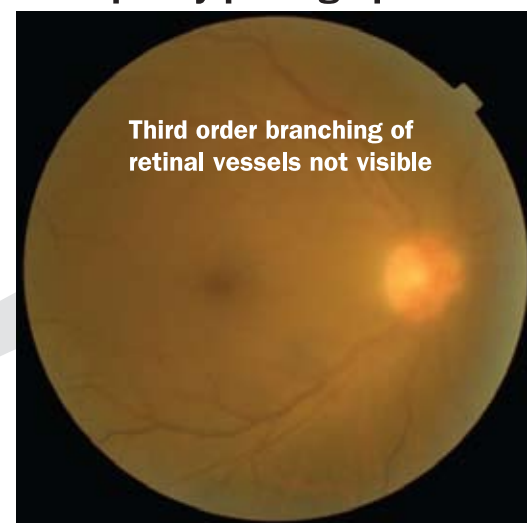


## Normal retina



No red or yellow spots  
Good photograph

## Poor quality photograph



Ungradeable photograph

**Helpful tip:** Unlike yellow lesions (eg. exudates), red lesions (eg. microaneurysms and abnormal blood vessels) are easily missed, especially in photo prints. The best way of detecting these often subtle findings is to view the digital images in high magnification (zoom) and to use the "Autocorrect" (or similar) function to enhance image contrast and brightness.