# Wet age-related macular degeneration (wet AMD)

Wet AMD (also known as neovascular AMD, or nAMD) is an eye disease that damages a portion of the retina called the macula. The macula is located in a region near the back of the eye and is necessary for sharp vision. Wet AMD leads to a loss of central vision and the ability to see things directly ahead.

#### **AMD: A global health problem**

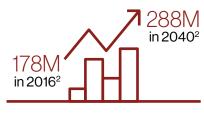




cause of blindness in industrialized nations<sup>1</sup>



cause of blindness globally<sup>1</sup>

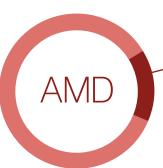


Number of people with AMD

#### Two types of AMD

85% Dry AMD<sup>3</sup>

- Gradual worsening
- Less severe



15%

- Rapid worsening
- Abnormal, leaking vessels under the retina
- Severe vision loss

90%

of severe vision loss

among all AMD patients is due to

wet AMD

#### Wet AMD Risk Factors<sup>4,5</sup>







Older age



Higher BMI



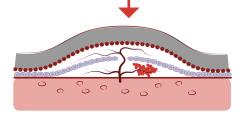
Higher HDL-cholesterol

anti-VEGF therapy

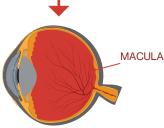
## How does wet AMD affect the eye?



Abnormal blood vessel growth into the retina



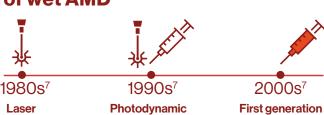
Leaky blood vessels cause fluid buildup within the retina



Macula (tissue in the back of the eye)



# Advancements in the treatment of wet AMD



therapy

What is an anti-VEGF drug?

therapy

A drug that blocks the activity of a protein called VEGF,\* which drives the abnormal formation of blood vessels that can leak fluid resulting in swelling of the retina

\*VEGF: vascular endothelial growth factor

### Challenges with existing anti-VFGF therapies<sup>6</sup>



Frequent medical visits for check-ups and treatment



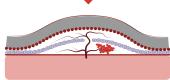
Long waiting periods



Logistical challenges including coordinating transportation to visits and time off work



Missed or off-schedule treatments



Fluid buildup and continual worsening of disease

1. Prevention of Blindness and Visual Impairment. WHO website. http://www.who.int/blindness/causes/priority/en/index7.html. Accessed October 2018. 2. Wong WL, Su X, Li X, et al. Global prevalence of age-related macular degeneration and disease burden projection for 2020 and 2040:a systematic review and met analysis. *Lancet Glob Health*. 2014;2:106-16. 3. Gottlieb JL. Age-related macular degeneration. *JAMA*. 2002;288:2233-6. 4. Cheung CM, Laude A, Yeo I, et al. Systemic, Ocular and Genetic Risk Factors for Age-related Macular Degeneration and Polypoidal Choroidal Vasculopathy in Singaporeans. *Sci Rep*. 2017;7:41386. 5. Risk Factors for Macular Degeneration. American Macular Degeneration Foundation website. https://www.macular.org/risk-factors. Accessed October 2018. 6. Holz FG, Schmitz-Valckenberg S, and Fleckenstein M. Recent developments in the treatment of age-related macular degeneration. *J Clin Invest*. 2014;124:1430-8. 7. Gehrs KM, Anderson DH, Johnson LV, and Hageman GS. Age-related macular degeneration—emerging pathogenetic and therapeutic concepts. *Ann Med*. 2006;38:450-471.



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