

Vision Basics: Lens types & options





Let's review the basics of eyeglass lenses



Lens types 101

Single vision

- Have the same power of correction across its whole surface
- Used to correct one field of vision either distance or near
- Can correct conditions such as farsightedness, nearsightedness and/or astigmatism
- The most commonly prescribed lenses on the market



Image for illustrative purposes only

Bifocal

- Includes 2 different areas of vision correction (divided by a horizontal line across the lens)
- Top portion of the lens is used for distance vision
- Bottom portion of the lens is used for closer vision



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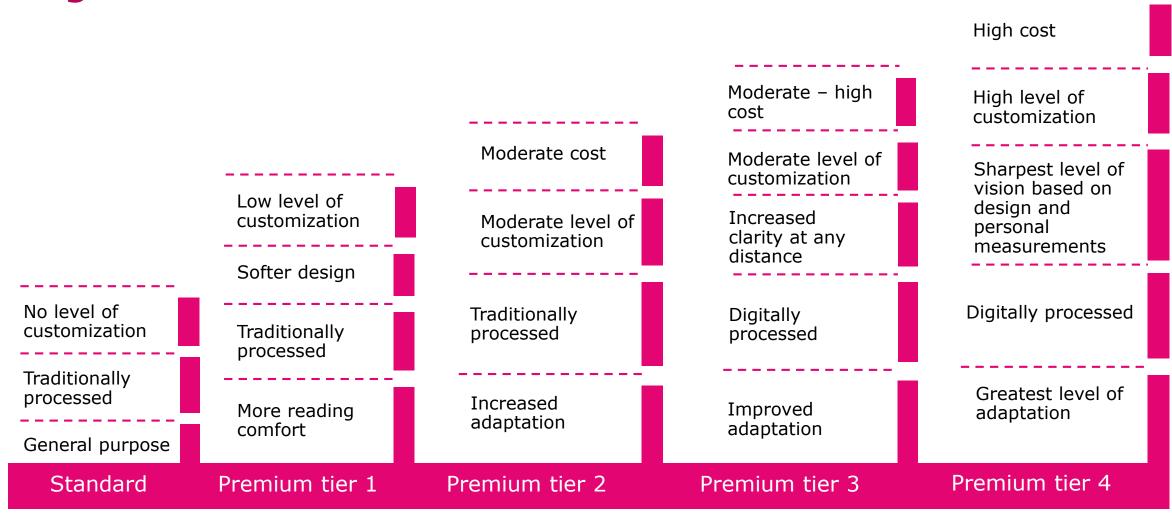
Progressive

- Provide a graduated range of vision that varies from distance (on the top) to reading (on the bottom)
- Typically seen as the best lens for complete vision correction at all distances
- Also known as no-line bifocals (because there's no horizontal line across the lens)



Image for illustrative purposes only

Progressive Lenses: Standard vs. Premium





Trifocal and lenticular

Trifocal

- Correction for 3 fields of vision
- Correction for near, far and intermediate vision

Lenticular

- For those who require a high-plus power (that a traditional lens cannot provide)
- Technology bonds 1 lens to the center of another to reach the correct power





Lens materials 101

Plastic vs. glass



Plastic lenses

- Most economical material for eyeglass lenses
- Lightweight and thinner than glass lenses
- Great option for value-conscious consumers



Glass lenses

- Most scratch-resistant lens material
- Heavier and more brittle than plastic lenses (making it infrequently used)
- Wide selection of lens styles

Polycarbonate

- A type of specialized plastic lens
- Impact, scratch-resistant and durable
- Thinner, lighter and more durable than standard plastic lenses
- Provides 99% UV protection

High index

- A type of specialized plastic lens
- Super thin and more lightweight than polycarbonate
- Bends light more efficiently, so light travels faster through them
- Offers the same degree of visual correction using less material

Best for anyone with an active, sporty lifestyle (especially children)



Best for individuals with a strong prescription, who want a lighter, thinner look



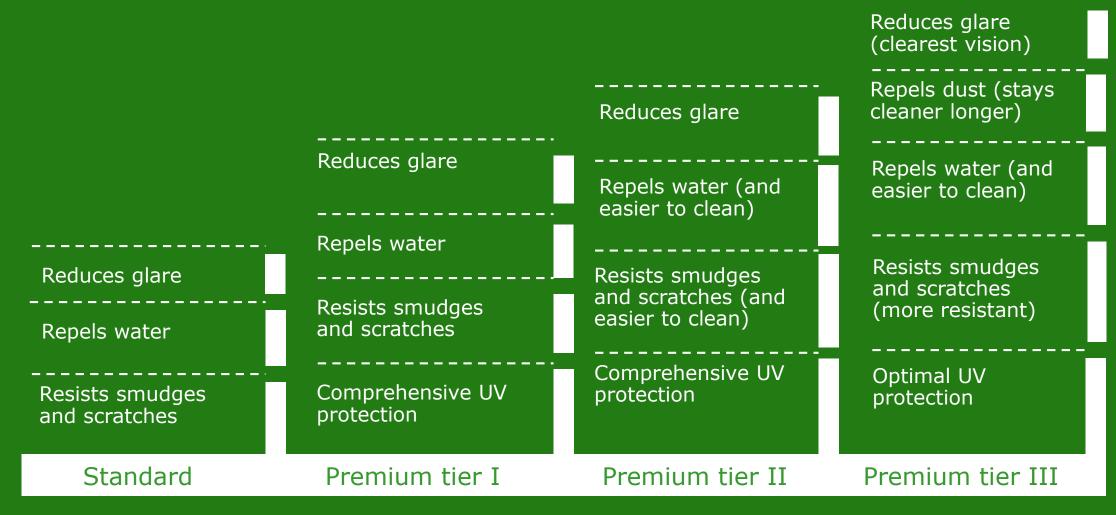
Common lens add-ons & enhancements

Anti-reflection

- Greatly reduces reflections on lenses
- Helps improve night vision (and makes driving in the dark safer)
- Reduces headaches, blurred vision and watery eyes caused by eye strain
- Best for: all patients but especially those who drive a lot at night, or those who work on a computer



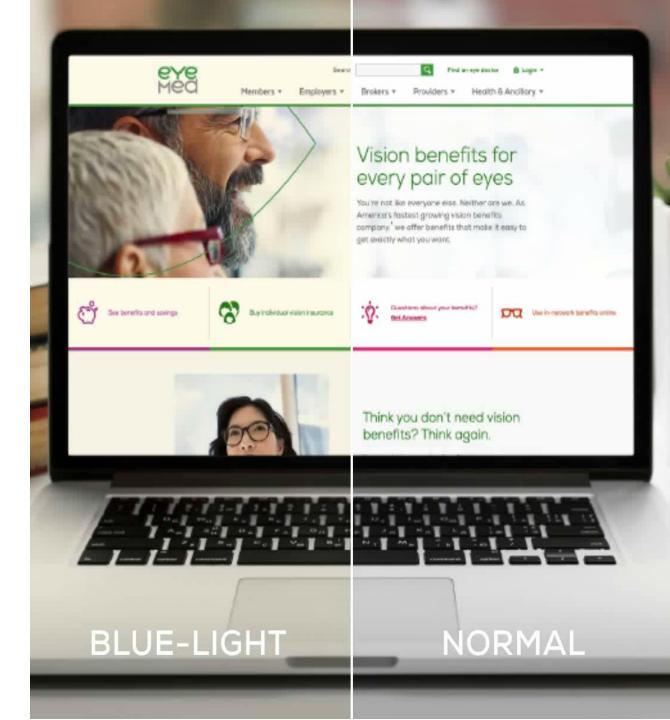
Anti-reflective: Standard vs. Premium

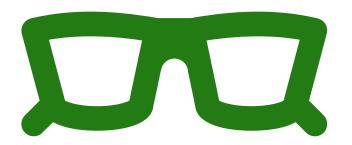




Blue light-filtering

- Filters the artificial light known as blue light
- Helps reduce blue light exposure with blue light filtering lenses
- Can be incorporated into the lens material in an Anti-Reflective coating or added to a lens as a Tint coating
- Best for: anyone who spends a lot of time using digital devices





Common protective add-ons

Scratch coating

- Helps protect lenses from everyday surface damage
- Helps prolong the life of lenses

Ultraviolet coating

- Helps protect against harmful ultraviolet (UV) rays
- Reduces the amount of UV light that passes through the lens

Tint

- Permanent color in the lens – either for function or fashion
- Reduces the amount of visible light that enters the eye

Photochromic

- Lenses adapt to changing light conditions
- Helps block UV rays
- Filters blue light
- Virtually clear lenses indoors and at night
- Top brand name: Transition Lenses
- Best for: anyone wanting the convenience of one pair of glasses that adapts to conditions



Polarization

- Used in sunglasses to help eliminate glare and distracting reflected light
- Reduces squinting and eyestrain while helping fight eye fatigue and headaches
- Best for: everyone purchasing sunglasses all patients of all ages







Contact lens wearer?

Contact Lens Exam

The Contact Lens Exam is a separate evaluation to determine your contact prescription, size and type of contact best suited for you

 The contact lens exam is also known as a Contact Lens Fit & Follow-Up and they fall into two categories:

Standard

- Applies to A standard contact lens is defined as a clear, soft, spherical, daily wear contact lenses for single vision prescriptions
- Does not include extended/overnight wear for any prescription

Premium

- Applies to more complex needs
- Includes, but not limited to, toric (astigmatism), multifocal, monovision, post-surgical, gas permeable contact lenses and other non-standard contact lenses



Contact lens types



Conventional

Designed for daily wear or extended use (and can last up to a year)



Disposable

Designed to be thrown away after a short period of timedaily, weekly, bi-weekly, monthly or quarterly



Medically-necessary

Worn when certain medical conditions hinder correction through regular eyeglasses or contacts

*Subject to approval by our Medical Director