

Creating Dry Eye Protocols for Younger Generations

Janelle L. Davison, OD

1 hour

Course Description:

Dry eye disease (DED) is no longer limited to older adults or those with autoimmune conditions. It now affects all age groups, with a strong connection to prolonged screen time on phones and computers. Digital device use disrupts tear stability and increases dry eye symptoms, making it a growing concern for younger generations. This course will highlight the risks across different age groups and provide practical strategies for effectively managing dry eye in younger patients.

Learning Objectives:

1. **Understand Key Risk Factors:** Explore the impact of digital device use, harmful beauty trends, and contact lens considerations on tear film stability and dry eye disease in younger patients.
2. **Develop Effective Clinical Protocols:** Learn how to screen, diagnose, and manage dry eye disease in younger patients using evidence-based approaches and clinical pearls for success.
3. **Implement Advanced Treatment Strategies:** Gain insights into in-office treatment options and strategies to optimize outcomes for younger patients with dry eye disease.

Course outline:

- A. **Increased device usage** greater than 2-3 hours per day
 - a. Uptake in dry eye symptoms
 - b. Reduced tear film stability
 - c. Reduced blink rate
 - d. Increased interblink interval

- B. **Life style modifications** can help reduce symptoms
 - a. TFOS DEWS III recommendations
 - i. conscious blink training and blink reminders
 - ii. regular breaks from screen use
 - iii. environmental adjustments
 - iv. dietary supplementation

- C. **Harmful Global beauty trends (10 minutes)**
 - a. Cosmetic Act
 - i. Date created
 1. 1938
 - ii. Label buzz words
 1. Vegan
 2. Eye Doctor tested/approved
 3. Organic

- iii. How ingredients are regulated
 - 1. No recall
 - 2. Don't have to list
 - 3. Only 11 harmful ingredients in USA banned significantly less than other developed countries
 - 4. Dirty Dozen
 - a. 12 most harmful ingredients to avoid
- b. Lash extensions
 - i. False
 - ii. Magnetic
 - iii. Individual
- c. Lash Lift/perm
- d. Eye Liner application
 - i. Waterline
 - ii. Tight line
- e. Eye shadows
 - i. Glitter
- f. Retinoid creams

D. Clinical Approach

- a. Effectively screen patients
 - i. Set screening protocol
 - 1. Age limit
 - 2. Screening questionnaires
 - 3. Imaging
- b. Level up diagnostic testing and treatment equipment
 - i. Create a repeatable testing protocol
 - 1. Cornea
 - a. Staining
 - i. Vital dye NAFL
 - b. TBUT
 - i. NIKTBUT
 - 1. Great for younger patients
 - c. Sensitivity testing
 - i. Neurotrophic keratitis
 - 1. More common in older generations
 - 2. Tear production
 - a. Schirmer testing
 - b. Tear meniscus height
 - 3. Tear interferometry
 - 4. Meibography
 - 5. Tear Osmolarity
 - 6. MMP9
 - 7. Lid and lash evaluation
 - ii. Treatment options
 - 1. Foundational treatment (all)

- a. Tears
- b. Warm compresses
- c. Lid hygiene
- 2. Prescription medications (21 and up)
 - a. Topical Steroids
 - b. Immunomodulators
 - c. Neuromodulation
 - d. Perfluorohexyloctane
 - e. lotilaner
- 3. Thermopulsation (21 and up)
- 4. Intense pulse light (21 and up)
- 5. Low light level therapy (16 and up)
- 6. Radiofrequency (21 and up)
- 7. Biologic therapy
 - a. Amniotic membrane extract drops
 - b. Autologous serum
 - c. Amniotic membranes

- c. Educate
 - i. Provide written treatment plans for patient reference
- d. Provide access to clean beauty alternatives
 - i. Think Dirty App
 - ii. Sell products in office or online website

E. Clinical Pearls

- a. Prepared for rejection of care
- b. Increase patient access to care
 - i. Medication assistance programs
 - ii. Medication coupons
 - iii. Provider Prior Authorization assistance
- c. Effective communication
 - i. Discussing DED with minors and parents.

F. Q&A / Discussion