Ultraviolet (UV) Light Eye Exposure Fact Sheet

Photokeratitis is a very painful eye condition which results from unprotected eye exposure to ultraviolet (UV) rays from various sources:

- **Sun and its reflection off snow/ice, water, sand, cement**
- **Welding arcs**
- **Tanning beds**
- **Germicidal UV lamps**

The UV rays are absorbed by the outer layer of the eye (cornea) causing a "sunburn" of the eye. Longer exposures cause more severe symptoms, but usually symptoms will resolve in a few days. Symptoms can be delayed for up to a day post-exposure, although often develop within 6-12 hours. Recovery can take from 1-3 days.

**SYMPTOMS**

- Pain
- Redness
- Gritty feeling in the eyes
- Teary/watery eyes
- Headache
- Twitching of the eyelids
- Distorted vision (halos, blurriness)
- Sensitive to light
- Swelling
- Temporary loss of vision (rare)

**PREVENTION**

- Make sure you have appropriate eye protection, even on overcast days.
- Sunglasses or goggles should be rated for 99-100% UV absorption.
- They should be wraparound or side shielded with large lenses that fit close to the face. Brimmed hats can also help reduce sun exposure to the eyes.

**FIRST AID TREATMENT**

- If you experience symptoms, remove yourself from the exposure and go into a darkened room or tent.
- Remove your contact lenses if you wear them.
- Do not rub your eyes.
- Apply a cool compress to your closed eyes.
- Use artificial tears.
- Manage pain with an oral over-the-counter pain medication like ibuprofen (Advil, Motrin), if appropriate given your medical history.
- Usually, the condition will go away within a few hours to a few days; if your pain or vision distortion continues more than 2 days after exposure, seek medical attention.
REFERENCES AND ADDITIONAL RESOURCES
American Academy of Ophthalmology Photokeratitis
World Health Organization The known health effects of UV

Illness, injury and close call events shall be reported by submitting an SU-17.
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