

Dear Falcon Parents

On August 21, 2017, our first Monday of the 2017-2018 school year, Littleton will experience a 92% partial eclipse. This event is being called "The Great American Solar Eclipse," because it is the first time since 1918 a total solar eclipse will be visible across the entire continental United States. The Science Department at Falcon Bluffs has designed a day of eclipse activities to ensure our students can experience this once-in-a-lifetime event. We purchased eclipse-safe viewing glasses for all students and staff for outside viewing and will have in-class activities as well.



As always, student safety is our top priority. Looking directly into the sun is unsafe! The only way to look at the eclipse or partially eclipsed sun is through special-purpose solar filters, such as eclipse glasses. Per NASA, homemade filters or ordinary sunglasses, even very dark ones, are not safe for looking at the sun. We are taking precautionary measures with both students and staff to make this experience safe and enjoyable. Although there is no way to fully guarantee student safety during such a rare event, we will take precautionary measures including pre-education to make sure students are aware of the risks involved in directly looking at the sun. **At no time should students remove their eclipse glasses and look directly at the sun as it could cause permanent eye damage or other unknown effects. There is no way for the school to guarantee that your child will not remove their eclipse glasses at all times during the event.** We are asking for your help at home to reinforce the need for all students to follow the safety rules. We have included the Eclipse Safety Information Page on the back of this document. Please read and review this document with your students before Monday, August 21st.

If you want your child to participate in the outdoor viewing activity planned on August 21st, please review, sign and return the attached permission slip. Permission slips may be returned at back-to-school night, August 15 or the first day of school, Friday, August 18, to your student's science teacher.

By signing this permission slip, you as a parent/guardian are acknowledging that you are aware of the risks associated with this event, are freely assuming those risks, and waive the right to pursue any and all claims against the District, its agents, employees, Board of Education members, and others acting on the District's behalf, of and from any and all injuries resulting from viewing the Solar Eclipse.

**Students who do not have a signed permission slip on Monday August 21 will not be able to participate in the outside activities that day but will be able to participate in-class activities.**



## **2017 Solar Eclipse Safely - When Day turns into Night**

On Monday, August 21, 2017, a solar eclipse will be visible (weather permitting) across all of North America. The whole continent will experience a partial eclipse lasting 2 to 3 hours. Halfway through the event, anyone within a roughly 70-mile-wide path from Oregon to South Carolina will experience a brief total eclipse, when the moon completely blocks the sun's bright face for up to 2 minutes 40 seconds, turning day into night and making visible the otherwise hidden solar corona — the sun's outer atmosphere — one of nature's most awesome sights. Bright stars and planets will become visible as well.

### **Only View with Proper Eye Protection**

During an eclipse, eye safety is very important. The Sun can be viewed safely with the naked eye only during the few brief seconds or minutes of a total solar eclipse. Partial eclipses, annular eclipses, and the partial phases of total eclipses are *never safe to watch without taking special precautions*. Even when 99% of the Sun's surface is obscured during the partial phases of a total eclipse, the remaining crescent is intensely bright and cannot be viewed safely without eye protection. **Colorado will NOT experience a total eclipse, eye protection MUST be used when viewing.**

### **Avoid Eye Damage**

Looking directly at the Sun (the bright disk of the Sun itself), even for just a few seconds, can cause permanent damage to the retina of the eye, because of the intense visible and invisible radiation that the sun emits. This damage can result in impairment of vision, up to and including blindness. The retina has no sensitivity to pain, and the effects of retinal damage may not appear for hours, so there is no warning that injury is occurring.

### **Irreversible Eye Damage within a Fraction of a Second**

Under normal conditions, the Sun is so bright that it is difficult to stare at it directly. However, during an eclipse, with so much of the Sun covered, it is easier and more tempting to stare at it. Looking at the Sun during an eclipse is as dangerous as looking at it outside an eclipse, except during the brief period of totality, when the Sun's disk is completely covered (totality occurs only during a total eclipse and only very briefly; it does not occur during a partial or annular eclipse). Viewing the Sun's disk through any kind of optical aid (binoculars, a telescope, or even an optical camera viewfinder) is extremely hazardous and can cause irreversible eye damage within a fraction of a second.

***For more information visit: <https://eclipse2017.nasa.gov/safety>***

# **Permission Slip**

StudentName \_\_\_\_\_ Grade \_\_\_\_\_

Science Teacher \_\_\_\_\_

I, Parent/Guardian of \_\_\_\_\_, hereby give permission for my son/daughter to participate in the Solar Eclipse activity to view the Eclipse on August 21,2017.

Parent/Guardian Signature \_\_\_\_\_ Date \_\_\_\_\_