# eyealert SMART SAFETY GLASSES SYSTEM IN THE WORKPLACE

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## OUR CONCEPT

eye**alert** is a system that prompts users when they forget to wear their safety glasses. This system integrates regular safety glasses with 3 simple components and a system that notifies the user to put their safety glasses back on with visual and physical cues. By reminding users to wear their safety glasses, the risk of danger caused by carelessness in the Makerspace should be reduced significantly.

## MOTIVATION

Safety glasses play an important role in ensuring people's safety in any workspace, as eye injuries can be costly and permanently debilitating. Although safety glasses are one of the most basic safety equipment, it is also one of the easiest ones to forget. According to the Centers for Disease Control and Prevention, 90% of eye injuries could be prevented by using safety glasses. Clearly, it is imperative that safety glasses are worn in any situation where eye safety can be compromised.

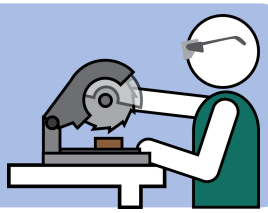
## IMPLEMENTATION

eye**alert** is wirelessly connected to a central "hub". If the glasses are detected as not being worn, a signal will be sent out to an external light on the wall to visually stimulate the user/staff, as well as activate the vibration motor on the glasses as physical stimulation. After the user is finished with their projects, they simply return the eye**alert** glasses to the charging rack.

## OUR SYSTEM:

1 put on

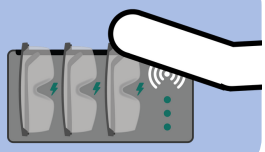
2 work



3 if taken off, you are alerted


4 put back on

5 return to hub when finished



## KEY FEATURES

### 1 FRICTIONLESS

Considering our design is built on top of standard safety glasses, users would experience minimal changes in adapting to the new system, as there is virtually no change to the current process of using safety glasses.

### 2 ADAPTABILITY

In almost every situation, safety glasses are required to be worn in the Makerspace. Our design plays its part. eye**alert** will work with any tool in any makerspace.

### 3 INSTALLABILITY

As a result of an easy-to-attach system and low number of components, permanent installation its at a minimum. This allows for simple and straightforward repair and replacement.