Protecting Your Eyes from Pesticide Exposure

Frederick Fishel

Figure 1. Example of a label’s eyewear protection statements

Vision is one of our most important senses, and eyes are very sensitive to chemicals contained in some pesticide formulations. Eyes readily absorb pesticides (ocular exposure); therefore, some product labels require handlers to wear protective eyewear. The statements regarding eye protection and other personal protective equipment (PPE) are generally found in the label’s “Precautionary Statements” section (Figure 1).

Some products do not require handlers conducting certain activities -- such as applying diluted pesticides -- to use protective eyewear. Labels on such products may indicate, however, protection is necessary for handling concentrates. Other products may require protective eyewear for all uses. Keep in mind that prescription eyeglasses and other eyeglasses do not offer protection from ocular exposure to pesticides.

Some labels will explain in detail the exact type of protective eyewear that should be worn. Satisfactory protective eyewear for handling pesticides generally is of three types:

- Shielded safety glasses,
- Goggles, and
- Full faceshields.

Shielded safety glasses (Figure 2) and full faceshields (Figure 3) are good choices in many situations because these protective devices are relatively comfortable, do not cause fogging and sweating, and they provide adequate protection.

Faceshields that are cupped inward, towards the throat, give better protection from splashes than straight faceshields.

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Figure 2. Shielded safety glasses

Figure 3. Full faceshield

Safety goggles are available in several models (Figures 4 and 5) and are appropriate in various situations, including making airblast applications from an open cab, flagging aerial applications, applying fogs and mists indoors, and other enveloped situations.

Safety goggles that are vented will help protect against fogging. Three variations in venting are available:

• Open vents for impact protection only,
• Indirect vents for splash protection, and
• Non-vented for protection from mists and fumes.

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Either goggles or shielded safety glasses can be worn with a half-face respirator (Figure 6). Full-face respirators are supplied with their own faceshields, so additional eye protection is not required (Figure 7).

Pesticide labels that list eye protection in their PPE statements and pertain to the Worker Protection Standard (WPS) require that at least 1 pint of emergency eyeflush water be immediately accessible for each pesticide handler. Eyewashes can be portable in several forms, such as clean water and special formulated solutions (figures 8 and 9). Eyewashes can also be available in a fixed location, such as an eyewash station (Figure 10) in a convenient place.

Because some pesticides are corrosive or cause eye irritation within seconds, consider carrying eyewash with you when handling such pesticides.
Additional information


