



# Tool Box Safety Talk No. 1

September 2002

## **Basic Personal Protective Equipment**

The proper selection and use of basic personal protective equipment is essential for maintaining your health and safety on construction sites. Personal protective equipment includes but is not limited to industrial clothing. Specialized personal protective equipment such as eye, noise and respiratory protection will be dealt with in separate toolbox meeting topic.

### **Footwear**

When purchasing construction footwear go to a store that specializes in the selling and fitting of protective industrial footwear. Protective footwear protects your feet from crushing, bruising, fractures, sprains, cuts and asphalt burns. Wounds to the feet may be caused by punctures by sharp objects, impact from heavy objects landing on your feet or by movement or pressure wounds such as ankle sprains. Properly selected footwear may also protect the worker from electrocution, heat, cold and corrosive liquid injuries. Choose leather high top boots with slip resistant soles. Construction footwear is manufactured to CSA standards and must be labeled to confirm compliance to the hazard it is providing protection from. In Alberta GRADE 1 footwear with puncture resistance and high voltage protection is required. The sole of the boot protects the bottom of the foot against hazards and protection will lessen as the sole wears out over time. When wearing footwear ensure that your boots are fully laced and tied. Keep footwear clean and inspect them for damage or embedded metal objects such as screws. Boots will last longer when a protective water-resistant coating such as Dubbin is applied regularly. Replace footwear often.

### **Hardhats**

Roofers working in an area where there is a risk of head injury must wear a protective hardhat. This basic piece of personal protective equipment shall be transported to each work site and must be placed within the worker reach at all times. At roof level the hardhat need not be worn unless work is taking place overhead or when craning operations are being undertaken. Hardhats must be worn at all times when workers are at ground level. This includes walking across the construction site to access the roof work area and when handling or hoisting materials stored at ground level. The standard for the manufacture of hardhats purchased after 1994 is American National Standard Institute (ANSI) Z89.1-1986 and encompasses three (3) classes of service conditions. Most construction hardhats meet all three service Classes A, B & C. The manufacturers name, ANSI standard and hard hat class are marked on the inside of each hardhat shell. Regular inspection and maintenance of the shell and suspensions will ensure that the head protection will perform as intended. Check for anything that could weaken the shell such as penetrations, cracks and dints. Hardhats that are dull in colour or have a chalky appearance must be replaced. The suspension inside the shell shall be inspected for wear or damage to the suspension lugs, adjusting slots and suspension harness. With normal use the suspension should be changed annually. Regular cleaning of the shell and suspension will extend a hardhat's service life. Do not paint or attach anything that may weaken the shell. Do not carry anything in the shell that will reduce the shock absorbing space surrounding the head. Hardhats that have sustained an impact should be remove from service and destroyed.

## **Hand Protection**

Select the proper type of work glove for the task being performed. Inspect gloves for cuts or tears that could allow dangerous goods to enter and be contained within the gloves while being used. Leather gloves or cotton gloves with leather palms are suitable for general roofing work including material tear off and handling, carrying equipment, sheet metal or hot asphalt work. Neoprene or nitrile rubber gloves will protect the hands when applying adhesives and cleaning solvents and must be worn to prevent the absorption of chemicals through the skin. Cotton gloves worn inside rubber gloves will wick away perspiration and make their use more comfortable. When wearing gloves, the shirtsleeves shall be buttoned over the cuffs to form a continuous protective covering for the arms and hands. Gloves that become thin and/or damaged from repeated use, shall be destroyed. Damaged gloves may become entangled in machinery and may become the cause of other injuries.

## **Protective Clothing**

For maximum health and safety roofers require a full body protective covering including a buttoned long sleeved work shirt, with buttoned cuffs, and long work pants without cuffs. Buttons allow for the easy removal of the shirt in the case of an emergency, such as chemical or asphalt spills and may prevent a more serious injury. Cuffless pants shall be worn over the top of high top safety boots. To reduce the risk of burns when torching, a non-synthetic material such as cotton should be chosen for work wear. Roofing requires that workers spend a lot of time on their knees while performing roofing activities. Properly sized and adjusted kneepads will protect the knees and reduce discomfort when kneeling for long periods of time. Workers that report for work dressed in short pants or wearing sandals shall be sent home immediately to dress appropriately, prior to their return to work.