Winter conditions can create a variety of safety challenges and hazards on the worksite. Some of the more common examples include the significant increase in the likelihood of slip and fall accidents, or health risks such as frostbite or hypothermia. But some of the hazards that arrive with winter conditions aren’t quite as obvious.

Icy Surfaces and Equipment

Just as bridges freeze more quickly than the roads leading to them, scaffolds, ladders, and similar surfaces typically begin to accumulate ice well before ground surfaces. The reason is they’re open, elevated and allow cold air to circulate around them. Even when precipitation is falling as rain, colder air near the ground may cause ice to form. In addition, early-morning dew or rainfall can turn to ice if the temperature drops. So if weather conditions are conducive to ice formation, inspect the scaffolding or ladders periodically to ensure that ice hasn’t begun to accumulate. If you notice that ice is forming, you should either remove it, or remove the people from the hazard.

Snow on the Roof

Many types of roof materials can become very slick from ice accumulation, or even from a light frost. But an accumulation of snow on the roof can present another hazard. Even the lightest and fluffiest snow can become extremely heavy once packed together. The finished structure may be able to handle a significant amount of snow, but that capacity may be less during construction. Ideally this variable has already been factored in by the engineers and architects, but it would be wise for workers to verify the roof can handle the expected snowfalls during the construction phase. If there is an issue with the weight of snow, or if winter conditions weren’t anticipated in the original schedule, work with the architects and engineers to develop safety standards.

Dehydration

Most supervisors recognize the importance of keeping a supply of water nearby on summer days, and most workers know that they have to remain hydrated to work productively and safely. But staying hydrated in the winter is just as important as it is during the summer. Even though workers don’t have to contend with high temperatures and blazing sunlight, the extra layers of clothing they wear to stay warm can also dehydrate them surprisingly quick. All the layers of clothing hold in heat, so the body has to perspire to cool down. If the worker fails to replenish that fluid, he may become dehydrated. Supervisors should treat cold weather just as they do hot days. Make workers aware of the dangers of dehydration, ensure that there is an adequate amount of drinking water on their work sites and encourage them to drink it.

Winter Safety Tips

- Clean ice and snow from access areas and work platforms. Make sure that stairs, ladders and scaffold planks are clear.
- Use sand, salt or other de-icing material to prevent slips and falls.
- Watch your footing. Steel beams, decks and platforms may be clear in sunny areas but icy in the shade. The same goes for plywood decks.
- Simply turning icy planks over may not be enough because ice often forms on the underside.
- Remove icicles, especially when the temperature starts to warm up. If icicles can’t be removed, rope off the area below them and put up warning signs.
- Clear frost and snow completely from all windows, lights and mirrors on vehicles and heavy equipment.
- When possible, keep your arms free to cushion a fall.
- Wear gloves, as well as head coverings that accommodate a hard hat. If you get hot while working, open your jacket but keep your hat and gloves on.