



Fall protection for sloped roofers

Working on a sloped roof is one of the most dangerous jobs in construction. Just a small slip or loss of balance can lead to a life-altering injury or even death.

Whenever roofers are exposed to a fall of more than 3 metres (10 feet) off the ground, they must be protected by a fall protection system and trained how to use it properly.



Training

In Ontario, sloped roofers must have training to work at heights. If you received your training before April 1, 2015, you have until April 1, 2017, to complete a working at heights training program that has been approved by the Chief Prevention Officer. However, it is highly recommended that you take the new training before then.

An approved course will include information on hazard recognition and safe work procedures as well as a practical component showing how to use fall protection equipment.



Safe work procedures

Step 1: Wearing the proper equipment

The proper equipment for working on a sloped roof generally includes the following.

1. A CSA-approved full-body **harness** connected to a **lanyard**
2. A CSA-approved **lanyard** connected to a **rope grab**
3. A CSA-approved **rope grab** connected to a **lifeline**
4. A CSA-approved **lifeline** connected to an **anchor point**.

Step 2: Getting onto the roof using a ladder

Although falls from ladders are common in construction work, a ladder can be a safe means of access and egress if you follow proper safety procedures. However, you should not work from a ladder. It is not a work platform.

- Inspect ladder components such as rungs and hooks for damaged or defective parts before using it.
- Secure the ladder at the top and bottom.
- Set up the ladder at a slope of at least 3-to-1 but not more than 4-to-1 (one foot back for every 3 or 4 feet up).
- Make sure the ladder extends at least 90 cm (3 ft) above the access level of the roof.
- Keep the areas at the top and bottom of the ladder clear of debris.
- Maintain three-point contact when climbing up or down a ladder. (That's two hands and one foot or two feet and one hand on the ladder at all times.)



- Never carry tools or material up or down the ladder. Instead, use a tool belt and hoist materials up by rope.
- If overhead powerlines are close to the work area, use a non-conductive type of ladder, such as a fiberglass one.

Step 3: Installing anchors

If you're using a fall protection system on a sloped roof, you must be tied off at all times. Finding an anchor point to tie off to can seem like a challenge. However, if you plan ahead and know what to do, there are several options.

- You can use roof peak anchors as your main anchor point. The problem is getting to the roof peak to install the anchors while still being tied off. One way to do this is to install temporary roof anchors and tie off to them along the way.
- On new homes, some builders leave a hole in the sheathing near the roof peak so that you can tie off to the top chord of the roof truss.



Roof peak anchor



Temporary anchor

Depending on the size of the roof, you may have to install several temporary anchors before you reach the roof peak. Make sure to install your anchors correctly by using the proper screws and following the instructions in the manufacturer's guide. If you're not sure about something, ask for help or advice.

On most homes, you will need multiple anchor points to prevent a swing-fall hazard. Make sure to tie off to anchor points that are at a height and location to prevent you from swinging and striking a lower level if you fall.

Step 4: Working on the roof

If you are working above 3 m (10 ft), you must be protected from a fall at all times. For roofers, that means being tied off from the time you leave the ladder until you get back on the ladder.

If you have to move from one lifeline to another, use a Y-lanyard. It has two places to attach to a lifeline, so it will allow you to be tied off at all times.



Y-lanyard

Step 5: Getting off the roof

Getting off the roof while remaining protected from a fall can be difficult because the peak anchor has to be removed. This will happen on every job, so there should be a clear procedure to follow.

Find a method that works best for your situation and make a plan for getting off the roof before you start the work. For instance, there may be an appropriate anchor to tie off to at ground level. Or you can use the same method you used to get onto the roof, just in reverse. Remember to remove any temporary anchors on the way down.

How IHSA can help

For more information on this topic, visit

ihsa.ca/roofing and download the best practices document *Fall Protection on Sloped Roofs* (W207).

