

VIBRATION WHITE FINGER

IDENTIFY

Vibration white finger, also known as a form of Raynaud's Syndrome, is a disease that makes your fingers turn white. It starts when your hands are exposed to too much vibration. Vibration white finger damages blood vessels, nerves, and muscles.

There are several symptoms:

- Numbness and tingling in fingers
- Whitening — first your fingertips, then your whole finger
- Spasms in fingers
- Attacks lasting up to half an hour — often with whiteness, changing to deep red — that become very painful
- Permanent loss of feeling in your fingertips
- Reduced grip strength
- Attacks that become more frequent and painful

Tool and equipment operators are at the most risk. Their hands are often exposed to high levels of vibration. High-vibration equipment includes road drills, chipping hammers, compactors, and chainsaws.

Risk depends on:

- The magnitude (acceleration) of vibration. Tools such as impact wrenches, chainsaws, and jack hammers can be high-risk if workers use these tools more than 60 minutes (cumulative) per day.
- How long the vibrating tool or equipment is used.
- Whether operation is off-and-on, or continuous.
- Workplace temperature (cold is a major trigger for vibration white finger).
- Whether or not you smoke (smoking reduces blood flow to your fingers).

COMMUNICATE AND CONTROL

- Where possible, do the job without using vibrating tools or equipment.
- Use tools with built-in anti-vibration features.
- Wear anti-vibration gloves as classified under ISO Standard 10819.
- Don't use vibrating equipment for long periods, especially in the cold. Short bursts are better.
- Keep your whole body warm — your hands and chest especially.
- Don't smoke.
- Keep equipment in good condition. Poorly maintained equipment can produce excess vibration. Report poorly functioning tools to your supervisor immediately.
- Follow an appropriate work/rest schedule. Rotate between different jobs.
- Exercise. It can maintain healthy blood circulation.
- Don't ignore signs and symptoms. See your doctor right away.

THE QUIZ

- List two pieces of equipment on the jobsite that cause vibration:
a) _____
b) _____
- What is another name for vibration white finger?
a) Pale finger
b) Numb disease
c) Raynaud's Syndrome
- List two items that could prevent or reduce vibrating equipment:
a) _____
b) _____
- List two things vibration white finger damages:
a) _____
b) _____
- List two symptoms of vibration white finger:
a) _____
b) _____
- List two risk factors of vibration white finger:
a) _____
b) _____
- List two pieces of high-vibration equipment:
a) _____
b) _____
- What is the maximum amount of time you should use high-vibration equipment?
a) 60 minutes
b) 30 minutes
c) 45 minutes
- Which two parts of the body must you keep warm while working with high-vibration equipment?
a) _____
b) _____
- Why should you exercise regularly as per the vibration white finger controls?

ANSWERS:

1. Site-specific answers; 2. c; 3. Anti-vibration gloves, anti-vibration features on tools; 4. Feeling in fingertips, grip strength; 5. Spasms, numbness, whitening of fingers; 6. Magnitude of vibration, length of time tool is used, continuity of tool use, workplace temperature; 7. Road drills, chipping hammers, compactors, chainsaws; 8. a; 9. Hands, chest; 10. Maintain healthy blood circulation