



SAFETY INCENTIVE PROGRAM  
950 Keynote Circle, Suite 10  
Cleveland, Ohio 44131-1802  
Telephone (216) 398-9860

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## **SIP TIP: WET CONCRETE AND SKIN DON'T MIX**

Kneeling in wet concrete for up to an hour left two New Zealand construction workers with serious injuries and a hospital stay. As reported in J.J. Keller's Construction Regulatory Update in July 2005, the two workers were wearing thin cotton coveralls and knelt on the wet concrete to level the floor of a sump. The skin on the workers shins and knees was exposed for up to an hour before they noticed any discomfort.



**The two workers were hospitalized for 8 days with third degree burns and required skin grafts.** By the time the workers became aware of the burns, the damage had already been done.

The following information on hazards and solutions has been excerpted from OSHA's website ([www.osha.gov](http://www.osha.gov)) and the Electronic Library of Construction Occupational Safety and Health ([www.cdc.gov/elcosh/index.html](http://www.cdc.gov/elcosh/index.html)).

### **Hazards**

- Concrete is alkaline by its contents, such as lime (calcium oxide). This alkalinity is corrosive to human tissue and effects can range from skin irritation to first-, second-, or third-degree chemical burns;
- Compounds such as hexavalent chromium may also be harmful, and can result in cancerous ulcers and allergic reactions;
- Compounds such as crystalline silica which are abrasive to the skin and can damage lungs;

**Not wearing any PPE!!!!**



### **Solutions:**

- Wear alkali-resistant gloves, coveralls with long sleeves and full-length pants, waterproof boots and eye protection;
- Skin in contact with wet cement should be washed *immediately* with large amounts of cool, clean, running water as soon as possible. Don't use the water from buckets used for cleaning tools;
- Rinse eyes splashed with wet concrete with water for at least 15 minutes and then go to the hospital for further treatment;
- Clothing contaminated by wet cement should be quickly removed.

**REMINDER: WEAR THE PROPER PPE AROUND WET CONCRETE**