

# **FS/HAAF GARRISON SAFETY OFFICE**

Outsmart the Darkness: Your Weekly Safety Spotlight"



# Strains & Sprains & Vibration

Sprains and strains account for about a third of injuries in construction. A sprain is an injury to a ligament, the tough, fibrous tissue that connects bones to other bones. Sprain injuries involve a stretching and or a tearing of this tissue. Ankle, knee, and wrist injuries account for the majority of sprains. A strain is an injury to either a muscle or a tendon, the tissue that connects muscles to bones.

### **Strains**

## Hand & Arm & Knee & Ankle

- Overexertion of the joint. Carrying heavy loads.
- Misstep and twist the ankle/knee.
- Slipping and twisting your joints.
- Falling and catching yourself, straight arm or over-flex.

## **Sprains**

## Hand & Arm & Knee & Ankle

 Same as Strains except a more profound injury that may require medical services and result in lost time or reduced work capability / light duty.

### **Vibration**

- Caused by repetitive use of electric / battery operated hands, any large reciprocating machinery and even driving.
- Reynaud's Syndrome is were there is reduced blood flow to the fingers and toes caused by prolonged vibration.
- Symptoms are cold tingling fingers/toes and white or ashen skin tones.

#### Precautions, Hazard Abatement, Etc.

- Be certain that you understand your employer's Material Handling Safety program.
- Whenever possible, arrange your work areas to minimize the amount of heavy lifting required.
- Before any heavy lifting activity, always warm up, using moderate stretching exercises. Do not stretch
  aggressively as you may over-stretch and injure yourself.
- Always plan the lift. Consider the weight of the object; how far you must carry it and your route of travel. When
  you approach an object on the floor, try to get an idea of how heavy it may be by moving it with your foot or
  cautiously lifting it off the ground. If the object is too heavy, seek additional help or use a mechanical lifting
  device such as a forklift, hand truck or winch.
- Lift objects in the "power zone". This is the area between mid-thigh and mid-chest height. Avoid lifting objects outside this zone. Use your best judgment when lifting heavy objects. Do not attempt to lift an object that exceeds your strength, and use extreme caution when lifting objects exceeding 50 lbs.
- Always carry objects close to your body.
- Always lift slowly and smoothly.
- Avoid repeating awkward movements or holding yourself in awkward positions.
- Wear protective gloves that reduce pressure or tool vibration on your fingers.
- Wear good quality rubber soled footwear.