



Training Solutions, Delivered!

SAFE LIFTING IN HEALTHCARE

**Leader's Guide, Fact Sheet
& Quiz**

Item Number: 3616
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This easy-to-use Leader's Guide is provided to assist in conducting a successful presentation.

PREPARING FOR THE MEETING

Here are a few suggestions for using this program:

- a) Review the contents of the Fact Sheet that immediately follows this page to familiarize yourself with the program topic and the training points discussed in the program. The Fact Sheet also includes a list of Program Objectives that details the information that participants should learn from watching the program.
- b) If required by your organization, make an attendance record to be signed by each participant to document the training to be conducted.
- c) Prepare the area and equipment to be used for the training. Make sure the watching environment is comfortable and free from outside distractions. Also, ensure that participants can see and hear the TV screen or computer monitor without obstructions.
- d) Make copies of the Review Quiz included at the end of this Leader's Guide to be completed by participants at the conclusion of the presentation. Be aware that the page containing the answers to the quiz comes before the quiz itself, which is on the final page.

CONDUCTING THE PRESENTATION

- a) Begin the meeting by welcoming the participants. Introduce yourself and give each person an opportunity to become acquainted if there are new people joining the training session.
- b) Introduce the program by its title and explain to participants what they are expected to learn as stated in the Program Objectives of the Fact Sheet.
- c) Play the program without interruption. Upon completion, lead discussions about your organization's specific policies regarding the subject matter. Make sure to note any unique hazards associated with the program's topic that participants may encounter while performing their job duties at your facility.
- d) Hand out copies of the review quiz to all of the participants and make sure each one completes it before concluding the training session.

3616 SAFE LIFTING IN HEALTHCARE FACT SHEET

LENGTH: 9 MINUTES

PROGRAM SYNOPSIS:

According to the National Safety Council and medical research, 20% of backaches are attributed to inflammation such as arthritis, 10% are due to actual back injuries and other miscellaneous causes. 70% result from degeneration of spinal discs. This program shows the proper way to lift items to help prevent injuries to the back and spinal discs.

PROGRAM OBJECTIVES:

After watching the program, the participant should be able to explain the following:

- The mechanics of the back;
- Stretching and the normal range of spinal movement;
- How to pay attention to posture whether sitting, standing or lifting;
- The back and the lever principle;
- Proper lifting techniques.

INSTRUCTIONAL CONTENT:

WHY KNOWLEDGE ABOUT THE BACK MATTERS

- According to the National Safety Council and medical research, 20% of backaches are attributed to inflammation such as arthritis, 10% are due to actual back injuries and other miscellaneous causes.
- 70% result from degeneration of spinal discs. That's right, aging of the spinal disc material causes the most trouble and can cause extreme pain even from routine body motions.
- You've all heard the routine warnings about bending your knees and lifting with your legs. We see people lifting boxes to demonstrate the proper technique.
- Those techniques are still correct, but we don't always pick up a box or the item we want to lift is sitting under a storage rack or other difficult position.
- Today we want to explain how the back works, so you'll have enough information to make the right choices on how to lift anything safely. We will also discuss how strains and muscles work so you can prevent these types of back injuries also.
- There's no magic formula; all you need is a good attitude about safety and are willing to think about safety every time you lift anything. If you'll do that, it's difficult to have an injury.

MECHANICS OF THE BACK

- Each disc is a circular pad filled with gelatinous substance under pressure. The disc looks like a soft hockey puck with jelly on the inside.
- The disc works like shock absorbers or springs that provide a linkage to the vertebrae or bones but prevents any sliding of one vertebra against another.
- The spinal cord is a bundle of nerves in a protected vertical passage behind the disc area. Nerve roots branch out through spaces between each vertebra and go to different parts of the body.
- The normal range of spinal movement is bending forward and backward.
- You can see the nerve roots are in a vulnerable position because the spinal cord must bend and flex without the vertebrae slipping out of alignment.
- It is quite easy to wear out a disc with normal movement. As you bend and move, your discs are working just like the shock absorbers in your automobile.

- Discs can become damaged through excessive twisting, turning, bending and when this happens the disk may spring a slow leak.
- Now as the fluid leaks out, you can lose disk pressure. This loss of pressure in one disk can affect the entire linkage.
- It could happen at almost any age; you don't have to be old to wear out your disks.
- Back pain sufferers should pay constant attention to posture, standing, sitting, working, even while sleeping.
- The lumbar flexion or dynamic posture as shown here helps widen the opening that nerve roots pass through and reduce the chance of pinches.
- Regular exercise is encouraged which promotes flexibility of the muscles and all the other body parts to keep you healthy.

STRETCHING AND MUSCLE STRAINS

- When you stretch, ligaments in your back stretch also. Now if you stretch too far, these ligaments may tear or overstretch. They can be quite painful.
- Many times we must lift something over our head so you're going to stretch your arms to reach the object.
- The best way would be to set the lifted object on a table or other support, then reposition the object so your arms are doing the lifting, not your back.
- As a minimum, reposition your grip on the object to keep the weight centered.
- Arching the back during the lift makes nerve roots susceptible to pinching.
- Just remember how the discs protect the back and try to make the lift with your back as straight or in a normal position as possible. When you do this, the discs can do their job without damage and the ligaments aren't stretched so far that they'll tear.

HOW THE BACK WORKS

- Naturally, medical research has provided us with some basics about your back to help you understand how the back works.
- The back works like any other machine on the lever principle. You have a load and a counter load, the load you're lifting and your back balanced on a pivot point or center of gravity.
- The heavier the load, the more counterweight you need or some position to help offset that load.
- The back has a 10 to one ratio to the object you're lifting. If an object you're lifting weighs 10 pounds, it's going to take 100 pounds of pressure in your back to lift the object. This puts a lot of pressure on those delicate discs.
- Add in more weight, more length of the lever or an awkward position, then you're adding much more pressure on those discs and of course the ligaments.
- That's why you hear safety and medical personnel telling everyone to bend your legs and squat down near the object you're going to lift. This keeps the discs lined correctly between the bones.

HOW TO MAKE A PROPER LIFT

- Get a good palm grip; don't use your fingertips. The palm grip is designed to make sure the object you're lifting doesn't slip out of your hands.
- Lift the object slowly to prevent any jerking movements that can cause discs to move out of their proper alignment and bring the object close to your body.
- This reduces the lifting pressure based upon the 10 to 1 ratio of the lever. The closer the load, the less pressure it takes to lift.
- You have a good grip, the object is close to your body, now stand up.
- You are using your leg power to do the lifting, not your back. That's the standard method of lifting safely and it does work.

WAYS TO LIFT AN AWKWARD ITEM

- A man places his right hand on a sturdy item and picks up a paint can with his left hand. He used his free hand to provide support for some of the lifting. Anything you can use to provide additional support is great for your back.
- How about trying to install a car battery into an automobile? You have to be standing to get the battery over the fender and into the battery case. Can't bend your legs on this one.
- The next best thing to do is move your legs against the car's fender. This provides good support and assistance to your back when the battery is lowered into the case.
- Use your legs whenever you can to help reduce the load or pressure on your back.
- Keep in mind how your disks support your back, the 10 to 1 lever ratio and that you have ligaments in your back that can stretch and possibly tear.
- Whenever you have a particularly difficult load to lift, you can use your good judgement and make the right decision how to lift properly.
- Naturally if the load is too awkward or heavy for one person, get some help.

CONCLUSION

- Safe lifting doesn't have to be perfect, but it does have to be done safely.
- Twisting your back while lifting is extremely dangerous. Find another way to lift because it only takes one wrong way to cause a problem.
- Perhaps you have been lifting improperly, twisting and lifting and stretching and your back is still in good condition. Well, that doesn't mean you haven't injured your disks. Perhaps it just means that time age and body mechanics just haven't caught up with you yet.
- We urge each individual to practice safe lifting all the time at home, play and at work.
- Back injuries can be prevented but you're the only person who has control over your well-being.
- The most important part of safe lifting, actually any type of job and home safety, is having the right attitude about safety and thinking about safety before you perform each task.
- Take time for safety because it's important to you, your family and your job.

SAFE LIFTING IN HEALTHCARE
ANSWERS TO THE REVIEW QUIZ

1. a

2. c

3. b

4. b

5. a

6. b

SAFE LIFTING IN HEALTHCARE
REVIEW QUIZ

Name _____ Date _____

The following questions are provided to determine how well you understand the information presented in this program.

1. A proper lifting technique is bending at the knees and lifting with your legs.
 - a. True
 - b. False

2. The spinal cord is a bundle of _____ in a protected vertical passage behind the disc area.
 - a. Blood vessels
 - b. Cells
 - c. Nerves

3. Discs become damaged and wear out only when you get older.
 - a. True
 - b. False

4. When lifting something over your head, you can _____.
 - a. Throw it as hard as you can from where you are standing
 - b. Reposition your grip on the object to keep the weight centered
 - c. Use one hand and balance on one foot

5. The back has a _____ ratio to the object you're lifting.
 - a. 10 to 1
 - b. 20 to 1
 - c. 50 to 1

6. Twisting your back while lifting can be done safely as long as you do it slowly.
 - a. True
 - b. False