A Safety Module:

TAKING CARE OF YOUR BACK

© 1998-2014

May be copied for use within each physical location that purchases this inservice topic.
Sonya works as a Home Health Aide for a small private company in her hometown. She always has a positive attitude and a kind word for everyone.

One day, while working in a client’s home, Sonya follows her usual routine. She gets the client up in the morning, then bathes him and dresses him. But something seems different. The client is weaker than usual and he seems less able to help. As Sonya lowers him into his recliner so he can eat breakfast, a sharp bolt of pain jolts her back.

When Sonya tries to straighten up after lowering the client to the chair, she has to wait a bit for the pain to pass. However, in less than a minute, Sonya is able to stand and go about her business as usual. She doesn’t think much of the pain again until she gets into her car to leave.

While driving home, Sonya feels an ache in her back. She grabs a few Motrin tablets out of her purse and swallows them down. She never even considers reporting the pain because she thinks back pain is just part of the job. This line of work is hard and pain just goes with the territory.

The next morning, the pain is unbearable. Sonya takes more Motrin and heads off to work. Her morning starts with a team meeting, during which Sonya remains quiet. Her usual positive energy and kindness are missing.

Sonya briefly considers asking her boss for the day off—but a day off for her means extra work for everyone else—and she doesn’t want to do that to her team. She thinks about asking one of the other girls to switch clients with her, but she doesn’t want to “make waves” or call attention to herself. So, she goes back to her client’s home and works with the injury.

After weeks of taking Motrin on a daily basis and remaining in pain, Sonya finally talks to her supervisor about taking a day off for a doctor’s visit.

Keep reading to learn all about what can (and does) cause back problems for nursing assistants like you. You’ll learn how to avoid injuries altogether and how to handle things right away if an injury happens to you.
ANATOMY OF THE SPINE

PARTS OF THE SPINE

The spine (or backbone) runs from the base of the skull to the pelvis and is made up of 33 bones divided into 5 sections. The bones are called vertebrae and are connected together by discs, ligaments, joints, and muscles. The vertebrae are named by the first letter of their region (cervical, thoracic, or lumbar) with a number to indicate their position. For example, the fifth lumbar vertebra is called L5, and the third thoracic vertebra is called T3.

The spinal cord is a thick bundle of nerves which runs down through the middle of the spine. The spinal cord manages all the messages coming to and from the brain. A healthy spine is critical to life because the spine protects the spinal cord.

The spine forms three natural curves that give it a shape like the letter “S”.

FUNCTIONS OF THE SPINE

The spine has a number of important jobs. It:

- Supports the body and head.
- Gives the muscles and ligaments someplace to attach themselves.
- Allows your body to bend, lean and twist.
- Protects your spinal cord and nerves.

The lower part of your back supports most of your body weight. Even a minor problem with the bones or muscles in this area can cause pain.
WHO IS AT RISK?

Health care workers are at the top of the list for work-related back injuries. In fact, CNAs are three and a half times more likely than the average worker to miss work because of a work-related injury. The rate of injury in Nurse Aides is similar to that of construction workers!

In most industrial jobs, women are not expected to lift more than 50 pounds. But, in health care, women are often expected to lift clients who weigh several hundred pounds or more. Most nursing assistants who hurt their backs do so while transferring or lifting a client.

No matter what kind of work you do, you are at risk for back pain if you:

- Sit or bend a lot.
- Lift, move or carry things incorrectly.
- Are overweight or pregnant.
- Smoke. (Smoking increases the risk of disc degeneration and it reduces blood flow to the spine and the surrounding muscles.)
- Don’t exercise regularly.
- Have had previous episodes of low back pain.
- Are under stress. (Tense muscles are more easily strained or sprained.)
- Play sports.
- Have poor posture while sitting, standing or lying down.
- Have a weak muscles in your “core region” which consists of all of the torso.
- Come from a family with a history of degenerative disc disease or degenerative arthritis.
- Are middle aged or older. (The chance of developing back problems increases with age.)
- Have long periods of depression.
- Use medicines long-term that weaken bones, such as corticosteroids.
- Have an illness or disease that causes a chronic cough.

Are you playing a game of Russian Roulette with your back? Ask yourself these questions:

- Have I moved or transferred a client who is larger than I am—without help?
- Am I overweight and/or out of shape (with weak core muscles)?
- Do I smoke, have too much stress or work when I’m distracted?
- Do I often find myself working in an awkward position, like bent, twisted or leaning?
- Have I manually moved a client who was supposed to be moved with a mechanical lift because I didn’t have time to get the lift?

If you answered “yes” to any of these questions, it’s only a matter of time before you will be injured.

Think about all the things you do that put you at risk, and then make the changes necessary to keep yourself safe.
WHAT CAUSES BACK PAIN?

PROBLEMS WITH MUSCLES AND TENDONS

Back **sprains and strains** are very common—and are probably responsible for most back pain. Muscle strains and sprains are not serious conditions but they can lead to chronic back pain if muscles continue to be abused.

Muscles and tendons can become strained by tension or by being overworked. A strained back usually heals itself within a few weeks.

With a sprain, a joint is forced beyond its normal range of motion which stretches and tears the ligaments.

**Muscle spasms** are abnormal contractions that can occur when a muscle is tired or strained. Sometimes, the back muscles will spasm—and the contracted muscle will lock up—in order to “hold” an injured spine in place. Spasms can be very painful.

PROBLEMS WITH DISKS

The bones of your spine are separated by small cushions of cartilage—called discs. Each disc has a soft, squishy center, surrounded by tough outer rings. As people age, their discs lose moisture and don’t bounce back into place as easily.

You may have heard of a “slipped disc”, but discs don’t really slip. They can begin to bulge out from between the vertebrae—often as a result of years of poor posture. The **bulging disc** gets squeezed by the vertebrae. This may cause pain or there may be no symptoms at all.

Most **herniated discs** can be treated without surgery by a combination of physical therapy, medications and exercise.

PROBLEMS WITH NERVES

Sometimes, a bulging disc ruptures, putting pressure on the nerves. A **pinched nerve** can cause pain, weakness and numbness.

Sometimes, a pinched nerve causes a condition known as sciatica. Typically, sciatica pain:

- Begins in the buttocks and travels down the back of the thigh and calf—and even into the foot and heel.
- Causes a burning or tingling feeling down the leg.
- Produces weakness or numbness in the leg or foot.
- Causes a shooting pain that makes it difficult to stand up.

Sciatica can be very painful, but it does not usually cause permanent nerve damage.

OTHER PROBLEMS

**Osteoarthritis**, also known as degenerative joint disease is a condition in which the protective cartilage that cushions the tops of bones wears down.

Osteoarthritis of the spine may cause stiffness or pain in the neck or back. It may also cause weakness or numbness in the legs or arms. The pain is usually relieved by lying down.

In general, osteoarthritis happens as people age, but it can also develop in younger people after an injury. For people younger than 45 years old, osteoarthritis is more common in men. After age 45, it is more common for women.

**Spinal stenosis** is a narrowing of the open spaces within your spine, which can put pressure on your spinal cord and the nerves that travel through the spine. It can cause pain, numbness, muscle weakness, and problems with bladder or bowel function.

Spinal stenosis is most commonly caused by wear-and-tear changes in the spine as a result of aging.

In severe cases, doctors may recommend surgery to create additional space for the spinal cord or nerves.
For decades much attention was focused on preventing injuries during direct client care by using good "body mechanics." This is when you learn how to move, hold and position your body in order to lift and move heavy loads safely.

This research was promising and the new techniques were taken into the field. . . but the injuries kept happening.

The problem was that all the research into body mechanics was done on mannequins. The weight of mannequins is fixed and even. Real human bodies are much harder to move.

So, what we learned is that while knowing proper body mechanics is great . . . it's just NOT ENOUGH!

In 1988, a nurse in Australia, named Elizabeth Langford, was injured while moving a patient and became unable to work. She was devastated by the lack of support she received by her employer and was told by the insurance companies to look for other work.

Instead, she got busy developing the "No Lift" method of direct patient care.

The "No Lift" method has been accepted worldwide and is now used in around 70 percent of hospitals and long term care facilities in the United States.

So, what is a “No Lift” policy? Well, it means your workplace has a policy that says it will evaluate every client for the ability to sit, stand and walk safely and will make recommendations to the staff on how best to handle each situation. The goal is to minimize the use of nurses and nursing assistants as “human lifting machines”.

Those clients needing maximum assistance, meaning they cannot sit unsupported and cannot bear weight, must be moved by mechanical lifts only.

Clients who can sit unsupported but have trouble bearing weight must have more than one caregiver or a “stand assist” lift to transfer or walk.

For the most part, employers decide whether or not to enforce a “No Lift” policy. However, in 2005, Texas became the first state in the US to make it a law. Since then several other states have also made the “No Lift” policy a requirement for healthcare employers.
TIPS FOR PREVENTING BACK INJURIES

STRENGTHEN YOUR CORE

The group of muscles that support your spine are known as the “core muscles.” Core muscles include the muscles in your abdomen, back, buttocks, sides, and pelvis. Strengthening all of these muscles reduces your risk for back injuries and can even help to relieve or prevent pain that you may already have.

Here are a few exercises you can do to strengthen your core:

The Bridge

Lie on your back with your knees bent. Tighten your abdominal muscles.

Raise your hips off the floor until your hips are aligned with your knees and shoulders. Hold for three deep breaths.

Return to the start position and repeat.

The Plank

Lie on your stomach. Raise yourself up so that you’re resting on your forearms and toes. Align your head and neck with your back. Tighten your abdominal muscles. Hold for three deep breaths.

Return to the start position and repeat.

The Side Plank

Lie on your left side, raising yourself onto your left forearm. Place your left shoulder directly above your left elbow, keeping your shoulders, hips and knees in alignment. Rest your right arm along the side of your body.

Tighten your abdominal muscles. Hold for three deep breaths.

Repeat on your right side.

THINK ABOUT IT!

THE POWER OF POSTURE

Did you know that having good posture can protect you from back pain and injuries!

The key to good posture is maintaining the balance of your spine’s three curves. “Standing up straight” means keeping your back’s natural curves in balance.

Check your posture!

- Stand against a wall with your heels about two inches away.
- The space between your waist and the wall should be no more than the width of your hand.

Balance yourself!

- Stand with your feet flat on the ground. Relax your knees and tilt your tailbone slightly under and forward.
- Drop your shoulders.
- Tighten your abdominal muscles a bit.
- Relax any muscles or joints that are tense.
TIPS FOR A HEALTHY BACK

When you sit . . .

- Choose a chair with a firm back whenever possible. Sit with your buttocks up to the back of the chair.
- Place a rolled-up towel or small pillow in the small of your back when sitting in a seat without good back support. This may include the time you spend sitting in a car or at a movie theater.
- When sitting for long periods, get up and stretch often.

While standing . . .

- Stand up straight, without slouching.
- If standing at a counter for long periods, place one foot on a small stool (or open a lower cabinet and put your foot on the bottom shelf).

For the best sleep . . .

- Turn and flip your mattress every six months. Sleeping on a firm mattress is best for your back.
- Try putting a small pillow between your knees when you sleep. This helps keep your hips lined up and may prevent lower back stiffness.

When you are working . . .

- Stretch out your back before the start of every work day to warm up and loosen your muscles.
- Use available equipment to help you lift or transfer clients, such as:
  - Mechanical lifts.
  - Sliding boards.
  - Draw sheets.
- Always bend your knees—not your waist—when picking something up.
- Before lifting anything (or anyone) heavy, ask yourself these questions:
  - Can I lift this load safely by myself?
  - How far do I have to carry this load?
  - Is there a clear path for me to travel with this load?
- Center your body over your feet and let your legs do the lifting.
- Lift in one continuous motion, without jerking.
- Avoid twisting your body while lifting. If you must turn, turn with your feet, not with your body.
- Look straight ahead while lifting. Don’t look down.
- Remember to get assistance—from other people or equipment—before you try to lift or transfer a heavy client. If you don’t, your back may suffer!

In the car . . .

- Adjust your seat close to the steering wheel.
- Keep your knees and arms bent to avoid straining your back.
  - Use a headrest in your car. Use armrests if your car has them.
  - Do some shoulder rolls at stoplights.
  - Stop every hour or two on a long trip to walk around and do some stretches.

In general . . .

- Maintain a healthy weight.
- Exercise at least 30 minutes a day, 3 to 4 times each week. Your routine should include both aerobic types exercises (like biking, swimming, or walking) and strength training to strengthen your core muscles along with your arms and legs.
  - If you have a choice, push—don’t pull. It’s much easier on your back to push a heavy load than to pull it.
- Wear good shoes. If you wear athletic type shoes for work, consider replacing them every six to eight months. (Athletic shoes are made of soft materials that tend to flatten after repeated use. This means your foot will not be supported as the shoes wear out.)
IF YOU HURT YOUR BACK AT WORK

Report it! If you feel any of the following symptoms anywhere along your back, talk to your supervisor right away!

- Aching
- Sharp pain
- Dull pain
- Pain that comes and goes
- Hot, inflamed feeling
- Tingling
- Unusual tightness
- Unusual muscle weakness or fatigue

File an incident report. Follow your workplace protocol for filing an incident report. Be sure the report includes a detailed description of what you were doing when you hurt yourself, how it felt, who you reported to and any action you took. Be sure to keep a copy of the report for yourself.

Get medical help. Some states require you to see a company doctor first. If so, go see your own doctor as well. A doctor can help you find out which part of your body was strained, sprained, damaged or injured. Your treatment will depend on what’s wrong and what’s causing the pain.

Be sure to tell your doctor all about your job. Explain the kind of lifting, bending and twisting you do every day, which tasks cause pain and discomfort, and what kinds of body movement cause pain.

Follow your doctor’s orders. This may be the hardest part of getting injured! Healthcare workers are usually the worst patients!

If your doctor puts you on “light duty,” it usually means you cannot lift anything over 25 pounds. Light duty tasks can include: doing closet checks, passing ice, manicuring nails, doing simple office tasks, and sometimes feeding residents.

Don’t do any job, task or body movement that causes discomfort or pain. If you continue doing them, your body won’t be able to heal and your symptoms might get worse.

It’s rare for a doctor to recommend bed rest. Most injuries get better faster if you continue to move around in ways that don’t make the pain worse. Be sure to ask your doctor about exercises that will help improve your strength and flexibility as you heal.

Read all about the other possible treatment options your doctor may recommend on the next page!

Get More INFO!

You probably already know that looking for health-related info on the internet can be tricky! It’s no different when you search for information on back and spine health.

Here are a few online resources you can go to (or recommend to clients) and feel safe knowing the information can be trusted:

- North American Spine Society at knowyourback.org
- American Academy of Physical Medicine and Rehabilitation at www.aapmr.org
- Mayo Clinic at www.mayoclinic.com
- National Institute of Arthritis and Musculoskeletal and Skin Diseases at www.niams.nih.gov
HOW ARE BACK INJURIES TREATED?

MEDICATION

• Some people take anti-inflammatory medications, such as Motrin or Tylenol, to relieve their back pain. It’s important to remember that even over-the-counter drugs can be abused. It’s best to take them only when recommended by a doctor.

• A doctor may prescribe other medications to decrease pain, reduce swelling or relieve muscle spasms. Anyone taking these drugs should be aware of potential side effects—including addiction (with some prescription pain medications).

• Some types of back pain respond when medication is injected or implanted directly into specific muscles, nerves or joints.

SURGERY

• There are certain back conditions—such as tumors or infections—that must be treated with surgery. For most other back problems, having surgery is a choice.

• It’s important for people who are considering back surgery to learn as much as possible about their condition...and about the type of surgery suggested by their doctor.

• Back surgery has been found to be helpful in only 1 out of every 100 cases of low back pain.

HEAT & COLD

• Within the first 48 hours of having back pain and/or muscle spasms, you may want to apply a cold pack to the painful area for five to ten minutes at a time.

• After 48 hours, a heating pad, hot shower or hot bath may help to relax the affected muscles.

ULTRASOUND

• Ultrasound involves the use of high-frequency sound waves. The tissues in our bodies are able to absorb these sound waves, producing a deep heat—well below the surface of the skin.

• Physical therapists often use ultrasound to treat back pain.

MASSAGE

• Massage increases blood flow and relaxes muscles. It may help decrease back pain and spasms.

• Sometimes, the massage itself will cause pain—until the affected muscles begin to relax.

• Massage is also a temporary measure. It doesn’t fix the underlying problem.

ACUPUNCTURE

• Acupuncture is an ancient practice, developed centuries ago in China, in which thin needles are inserted into the skin at certain points on the body to relieve pain and treat disease.

• There are more than 2000 acupuncture points on the human body.

• The needles used for acupuncture are solid, sterile and slightly bigger than a human hair. People say they feel the needles pierce the skin, but that there is no pain.

• A standard acupuncture session costs from $50 to $70 and is sometimes covered by insurance.

TRACTION

• Traction is used mostly in cases of lower back pain.

• The idea of traction is to pull the vertebrae away from each other—relieving pressure on the disc.

CORSETS & BRACES

• Some doctors prescribe the use of a corset or a back brace—in order to restrict movement, support the abdomen and correct a person’s posture.

• Some people wear neck or back braces after spinal surgery or because of a spinal fracture.
Now that you’ve read this inservice on taking care of your back, jot down a couple of things you learned that you didn’t know before.

---

FINAL BACK CARE TIPS!

- Try to **stretch and loosen** your muscles every day before work. Even five minutes of stretching can help save your back!

- Work toward strengthening your core muscles and maintaining a healthy weight to protect yourself from injury.

- If you must lean forward to work, support the weight of your upper body on your free hand and arm to relieve the pressure on your lower back.

- Just because a client is small doesn’t mean that he or she will be easy to transfer. Be sure to think about the client’s flexibility, range of motion and overall strength. All these things together affect how easy a client is to transfer.

- Always make use of **assistive devices** like mechanical lifts, transfer belts, sliding boards or draw sheets. It may take a few more minutes to get these devices in place . . . But it will be worth it in the long run!

- **A back injury can change your life.** It can keep you from being able to do your job . . . and from doing the things you love. A back injury can also give you a lifetime of chronic pain.

- If you’ve felt pain or discomfort while moving a particular client, then DON’T DO IT AGAIN IN THE SAME WAY! Change your technique or get help when it’s time to move that client again.

- If you hurt your back during work, let your supervisor know and follow up with your family physician.

- How can you know if you have good posture? Your ears, shoulders and hips should all be in a straight line—along with the fronts of your knees and ankles. Ask a friend to check out your posture.

- You can also practice your posture by standing against a wall. Keep your heels about 2 inches away from the wall. There should be a space between your waist and the wall about as thick as your hand. Keep your chin parallel to the floor.

- As you go about your daily work, remember to push, pull or roll heavy objects rather than lifting them—whenever possible.

- Always remember, **it’s much easier to prevent back injuries** than it is to treat (or live with) them!
A Safety Module:
Taking Care of Your Back

Are you “In the Know” about taking care of your back? Circle the best choice or fill in your answer. Then check your answers with your supervisor!

1. The bones that make up the spine are called:
   A. Disks.    C. Ligaments.
   B. Vertebrae.   D. Ribs.

2. Most nursing assistants who hurt their backs at work, do so while:
   A. Lifting or moving a client.  C. Taking out the trash.

3. A new nursing assistant on your team asks you for advice on preventing back injuries on the job. The best advice you can give her is to:
   A. Maintain a healthy weight and strong core muscles.
   B. Rest in bed as much as possible on her days off.
   C. Lift as much as possible. The more you do, the better you get at it.
   D. All of the above.

4. A pain that begins in the buttocks and travels down the back of the thigh and calf is probably a:
   A. Bulging disk.   C. Pinched nerve.
   B. Sprained muscle.   D. None of the above.

5. True or False
   A “No Lift” policy means that all clients must be moved by mechanical lift.

6. True or False
   The group of muscles that support your spine are known as the “core muscles.”

7. True or False
   Always bend your waist—not your knees—when picking something up.

8. True or False
   If you hurt your back at work, the first thing you should do is get a massage.

9. True or False
   Having good posture is essential to having a healthy back.

10. True or False
    A standard treatment for many common back injuries is bed rest.