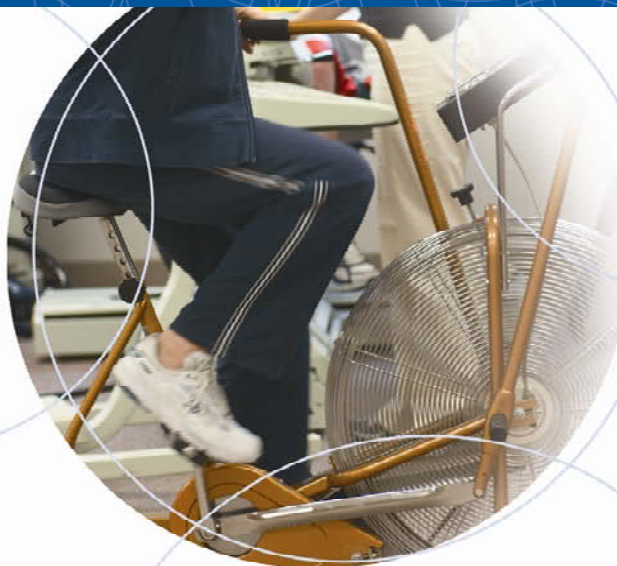


About 21st Century Rehab

21st Century Rehab is dedicated to you, and in providing the utmost of patient-centered care. Whether you need intensive rehabilitation after a sport injury or surgery, or occupational health services for your employees, or quick recovery from back or neck pain, you'll find the services you need at 21st Century Rehab. We look forward to becoming a resource for your good health...now and after your therapy is over.

Our staff of physical, occupational, and speech therapists and certified athletic trainers provides treatment for the following injuries:

- Arm, Wrist or Hand Problems
- Carpal Tunnel Syndrome
- Pain and/or Dysfunction Related to Arthritis
- Balance Impairments or Vertigo
- Post-Surgical Rehabilitation
- Athletic Injuries
- Occupational Health (Consultation, Risk Reduction Services and Treatment of Work-Related Injuries)
- Back, Neck and Shoulder Pain
- Hip, Knee, Ankle or Foot Pain
- TMJ Disorders, Headaches, or Facial Pain



LOCATIONS

www.21stcenturyrehab.com

Corporate Office
P.O. Box 461
Nevada, IA 50201
Ph: 515-382-3366
Fax: 515-382-1576
Toll Free: 1-877-21REHAB

612 8th Street SW
Altoona, IA 50009
Ph: 515-967-4124
Fax: 515-967-9094

270 SW 1st Street
Suite H
Grimes, IA 50111
Ph: 515-986-9667
Fax: 515-986-9642

Indianola Physical Therapy
1507 N. 1st Street
Indianola, IA 50125
Ph: 515-961-7435
Fax: 515-961-7436

Dallas County Hospital
610 Tenth Street
Perry, IA 50220
Ph: 515-465-7672
Fax: 515-465-7655

Hamilton Hospital
800 Ohio Street
Webster City, IA 50595
Ph: 515-832-7735
Fax: 515-832-9420

Story County Medical Center
630 Sixth Street
Nevada, IA 50201
Ph: 515-382-2543
Fax: 515-382-7171
Toll Free: 1-888-522-9820



**21stCENTURY
REHAB**

Work well. Play well. Live well.

*What You Need
to Know about*

BALANCE





Anyone who has ever slipped on a patch of ice knows how unnerving it can be to lose your balance – for a moment your world is literally turned upside down. Yet balance – the ability to control and maintain your body’s position as it moves through space – is such an integral, ever-present part of daily life that most people rarely give it conscious thought. There are conditions, however, that may impair your sense of balance and contribute to falls. The effects of aging are the most common causes of balance problems; injury and disease can also trigger problems. Because falling is such a common and potentially serious problem – 1 in 4 people over the age of 65 (who live at home) will fall during the next year – it’s important to find out what you can do to decrease your risk and improve your general health and mobility.

How Balance Works

Your brain, muscles, and bones work together to maintain your body’s balance and to keep you from falling, whether you’re walking, rising from a chair, or climbing stairs. They also let you navigate sloping or uneven surfaces.

Balance relies on three types of sensory information. The first of these is visual: Your eyes tell you about your environment and your place within it. They help you sense obstacles and potential dangers, and form motor memories that prevent falls. The second type of sensory information comes from your body’s internal sense of spatial orientation, independent of vision. This allows you, for example, to close your eyes and then wiggle your foot in any direction, while still knowing which way your foot is pointed. The third type of sensory information is provided by your inner ears, which contain fluid-filled semicircular canals. These canals provide your brain and eyes with crucial information on the position of your head and its movement in space with respect to gravity. (Common problems related to the workings of the inner ear include dizziness on escalators and sea-sickness.) When your sense of balance is in good working order, the

three elements of balance work together automatically with your musculoskeletal system to keep you mobile and to prevent falls.

There are various reasons why your sense of balance can become impaired. In older adults, poor posture – particularly if you tend to slouch forward and have rounded upper shoulders – can sometimes cause unsteadiness. Furthermore, your base of support is important in keeping you balanced: If you have a wide “pyramid”-type stance, you’re less likely to lose your balance or fall than if your feet are close together in a “pencil” stance. Disease can also rob you of a strong sense of balance. People with diabetes, for example, may suffer from numbness in the lower extremities and feet – a problem that makes detecting obstacles or dangers more difficult. People with arthritis, or who have had surgery on their hips, knees, or feet, may lack the flexibility and range of motion necessary to avoid falling.

Strength, flexibility, and endurance are crucial to maintaining balance and preventing falls. Even if your basic perception of balance is good – you have normal vision and no inner ear problems – you can still be at risk for falls if your muscles are weakened or stiff, or if you tire easily. Older adults – particularly those with osteoporosis (the disease that causes brittle bones) – have very legitimate concerns about falling and often restrict their physical activities to prevent such a mishap. Ironically, lack of exercise only makes it more likely that a fall will occur – and a vicious cycle has been put into motion.

Fortunately, physical therapy can help you learn to cultivate and maintain higher levels of strength, flexibility, and endurance in a way that still feels safe and secure. Research indicates that the risk of falling in older adults can be reduced dramatically when specific exercises, activities, and interventions are prescribed by physical therapists. There are instances, however, in which physical therapy alone may not be appropriate. If you have an inner ear disorder, for example, you will need to consult a physician.

How Physical Therapy Can Help

If you consult a physical therapist about falls and balance, he or she will likely review your medical history and determine your general physical condition, as well as conduct an inventory of tests specifically designed to measure balance and gait (your individual style of walking). If you have fallen before, your physical therapist will ask you to describe the accident in some detail to find out what caused the fall. (Just as important as actual falls are “near-falls” – instances in which you were on your way down but managed to “hang on.”)

After your physical therapist has determined what is impairing your balance, he or she will design a program of exercises and activities just for you, with an emphasis on strength, flexibility, and proper gait. All exercises would be planned for maximum safety and security. Your physical therapist may also perform specific interventions to increase your range of motion and musculoskeletal flexibility. These may include electrical stimulation, massage, hydrotherapy, heat, cold, and ultrasound. If you have balance problems related to the inner ear, your physical therapist may also try interventions known as vestibular rehabilitation. Vestibular rehabilitation includes techniques that help the inner ear respond to a change in position. Conditions that may require vestibular rehabilitation include vertigo, dizziness, or nausea.

If necessary, your physical therapist may also prescribe assistive devices for walking (such as canes, crutches, or walkers). Make sure the tips on canes and crutches are large (and spiked, if necessary, for icy conditions), and that canes are high enough (they should come up to your hip).

Appropriate footwear is another major consideration. Wearing a good pair of lace-up walking shoes will help support your foot and provide necessary cushioning for your joints; this will make walking safer and more comfortable. Avoid high heels, slippers, and open-toed sandals, which can cause you to trip.

Balance Is A Skill You Can Keep — Or Recapture

The good news is that balance is a skill that almost all of us can keep throughout our lives. Much of the deterioration in balance associated with age is simply due to not using this skill. Sometimes this happens because of change in lifestyle – most of us become more sedentary as we grow older – or it can happen due to fear of falling.

Working with a physical therapist can produce exceptional results in many cases. Even if some of your innate sense of balance has been diminished over time, physical therapists are experts at retraining your body to make the most of its capabilities.