



Gillette Children's
Specialty Healthcare



**A Gillette Center
of Excellence**

Center for Spina Bifida
at Gillette Children's Specialty Healthcare

Centers of Excellence at Gillette Children's Specialty Healthcare

Treating people who have disabilities and complex medical conditions requires a team approach. At Gillette Children's Specialty Healthcare, our doctors, surgeons, nurses, therapists, orthotists, psychologists, social workers and other specialists work together to care for patients. Throughout our centers of excellence, we offer leading-edge medical treatments tailored to the unique needs of each patient.

Gillette's centers of excellence:

- Center for Cerebral Palsy
- Center for Craniofacial Services
- Center for Gait and Motion Analysis
- Center for Pediatric Neurosciences
- Center for Pediatric Orthopaedics
- Center for Pediatric Rehabilitation
- Center for Pediatric Rheumatology
- Center for Spina Bifida

A Gillette Center of Excellence

Center for Spina Bifida

At Gillette's Center for Spina Bifida, we value a team approach to patient care. Our specialists work together to provide comprehensive, innovative treatments tailored to each patient's and family's needs. Moreover, we demonstrate our commitment to lifelong care by offering transition-planning and health-care services for teens and adults who have spina bifida.

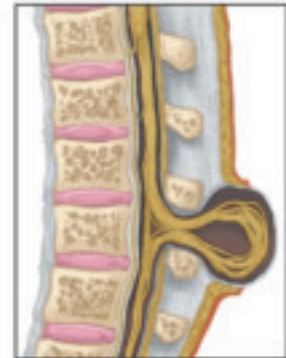
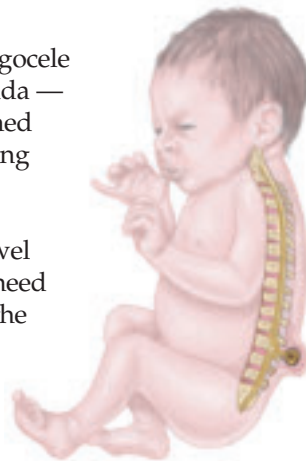
Gillette has the largest spina bifida program in the five-state area. We collaborate with local and national advocacy groups to offer education and support to patients, families and health-care professionals. As a leader in the care and treatment of people who have disabilities, we strive to raise awareness about spina bifida and other complex medical conditions.

About Spina Bifida

Spina bifida occurs when the spinal cord, surrounding nerves and/or spinal column fail to develop normally during the first 28 days of gestation. The condition often causes paralysis and other complications below the affected area on the spine.

Common Types of Spina Bifida

- **Myelomeningocele:** In myelomeningocele — the most severe form of spina bifida — a sac containing an abnormally formed spinal cord protrudes from an opening in a newborn's back. The nerves at and below the affected area are damaged, causing paralysis and bowel and bladder complications. Babies need surgery shortly after birth to repair the affected area. The nerve damage, however, can't be reversed.



With myelomeningocele, a sac containing an abnormally formed spinal cord protrudes from a newborn's back.

- **Meningocele:** In meningocele, a baby is born with a sac protruding from an opening in the back. It differs from myelomeningocele in that the sac doesn't contain the spinal cord and fewer nerves are affected. Babies need surgery shortly after birth to repair the affected area. Most babies born with meningocele develop normally without complications.
- **Spina bifida occulta:** In spina bifida occulta, the bones around a baby's spinal cord fail to develop normally. The nerves of the spinal cord usually are normal, as is the skin on the back. Sometimes, however, there will be a dimple, hair patch or red discoloration on the skin over the affected area. If patients experience tethered spinal cords, spinal lipomas or split-cord malformations, they might require surgery in infancy or in later years.

Effects of Spina Bifida

People who have spina bifida can experience a wide range of medical complications, including:

- Allergic reactions caused by prolonged exposure to latex
- Fractures and other orthopaedic problems
- Seizures
- Bladder, bowel and kidney problems
- Hydrocephalus (excess fluid on the brain)
- Skin problems
- Eye problems
- Learning disabilities that affect concentration and organizational skills
- Tethered spinal cord
- Weight gain or obesity

Our Team Approach

Spina bifida is a complex condition involving the nervous, urinary, muscular and skeletal systems. The effects of spina bifida are different for each person, depending on how much of the spinal cord is damaged. That's why we offer a full range of services to help our patients live full, productive lives.

We use a collaborative approach that places families at the center of the care team. Our specialists often build long-term relationships with patients, focusing on their physical, mental and emotional health. We believe that our approach ensures the best possible outcomes for our patients.

Gillette's Center for Spina Bifida brings together a caring team of professionals from a wide variety of disciplines. We work together to offer comprehensive care for every patient.



Lifelong Needs, Lifelong Care

The effects of spina bifida require lifelong management and care. We often begin seeing our patients when they're babies and continue providing age-appropriate care throughout their lifetimes. As our patients approach adulthood, we support families by discussing independence and the transition to adult-focused health care. Gillette Lifetime Specialty Healthcare continues Gillette's tradition of excellence with services tailored to the specific needs of adults.

Gillette Lifetime Specialty Healthcare provides a full range of services — including physical medicine and rehabilitation — for adults who have spina bifida.

Our Services

At Gillette, we provide a wide range of services for people who have spina bifida. We work with families to coordinate patient care from birth through adulthood.

Assistive Technology and Seating

People who have spina bifida often need orthoses, standers, wheelchairs and adaptive equipment for mobility and independence. Our assistive-technology team designs and fabricates custom braces and seating systems to meet each patient's specific needs. We offer assistive-technology services on our main campus, at our clinics and at outreach sites throughout greater Minnesota.

Casting

Clubfoot, fractures and other orthopaedic problems are more common in people who have spina bifida. We offer casting services for patients with acute orthopaedic and postsurgical needs. Our technicians are trained in a wide range of casting techniques, including the Ponsetti method — a nonsurgical casting process used to treat clubfoot.

Child Life and Therapeutic Recreation

Through therapeutic play, patient education and hospital tours, our child life specialists help patients and families cope with — and better understand — medical procedures, hospital stays and pain-management techniques. Therapeutic recreation specialists help patients develop fitness programs and pursue recreational activities.



As children grow, our certified seating specialists modify and rebuild seating systems to ensure comfort and enhance patients' abilities.

Many children become nervous when technicians apply and remove casts. Gillette's friendly staff is experienced at helping children feel more comfortable.



Family Resource Center

Gillette's Family Resource Center provides a full range of educational materials, including books, brochures, videos and Web resources. Our staff can help families find appropriate resources and use the center's computers.

Neurology

Approximately one in 20 people who have spina bifida develop seizures. Gillette's team of neurologists manages seizures and treats other brain and nervous-system problems in patients who have spina bifida.

Neurosurgery

Gillette provides a full range of neurosurgery services for patients who have spina bifida. In addition to repairing spinal defects present at birth, neurosurgeons repair tethered spinal cords and implant shunts to treat hydrocephalus — a condition that affects 80 to 90 percent of people who have spina bifida.

Nursing

Our nurses collaborate with physicians before, during and after surgery. Our nurses also care for patients and educate families during inpatient stays and outpatient clinic appointments.

Occupational Therapy

Occupational therapists help people improve their ability to perform daily tasks, such as dressing and grooming. Occupational therapists also evaluate patients who might benefit from adaptive equipment, manual and powered wheelchairs, and environmental controls.

Gillette's physical therapists use toys and games to keep children focused during strengthening and stretching exercises.



Ophthalmology

Some people who have spina bifida develop crossed eyes or other visual disorders. Gillette's ophthalmologists treat such disorders with eye patches, glasses or surgery.

Orthopaedics

Because people who have spina bifida often experience paralysis, they're more likely to develop foot deformities, dislocated hips, fractures, bowed legs and scoliosis. Our orthopaedic surgeons monitor how bones, muscles and joints develop in people who have spina bifida. When orthopaedic problems occur, surgeons recommend such treatments as bracing and surgery.

Pediatrics

Specialty pediatricians and pediatric nurse practitioners assess development in patients who have spina bifida. In collaboration with patients' primary-care physicians, they also address health concerns such as nutrition and bowel management.

Rehabilitation Medicine

Pediatric rehabilitation medicine physicians develop treatment plans to promote mobility and independence in children who have spina bifida. They collaborate with therapists to develop rehabilitation programs that increase mobility and independence. Physical medicine and rehabilitation physicians provide services for adult patients.

Physical Therapy

Physical therapists help patients who have spina bifida improve their strength and gross-motor skills. By monitoring range of motion, strength and abilities, physical therapists help patients improve their independence and mobility.

Psychology

Gillette's psychologists regularly screen patients to evaluate their cognitive, academic and psychosocial strengths and challenges. We provide individual and family counseling, which often focuses on coping with disabilities, pain and stress. If needed, we contact patients' schools to discuss special academic services or behavior-management strategies. Our psychologists also help adult patients with work-related and relationship issues.

Social Work

Our social workers interview patients and families to determine their needs. In addition to helping families find community resources for needed services, social workers provide educational and emotional support. As patients approach adulthood, social workers help patients and families prepare for the transition to adult-focused health care.

Urology

Bowel and bladder complications are common in people who have spina bifida. Urologists use medical and surgical techniques to improve bladder, bowel and kidney function and prevent incontinence.

Gillette social workers talk to teens and young adults about the transition to adult-focused health care. We offer resources on a variety of topics, including health insurance, relationships and sexuality.



Information & Referrals

For more information about Gillette's Center for Spina Bifida, call 651-229-3878 or 800-719-4040 (toll-free). To refer a patient, call 651-229-3944. For information about Gillette Lifetime Specialty Healthcare for teens and adults, call 651-634-1920.

Additional Resources

- Spina Bifida Association of America
800-621-3141 (toll-free)
www.sbaa.org
- The Hydrocephalus Association
888-598-3789 (toll-free)
www.hydroassoc.org



LEARN MORE!

For more information about spina bifida, visit our Web site at www.gillettechildrens.org.

Our Mission

Gillette Children's Specialty Healthcare meets the special health-care needs of people — primarily children and teens — who have disabilities. Our mission is to help those we serve realize greater well-being, independence and enjoyment in life.

We combine medical, nursing, therapeutic, technical, psychosocial and other expertise in family-centered programs. We provide services at our clinics, in our hospital and throughout the region, in response to community needs and often in collaboration with other organizations. We seek to build community partnerships that help continue our mission and enhance care for people who have disabilities.



Gillette Children's
Specialty Healthcare

St. Paul (Main) Campus
200 University Avenue East
St. Paul, MN 55101
651-291-2848
800-719-4040 (toll-free)

Burnsville Clinic
305 East Nicollet Boulevard
Burnsville, MN 55337
952-223-3400
866-881-7386 (toll-free)

Duluth Clinic
Lakewalk Center
1420 London Road
Duluth, MN 55805
218-728-6160
800-903-7111 (toll-free)

Minnetonka Clinic
6060 Clearwater Drive
Minnetonka, MN 55343
952-936-0977
800-277-1250 (toll-free)



Gillette Lifetime
Specialty Healthcare

New Brighton Clinic
550 County Road D
New Brighton, MN 55112
651-636-9443
800-578-4266 (toll-free)

www.gillettechildrens.org