WakeMed Rehab Spinal Cord Injury Scope of Service

The WakeMed Rehab Continuum provides an integrated, comprehensive delivery of rehabilitation services utilizing evidence-based practice directed toward a population of individuals who have sustained a spinal cord injury as a result of illness, injury, or disease process. This continuum formally includes the Rehabilitation Hospital and Outpatient Rehab Day Treatment Program at WakeMed, Raleigh Campus and medical follow up annually or as needed. The patient’s care begins in WakeMed’s acute care Level I trauma center/hospital, through the Rehabilitation Hospital and Outpatient Day Treatment program. The continuum continues post-discharge from the medically-based programs into community based programs in the Spinal Cord Injury Fitness Program, the Spinal Cord Injury Support Groups and the involvement with the North Carolina Spinal Cord Injury Association. Admission to the WakeMed Rehab Continuum would benefit these individuals in ways not otherwise possible by developing and restoring skills toward independence, facilitating self-management, and decreasing the dependency effect on their families and communities.

WakeMed Rehab receives referrals from many sources, including, but not limited to, private physicians, physiatrists, acute care hospitals, rehab hospitals, nursing facilities, Wake County Health Department, home health agencies, WakeMed Emergency Departments, local urgent care centers and follow-up appointments from former inpatients and outpatients. Payer sources for WakeMed Rehab include both state and federal public payers (Medicare, Medicare Advantage Plans and Medicaid), commercial insurances, worker’s compensation, and self pay. Any payer requirements that affect the provision of services are identified and communicated to the treatment team, including the person served.

Annually, WakeMed reviews market comparisons and establishes reasonable rates for private and semi-private rooms, as well as updating the Charge Description Master for all provided services. Program fees are defined, and anticipated liability related to services are discussed with patients individually prior to admission and provided in writing via the Written Disclosure Form. On-going discussion of the financial impact of hospitalization, outpatient services and services post-discharge is the responsibility of the case manager.

Admission decision-making occurs by evaluating the patient’s impairments, activity and participation limitations and determining rehab needs and potential for functional improvement. Additionally, a review of the program’s ability to meet the patient’s needs and recognize community resource alternatives and availability is assessed. WakeMed Rehab serves patients ages 4 and up, though younger children may be accepted after discussion and approval of Medical Director, Rehab Hospital Director and Nurse Manager of 3C, or Outpatient Rehab Director on a case-by-case basis. Appropriate placement of each person served is also addressed through the admission and discharge/transition criteria for each component of care, the resources available, and resources previously used, ongoing reassessment and the person’s potential to benefit. The spinal cord injury program accepts patients with injury or dysfunction due to trauma, injury or disease with motor and/or sensory deficit that are either complete or incomplete. All levels of spinal cord dysfunction that do not require ventilator assistance are accepted for admission with the presence of at least one of the following problems:

- Impaired mobility
- Impaired ability to perform self-care activities
- Bowel/bladder management problems
- Lack of safety in performing functional activities
- Impaired skin integrity

The program will not accept patients with active pulmonary disease or contagious conditions if in an infective stage.

The spinal cord injury treatment program in the WakeMed Rehab Continuum is medically supervised by a
physiatrist who has expertise in the medical management and rehabilitation of people with a spinal cord injury. Highly qualified professional staff designated specifically for the inpatient and outpatient spinal cord injury rehabilitation program provides evidence based services that are up to date with current research standards. Treatment space, bed assignment and equipment are also specifically identified for provision within the spinal cord injury rehabilitation program. WakeMed Rehab services offered that are unique to the SCI program include the Vector Gait and Safety System, Bioness L300 Plus, Lite Gait, FES bike, BTE Primus, Ekso™ and the Easy Stand Glider.

The interdisciplinary teams for the spinal cord injury program are comprised of the person served, family members/caregivers/significant others and of consistently assigned staff from the following professional disciplines dependent upon patient need:

- Rehabilitation Medicine
- Neuropsychology
- Rehabilitation Nursing
- Therapeutic Recreation
- Occupational Therapy
- Clinical Case Management
- Physical Therapy
- Clinical Dietician
- Speech-Language Pathology
- Rehabilitation Medicine

If services not available within WakeMed Rehab Continuum are needed, referrals, contracts or consultations will be made to provide persons served with appropriate services. These services may include, but are not limited to:

- All medical, diagnostic and laboratory services offered at WakeMed including respiratory care
- Adjustment to disability
- Advocacy
- Aging with a disability
- Assistive technology
- Audiology
- Benefits
- Behavioral Health and Psychiatry
- Community Support Agencies, Advocacy Groups, Peer Support Groups
- Department of Social Services
- Drivers Assessment and Education
- Durable Medical Equipment (provision of and instruction in use)
- Edema management
- Environmental modifications/Assistive Technology
- Fall prevention
- Financial counseling
- Family/support system Counseling
- Insight of the person served
- Leisure and recreation
- Life roles
- Medical Interpreter Services
- Medical Nutrition Therapy
- Orthotics and Prosthetics
- Pain
- Parenting skills
- Physical activity
- Palliative Care
- Pediatric services
- Peer Support
- Posture, seating and wheelchair setup
- Pulmonary management
Rehab Engineering
• Seating
• Sexual Counseling
• School continuance or re-entry
• Sexual Function and Reproductive Assessment and Management
• Skin Care
• Socialization
• Specific healthcare services
• Spouse/significant other relations
• Substance use counseling and education
• Supervision needs
• Social Security Administration
• Specialty Consultants
• Spiritual Care
• Substance Abuse Counseling/Chemical Dependency Specialist
• Tone management
• Transportation needs
• Volunteerism
• Vocational Rehabilitation
• Wellness
• Work continuance or re-entry
• Wheeled mobility, including:
  • Ordering
  • Modification
  • Training in community settings
  • Seating

The spinal cord injury rehabilitation program coordinates services to meet individual needs. Integration of services is provided through interaction and feedback within the WakeMed system and with other service providers/systems. Provision is made to include all consulting services and external case managers as members of the interdisciplinary team.

Upon admission to WakeMed Rehab Spinal Cord Injury Program, each individual receives a comprehensive assessment and evaluation by each team member initially involved in provision of his/her direct treatment. Appropriate assessments are provided based on the ages, cognitive levels, interests, concerns and cultural and developmental needs of the persons served. Designated space, equipment, furniture, materials and a private area for family/peer visits are provided as appropriate.

For patients served in the Rehab Hospital, with input from all team members, the physician develops an Individualized Plan of Care for each patient within four days of admission. The treatment team will meet to update the Plan of Care based on realistic, achievable, functional goals and planned interventions necessary for goal achievement in a realistic time frame. Treatment planning includes a minimum standard of intensive rehab programming of either three hours of therapy per day, five days per week or fifteen hours of therapy over a seven day period. Weekend therapy is routinely provided as recommended by the team and as part of the treatment plan. The Plan of Care is structured to include the patient/family’s goals and discharge planning issues. An estimated length of stay and assessment of discharge needs are identified within the parameters of the long-term goals. Through the case management process, the Plan of Care is shared with the patient/family and, when appropriate, the individual’s insurer to facilitate communication, reimbursement and a collaborative discharge plan. Services are provided on the nursing units in the Rehab Hospital at WakeMed, in the therapy gyms, the Health Park and other WakeMed public areas and, as appropriate, within the community. Medical and nursing services are available twenty-four hours per day, seven days per week. Therapy services are offered daily. Case Management services are available six days per week.
The Day Treatment Program team completes individualized assessments and develops a Plan of Care based on realistic, achievable, functional goals and planned interventions necessary for goal achievement in a realistic time frame. The interdisciplinary team establishes a frequency of treatment based upon the individual rehab needs of the person served, short and long term goals and discharge needs. The Outpatient Rehab Day Treatment Program operates Monday and Wednesday from 8:00am-5:30pm, Tuesday, Thursday and Fridays from 8:00am-4:00pm based on patient need.

Patient and family involvement in the spinal cord injury program begins during the pre-admission and assessment phases and continues throughout the program. The Inpatient Rehab Clinical Case Manager formally discusses the comprehensive Plan of Care, progress and goals with the patient/family, at least weekly. Discipline-specific goals focused on fostering self-management are discussed during treatment sessions and include the family during specific family training sessions as needed. Every effort is made to meet patient/family needs and goals through participation in the decision making process. Goal conflicts are addressed primarily through the Case Management process or Family Conferences but may also be addressed during family training sessions, individual treatment sessions, or other contacts with persons served and/or family. The system of care provides, or arranges for, advocacy training, support services, education, family support, and sibling/peer support as appropriate.

Patient and family involvement continues into the outpatient program, which follows either a day treatment or traditional outpatient model. A comprehensive Plan of Care is established, assuring continuous service from inpatient to outpatient. Formal or informal team conferences are held. Discipline-specific goals are discussed during treatment sessions and include the family during specific family training sessions. Every effort is made to meet patient/family needs and goals through participation in the decision making process. Goal conflicts are addressed primarily through the Case Management process or Family Conferences but may also be addressed during family training sessions, individual treatment sessions, or other person served/family contacts.

The scope of the spinal cord system of care includes Orientation, Assessment, Education, Treatment, Transition Planning and Follow Up. The system of care addresses the unique aspects of delivering care to the person served according to their level of impairment, activity and participation in the following areas:

1. Medical/Physiological Sequelae: Abnormal tone, auto-immune disorders and immune suppression, autotomic dysreflexia, bowel and bladder function, body composition, circulation, demyelinating disorders, dysphagia, fertility, infection management, medications, mens’ health issues, musculoskeletal complications, neurological change, nutrition, pain, respiration, sexual function, skin integrity, spasticity, vision and women’s health issues.
2. Psychosocial: Adjustment to disability, behavioral health, substance misuse, family/support system counseling, mental health, coping/adjustment/insight, peer support and sexual adjustment.
3. Functional: Activities of daily living, assistive technology, behavior, cognition, communication, community integration, driving, durable medical equipment, emergency preparedness, environmental modifications, leisure and recreation, medication, mobility, occupation, orthosis, personal care assistants, prosthesis, seating and vocational.
4. Education and Training for the persons served and their family/support system, the community, and the professional community.
5. Aging including aging with a disability and spinal cord injury and dysfunction in an aging population.
6. Case Management
7. Resource management
8. Transitions across the lifespan
9. Follow-up
10. Prevention related to potential risks and secondary health conditions due to impairments, activity limitations, participation restrictions and the environment.
11. Safety for the persons served and the environments in which they participate.
12. Research capability
13. Life-long follow up
14. Health promotion and wellness
15. Independent living and community integration

The Spinal Cord System of Care provides or arranges for diagnostic services to screen for and assess the status of bladder function, bowel function, cardiac function, cognitive function, depression, metabolic function, musculoskeletal function, neurological function, pulmonary function, skin integrity, swallowing, thromboembolic disease and other common secondary conditions.

The spinal cord system of care identifies services/programs that dependent upon the needs of the persons served it will provide or link with: emergent care, acute hospitalization, other inpatient programs, skilled nursing care, long-term care hospitals, behavioral health, home care, other outpatient programs, community based services, independent living centers, residential services, vocational services, primary care, specialty consultants, clinical research centers, consumer advocacy organizations, driver rehabilitation and long term care. The system of care also defines its relationships with the services/programs, defines the responsibilities of the spinal cord system of care and the services/programs with which it links. The system of care will involve, as appropriate, the payer, the referral source, treating physicians, health care professionals, the person served, the family or support system, and the employer/employer designee. Care planning also includes:

1. Contact with the patient’s primary or referring physician and/or hospital.
2. Early identification of a realistic discharge destination.
3. Assessment of accessibility and characteristics of the discharge environment and community.
4. Identification of family/primary caregivers.
5. Identification of and referral to community support resources, including but not limited to advocacy services, counseling/support resources for individual, family, parent, sibling, etc.
6. Referral for continued rehabilitation therapy on an outpatient or home care basis.
7. Referral to medical specialists for follow-up after discharge.
8. Education regarding prognosis, prevention and wellness.
9. Referral to equipment, orthotic or prosthetic agencies.

The system of care also assists the person served to access community resources, uses community systems, obtains appropriate equipment and supplies and provides referrals for expertise when appropriate.

Need for continued treatment is decided upon by all team members throughout the treatment process during team and family conferences, as well as informal daily treatment team conversations, and is based on:

1. Medical/physical problems, which can best be treated within the rehabilitation hospitalization.
2. Continued progress toward stated goals.
3. Expected improvement in function and independence.
4. Availability of alternative treatment or programming.

Discharge dates are planned or set when continued hospitalization is no longer necessary, and/or the patient and family are adequately prepared and discharge destinations are finalized. The system of care identifies the skill sets necessary to be successful in the next environments of care for both the person served and the family. The patient and/or the family are asked to demonstrate these skills required prior to discharge.

The system provides a systematic education program about spinal cord injury for the persons served and the family/support systems that considers the readiness of the person served and the family/support system to receive the education and is reinforced among members of the interdisciplinary team and throughout the rehab process. The education includes:
1. Access to financial resources and benefits systems such as education, vocational rehabilitation, Social Security, Medicaid, workers’ compensation, etc.
2. Autonomic dysreflexia
3. Bladder management
4. Bowel Management
5. Cardiovascular risk factors
6. Substance misuse
7. Consumer advocacy organizations
8. Depression
9. Diabetes prevention
10. Edema management
11. Emergency preparedness
12. Follow-up medical care, including the need for such care and how to access it
13. Health promotion and wellness
14. Independent living and community integration
15. Life care planning
16. Transitions across the lifespan
17. Aging with a disability
18. Medical nutrition therapy
19. Musculoskeletal issues
20. Pain management
21. Prevention related to potential risks and secondary health conditions
22. Psychosocial issues
   a. adjustment to disability,
   b. role changes,
   c. mental health needs,
   d. cultural
   e. adjustment issues,
   f. delineation of roles,
   g. social perceptions.
23. Pulmonary care
24. Resource management
25. Safety for persons served in the environments in which they participate
26. Self-advocacy and consumer competency
27. Self-management of health
28. Sexual counseling and education, including information about reproduction issues
29. Skin care and prevention of pressure ulcers
30. Spasticity management
31. Spinal cord injury research, including access to current research
32. Use of leisure time
33. Weight management

The System of Care provides for the transition of the persons served to other levels of care including immediate access to emergency medical services as needed. Upon discharge, each patient and family will receive a written follow-up plan including recommendations for the following as needed:

1. Medical/physiological issues and contact information with phone numbers
2. List of medications, dosage and directions for use
3. Dietary instructions
4. Functional issues including therapy prescriptions, and recommended activity/participation levels
5. Psychosocial issues
6. Aging issues
7. Education and training
8. Case management
9. Resource management
10. Transition planning
11. Primary prevention
12. Secondary prevention
13. Community integration services
14. Equipment checks
15. Life-long follow-up including, the durability of the outcomes achieved, issues of impairment, issues of activity, issues of participation, issues of quality of life, the environment, and personal preferences.
16. Contacts with Home Health Care or Outpatient rehabilitation.
17. Contacts with referred financial and vocational assistance agencies
18. Contacts with DME, orthotics or prosthetic agencies.
19. Educational service contacts.
20. Referral for psychosocial adjustment counseling (family counseling, individual counseling, parent support groups, sibling support groups).
21. Community support groups and/or advocacy groups

The scope of the spinal cord system of care recognizes the importance peer relationships can have on the long-term outcomes for those with a spinal cord injury. Efforts are made to maintain relationships with current social networks and also establish new relationships with persons living in the community with a spinal cord injury. Team members maintain a list of people living in the community with a spinal cord injury to serve as peer mentors. The peer-mentoring program assures that patients with newly acquired spinal cord injuries have an opportunity to establish a relationship with another person of like characteristics with a spinal cord injury. Often these relationships can serve as a source of ‘real life’ information, shared experiences and support in adjusting to the challenges of living with spinal cord injury. Referrals to peer mentors are made with the patient’s permission by the treatment team to qualified and approved peer supporters which include previous patients or active members within the network of those with Spinal Cord Injury. Referral to spinal cord injury support groups, NCSCIA, and adaptive sports further enhance the opportunity for integration with new social, recreational and peer networks.