

PREAMBLE

A rotation on team 3 at McMaster should give senior residents the opportunity to become familiar with a wide variety of conditions and challenges that present to children with chronic complex conditions.

MEDICAL EXPERT

1. The resident should have an understanding of the applied anatomy and physiology with respect to the problems and conditions faced by chronic complex patients admitted to the pediatric ward
2. Demonstrate the unique communication skills necessary to obtain thorough, focused histories from parents or other caregivers.
3. Elicit key physical signs in children despite potential poor compliance.
4. The pediatric resident should be able to:
 - a. Recognize the unique illnesses faced by Chronic Complex patients.
 - b. Recognize limited host resistance and high risk of nosocomial infections.
 - c. Recognize the need to individualize fluid administration on the basis of weight and increased insensible losses, and be able to calculate expediently nutritional and fluid and electrolyte requirements.
 - d. Recognize and accommodate for the altered physiological drug administration.
 - e. Recognize the normal range and wide variation with respect to diagnostic tests involving infants and children of different ages.
 - f. Understand the indications for, maintenance of, and frequent complications encountered with Tracheostomies.
 - g. Understand the basics of a tracheostomy change
 - h. Understand the indications for, maintenance of, and frequent complications encountered with Gtubes/GJtubes.
 - i. Understand the indications for home oximetry
 - j. Recognize the considerable cost to families and health care systems of health maintenance of a medically fragile and technology dependant child
 - k. Understand the principles of a POST and be able to discuss it with health care givers and families

5. Be able to diagnose and manage a variety of medical conditions including:
 - a. Cerebral palsy and its classifications
 - b. Neurodegenerative disorders
 - c. Metabolic disorders
 - d. Genetic syndromes – common chromosomal anomalies including Trisomy 21, 18, 13 and microdeletions
6. Demonstrate aseptic technique in performing medial procedures including:
 - lumbar puncture
7. Demonstrate proficiency in insertion of naso gastric feeding tubes, replacement of fallen gtubes with foley catheters. Understand the technique of tracheostomy change.

The Senior resident should be competent in his/her knowledge and skills above. The Senior resident should be able to begin to independently manage the patients and make independent treatment decisions.

COMMUNICATOR

1. Convey pertinent information on the inpatients in different circumstances (over the phone, during ward rounds and case conferences).
2. Provide accurate and concise written information to other health professionals by means of dictated summaries and consultation notes.
3. Appreciate the importance of communicating with the child's parents and other family members.
4. Understand the crucial role the patient's primary care physician plays not only during the hospitalization, but also after discharge, and communicates with them on a regular basis.
5. Learn to share and convey favourable and unfavourable information to patients and families and provide updated and accurate medical information if requested to do so.

COLLABORATOR

1. Involve pediatric sub-specialists in diagnosing and managing children with multisystem complex medical issues.

2. Work together with fellow team members to ensure sharing of responsibility and workload in a pleasant and collegial working environment.
3. Recognize the key role the ward nursing staff play in ensuring optimal care for infants and children in hospital.
4. Be able to coordinate care involving many different medical and allied health professionals.
5. Be able to coordinate safe and efficient discharges of medically complex patients, involving and communicating with families, other caregivers, CCAC and allied health teams, community pediatricians and family physicians, subspecialists, and if needed child protection agencies.

MANAGER

1. Appreciate the issues surrounding informed consent and refusal of treatment.
2. Understand the costs and cost effectiveness of treatments and interventions for infants in a hospital setting.
3. Be able to manage the difficult task of ensuring timely admission and discharge of patients on busy active inpatient units

HEALTH ADVOCATE

1. The resident should be an injury prevention and preventative health advocate which includes:
 - a. Promoting safety in the home
 - b. Advising families on safety and maintenance of Tracheostomies
 - c. Advising families about Gtubes, feeding pumps, prevention of aspiration

SCHOLAR

1. Recognize the importance of self-assessment, self-directed learning and personal continuing education combined with integrated patient care.
2. Be able to critically appraise medical literature and apply these skills in practicing evidence-based medicine.

3. Value the critical need for ongoing systems of peer review, maintenance of competence, and evaluation of outcomes in the management of medically complex children.
4. Teach the challenges of medically complex patients to medical students, fellow residents and other health professionals.

PROFESSIONAL

1. Appreciate the particular emotional and ethical issues surrounding the care of a sick child and the need to involve parents, children's advocates and other caregivers in providing support in difficult situations and circumstances.
2. Be aware of the life-long significance of serious or chronic illnesses in children and their impact on quality of life.
3. Demonstrate appropriate attitudes with respect to gender, culture and ethnicity.
4. Appraise the ethics of research concerning children.