State of North Carolina
State Health Coordinating Council
Department of Health and Human Services • Division of Health Service Regulation
2714 Mail Service Center • Raleigh, North Carolina 27699-2714
Tel 919-855-3865 • Fax 919-715-4413

Beverly Eaves Perdue, Governor | William Wainwright, Chairman | Dennis Clements, Pediatric Operating Room Work Group

September 9, 2011

Colleagues,

Representative Wainwright has asked us to consider the NEED for the operating room standard methodology to be changed to determine pediatric operating rooms separately from adult ORs. And while doing that to consider:

1- changes in surgery cases data collection and tracking of OR use that would be needed,
2- a need to therefore reduce operating rooms of other types,
3- degree of flexibility to use the rooms if not otherwise being used, and
4- implications for ambulatory surgery centers.

Facts for consideration:

1) Children should be operated on in operating rooms designed and equipped for children – including anesthesia and surgical equipment. Children, particularly young children need different sized equipment for airway management, catheterization, IVs etc and it must be at hand at all times. OR temperatures also may need to be adjusted for maximum safety.

2) It is also apparent that pediatric surgical rooms need to be clustered as one pediatric anesthesiologist may be covering more than one room and not all anesthesiologists are comfortable or competent with children so rooms need to be as close together as possible to assure safety of airway management.

3) Children - particularly young children - need a longer time for induction of anesthesia – generally their parents are with the children during this time. And they need a space in which this can be performed. In addition, there is data that supports a small incremental time increase required to perform procedures on children – at least for some procedures.

4) Children – particularly less than 2 years of age – must go first in the morning to the OR – they are kept NPO overnight and because of their body mass to surface area ratios they become dehydrated quickly and can also become hypoglycemic.

All of these points suggest that from a clinician's safety perspective - children should have separate operating rooms, equipped for them and staffed for them and rooms as contiguous as possible if multiple operations are being covered by one anesthesiologist.

Constraints considered in changing the methodology:

1) The purpose of the SHCC driving the SMFP and the CON process is to match healthcare capital expenditures to community need, regardless of individual institutional need, and thereby eliminate excess capacity and runaway healthcare costs.

2) Exemptions to the plan, or exceptions to the needs methodology, should be few and far between, because it undermines the validity of the model, the intent of the process and it sets precedence. Where exemptions or exceptions are granted within the plan, great care must be taken to justify why such a change is needed.

3) Some Hospitals in the State have already segregated pediatric surgery without benefit of a change in O.R. needs methodology for pediatric patients.

4) Individual institutional need driven exceptions and desires can be addressed through petitions to the SHCC, through a process that is already in place.

Considering these points and counter-points, the Pediatric OR Work Group recommends the following for the 2013 N.C. SMFP:

1) There is a need to change the operating standard methodology to consider calculating need using a different multiplier (1.125) for pediatric operating rooms,

2) This calculation means that all pediatric surgeries (except for circumcisions) be weighted 12.5% more than adult surgeries.

3) Pediatric patients for this chapter will be defined as patients <18 years of age.

Rationale:

This is an imperfect resolution to a real problem. Pediatric Surgery rooms need to be designated, staffed and equipped specifically for children. Many centers now do a significant number of pediatric surgeries (see attached). There is no mechanism within the SMFP to require designating certain ORs as pediatric although many centers have already done so. Although the methodology is designed to project need for "generic" operating rooms, it is our recommendation that need determinations which result from the additional "weighting" of pediatric cases should be used to develop designated pediatric operating rooms.

It is also recommended that data (time and type of operation) begin to be collected separately for operations on children less than 18 so that in 3-5 years this methodology can be refined and made more precise for a future SMFP.

Best Regards,

Dennis Clements, III, MD

Attachment

cc: Drexdal Pratt, Director, DHSR

Pediatric Inpatient Surgical Cases (without Circumcision)

Sorted by Volume of Pediatric Cases

County	Hospital	Total Inpt	Ped Inpt	Ped Inpt %
Orange	UNC Hospitals	11,258	1,927	17.1%
Mecklenburg	Carolina Medical Center	16,750	1,811	10.8%
Durham	Duke University Hospital	16,069	1,718	10.7%
Forsyth	North Carolina Baptist Hospitals	12,862	1,403	10.9%
Wake	WakeMed Raleigh	10,966	664	6.1%
Mecklenburg	Presbyterian Hospital	7,579	387	5.1%
Buncombe	Mission Hospitals	14,352	374	2.6%
Pitt	Pitt County Memorial Hospital	11,631	370	3.2%
Cabarrus	Carolinas Medical Center - NorthEast	5,567	241	4.3%
Cumberland	Cape Fear Valley Medical Center	6,962	230	3.3%
New Hanover	New Hanover Regional Medical Center	11,200	187	1.7%
Guilford	Moses Cone Health System	13,624	154	1.1%
Robeson	Southeastern Regional Medical Center	1,951	84	4.3%
Wayne	Wayne Memorial Hospital	2,630	79	3.0%
Wake	Rex Hospital	8,171	78	1.0%
Forsyth	Forsyth Medical Center	9,766	78	0.8%
Moore	FirstHealth Moore Regional Hospital	7,212	72	1.0%
Sampson	Sampson Regional Medical Center	624	72	11.5%
Randolph	Randolph Hospital	1,104	64	5.8%
Guilford	High Point Regional Health System	4,523	57	1.3%
Gaston	Gaston Memorial Hospital	4,353	57	1.3%
Wake	Duke Health Raleigh Hospital	3,222	53	1.6%
Catawba	Catawba Valley Medical Center	2,355	51	2.2%
Union	Carolinas Medical Center - Union	1,596	50	3.1%
Onslow	Onslow Memorial Hospital	928	50	5.4%
Wilson	Wilson Medical Center	2,000	46	2.3%
Scotland	Scotland Memorial Hospital	928	42	4.5%
Lenoir	Lenoir Memorial Hospital	1,503	42	2.8%
Burke	Grace Hospital	1,044	40	3.8%
Alamance	Alamance Regional Medical Center	2,246	40	1.8%
Nash	Nash General Hospital	2,261	39	1.7%
Harnett	Betsy Johnson Regional Hospital	753	36	4.8%
Craven	CarolinaEast Medical Center	3,841	36	0.9%
Johnston	Johnston Memorial Hospital	1,358	35	2.6%
Wilkes	Wilkes Regional Medical Center	632	31	4.9%
Columbus	Columbus Regional Healthcare System	1,177	31	2.6%
Iredell	Lake Norman Regional Medical Center	1,444	31	2.1%
Surry	Northern Hospital of Surry County	864	30	3.5%

Note: 2009 Thomson data (10/08 - 09/09) provided by The Cecil G. Sheps Center. Total surgical cases are listed for facilities that reported both adult and pediatric surgical cases.

9/1/2011