

Pediatric Thread Curriculum

PRE-CLERKSHIP – YEARS 1 &2

Goals

During the pre-clerkship curriculum, all medical students, regardless of ultimate career choice should:

- Participate in the care of patients of all ages in order to gain a foundational understanding of pediatric health and disease processes
- Experience pediatric conditions embedded into the basic science curriculum
- Gain exposure to children of various ages and their families to enhance communication and physical exam skills

Method

Components of the thread will include integrating pediatric content into basic science didactics, introduction of pediatric history and clinical skills, communication with caregivers /families and introduction to preventive and community pediatrics. Pre-clerkship activities will be planned utilizing

- Recorded virtual lectures
- Videos or podcasts
- Self-Study Assignments
- Integration of pediatric content into existing PBL, Doctoring cases and LACE.
- Use of standardized patients via Telemedicine
- Integration of pediatric clinical skills into existing clinical skills curriculum

Learning Outcomes

Prior to starting MS3, medical students will:

1. Learn pediatric clinical content in the context of basic science learning

2. Practice pediatric physical exam maneuvers with age appropriate techniques on different age groups
3. Recognize the different components of and approaches to a pediatric history on different age groups
4. Practice communication with a child and his/her caregiver
5. Identify the use of preventative medicine strategies for children according to age
6. Identify barriers to healthcare in the community, and healthcare team resources available for children and families

Pre-Clerkship Activities

1. Integrating pediatrics into basic science

Case Based Learning Pediatric cases will be integrated into existing curriculum that runs throughout M1-M2 years. Case topics will relate to basic science content and integrate clinical presentations of disease, physical exam findings, differential diagnosis, evaluation, management and treatment of disease. These will be in the form of:

1. Self –Study Assignments/Podcasts/Videos
2. Integration into existing CBL Cases
3. Integration into existing Doctoring Cases
4. Zoom lecture

There will be 13 total pediatric cases over first 2 years, embedded into basic science didactics.

Block	Pediatric Case Based Learning Topic	Format	Duration of activity	Doctoring or CBL case
1 The Fundamentals	NB screening	Self-Study Assignment	30 min	CBL, Wilson's Lament
	Immunizations and Vaccine Refusal/Hesitancy	Vaccine Education Module on Vaccine Fundamentals	30 min	Doctoring 1, "Joey Rivers"

2 Cardiovascular, Renal, Respiratory I	Introduction to Pediatric heart murmurs	Podcast	15min	
	Approach to Pediatric chest x-rays	Video	15min	
3 GI, Endocrine, Reproductive I	Jaundiced Baby	Self –Study and discussion	30 min	CBL, The Neonate with multiple problems
4 MSK	Child with a Limp	Podcast and Self-Study	15 min	
5 Neuroscience I	Cerebral Palsy	Video and Self-Study	15 min	
6 Hematology, Microbiology, Dermatology	Common Pediatric Rashes and Skin Lesions	Video	15min	
7 Nephrology, Cardiology, Pulmonology	Pediatric CHF	Podcast and Discussion	30min	Doctoring II, Cardiac Transplant Case
	Bronchiolitis	Self-Study Assignment	30 min	
8 GI, Endocrine	Pediatric Bowel Obstruction	Podcast	15min	CBL, Rena Roth's Abdominal Woes
	Approach to pediatric abdominal x-rays	Video	15 min	
9 Clinical Neurosciences II	Syndromic Child	Zoom Lecture	60 min	

2. Pediatric History Taking

M1 students have a didactic lecture on the pediatric history, highlighting strategies to successfully perform these skills and emphasizing differences in pediatric and adult histories as part of patient interview series in Doctoring 1. Following the didactic lectures, students will watch a video, in which history skills are demonstrated by a pediatric faculty member.

Students will utilize pediatric history skills in existing PBL and Doctoring cases in MS1 and MS2.

Existing CBL Cases for integration into pediatric thread

- Sickle Cell Anemia
- Down's Syndrome
- FTT/Malabsorption
- Infant of Diabetic Mother
- Asthma

Existing Doctoring cases for integration into pediatric thread

- Gastroenteritis
- Kawasaki Disease and cardiac transplant
- Adolescent with cough
- Teen Health Risk Counseling
- Screening for violence

3. Pediatric Physical Exam Videos

Peds Physical Diagnosis-Clinical Exam

M2 students have a didactic lecture on the pediatric and newborn history/physical exam, highlighting strategies to successfully perform these skills and emphasizing differences in pediatric and adult exams.

Students will be assigned pediatric physical exam videos (HEENT, CV/Resp, Abd/Vitals/Growth charts, MSK, Neuro) to watch during corresponding organ system blocks/Clinical Skills sessions in MS2.

Standardized patients or children of faculty will join students in person or via telemedicine for the demonstration of practice pediatric physical exams techniques.

4. Communication with caregivers/families

MS1 students observe and participate in assessing developmental milestones in children of varying ages via Telemedicine by a pediatric faculty member.

MS2 students participate in video based anticipatory guidance to families on sleep, safety, activity and nutrition.

Pediatric faculty member will be present during existing CBL and Doctoring adolescent cases to provide guidance and feedback to students on adolescent development and HEADSS interview.

5. Pediatric Preventive Medicine

With the assistance of pediatric faculty and Pediatric Interest Group, medical student volunteers will host a variety of activities for children focused on nutrition/healthy diet, physical activity, dental hygiene, immunizations, tobacco avoidance, safety, etc.

6. Pediatric Community Health

In coordination with LACE, students will visit pediatric community resource centers such as

- WIC office (Nutrition and preventive screenings for pregnant women and children under 5y)
- Inland Regional Center (Early intervention therapies and resources for children with developmental delays)
- First Five of Riverside (County resources for children and parents of children under 5y)
- School nurse/health/RUSD programs in local public schools (Regular and special education and school health)
- California School for the Deaf (CSD)
- Day care center

Assessment/Evaluation

This is designed to be a **formative** experience for students. The Pediatric Thread Curriculum will be evaluated at the completion of the 3rd year pediatric clerkship, where students will be asked if their pre-clerkship pediatric experiences prepared them for the clerkship. We will continue to monitor the change in responses to these questions with the expectation that more students will answer in a positive direction.

References

1. COMSEP <https://www.comsep.org/curricula-pre-clerkship>
2. COMSEP Curricular Action Toolkit
3. USMLE Content Outline
4. Pediatric Thread Curriculum, Washington University

Adwoa Osei MD, 7/2020

CLERKSHIP – YEAR 3

The purpose of the Pediatric Clerkship is to provide the 3rd year medical student with inpatient and outpatient pediatric clinical experiences where students will

- Acquire a working knowledge of normal and abnormal growth and development
- Recognize, understand the pathophysiology of, diagnose, and treat the common disorders of infancy, childhood, and adolescence, and
- Develop an understanding of children's and families' perspectives of being cared for within our healthcare system through observation, inquiry, and reflection.

The 3rd year pediatric clerkship consists of an inpatient, outpatient (well, sick, and follow up), and nursery rotation, including a core pediatric medical student education curriculum from birth through adolescence.

During the outpatient and inpatient experiences, students will work with several attending preceptors in the community and have an opportunity to participate in all activities that occur at the site. To help standardize and promote uniform learning experiences, we have included a list of learning outcomes for students, a list of required clerkship encounters, student reading resources and site requirements.

Pediatric Clerkship Team

Block Director
Kenneth Ballou

Kenneth.Ballou@medsch.ucr.edu

Clerkship Director
Adwoa Osei

aosei@medsch.ucr.edu

Clerkship Coordinator
Lauren Valko

Laure.Valko@medsch.ucr.edu

LEARNING OUTCOMES FOR THE PEDIATRICS CLERKSHIP

After completing the pediatrics clerkship, participating medical students will be able to:

AAMC CI PCRS
competencies:

AAMC Core EPAs:

1.	Perform effective age-oriented interviews and physical examinations on newborns, children, and adolescents.	1.2, 1.9, 4.1, 4.6, 4.7, 5.3	1, 7, 8
2.	Demonstrate the ability to develop and present a clinical assessment and plan in a problem-oriented fashion.	1.3, 1.4, 1.6, 1.8, 1.9, 1.11, 2.1, 2.2, 2.3, 2.4, 2.5, 2.6, 4.2, 4.5, 4.7, 3.5, 3.8, 3.10, 6.3, 6.4, 6.6	1, 2, 3, 4, 5, 6, 7
3.	Demonstrate clinical skills typically required in the care of newborns, children, and adolescents.	1.1, 1.2, 1.3, 1.4, 1.8, 2.1, 2.3, 2.4, 2.6, 3.1, 3.3, 3.4, 3.9, 3.10, 5.1, 5.2, 5.3, 5.4, 5.5, 5.6, 6.1, 6.3, 8.7	1, 2, 3, 4, 5, 9, 10
4.	Illustrate ways in which pathophysiologic processes can affect the growth and development in children.	1.5, 2.1, 2.2, 2.3, 2.4, 2.5, 3.3, 3.6, 3.99,	1, 2, 7
5.	Demonstrate the ability to differentiate well children from those who are mildly or severely ill based on their signs and symptoms at various ages.	1.5, 2.2, 2.3, 3.6, 3.10	1, 2, 7, 10
6.	Practice preventive pediatrics to improve child health through age-appropriate screening and anticipatory guidance about nutrition, environmental influences, safety, and immunizations.	1.5, 1.8, 1.9, 4.1, 4.6, 4.7, 3.6, 3.8, 6.2, 6.4, 7.2, 7.4, 8.7, 8.8,	1, 3, 6, 11, 12
7.	Demonstrate humanistic attitudes and professional ethical behaviors related to the pediatric patient, family, and other health care professionals.	1.10, 4.1, 4.2, 4.3, 4.4, 4.5, 4.6, 4.7, 8.1, 8.2, 8.3, 8.4, 8.5, 8.6, 8.7, 8.8	1, 3, 8, 11

8.	Demonstrate the ability to complete a clinical presentation of a pediatric patient in both oral and written format.	2.1, 2.2, 2.3, 2.4, 2.5, 2.6, 4.2, 4.5, 7.3, 8.5	1,2,3,4,5,6,7
9.	Communicate effectively with patients and their families.	1.7, 3.8, 4.1, 4.6 ,4.7, 5.1, 5.2, 5.3, 5.5, 5.6,	1,3, 11,12
10.	Demonstrate a commitment to lifelong learning through inquiry and reflective practice.	2.1 , 8.1, 8.2, 8.3, 8.4, 8.5, 8.6, 8.7, 8.8,	9,13,
11.	Demonstrate professionalism and ethical behavior (e.g., work-appropriate attire, work ethic, timely attendance and completion of assignments, and respect for others including patients, families, peers, staff and faculty).	1.7, 1.10, 4.1, 5.1, 7.1, 7.3, 8.5	8,9,11,13,
12.			
13.			