

The Bruin Breathes

UCLA Pediatric Pulmonology & Sleep Medicine

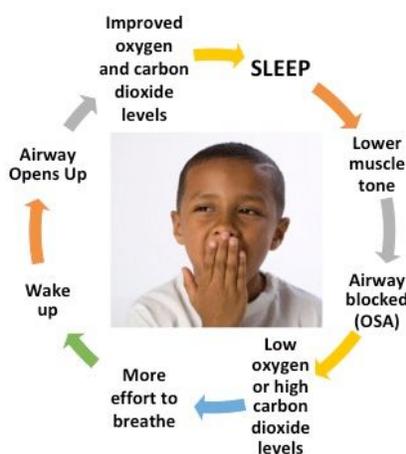
OBSTRUCTIVE SLEEP APNEA: SPRING INTO ACTION

Obststructive sleep apnea (OSA) occurs when the upper airway collapses and blocks airflow into and out of the lungs, affecting the body's oxygen and carbon dioxide.

Symptoms include snoring and pauses in breathing for two or more breath cycles (apnea), daytime sleepiness, hyperactivity, behavioral and/or school performance issues.

Children at high risk for OSA are those who: have large adenoids or tonsils, are born premature, are obese, or have a complex medical condition (e.g., Trisomy 21 syndrome, neuromuscular disease).

How does OSA happen? When people sleep, the muscles in the upper airway relax and can block the airway, causing apnea and less oxygen delivered to the lungs, which in turn lowers oxygen levels in the



body (hypoxia) and can increase carbon dioxide (hypercarbia).

The brain detects hypoxia and responds by activating the airway muscles to open the upper airway, which cause the person to wake up (known as arousal). Once the person is awake, the lungs are able to get air

again and the oxygen level improves. The brain is made aware of the oxygen improvement and allows the person to fall asleep again (see figure for the entire cycle).

OSA severity depends on how often this apnea cycle happens as diagnosed by a sleep study. In children, an apnea score of less than 1/hour is normal; 1-5/hour is mild; 5-10/hour is moderate; and >10 events is severe OSA.

First-line treatment of OSA in children is often removal of the tonsils and adenoids. Other options include medications and positive airway pressure (CPAP/BiPAP) machines to prevent upper airway collapse.

Pulmonologists and sleep specialists can help you decide the best course of action for your child. ~Dr. Iqbal Rashid

For Parents and Practitioners

SLEEP HYGIENE

It is important to ensure your child has successful sleep. Tips include:

1. Establish regular and consistent times for going to sleep and for waking up.
2. Go to bed when sleepy.
3. Avoid bright lights and lights from screens in the bedroom.
4. Minimize worry and stress at bedtime. Address tomorrow's activities earlier in the day.
5. Use the bed for sleeping to associate the bed with sleeping. Avoid doing homework, playing games, watching TV on the bed.
6. Avoid heavy meals late in the evening. Avoid going to bed hungry. Light dairy-based snacks may help.
7. Avoid caffeine or stimulants 4-6 hours before bed.
8. Exercise regularly. Even 20 min per day, 3 days per week has shown benefit.
9. Avoid naps longer than 30 minutes after 3pm.
10. Ensure children get enough sleep

Infants: 12-16 hours/24 hours

1-2 years: 11-14 hours/24 hours

3-5 years: 10-13 hours/24 hours

6-12 years: 9-12 hours/24 hours

>13 years: 8-10 hours/24 hours

SLEEP CENTER REFERRAL:

In order to obtain a sleep study at the UCLA Sleep Center a patient may be referred by their physician or have a sleep study ordered by their physician. Phone: (310) 267-5337

E-mail: UCLASleepCenter@mednet.ucla.edu

Web: <https://www.uclahealth.org/sleepcenter/>

Sleep Study Order Form:

<https://www.uclahealth.org/mattel/pediatric-pulmonology/sleep-medicine>

SLEEP STUDIES: WHEN TO REFER

The American Academy of Pediatrics recommends that all children be screened for snoring. Those who snore should be referred for a sleep consult and/or sleep study (polysomnogram) if history includes:

- Snoring ≥ 3 times per week
 - Labored breathing during sleep
 - Gasps/snorts with pauses in breathing
 - Sleep enuresis (bed-wetting)
 - Sleeping propped up or with the neck pushed forward
 - Blue color change with sleep
 - Morning headaches
 - Daytime sleepiness
 - Attention-deficit/hyperactivity
 - Learning disability
- Or physical exam includes:
- Underweight or overweight
 - Enlarged tonsils
 - Facial features consistent with large adenoids (adenoidal facies)

- Jaw abnormalities (retrognathia/micrognathia)
- High-arched palate
- High blood pressure

Meet the doctors

PROFILE: DR. IQBAL RASHID

Dr. Rashid is a board-certified sleep medicine specialist. His clinical practice is focused on caring for infants, toddlers and children within the entire spectrum of pediatric sleep disorders including obstructive sleep apnea; excessive daytime sleepiness; difficulty falling asleep and staying asleep (insomnia); sleep cycle disorders; nightmares and night terrors; restless leg syndrome; and sleep movement disorders.

In addition, Dr. Rashid is actively involved in research that includes obstructive sleep apnea and circadian rhythm disorder.

On a personal note, Dr. Rashid loves to spend time with his wife and three daughters who mean the world to him.

Being a parent helps him understand concerns a parent feels in regard to any medical issues in regard to their child.

Dr. Rashid is currently taking new patients. To schedule a pediatric sleep consultation with Dr. Rashid, please call (310) 825-0867.

Nutrition

SLEEP AND WEIGHT GAIN

Lack of sleep can be associated with weight gain. One reason for this is thought to be related to hormones (ghrelin and leptin).

Ghrelin tells our body to eat (causes hunger). Less sleep causes more production of ghrelin. Leptin tells our body that it is full (satiated). Less sleep causes less production of leptin.

Therefore, more ghrelin and less leptin can result in weight gain and cause/contribute to obstructive sleep apnea. ~Dr. Iqbal Rashid

*Stay tuned for our **Summer issue** about **cystic fibrosis**.



Sande Okelo, MD PhD
Asthma



Diana Chen, MD
Asthma, BPD
Gen Pulm, Vent



Douglas Li, MD
Asthma, BPD, CF,
Gen Pulm, Vent



Iqbal Rashid, MD
Sleep, Asthma, BPD,
Gen Pulm, Vent



Mindy Ross, MD MBA
Asthma, BPD
Gen Pulm, Vent



Marlyn Woo, MD
CF, Gen Pulm, Vent

CONTACT US

MEDICAL CARE, APPOINTMENTS, AND REFERRALS

Santa Monica

Pediatric Specialty Clinic
1260 15th Street, Suite 1024
Santa Monica, CA 90404

Westwood

UCLA Children's Health Center
200 UCLA Medical Plaza, Suite 265
Los Angeles, CA 90095

Phone: (310) 825-0867

ADMINISTRATIVE CONTACT & INFORMATION

Pediatric Pulmonology & Sleep Medicine
Website: www.uclahealth.org/pedspulmonology
Email: pulmonary@mednet.ucla.edu
Phone: (310) 825-5930 Fax: (310) 794-7338