

CIRCADIAN RHYTHM DISORDERS

i Quick Facts:

Circadian rhythms are 24-hour natural rhythms in the body. These internal rhythms are matched to the outside light-dark cycle. When there is a disruption of the internal system, or there is a mismatch between the body's circadian rhythm and the outside environment, a circadian rhythm sleep-wake disorder may occur.

KEY POINTS:

- **A long-standing pattern of sleep-wake disturbance can occur from a circadian system disruption or misalignment, called a circadian rhythm sleep-wake disorder.**
- **Sleep diaries and questionnaires can help assess your risk for these disorders.**
- **Your doctor may evaluate your sleep using an overnight sleep study or actigraphy, which measures body movement and activity.**
- **Circadian rhythm sleep-wake disorders can contribute to insomnia, sleepiness and safety concerns, as well as other health consequences such as obesity and diabetes.**
- **These disorders can be treated with a variety of medications, bright light therapy and behavior treatments.**



? How Can I Learn More?

- Talk to your board-certified sleep medicine physician.
- Visit www.sleepeducation.org

! Am I At Risk:

People who have a higher risk for circadian disorders include teenagers and the elderly. Others who are at risk include those who work irregular or rotating shifts, travel frequently, or are blind.

GENERAL OVERVIEW:

Circadian rhythm sleep-wake disorders can make it difficult to fall asleep when you go to bed. They also can make it hard to stay awake when you need to be alert. These disorders can lead to social problems. They also can hinder your job and school performance and can pose a safety risk.

There are several types of circadian rhythm sleep-wake disorders.

- *Delayed sleep-wake phase disorder:* You tend to fall asleep and wake up much later than is desired or required. This disorder is common in teens.

- *Advanced sleep-wake phase disorder:* You tend to fall asleep and wake up much earlier than is desired or required. This pattern is common in older adults.
- *Irregular sleep-wake rhythm disorder:* There is no clear circadian sleep-wake rhythm. This disorder is common in older adults with dementia and in children with developmental disorders.
- *Non-24-hour sleep-wake rhythm disorder:* There is a progressively delayed sleep-wake pattern. It may occur in more than half of people who are blind. It can occur occasionally in sighted people as well.

Other factors can lead to problems with your sleep schedule. A work schedule that overlaps with your usual bedtime can result in shift work disorder. Travel by airplane across two or more time zones can cause jet lag disorder.

TIPS:

Try to sleep 7 or more hours per night on a regular basis and maintain healthy sleep habits, which can help reduce symptoms of a circadian rhythm disorder.

- Maintain a consistent sleep-wake schedule, including weekends and vacations.
- Track the timing of your sleep by using a sleep diary for 2 weeks.
- Do not spend a lot of time awake in bed. Get out of bed if you have trouble falling asleep. Try reading a book or doing another relaxing activity that will help you feel sleepy.
- Do not take more than a 20-minute nap during the day.
- Limit caffeine and alcohol and do not smoke.

→ Next Steps:

The treatment for each circadian rhythm sleep-wake disorder is different. Circadian rhythm disorders are best managed by a board-certified sleep medicine physician. Talk to your doctor about your sleep schedule and sleep quality. Your doctor may refer you to a sleep doctor at a comprehensive sleep disorders center. Be sure to bring your completed sleep diary with you to the appointment. This information will help your sleep doctor identify the exact problem.



Questions For Your Physician

Take a few minutes to write your questions for the next time you see your healthcare provider.



Sample Questions:

Why do I feel tired all the time?

Why do I wake up so early in the morning?

