

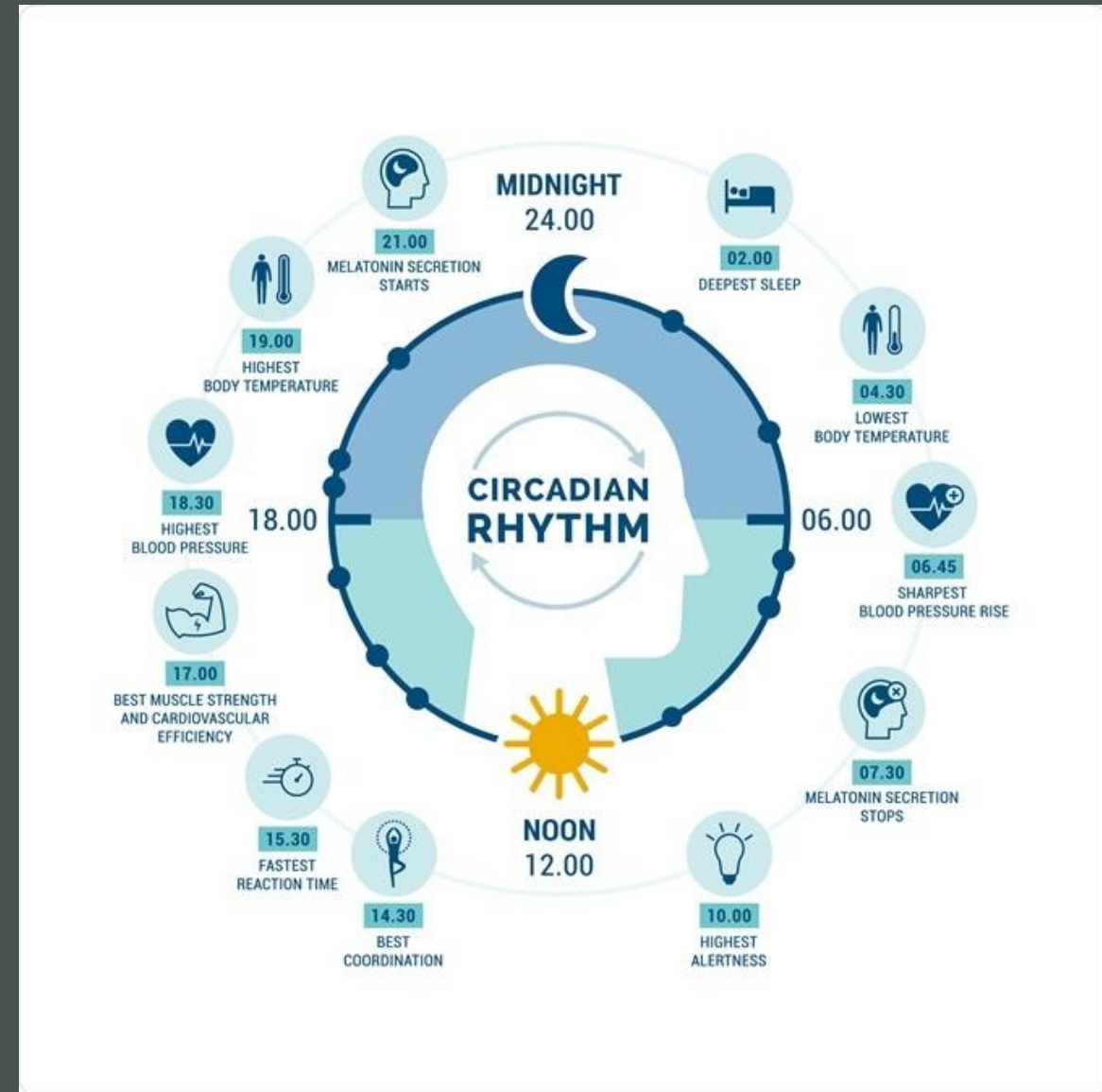
WORKING THE NIGHT SHIFT

-Our internal body clock generates circadian rhythms that regulate our sleep and wake cycle over 24 hours. It is strongly influenced by the natural cycles of light and dark.

-Working at night involves fighting against our natural circadian rhythms, and trying to be alert when you are programmed to be asleep. Equally, we are not adapted to achieve good quality sleep during the day.

-When we act against our circadian rhythms, we feel tired and function less effectively. Working at night can cause sleep deprivation and fatigue, and lead to accumulating sleep debt.

-A fundamental aspect of being a successful night worker is learning how to manage your daytime sleep (and fatigue at night) so that you keep your sleep debt to a minimum.



CONSEQUENCES OF SHIFT WORK

- Sleep-deprived staff have more attentional failures and make more clinical errors.
- When you are tired you become less able to judge your own performance. You may not even realize you are making mistakes.
- Exhaustion erases recent learning and has been shown to decrease the ability of junior doctors to make correct diagnoses.
- Moderate sleep deprivation (equivalent to being awake for 16-18 hours) can have the same effect on reaction time as being at the legal blood alcohol limit for safe driving.
- The likelihood of being in a road traffic accident is greater following a night shift than other shifts.

Box 1 Risks and consequences of working night shifts

Night shift workers:

- ▶ sleep less well and for shorter times in the day
- ▶ are less alert and perform less well than day shift workers⁵⁻⁹
- ▶ are more likely to make simple mistakes and avoidable errors, leading to increased risks to patient safety
- ▶ process information, particularly novel situations, slower
- ▶ have impaired alertness, vigilance and reaction time
- ▶ are more likely to make decisions that involve higher degrees of risk
- ▶ have increased risk of road traffic accidents after a shift¹⁰

PREPARING FOR THE NIGHT SHIFT

1

Maintain a good core sleep routine

- Invest time in getting sleep right every night, not just when working nights, to improve long term sleep quality

2

Stick to good sleep hygiene

- Bedroom should be cool, dark and quiet. Keep a regular routine. Avoid electronic devices in bed. Minimize alcohol, caffeine and nicotine in the evening. Only sleep when sleepy.

3

Get extra sleep before your first night shift

- Try to have a long lie in, ideally until midday, on the morning before you start

4

Take a two-hour afternoon sleep before the shift

- Nap in the afternoon rather than just before the shift. We naturally feel sleepy in the afternoon making it easier to nap.

SURVIVING THE NIGHT SHIFT

Nap

- **Develop a napping routine**
 - Nap to increase vigilance and alertness. Aim to take a brief nap during your breaks, keeping it short and no longer than 45 mins (preferable 15-20 min). Set an alarm. If you can, ask for a break from non-emergency bleeps. Naps are more effective if taken early, before you are really tired. Aim for a dark and quiet environment and lie down if you can.

Bright Light

- **Expose yourself to bright light**
 - Apart from when napping, try to keep your work area brightly lit if possible. Bright light from overhead or desk lamps have an alerting effect on the brain and improves performance. Even if you can only get intermittent exposure, this will still be beneficial.

Meals

- **Don't skip meals when working at night**
 - Eat and drink properly so you do not start your night shift hungry or dehydrated. You should eat a full meal before you start your shift, have 'lunch' halfway through, and have a digestible meal before trying to sleep when you are home, if you are hungry.

Caffeine

- **Use caffeine cautiously**
 - Caffeine can cause muscle shakes, irritability and stomach upsets if overused. If you decide to use caffeine, take it in small amounts. By taking a small dose before a nap, its effects should be felt about the time you return to duty. It can also help overcome any sleep inertia. Caffeine should be discontinued at least 4 hours before the end of the shift, as its long-lasting effect may affect your daytime sleep.

RECOVERING FROM THE NIGHT SHIFT

Getting Home

If you are too tired, do NOT drive

Driving overtired is like driving at the legal drink-drive limit. Your ability to safely drive, and your judgement as to whether you think you can drive is impaired. Try to take public transport instead, or sleep at work if possible.

Sunglasses

If possible, and safe to do so, wear sunglasses on the way home

If possible, wear sunglasses on the way home, as daylight will encourage you to feel awake and reduce the chance of getting good daytime sleep. Be wary of driving with sunglasses.

Get to bed quickly

On getting home, try to sleep immediately

Try not to get distracted by things that delay getting to bed. The longer you delay, the more awake you will feel and the harder it will be to sleep. Don't go to sleep hungry/thirsty, have a light snack and drink. Avoid alcohol as it leads to poor quality sleep. Avoid nicotine as it is a stimulant, and any activities that will increase your alertness.

Daytime Sleep

Develop a routine for daytime sleep

Your bedroom should be cool, dark and quiet. Invest in blackout blinds or an eye mask, and earplugs. Warn any housemates that you will be sleeping. Switch off your mobile. Sleeping tablets are not recommended as they can have hangover/addictive effects. Expose yourself to bright light for 20 mins after waking and try to get some light exercise in.

RECAP

Maximising your ability to cope with night shifts – KEY POINTS

FACTS

- Night shifts require doctors to be alert when their bodies tell them to sleep.
- Working at night generates an increasing sleep debt.
- Sleep-deprived junior doctors have more attentional failures, and make more clinical errors and incorrect diagnoses.
- Junior doctors have more road traffic accidents when tired.
- Exhaustion erases recent learning.

KEY ADVICE

Preparing for the night shift

- Build a successful normal sleep routine.
- Get extra sleep before working the first night shift.
- Take a two-hour afternoon sleep before coming on duty.

Surviving the night shift

- Take 20- to 45-minute naps to counteract fatigue.
- Your alertness will be improved by exposure to bright light during the night.
- Do not miss proper meals when working at night.
- Use caffeine cautiously, if at all, as it is a stimulant.

Recovering from the night shift

- If planning a long drive home, consider the risks.
- On getting home, try to sleep immediately.
- Develop a routine for sleeping during the daytime.
- Keep your sleep debt to a minimum.

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