

Episode Summary

How Lack of Sleep Destroys Your Hormones, Brain and Lifespan?

Video link: [click here](#)



1. Sleep is the master regulator of your hormones

Sleep controls key hormones responsible for stress (cortisol), sleep (melatonin), regeneration (growth hormone), appetite (leptin and ghrelin) and metabolism (insulin).

Too little sleep disrupts all of them – raising cortisol, lowering melatonin and growth hormone, increasing hunger and sugar cravings, and worsening blood sugar control.

2. Lack of sleep accelerates biological ageing

Even a few hours less sleep increase inflammation, slow tissue regeneration and speed up cellular ageing.

People sleeping under 6 hours have a higher risk of heart disease, type 2 diabetes, obesity and faster skin ageing.

3. At night the brain 'cleans itself' of toxins

Deep sleep activates the glymphatic system – a night-time cleaning network that removes toxins, including beta-amyloid linked to Alzheimer's.

Without sleep, toxins build up, impairing memory, focus and cognitive performance.

4. Sleep stabilises emotions and protects mental health

Sleep loss weakens the prefrontal cortex and overactivates the amygdala by up to 60%.

Result: irritability, impulsiveness, anxiety and poorer emotional control.

Good sleep restores emotional balance and strengthens mental resilience.

5. Sleep directly affects lifespan

Chronic sleep deprivation increases the risk of premature death (by around 12%).

Sleep supports the immune system – people sleeping under 7 hours are up to 3 times more likely to catch infections.

6. Sleep quality is as important as sleep quantity

Full regeneration happens only when all sleep stages – light, deep and REM – run uninterrupted.

Night-time awakenings prevent the body and brain from completing the repair cycle.