

Working with Insomnia: The Occupational Impact of Sleep Quality

Kevin Morgan
Sleep Research Centre

Work, Sleep and Health

The foundations of health and wellbeing:

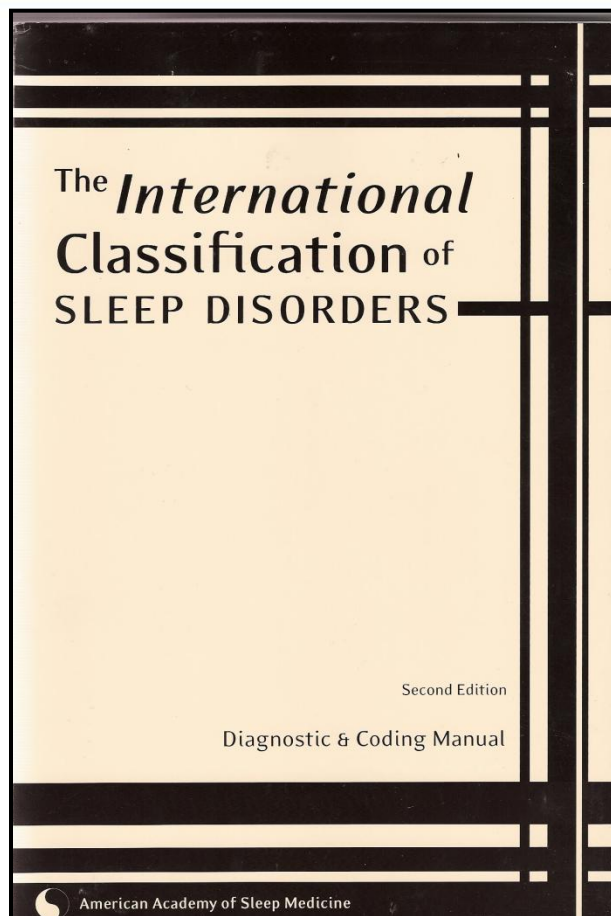
- Diet
- Exercise
- Sleep quality

Work, Sleep and Health

The foundations of health and wellbeing:

- Diet – latent effects on wellbeing
- Exercise – latent effects on wellbeing
- Sleep quality – immediate & latent effects on wellbeing

Sleep Disorders (ICSD, 2005)



8 categories of Sleep Disorder:

1. Insomnias
2. SR Breathing Disorders
3. Hypersomnias (central origin)
4. Circadian Rhythm SD
5. Parasomnias
6. SR Movement Disorders
7. Isolated Symptoms
8. Other SDs

Consequences of Sleep disorders

- Obstructive Sleep Apnoea
- SWSD

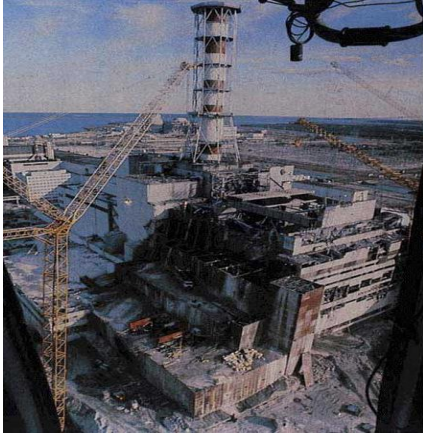
Cardinal symptom: Hypersomnolence/Excessive Daytime Sleepiness (EDS)

Hypersomnolence and Work

- Sleepiness causes up to 1/5th of UK road accidents (including occupational accidents among car, lorry and bus drivers)



Hypersomnolence and Work



Assessing Sleepiness

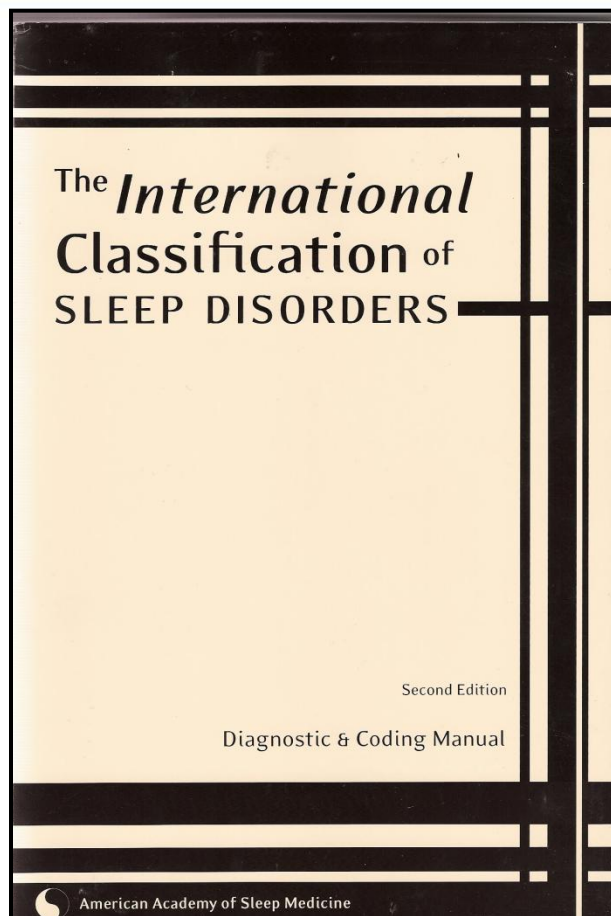
The Epworth Sleepiness Scale

Likelihood* of “dozing off” when:

- Sitting and reading
- Watching TV
- Sitting in a public place
- When a passenger in a car for >1 hour
- Lying down to rest in the afternoon
- Sitting and talking to someone
- Sitting quietly after lunch
- In a car, when stopped at traffic lights

*(no, slight, moderate, high)

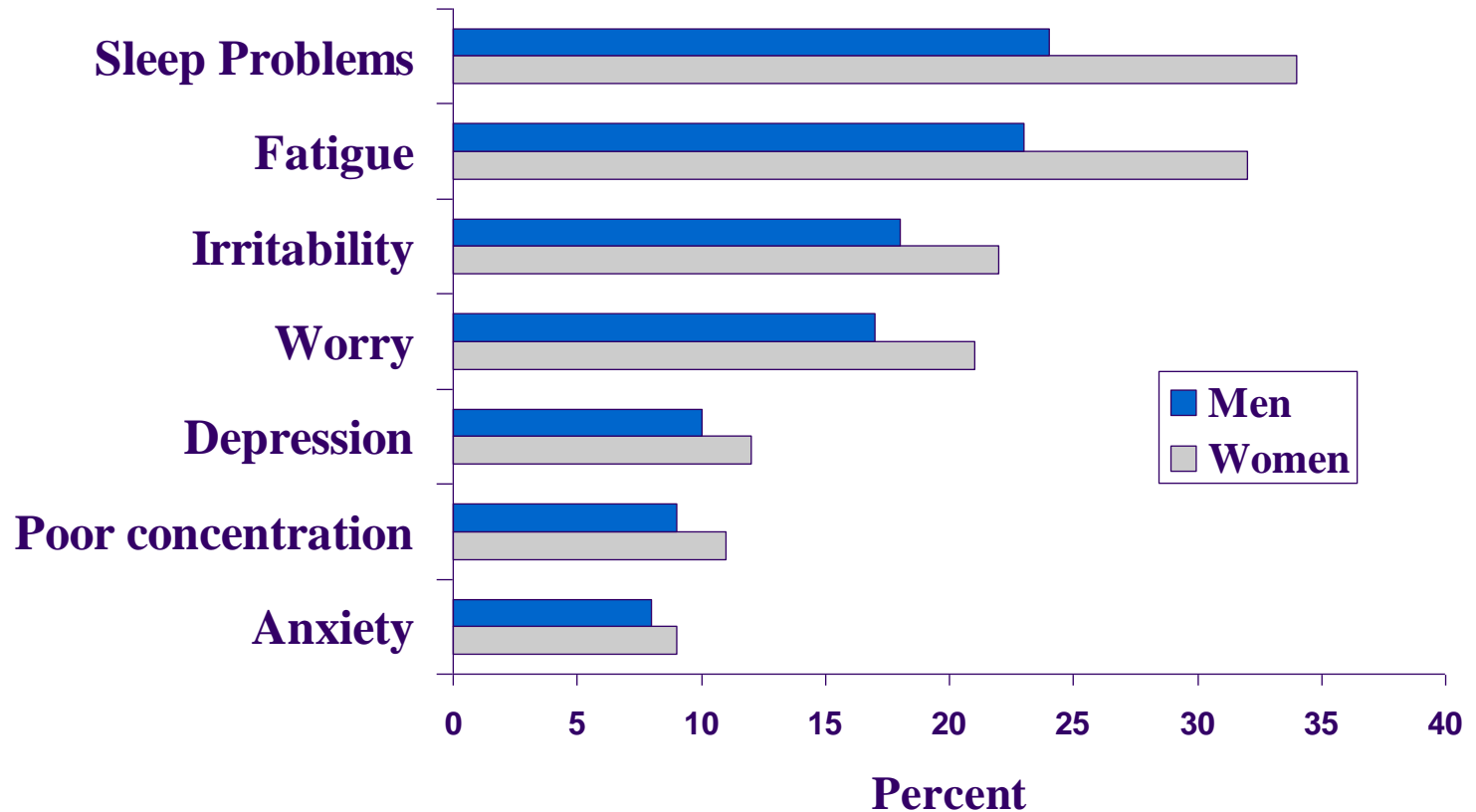
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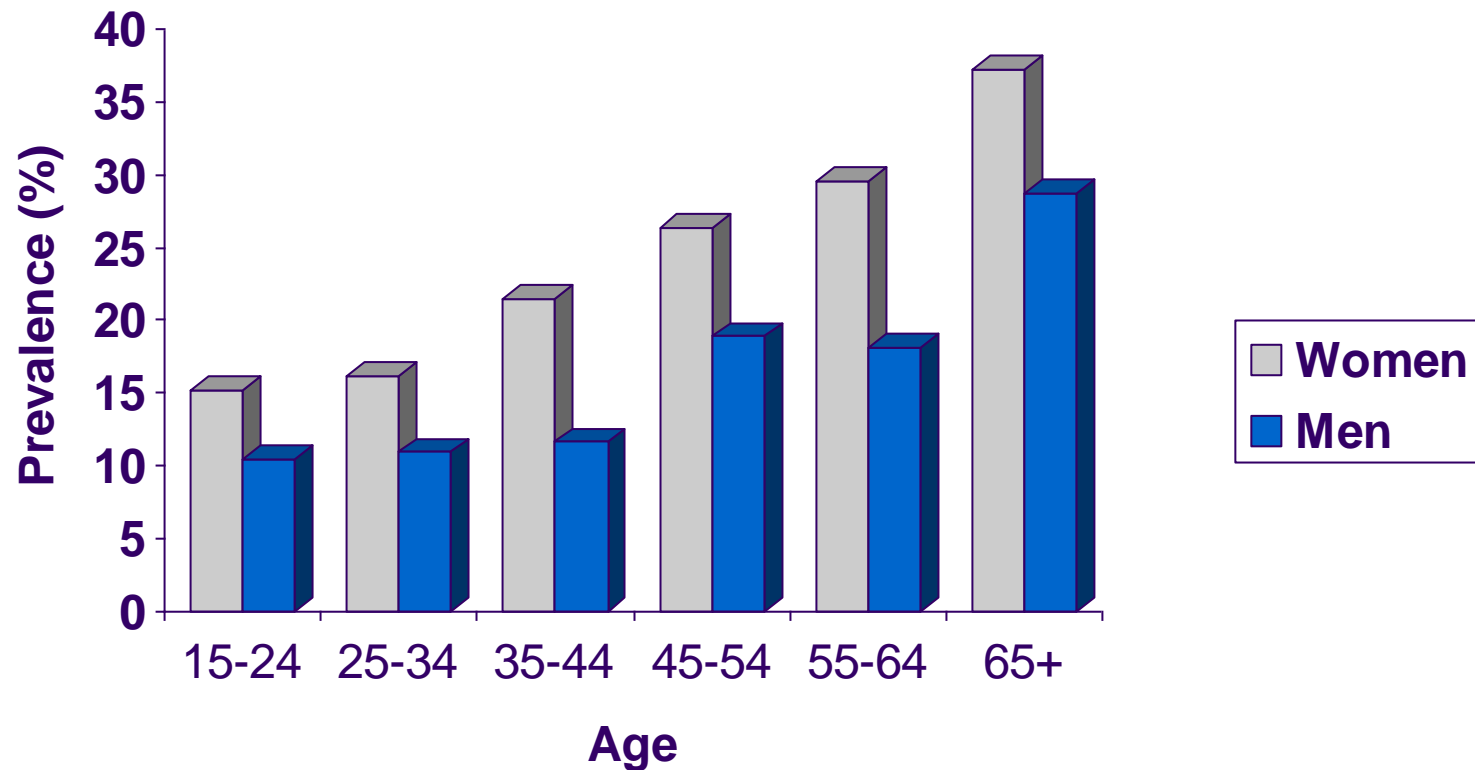
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Top 7 Psychological Symptoms among British Adults



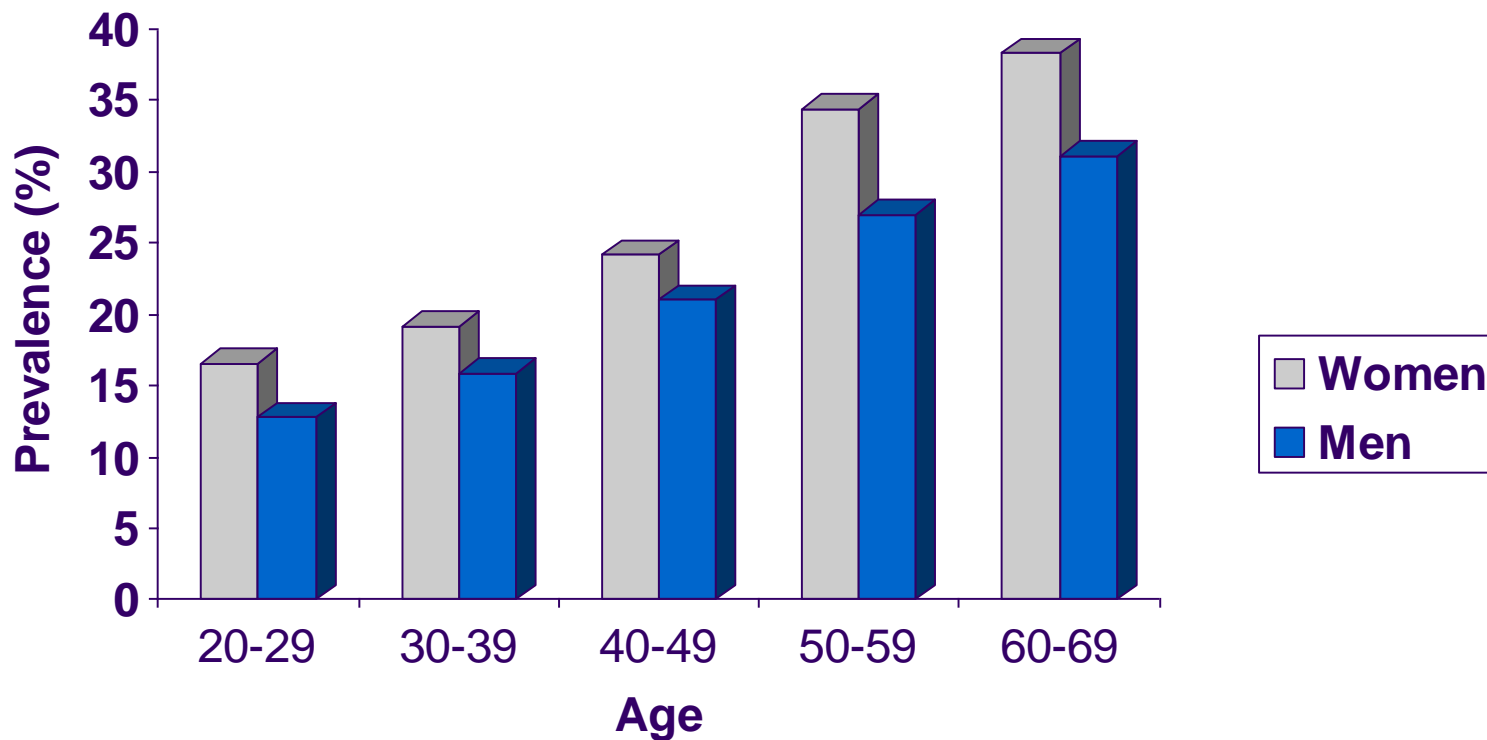
Prevalence of Insomnia Symptoms

(France 1996; N = 5622)



Prevalence of Insomnia Symptoms

(Korea 2009; N = 5000)



Insomnia (DSM-IVR/ICSD-2)

- Persistent complaint of...
- difficulty initiating or maintaining sleep...
- (despite adequate opportunity to sleep)...
- which causes significant distress...
- and is associated with impaired social or occupational functioning.

Impact of Insomnia

- Fatigue
- Degraded quality of life
- Impaired social and occupational functioning
- Delayed recovery from acute illness episodes
- Increased healthcare utilisation
- Independent risk factor for major depression

What is 'Fatigue'

- Tiredness, lethargy, listlessness
- Lacking in energy/vitality
- Impaired ability to sustain attention

But

- NOT sleepiness

Assessing Fatigue

The Fatigue Severity Scale

Here 'fatigue' is self-defined

- My motivation is lower when I am fatigued.
- Exercise brings on my fatigue.
- I am easily fatigued.
- Fatigue interferes with my physical functioning.
- Fatigue causes frequent problems for me.
- My fatigue prevents sustained physical functioning.
- Fatigue interferes with carrying out certain duties and responsibilities.
- Fatigue is among my three most disabling symptoms.
- Fatigue interferes with my work, family, or social life.

Impact of Insomnia on Work Performance

- Absenteeism increased
- Presenteeism increased
- Loss of vigour in the workplace
 - Lost productivity
 - Impaired personal development
- Illness episodes more likely
- Loss of job satisfaction
- Lost productivity

Occupational Impact of Insomnia Assessment Issues

- Generally quantified at the macro level
- No 'individual level' assessment of occupational impact

Developing the Occupational Impact of Sleep Survey (OISS)

- Review existing health-related occupational scales
- Focus groups with: OSA groups; insomnia groups; good sleepers
- Psychometric scaling
- Result = 40 item OISS

Developing the Occupational Impact of Sleep Survey (OISS)

- Appropriate as a workforce screening tool ✓
- Sensitive to EDS and insomnia symptoms ✓
- Discriminates between patients and controls ✓
- Delivers an individual level assessment ✓
- Effective as a post-intervention outcome ✓
- Suitable for economic evaluations

Occupational Impact of Sleep Survey (OISS)

Full occupational sleep assessment available
at: <http://www.surveymonkey.com/s/TSSFP7>