Explanations for sleep walking

- A parasomnia common in childhood affecting 20% of children and less than 3% of adults.
- Occurs most commonly in NREM sleep and SWS. If occurs in REM- known as REM behaviour disorder.
- It is not conscious yet may engage in activities such as dressing themselves, preparing food and even sex and murder in some cases.
- No memory of episodes or awoken during can feel confused.
- Show array of delta waves typical of SWS and beta waves of the awake brain- related to arousal.
- Propose occurs when person in SWS is woken, but arousal of brain is incomplete.

- Nature and genetic link- Broughton has shown it’s ten times more likely if a relative has history. Common in ID twins.
- Environment and nurture- stress, alcohol, sleep deprivation and drugs linked.
- More SWS sleep- Children more than adults. System inhibiting motor ability is not fully developed in children. Study examined motor excitability and found sleep walkers had immature neural circuits.
- Other medical disorders- fever, asthma, seizures and psychiatric disorders link. But cause or effect of underlying issue unknown.
- Diathesis stress model- genetic vulnerability may be underlying cause yet environmental factors trigger this vulnerability. Link between twins and close family members supporting this.
- Lecendreux- 50% concordance in identical twins compared to 10-15% in non identical highlighting nature but as concordance was at 100% role of nurture and environmental factors. Argued that higher rate among identical twins may be due to psychological factors with similar treatment and behaving same in upbringing.
- Drugs and alcohol association may be explained by how they reduce REM so more time is spent in SWS/NREM sleep as consequence. Increases likelihood of sleep walking as most vulnerable in those stages. How environment association rather than nature.
- Reductionism- Explanations surrounding genes or environmental factors alone as fail to explain complex nature of how genes and environment interact.
- Determinism- Assume no free will over sleep walking as controlling environmental factors may have a mitigating role on reducing SW for those with genetic vulnerabilities.
- Real world application- Cited as defence for murder as its important to establish what control an individual has over it. Jules Lowe attacked and killed elderly father, but acquitted as has tendency to sleep walk. Some may voluntarily expose to risk factors and others wont.