


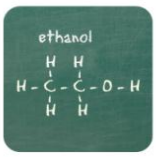


Understanding human evolutionary behaviour and the common mismatch between the way we run our lives in present times and the way our lives were run in the environment in which we evolved can provide better pointers as to what needs to be done to reduce the ill-health and premature death resulting from the use of alcohol and drugs

ill-health
heavy use
drugs
evolutionary
behaviour

Ecological analyses find that humans have evolved to be active and functional, rather than passive and vulnerable with respect to the drugs that we take. Many drugs (other than alcohol) are neurotoxins developed by plants as defence mechanisms against being eaten by animals. Humans, as many other plant-eating animals, have counter-exploited plant neurotoxins for advantage. For example, both cannabis and nicotine are used by modern hunter-gatherer communicates for their anti-parasitic properties, with, for example people living in high intestinal worm-burden areas, titrating cannabis and nicotine use with worm burden (the greater cannabis and nicotine use, the lower the worm burden). Moreover, treating the worm burden with anthelmintic drugs treats the heavy use of tobacco – the number of cigarettes smoked drops. As a separate mechanism, ethanol results from fermenting fruit, as a defence mechanism to avoid premature rotting. Ethanol vapour is used for olfactory location of ripe fruit, and thus giving nutritional advantage, also to humans who evolved as fruit-eating hominids.

An understanding of evolutionary behaviour has at least two implications for alcohol and drug policy: first, policies that prohibit the use of alcohol and drugs are unlikely to succeed because people are biologically programmed to seek these chemicals; and, second, in the presence of active and functional behaviour, high modern drug potency and ease of availability and affordability are likely to be cores driver of alcohol and drug-related harm.

READ MORE

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