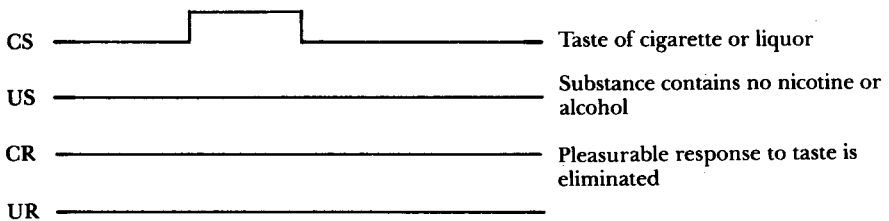
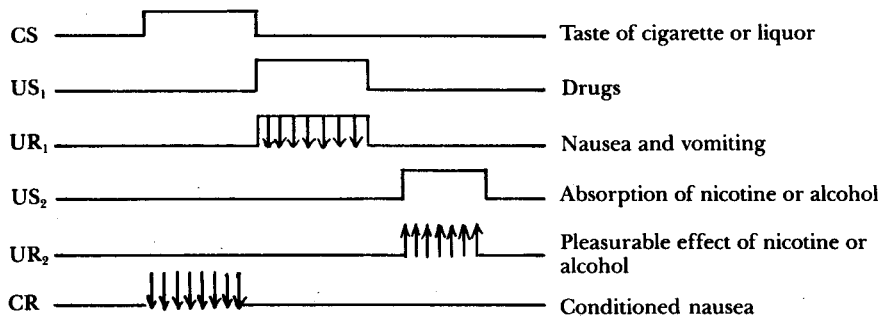


A. Pavlovian Analysis of Cigarette or Alcohol Addiction



B. Extinction of Pleasurable CRs to Cigarettes or Liquor



C. Counterconditioning of Addiction

Figure 4–8. Diagrams of (A) a Pavlovian Analysis of Addiction, (B) a Pavlovian Extinction Procedure, and (C) a Pavlovian Counterconditioning Procedure. The Pavlovian analysis suggests that pleasurable conditioned responses (upward arrows) develop to the taste of alcohol or cigarettes. Extinction would eliminate these conditioned responses by breaking the relation between CS (taste) and US (absorption of nicotine or alcohol). Counterconditioning supersedes the pleasurable conditioned responses with aversive ones (downward arrows) by pairing tastes with drug-induced nausea.

A second case involved a 14-year-old boy who had been smoking a pack of cigarettes or more a day since age 7. Again, the drug apomor-