Ch 9: Punishment cont.

Effects of Non-contingent Punishment

- Learned helplessness
- Masserman's experimental neurosis

- Learned helplessness
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  – Seligman, Maier & Overmier (1967)
    - Two groups of dogs
    - Group 1:
    - Group 2:
      – Dogs placed in harness (escape/avoidance not possible) and delivered 64 strong shocks
    - All dogs placed in a shuttle-box with barrier in centre
    - 10-s warning light - followed by 50-s electric foot-shock
    - Dogs could avoid (jump when light appears) or escape (jump when shock starts) the foot-shock

  – Results
    -
    - Pre-training group –
      – Laid down on bottom of cage & whimpered until shock terminated (they just 'gave-up')
      – No sign of learning over subsequent trials
      – On rare trials they did avoid/escape shock
      – But…on subsequent trials avoid/escape behavior not repeated (naïve group had rapid learning)
  – Interpretation
    -
    - When placed in shuttle-box made no effort to escape

Learned Helplessness cont.

- Similar results in human Ps
  - Dweck & Repucci (1973)
    - Two teachers gave 5th-graders math problems
    - Teacher 1 always gave solvable problems
    - Teacher 2 always gave insolvable problems
    - Test: Teacher 2 gives students solvable problems
    - Results
      -

- Links to depression
  - Individuals who experience sequence of uncontrollable, aversive events (e.g., divorce, job loss)
- Eliminating learned helplessness through *forcing* organism to escape aversive stimulus
  - Drag dog over barrier
  - Encourage depressed person to perform a graded series of tasks (e.g., go out to bar; meet other people; dating)
- Preventing learned helplessness
  -
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Effects of Non-contingent punishment

- Experimental neurosis
  - Experimentally induced neurotic-like symptoms
  - Experimental neurosis vs. learned helplessness
    - Learned helplessness –
    - Experimental neurosis –
    - Both consist of uncontrollable events, so considerable overlap in symptoms

- Masserman (1943)
  - Employed unpredictable aversive stimuli (rather than appetitive stimuli)
  - Cats receive electric shock or air blasts while eating
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- Cats developed
- PTSD more likely to develop if person

Chapter 9 - Summary

- Negative reinforcement is important in development of escape and avoidance behaviors
- Mowrer's two-factor theory proposes that fear results from classical conditioning and avoidance of the CS is negatively reinforced by a reduction in fear
- Anxiety conservation hypothesis argues that avoidance is so quick, there is little chance for the response to extinguish
- Stampfl demonstrated phobic-like avoidance in rats was similar to phobic responses in humans
- Avoidance conditioning play a role in OCD
- Positive punishment involves presentation of aversive stimulus
- Negative punishment involves the removal of a desired stimulus (e.g., response cost; timeout)

Chapter 9 - Summary cont.

- Problems with the use of punishment include avoidance of person administering punishment, suppression of behavior, and emotional responses including aggression
- Punishment is most effective when delivered immediately, consistently, and of sufficient intensity
- Conditioned suppression theory suggests that an emotional response suppresses behavior
- Avoidance theory suggests that any response other than that being punished is strengthened
- Premack views punishment as the opposite of reinforcement
- Learned helplessness is a decrement in learning following exposure to aversive inescapable stimuli
- Experimental neurosis studies produce symptoms similar to PTSD