PSYO111-Midterm 1-Review

1. Chapter 1 Key Terms and Definitions
   1. psychology: The scientific study of mind and behavior. Where mind is the term for the set of private events that happen inside a person and behavior is the set of public events.
   2. Philosophical Terms
      1. philosophical dualism: The view that mind and body are fundamentally different things.
      2. “ “ materialism: The view that all mental phenomena are reducible to physical phenomena.
      3. “ “ realism: the view that perceptions of the physical world are produced ***entirely*** by information from the sensory organs
      4. “ “ idealism: the view that perceptions of the physical world are the brain’s ***interpretation*** of information from the sensory organs.
      5. “ “ empiricism: the view that all knowledge is acquired through experience.
      6. “ “ nativism: the view that some knowledge is innate rather than acquired.
   3. Structuralism & Functionalism
      1. reaction time: the amount of time between the onset of a stimulus and a person’s response to that stimulus.
      2. structuralism: an approach to psychology that attempted to isolate and analyze the mind’s basic elements.
      3. introspection: also known as “systematic self-observation”, the analysis of subjective experience by trained observers.
      4. functionalism: an approach to psychology that emphasized the adaptive significance of mental processes.
      5. natural selection: the process by which the specific attributes that promote and organism’s survival and reproduction become more prevalent in the population over time.
   4. Psychoanalysis & Behaviorism
      1. hysteria: a loss of function that has no obvious physical origin.
      2. unconscious: the part of the mind that contains information of which people are not aware.
      3. psychoanalytic theory: a general theory that emphasizes the influence of the unconscious on feelings, thoughts, and behaviors.
      4. psychoanalysis: a therapy that aims to give people insight into the contents of their unconscious minds.
      5. behaviorism: an approach to psychology that restricts scientific inquiry to observable behavior.
      6. principle of reinforcement: any behavior that is rewarded will be repeated and any behavior that isn’t wont.
   5. Resistance to Behaviorism
      1. Gestalt psychology: an approach to psychology that emphasized the way in which the mind creates perceptual experience.
      2. developmental psychology: the study of the ways in which psychological phenomena change over the lifespan.
      3. social psychology: the study of the causes and consequences of sociality.
   6. The Cognitive Revolution
      1. Cognitive psychology: the study of human information-processing.
      2. evolutionary psychology: the study of the ways in which the human mind has been shaped by natural selection.
   7. New Frontiers
      1. cognitive neuroscience: the study of the relationship between the brain and the mind.
      2. behavioral neuroscience: the study of the relationship between the brain and behavior (non-human animals)
      3. cultural psychology: the study of how culture influences mental life.
2. Chapter 2 Key Terms and Definitions
   1. Empiricism: How to Know Stuff
      1. empiricism: the belief that accurate knowledge can be acquired through observation.
      2. scientific method: a procedure for using empirical evidence to establish facts.
      3. theories: hypothetical explanations of natural phenomena.
      4. hypothesis: a falsifiable prediction made by a theory
      5. empirical method: a set of rules and techniques for observation
   2. Methods of Observation
      1. operational definition: a description of a property in measurable terms
      2. construct validity: the extent to which a videocamera aimed at a face adequately characterizes the property. An operational definition is said to have construct validity when most beholders agree that it adequately characterizes a property.
      3. power: one of the key features of a good detector, refers to a detector’s ability to detect the ***presence*** of differences or changes in the magnitude of a property.
      4. reliability: the other key feature of a good detector, refers to a detector’s ability to detect the ***absence*** of differences or changes in the magnitude of a property
      5. demand characteristics: those aspects of an observational setting that cause people to behave as they think someone else wants or expects.
      6. naturalistic observation: a technique for gathering scientific information by unobtrusively observing people in their natural environments.
      7. observer bias: the tendency for observer’s expectations to influence both what they believe they observes and what they actually observed.
      8. double blind study: a study in which neither the researcher nor the participant knows how the participants are expected to behave.
      9. population: a complete collection of people.
      10. sample: a partial collection of people or animals or things drawn from a population.
      11. frequency distribution: the most common type of graphic representation that shows the number of times in which the measurement of a property takes on each of its possible values.
      12. normal distribution: a mathematically defined distribution in which the frequency of measurements is highest in the middle and decreases symmetrically in both directions. AKA bell curve; Gaussian distribution.
      13. three most common descriptions of central tendency:
          1. mode: the value of the most frequently observed measurement.
          2. mean: the average of all measurements.
          3. median: the value that is in the middle.
      14. measures of variability:
          1. range: the simplest measure of variability that is the value of the largest measurement in a frequency distribution subtracted by the value of the smallest measurement.
          2. standard deviation: a statistic that describes how each of the measurements in a frequency distribution differs from the mean; an estimate of how far, on average, the various measurements are from the center of the distribution.
   3. Methods of Explanation
      1. variables: properties that can take on different values.
      2. correlation: a pattern of variation where variations in the value of one variable are synchronized with variations in the value of the other.
      3. correlation coefficient: a mathematical measure of both the direction and strength of a correlation; symbolized by ‘r’; has a limited range (-1 to 1), the closer to 1 or -1 the stronger the correlation
      4. natural correlations: the correlations we observe in the world around us.
      5. third variable problem: the natural correlation between two variables cannot be taken as evidence of a causal relationship between them because a third variable might be causing them both.
      6. experimentation: a technique for establishing the causal relationship between variables.
         1. manipulate the independent variable
         2. measure the dependent variable
         3. compare results
      7. manipulation: a technique for determining the causal power of a variable by actively changing its value.
      8. self-selection: a problem that occurs when anything about a participant determines the participant’s condition.
      9. random assignment: a procedure that assigns participants a condition by chance.
      10. internal validity: an attribute of an experiment that allows it to establish causal relationships
      11. external validity: an attribute of an experiment in which variables have been operationally defined in a normal, typical, or realistic way.
      12. case method: a procedure for gathering scientific information by studying a single individual
      13. random sampling: a technique for selecting participants that ensures that every member of a population has an equal chance of being included in the sample.
      14. type I error: when researchers conclude that there ***is*** a relationship between two variables when in fact there ***is not***; false positive; fluke.
      15. type II error: when researchers conclude that there ***is not*** a relationship between two variables when in fact there ***is***; false negative; flunk.
   4. The Ethics of Science
      1. informed consent: a verbal agreement to participate in a study made by an adult who has been informed of all the risks that participation may entail
      2. debriefing: provided when a participant is deceived in any way in the entirety of the study; a verbal description of the true nature and purpose of the study.