

(Comparative Studies Valued)
(The Value of Lower Organism Research in Psychology)

Who is Not Ready? J.B. Watson had just been reincarnated and 2 people called him in:

Situation #1

Pope: Did you see angels?

J.B.: No.

Pope: "I was afraid of that! Don't tell the people, for they are not ready for it."

Situation #2

Mr. Atheism: Did you see angels?

J.B.: Yes.

Mr. Atheism: "I was afraid of that! Don't tell the people, for they are not ready for it."

Humans are on top of the evolutionary scale because they made the scale!

Why use lower organisms in research?

These are a few of the reasons for animal research to be discussed in this section. (The memory device is GO CAT)

ONE: Generalization

TWO: Own Sake

THREE: Controlled History

FOUR: Availability

FIVE: Taboo Areas

ONE - Generalizations of Results as well as Techniques:

The study of lower organisms has a great deal to offer in the study of human behavior, for the techniques as well as the results are often directly applicable to human studies.

24-1 Animal research is desirable because:

- A. it is a sanctioned way of taking out one's frustrations on rats
- B. it gives experimental psychologists something to do
- C. from it, we derive principles which can be applied to human behavior (C)

TWO - Own Sake:

In psychology one must study scientifically the behavior of various organisms. The field of animal behavior is legitimately included in the field of psychology. The scientific understanding of animal psychology/behavior can be used for predicting and controlling animal

S.B. 24-1

behavior. We can no more infer consciousness from the behavior of

animals than we can from the behavior of humans. The same methods used to study animal behavior can be used to study human behavior. The psychologist studying human behavior, just as the psychologist studying animal behavior, can have no access to the consciousness of the subject. He/She cannot scientifically infer consciousness from his/her experimental observations or data.

- 24-2 The above statement expresses the position of a Behaviorist.
- A. True
 - B. False
- (A)

- 24-3 The above view is that:
- A. animal behavior is a valid subject for study in its own right
 - B. animal behavior should be studied to gain information about animal consciousness
 - C. animal behavior should be studied only to develop methods for studying humans
 - D. animal behavior should be studied because of the light it sheds on world problems
 - E. animal behavior should be studied in preference to human behavior
- (A)

- 24-4 The previous paragraph indicates:
- A. conscious experience exists in the back of the mind
 - B. introspective reports should be taken as descriptions of conscious experience
 - C. introspective reports are objective
 - D. both A and D are true
 - E. none of the above
- (E)

THREE - Controlled Histories:

By using simple naive organisms with controlled histories in simple environments we hold many variables constant in order to isolate and analyze one effective variable at a time. Thorndike states: "If we stay lost in wonder at the extraordinary versatility and inventiveness of higher forms of learning, we shall never understand man's progress or control his education."¹ Science develops from the simple to the complex. One need not throw out the problem when current measures are inadequate. Animal research helps in developing methodology of measurement.

(1) Thorndike, Educational Psychology, 1913, p. 23, N.Y. Teachers College, Columbia University.

Controlled history in species with rapid reproduction rates permit many generations to be studied in the life time of the human experimenter.

- 24-5 The principles of behavior obtained throughout animal research have historically applied directly to the behavior of humans.
- A. True
 - B. False
- (A)

FOUR - Availability:

Lower organism research can be accomplished more readily because the supply of subjects is plentiful and the cost is low. The organism is also available for continuous observations. Not too many humans will serve as faithfully as the 24 hours a day availability of lower organisms.

FIVE - Taboo:

A taboo exists against doing certain kinds of research with humans. This is not only the physically dangerous research, e.g., drug dosage investigation might fall into this class, but certain research that cannot be attempted because of overwhelming opposition to it, e.g., using strong electric shock. In many situations animals have substituted for people in medical and psychological research.

Even at the animal level the "Societies for the Prevention of Cruelty to Animals" and other such groups indicate that this taboo is not restricted to human experiments. Some will even go beyond this and say that any experimentation with animals with intent to generalize to humans is taboo. In their fear of loss of dignity, some people do not see ignorance or false explanation as a more serious shortcoming.

24-6 Some people feel that using animals for behavioral research detracts from human _____, but one might contend the only way an individual can become free and have dignity is to learn the _____ of his/her behavior. (DIGNITY/CAUSE)

24-7 Which would be reasons for experimenting with lower animals?
A. Their lives can be more easily controlled.
B. The results of findings can be applied to understanding aspects of human behavior.
C. Inheritance can be studied through several generations.
D. The effects of drugs, etc., can be studied; the results might prove useful in treating human disease. (A,B,C,D)

24-8 Comparative studies have which of the following advantages?
A. Some animal organisms do not reproduce.
B. Continuous observations are possible.
C. Techniques for human research can be developed.
D. The animal situation lends itself to control. (B,C,D)

24-9 Why conduct animal research?
A. Animals are humans.
B. One can do experiments on animals that one cannot do on humans.
C. Animals are fascinating and may be studied for their own sake.
D. Drugs affect animals differently than humans. (B,C)

The development of Psychology includes very important work in the field of the behavior of infra human organisms. Now studies using children and adults "normal," is a natural step in a science which does not begin

by trying to solve all the difficult problems first. A science must be content to wait until it has solved some of the simpler questions before it can then move on.

