

A Small But Not Insignificant Victory: The inclusion of behavior analysis... Use It or Lose It

P. A. Lamai

Because some of us requested the described change, I received the following memo from APA:

"In response to several requests to add 'behavioral [sic] analysis' as a subject index term in the *Convention Program*, the Board of Convention Affairs has voted (by mail) to do so for the 1994 Convention with further discussion on the new term scheduled for its March 1994 meeting. Since subject index terms are usually assigned by individuals submitting proposals for the convention and it is too late to follow this procedure this year, it will be the responsibility of the Division Program Chairperson to make the assignment for accepted proposals. The subject index term of 'behavioral analysis' for 1994 will be identified as '57'."

I do not know what "further discussion on the new term" portends, but my interpretation is that we use it or lose it. That is, if there are not sufficient convention submissions designated for *Behavioral Analysis* the term may well be omitted in future convention programs. Let's increase the visibility of behavior analysis in APA by using this subject index term.

10th Annual EAHB-SIG Outstanding Student Paper Awards

Five student papers were selected for recognition in the 1994 Student Paper Competition sponsored by the Experimental Analysis of Human Behavior Special Interest Group (EAHB-SIG). Awards were recommended by peer reviewers consisting of established members of the EAHB-SIG and selected outside experts. The following winners will present summaries of their work at an awards symposium at the ABA Convention in Atlanta:

Erik Augustson, University of New Mexico. The transfer of extinction and respondent eliciting functions through stimulus equivalence classes. Michael J. Dougher, sponsor.

Carmenne Chiasson, University of New Mexico. Contextual control over the transfer of function through stimulus equivalence classes. Michael J. Dougher, sponsor.

Adam S. Goodie, University of California-San Diego. The base-rate error in an experimental task: Conditional and unconditional probabilities in human matching-to-sample. Edmund Fantino, sponsor.

Hernan I. Savastano, University of California-San Diego. Choice, matching, and maximizing: A review of the literature. Edmund Fantino, sponsor.

Hernan I. Savastano, University of California-San Diego. Human choice in concurrent ratio-interval schedules of reinforcement. Edmund Fantino, sponsor.

Reviewers for the 10th Annual Competition: Philip Chase, Thomas Critchfield, Michael Dougher, William Dube, David Eckerman, Lanny Fields, Stephen Flora, Celso Goyos, Gina Green, Timothy Hackenberg, Theodore Hoch, Steven Hursh, Cloyd Hyten, Barry Lowenkron, Edward Morris, William McIlvane, Michael Perone, Carol Pilgrim, Howard Rachlin, Richard Shull, Joseph Spradlin, Dean Williams, and A. Michael Wylie.

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Please Note Article and Advertisement Deadlines, Prices, and Size Restrictions on Page-Portion Ads!! Thank You!!

The ABA Newsletter is published 4 times/year by the Association for Behavior Analysis. The ABA Newsletter is ABA's primary means of communicating with its members about association activities and developments. Articles and announcements must be submitted to the Editor for consideration. ABA reserves the right to edit all copy. Publication of articles, announcements, or acceptance of advertisements in The ABA Newsletter does not imply endorsement by ABA. ABA reserves the right to reject any advertisement or copy that ABA for any reason deems unsuitable for publication in any association publication. All advertisements are accepted and published on the representation of the advertiser and its agency that they are authorized to publish the entire contents thereof and that, to the best of their knowledge and belief, all statements made therein are true. The advertiser and the agency agree to hold the publisher harmless from any and all claims arising out of advertising published. Editor: Peter A. Lamal, Psychology Department, University of North Carolina, Charlotte, NC 28223. Business correspondence, questions, and comments ONLY may be faxed to (704) 547-3096. No article copy will be accepted via fax.

Articles and announcements must be received by November 30 for February 1 mailing, by February 28 for May 1 mailing, by May 31 for August 1 mailing, and by August 30 for November 1 mailing. Subscriptions: Institutions and nonmember subscription: \$20/year; Single issue: \$6. To order, send payment and volume number being ordered to ABA, 258 Wood Hall, Western Michigan University, Kalamazoo, MI 49008-5052. Telephone: 616-387-4494. FAX: 616-387-4457. Advertisements must be received by December 10 for February 1 mailing, by March 15 for May 1 mailing, by June 15 for August 1 mailing, and by September 15 for November 1 mailing. Classified advertisements: \$25 for 25 lines or less and \$1/line for each line over 25. Classified advertisements must be submitted in writing with billing information. Sizes and rates for display advertisements are: full page (7" wide x 10" deep) \$250.00; half page (6-1/2" wide x 4-1/2" deep or 3-1/4" wide by 9-1/2" deep) \$175.00; quarter page (3-1/4" wide x 4-1/2" deep) \$100.00; camera-ready-copy required. Advertisers will be charged for any size modifications required on submitted copy. Contact Kathleen "Kate" Morrow, 616-387-4494. FAX: 616-387-4457. E-MAIL: Compuserve ID# 76236,1312. Via INTERNET: 76236.1312@COMPUSERVE.COM

Notes From the Editor

Deadlines. They entail the problem of people who do not meet them. We have experienced that problem with the *ABA Newsletter*. If you submit material for inclusion in the *ABA Newsletter*, please observe the deadlines listed elsewhere on this page. Our deadlines are tight, and a particular problem ensues if we are sent material that is not on MacWrite disk. Also, if appropriate, please write your material to conform to APA style requirements.

I will meet with the ABA Executive Council at the May meeting. Among the questions to be discussed are the types of material appropriate for inclusion in the *ABA Newsletter* (e.g., obituaries, matters not directly related to ABA?) Perhaps the minutes of the Executive Council should be published in the *ABA Newsletter*.

Reminder: If you have a question about the structure and functioning of ABA, send it to me and it will be published, along with the answer, in the *ABA Newsletter*. It is quite likely that other ABA members share your question, thus you would be performing a useful service by asking it.

CONVENTION BOOK EXHIBIT

Visit the Cooperative Book Exhibit . .

to see two texts published by HarperCollins:

- *William Baum's Understanding Behaviorism (the first book in our new Behaviorism and Society Series, co-edited by William Buskist and Thomas Critchfield)*
- *and Lyle Grant and Annabel Evans' Principles of Behavior Analysis.*

Help Spread The Word

P.A. Lamal

Ed Morris (U. of Kansas) has called something important to my attention. A letter Ed received from Brian Gladue, a Senior Scientist with APA's Science Directorate expressed concern about federal support for basic behavioral research and about how little most people appreciate the process by which application flows from basic research. In the current funding climate, Congressional and Clinton Administration officials are emphasizing applied research that has a high likelihood of payoffs in the near-term. As Gladue put it in his letter, the question being asked by legislators (i.e., funders) and policy makers is: "What have you (basic science) done for us (society, the nation) lately?"

To help make the case for basic behavioral research, Gladue is initiating a compendium of examples of purely basic research that led to unanticipated applications or far-reaching applied or strategic outcomes. Also to be included are examples of basic research where an application was possible, perhaps expected, but not the primary goal of the research project. According to Gladue, the Science Director quite often receives requests from federal agencies, legislators, and government officials wanting to know just such examples.

Send your example(s) of basic science that has led (or is expected to lead) to an application of interest or importance. Note that the definition of "importance" is really up to you, although it helps if the connection between the research and its relevance to a problem or application is clear enough for a non-scientist to appreciate. Please indicate:

- Principal Investigator/Team
- Date of Research
- Funding Source(s), if any
- A brief description of the basic research project
- A brief description of its application or relevance to a major social, developmental, health, economic, behavioral, etc. concern.
- Citations/References for the basic research project
- Citations/References of its application

Send information to: PsychScience Compendium Senior Scientist, APA - Science Directorate, 750 First St. NE, Washington, DC 20002-4242. Or, for you e-mail fans: BZG.apa@email.apa.org, CompuServe: 70004,571; Internet: BZG @ apa.org

New Animal Use Guidelines Exclude Distressful Procedures in the Teaching of Psychology

The *Institutional Animal Care and Use Committee Guidebook* has now been completed and issued through the NIH Office of Protection from Research Risks.

The guide provides comprehensive information to IACUCs concerning procedures for the review of proposals, the oversight of animal care and use, the evaluation of animal welfare concerns, recordkeeping and reporting, and special considerations, including the instructional use of animals.

Use of animals for PHS-supported teaching must comply with federal regulations. To assure compliance, IACUCS are required to review all teaching procedures involving animals. The guidebook suggests that IACUCs ensure that maximum efforts are made to avoid pain and distress, and that alternatives to the use of animals are sought.

The guide then considers concerns for the teaching of individual scientific disciplines, beginning with psychology. Studies that involve only behavioral observations with no interventions are viewed as acceptable projects to "teach the rigors of conducting a research project and the variability inherent in animals." Conditioning studies that require food and water deprivation to strengthen motivation should "be very strongly justified for teaching purposes."

Studies that produce "potentially high levels of distress" are specifically excluding from teaching activities for psychology, but not for other sciences. These studies "include those using aversive stimuli, such as unavoidable electric shock; surgical ablations or drug-induced lesion designed to affect the animal's behavior or performance; or learned helplessness paradigms." It should be noted that Federal regulations do not require teachers of psychology to refrain altogether from using these procedures. Copies of the *Institutional Animal Care and Use Committee Guidebook* can be obtained from the OPRR, Building 31, Room 5B59, 9000 Rockville Pike, Bethesda, MD 20892, (301)496-7005.

Diagramming Operant Processes

John H. Hummel, Daniel J. Kaeck, Rebecca L. Ewes, Valdosta State University

Ray Dean Rittenhouse

Behavior analysis uses its terms very precisely. Unfortunately, while we share much of our terminology with other disciplines and, to an extent, the public, they do not always share our precision. The exactness associated with our field's terms has historically caused students and instructors considerable frustration when students are required to learn behavioral processes. Accurate definition of behavioral terms is difficult for naive students but seems to be mandatory if they are to correctly analyze textbook and real-life situations of behavioral interactions. One way of making behavioral processes easier to learn is to use a diagram(s) of operant processes that concretely depicts the relations between an antecedent, response, and consequence.

Taxonomies of animate and inanimate objects enjoy a long tradition in science, and have, historically, been quite useful to scientists in disciplines such as medicine, biology, chemistry, and geology. Psychologists have been slow to develop behavioral taxonomies that classify processes and operations or behavior (Catania, 1984). Those classification and notational systems that do exist (Grant, 1964; Hall, 1976; Mechner, 1959; Millenson, 1967; Schoenfeld, Cole, Blaustein, Lachter, Martin, & Vickery, 1972; Snapper, Kadden, & Inglis, 1982; Woods, 1974) are infrequently used (Catania 1984), and appear to be too detailed and complex for undergraduates enrolled in introductory courses to readily comprehend and use. Although the Goldwater and Acker (1994) system certainly has merit, there is another diagramming system (Hummel & Rittenhouse, 1990) college teachers may also wish to consider.

An Alternative Diagramming System

A new diagramming method was developed using the three-term contingency plus the multiplicative laws (e.g., [a] $+(+)=+$; [b] $+(+)=+$; [c] $-(+)=+$; and [d] $-(-)=+$) associated with mathematics.

Entry Level Requirements

The following represents the entry-level knowledge of terms, definitions, and symbols students should possess in order to learn the system:

1. Response: Designated as an **R**. An **R** represents an emitted behavior that is functionally or topographically a member of a response class. If one also chooses to teach students the omission processes identified by Woods (1974), an omitted response can be designated several

ways including, as one possibility, an underlined **R**. This symbol should be used when the operant process specifies any behavior other than the response targeted.

2. Reinforcer: A reinforcer is any environmental event that alters the future probability of responses/behaviors it follows. Positive reinforcers are symbolically designated as (+). Positive reinforcers strengthen responses that they follow and weaken those that lead to their termination/removal. Negative reinforcers are symbolically designated as (-). Negative reinforcers weaken responses that they follow and strengthen those that lead to their removal or avoidance. Most introductory textbooks in education and psychology use the term reinforcer for positive reinforcer and punisher or aversive stimulus for negative reinforcer. From a taxonomic and philosophical perspective, positive reinforcer and negative reinforcer are preferable to reinforcer and punisher since either type of consequent stimulus can strengthen or weaken an operant depending on whether it is contingently presented or removed.

Thus the status of consequent events defined as "reinforcers" or "punishers" in one context may be changed when they are scheduled differently. This raises important questions about the fundamental concepts applicable to a scientific formulation of behaviors and about the generality of the concepts of "reinforcers" and "punishers." The defining characteristics of reinforcers and punishers do not encompass all the effects of such stimuli on behavior. How consequent events modify behavior is to be understood in both the development and the maintenance of subsequent behavior (Morse & Kelleher, 1977, p. 176).

3. Multiplicative rules. These mathematical rules specify that when a: (a) positive is multiplied by a positive, the product is also positive, (b) negative is multiplied by a positive the product is negative, and (c) negative is multiplied by a negative, the product is positive. A plus or minus after the response symbol, **R**, denotes, respectively, whether the consequent stimulus was presented or removed. $A +$ or $-$ after the equals (=) sign denotes whether the function of the process is to strengthen or weaken the target response.

The following table depicts the alternative method for diagramming four basic operant processes.

Nomenclature and diagrams for the proposed taxonomy

Positive Reinforcement:	$R + (+) = +$
Punishment:	$R + (-) = -$
Response Cost:	$R - (+) = -$
Negative Reinforcement:	$R - (-) = +$

The alternative system enjoys several advantages. First, it is capable of distinguishing between unsignaled and signaled processes (Woods, 1974) and can incorporate antecedent stimuli (e.g., S^D , S^P , etc.). Second, many

continued on the next page

students report that it is easier to learn and understand than many diagramming methods.

The primary author of this paper has used the proposed taxonomy continuously since 1988. Student performance on exams shows that those who were taught the alternate taxonomy were able to both define the four basic processes more accurately and identify which process was illustrated in examples than were the students who learned only definitions.

Additionally, teaching students the proposed taxonomy requires no extra classtime because one can introduce the taxonomy while also presenting the processes. Third, the alternative taxonomy concretely indicates whether the process diagrammed strengthens or weakens the target behavior. Thus, the proposed taxonomy concretely depicts both the process and product (Deitz & Hummel, 1978) of the various operations diagrammed. Additionally, specific schedules of reinforcement can be incorporated into the schematics by subscripting the (+) symbol with FR-n, etc. For example, Signaled Positive Reinforcement on a variable-interval 3-minute schedule could be diagrammed as:

$S^D \rightarrow R (+)_{VI-3'} = +$

Fourth, the proposed taxonomy can be easily adapted to illustrate additional variations. For example, if one were interested in discriminating between primary and conditioned reinforcers, one could simply show a conditioned reinforcer as an italicized plus sign in parentheses such as (+).

Conclusions

Neither the proposed classification system nor Goldwater and Acker's (1994) are as comprehensive as the ones developed by Mechner (1959), Schoenfeld et al. (1972), or Snapper et al. (1982). These approaches, however, were developed to meet the needs of advanced students of behavior analysis and behavior analytic researchers rather than as an instructional aid to help introductory students learn (and teachers teach) the fundamental processes associated with operant learning. While it is likely that the proposed system could be revised to include classical conditioning, or to incorporate features found in these other notational schemes, we believe that the increased level of complexity would substantially diminish the instructional benefits of the proposed diagramming system for its intended audience: Introductory students.

Finally, we anticipate several additional criticisms. The first is our use of the term negative reinforcer rather than aversive stimulus or punisher. We stand by our use of the term for two reasons. First, negative reinforcer has been used previously in our field. Second, negative reinforcer is more complementary to our proposed system's other terms and symbols than either punisher or aversive stimulus. Another possible criticism is that the behavioral effect of each diagrammed process is presented as an absolute rather than as a conditional outcome. Users of the proposed system may wish to emphasize to their students that the

behavioral outcomes of operant processes are understood in terms of probabilities that are influenced by multiple historical-and-current environmental conditions/parameters, and must be validated by the continued collection of reliable data.

References

- Catania, A. C. (1984). *Learning* (2nd ed.). Englewood Cliffs, NJ: Prentice Hall.
- Deitz, S. M., & Hummel, J. H. (1978). *Discipline in the schools: A guide to reducing misbehavior*. Englewood Cliffs, NJ: Educational Technology.
- Goldwater, B. C., & Acker, L. E. (1994). Looking for symbols to represent reinforcement and punishment. *The ABA Newsletter*, 16(4), 8.
- Grant, D. A. (1964). Classical and operant conditioning. In A. W. Melton (Ed.), *Categories of human learning* (pp. 1-31). New York: Academic Press.
- Hall, J. T. (1976). *Classical conditioning and instrumental learning: A contemporary approach*. Philadelphia: Lippincott.
- Hummel, J. H., & Rittenhouse, R. D. (1990, May). *Revising Woods' taxonomy of instrumental conditioning*. A paper presented at the annual meeting of the Association for Behavior Analysis, Nashville, TN.
- Mechner, R. (1959). A notation system for the description of behavioral procedures. *Journal of the Experimental Analysis of Behavior*, 2, 133-150.
- Millenson, J. R. (1967). *Principles of behavior analysis*. New York: MacMillan.
- Morse, W. H., & Kelleher, R. T. (1977). Determinants of reinforcement and punishment. In W. K. Honig & J. E. R. Staddon (Eds.), *Handbook of operant behavior* (pp. 174-200). Englewood Cliffs, NJ: Prentice-Hall.
- Schoenfeld, W. N., Cole, B. K., Blaustein, J., Lachter, G. D., Martin, J. M., & Vickery, C. (1972). *Stimulus schedules*. New York: Harper & Row.
- Snapper, A. G., Kadden, R. M., & Inglis, G. B. (1982). State notation of behavioral procedures. *Behavior Research Methods and Instrumentation*, 14, 329-342.
- Woods, P. J. (1974). A taxonomy of instrumental conditioning. *American Psychologist*, 29, 584-597.

Authors' Notes

An earlier version of this paper that diagrams and describes the 16 processes identified by Woods (1974) and rediagrams them using the proposed system was presented at the annual meeting of the Association for Behavior Analysis, May, 1990, Nashville, TN. Requests for copies of this earlier paper are available from John H. Hummel, Department of Psychology, Counseling, and Guidance, Valdosta State University, Valdosta, GA, 31698.

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Spring 1994 Conferences

Quality Plus: From Organizational Process to Outcomes for People

(reprinted from press release, February, 1994)

The Accreditation Council on Services for People with Disabilities announces its Spring 1994 conference schedule, featuring two full-day sessions on "Applying Total Quality Concepts in Human Service Settings" and "Using Outcome Measures to Improve Quality" presented by senior staff of The Accreditation Council. Conferences are scheduled in... Salt Lake City...and Atlanta.

For further information about these conferences or to obtain registration materials, please contact The Accreditation Council by phone: (301) 459-3191 or write to: The Accreditation Council, 8100 Professional Place, Suite 204, Landover, MD 20785.

Call for Papers

Special Section on Teaching Behavior Analysis

The Behavior Analyst is soliciting manuscripts for a special section on teaching behavior analysis. The special section will feature papers on any issue or aspect of teaching behavior analysis -- theoretical, basic, or applied. Manuscripts of all types are sought, including, but not limited to: conceptual analyses, position papers, program or curriculum descriptions with outcome data, and empirical evaluations of instructional methods.

All manuscripts submitted for the special section will undergo peer review using standard criteria of *The Behavior Analyst*. Authors should submit six copies of their manuscript with a cover letter indicating they wish the paper to be considered for the special section on teaching behavior analysis. Manuscripts should be mailed no later than October 1, 1994, to Margaret Vaughan, Editor, *The Behavior Analyst*, Department of Psychology, Salem State College, Salem, MA 01970. Early submissions will be appreciated.

William Heward and Richard Malott will serve as co-editors of the special section. For further information about the special section, please contact Bill (Ph: 614-292-8148; e-mail: wheward.1@magnus.acs.ohio-state.edu) or Dick (Ph: 616-387-1268; e-mail: 73547.1141@Compuserve.com).

Call For Papers on Social Problems of the 1990s

The *Journal of Applied Behavior Analysis* is soliciting manuscripts for a special section that will feature the contributions of behavior-analytic research to the prevention and reduction of social problems that have become an unfortunately pervasive part of our current decade. Following is a list of examples of target problems for research that would be appropriate for this special issue:

- *Family, school, and community violence (e.g., child abuse)
- *Substance abuse
- *Teenage pregnancy
- *Sexually transmitted disease
- *Crime and delinquency (e.g., gangs)
- *Homelessness
- *Environmental endangerment
- *Problems associated with aging
- *Health care
- *Unemployment and adaptations to changing economic conditions
- *Psychiatric conditions (e.g., depression, schizophrenia, ADHD)
- *Discrimination (e.g., racial, gender, age)
- *Service-system delivery

Please submit manuscripts by June 20, 1994 to Nancy A. Neef, Editor, Psychology in Education Division, Graduate School of Education, University of Pennsylvania, 3700 Walnut Street, Philadelphia, PA 19104-6216.

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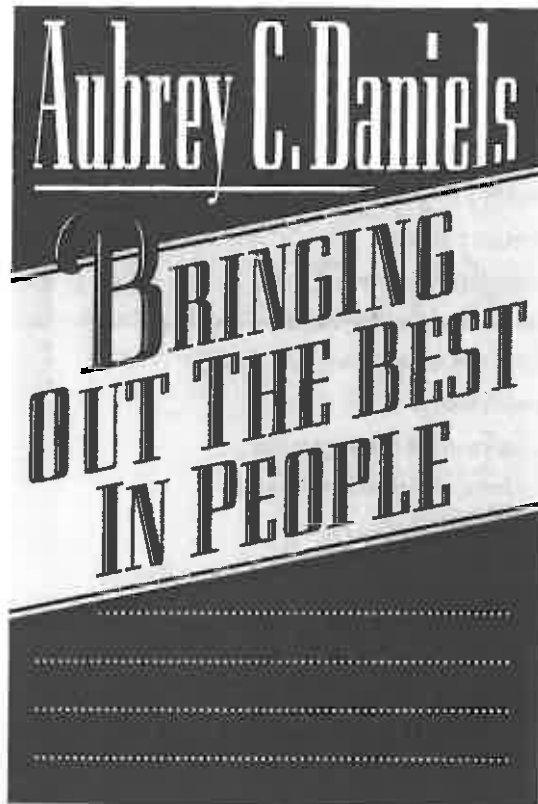
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STUDENT-RELATED NEWS: The Future is Here!

Student Committee News

Laura Methot

Western Michigan University

The ABA '94 Convention in Atlanta is approaching, and there are a number of events of interest for students. Among the most popular venues are the Student Breakfasts which have gotten even better. Three organizations have sponsored breakfasts this year: The Continuous Learning Group of Morgantown, West Virginia, is sponsoring a Saturday breakfast; Aubrey Daniels & Associates of Tucker, Georgia, is sponsoring Sunday's; and the Spectrum Center for Educational and Behavioral Development of Berkeley, California, is sponsoring Monday's breakfast. Thanks to these three organizations, we students will be able to begin each day energized for other convention activities.

Five speakers will participate in the student committee-sponsored symposium, "Presenting yourself as a behavior analyst in a non-behavioral setting." The speakers are Karen Budd of DePaul University in Chicago; Susan Schneider of Auburn University, Auburn, Alabama; Julie Smith of the Continuous Learning Group in Morgantown, West Virginia; Richard Spates of Western Michigan University, Kalamazoo, Michigan; and Larry Williams of Surrey Place Centre, Toronto, Canada. A rich mixture of professional experience is represented by this group—mark this event in your program book as a "must attend!"

Look for the Annual Student Committee Business Meeting in the Convention schedule. The meeting, associated with one of the Student Breakfasts, is a time when a large number of student members can gather together for discussion and information sharing. The agenda for the May meeting will include introduction of the new Student

Representative-Elect, discussion of difficulties graduates of behavior analysis face in job-hunting, and a synopsis of the Student Committee activities over the past year. If you have a suggestion for an agenda item, please send it to me at the address below.

As always, your communications are welcomed.

Laura Methot, Dept. of Psychology, Western Michigan University, Kalamazoo 49008 USA, or, e-mail 75460.474@Compuserve.com

Call for Papers 11th Annual EAHB-SIG Outstanding Student Paper Awards

Student papers are sought for the 1994-95 Student Paper Competition sponsored by the Experimental Analysis of Human Behavior Special Interest Group. Awards are based on peer review by established members of the EAHB-SIG; all papers receiving favorable reviews are recognized.

Submission deadline is September 19, 1994. For information and contest rules, contact: Barbara J. Kaminski, Behavioral Biology Research Center, Division of Behavioral Biology, Suite 3000, FSK/Bayview Campus, 5510 Nathan Shock Drive, Suite 3000, Baltimore, MD 21224

See the 1994 Award
Winners on page 1.
Congratulations to all!!

Pavlovian Society Annual Meeting

The Annual Meeting of the Pavlovian Society will be held in Prague, Czech Republic, July 1-3, 1994. Preliminary plans call for Friday, July 1/morning registration-welcome reception with afternoon conferences; Saturday, July 2/Integrated Program with the Pavlovian Society and The European Society for the Study of Higher Nervous Function (CIANS)/International Society for Behavioral Medicine (ISBM); and Sunday, July 3/The Pavlovian Society.

Special Paper Presentations: This year's meeting will have a number of interesting invited papers from notable researchers, in addition to symposia and individual paper presentations. The focus will be, "The Application of Pavlovian Thinking to Medicine". Invited lecturers are:

Ake Hjarlmarson, Cardiologist: "The Role of the Nervous System in the Primary Medical Disorder, Sudden Cardiac Death"

Paul McHugh, Psychiatrist: "Psychiatric Dysfunctions and Dysfunctions in Psychiatry"

Christian Guilleminault, Neuroscientist: "Brain and Behavior Relationships in the Study of Sleep and Its Disorders"

John Desmedt, Neurologist: "What the Human Event-Related Potentials Can Tell Us About the Disorders of the Brain"

Stewart Wolf, Physician: "A Weakness in Medicine is Specialization: The Focus on Body Parts Prevents Proper Medical Remedies!"

There is also a plan for a joint symposium, "Former Students of Pavlov and What We Are Researching Today".

For more information contact: William P. Pare', Ph.D., Eastern R & D Office (15R), VA Medical Center, Perry Point, MD 21902.

Development SIG Convention Dinner!

Nicola's Restaurant (404-325-2524)

Friday, May 27

6:30-8:30 pm

Hope to see you there!

"Exploring the Internet: An Overview and Hands-on Demonstration"

*Leslie Burkett & Peter Dams
(University of North Texas)*

Location: ABA Convention Poster Area

Date: Saturday, May 28

Time: 1:30pm - 3:30pm



BEHAVIOR ANALYST

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Schizophrenia and a Behavioral World View

Richard W. Malott—Western Michigan University

The Behavioral World View. I advocate the behavioral world view. And I am gradually coming to understand the meaning and implications of that view. For me, a behavioral world view means:

- ☐ All psychological phenomena are behavioral.
- ☐ The behavior involved is usually operant.
- ☐ Thus that behavior is controlled by some sorts of reinforcement and punishment contingencies.
- ☐ Essentially all psychological phenomena involve contingencies controlling behavior.

Reification. Reification may be the biggest enemy of a thoughtful analysis of psychological phenomena and thus the biggest enemy of a behavioral world view. *Why is Johnny acting so weird? Because he's schizophrenic. How do you know he's schizophrenic? Because he's acting so weird.* And I don't see operational definitions as a way out. Operational definitions are the hand maiden of circularity. *I operationally define schizophrenia as the presence of weird behavior; so I'm not being circular. Sure you do. But 10 seconds later your listeners or readers are thinking and saying Johnny is weird because he's a schizophrenic. And 30 seconds later, you're agreeing with them; you've forgotten your coldly logical operational stance. For example one behavioral text says, Schizophrenia is a disorder . . . for which there is no known cure. Reification causes many problems:*

1. **Symptoms of the Reified.** Once we get seduced into treating schizophrenia as a thing, we then look for symptoms, expressions, or characteristics of that reified thing, that cause of the bizarre behavior. So then, thought disorders, delusions, motor disturbances, affect disturbances, and poor perceptual screening are all said to be *symptoms of, expressions of, or characteristics of* schizophrenia; in other words, all are caused by the inferred gremlin, schizophrenia.

2. **Distraction from the Behavior.** The authors of the behavioral text, mentioned earlier, are too sophisticated to talk about *symptoms of schizophrenia*; they use the substitute, *characteristics of schizophrenia*; thus they fail to talk about behavior as anything but a characteristic (a.k.a. symptom). For example, *My name is General Eisenhower. I came to the hospital ward to set things straight.*

3. **Distraction from the Contingencies.** So the behavioral authors join the crowd by writing of *cognitive slippage* rather than contingencies that reinforce this bizarre

statement and the absence of contingencies that fail to punish that statement. We behavior analysts have long ago learned to look for social reinforcement contingencies that maintain the bizarre. And we've recently done more thorough functional analyses pointing toward supportive escape contingencies as well. A consistently behavioral world view may also lead us to analyze the punishment contingencies and contingencies for incompatible behavior that are not suppressing this bizarre, problem behavior. My general suspicion is that the biggest difference between us and our clients is that our positive behavior is more effectively maintained by various avoidance contingencies and analogs and our negative behavior is more effectively suppressed by various social punishment contingencies and analogs. We may be just as susceptible to the reinforcement contingencies that maintain negative behaviors as are our clients.

4. **Misguided Search for Biological/Genetic Causes of the Reified.** An emphasis on behavior and contingencies that control or fail to control, will make us skeptical of searches for genetic and biochemical causes of the operant response, *My name is General Eisenhower. I came to the hospital ward to set things straight.* If there is genetic or unusual biochemical involvement in such operant response sequences, then that involvement must be through the contingencies. So we would ask, *How does the neurotransmitter dopamine affect the contingencies, including the contingencies controlling the behavior of thinking?* Global statements, like *the bad genes or bad biochemistry interferes with learning*, won't get it. How? Through motivational variables? You mean food isn't a reinforcer? No? You mean social approval isn't a reinforcer? Did they inherit a tendency not to be susceptible to social approval? To learned reinforcers? Dipper-click/water pairing won't establish the dipper click as a learned reinforcer? The more molecular the questions, the more implausible the answers thus increasing the skepticism of the behavior analyst that truth will be found in the bad gene or the bad chem. But, if the cause is found there, the behavioral world view should provide the most effective framework for analyzing the impact of the bad biology.

The Behavioral World View to the Rescue. But rather than holding our breath waiting for the bio-breakthrough, the behavioral world view suggests we concentrate on the behavioral contingencies, past and present, if we are to understand bizarre, harmful repertoires and if we are to provide remedial and prosthetic contingencies.

To publish a reply to the Notes column in *The ABA Newsletter*, please submit your reply to Peter Lamal, Editor, The ABA Newsletter, Department of Psychology, University of North Carolina, Charlotte, N.C. 28223, with a copy to Richard W. Malott, Department of Psychology, Western Michigan University, Kalamazoo, MI 49008-5052. It helps if you accompany your hard copy to the Editor with a 3.5 in. computer disk containing a file of your reply, ideally in MS Word or MacWrite.

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ABOUT THE BOOK AND THE AUTHOR

JACK MICHAEL is professor of psychology at Western Michigan University. He has been teaching for over thirty-five years and specializes in college instructional technology, the technical terminology of behavior analysis, basic theory regarding motivation, and verbal behavior. It was during his first teaching position in Kansas that he became much influenced by B. F. Skinner's *Science and Human Behavior*. In the years to follow, as a result of his association with the rehabilitation psychologist, Lee Meyerson, he began to apply Skinner's behavioral concepts and methods to problems in the areas of mental retardation, mental illness, and physical disability. His current interest in college instructional technology came mainly as a result of his contact with Fred Keller. He has received a number of awards: Master Lecturer from Western Michigan University; Distinguished Faculty Scholar Award; Outstanding Contributions to the Development of Behavior Analysis; Distinguished Teaching Award; Master Lecturer; Distinguished Teaching Award. In over fifty publications and hundreds of presentations, he has worked to define, clarify, and analyze basic and applied behavioral phenomena. *Concepts and Principles of Behavior Analysis* presents a cross section of his work on many issues and provides a strong base for further study of behavior analysis.

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Research Grant Announcement

Young Investigator Research Awards for Behavioral Scientists - NIMH B/START Program Announcement.

The National Institute on Mental Health (NIMH) has developed a new funding program aimed solely at new researchers in behavioral science — the Behavioral Science Track Award for Rapid Transition (B/START).

Purpose: To provide "seed" funding for new researchers in the behavioral sciences.

Eligibility: The researcher must be at the beginning stages of his/her research career, that is, not in training and not previously a P.I. on any Public Health Service (PHS) - supported research project. (Students may apply so long as they will have received their degrees by the time the award is made.)

Mechanism: The NIMH Small Grant mechanism for a one-time, one-year grant not to exceed \$25,000 in total direct costs.

Submissions: Submission dates are Feb 1, June 1, and Oct 1.

Inquiries: Hilleary D. Everist, Ph.D., Deputy Director, Division of Neuroscience and Behavioral Science. NIMH, 5600 Fishers Lane, Room 11-103, Rockville, MD 20857. Phone: (301)443-6676; Fax: (301)443-4822; or Jane Steinberg, Ph.D., Acting Director, Division of Clinical and Treatment Research, NIMH, 5600 Fishers Lane, Room 11-103, Rockville, MD 20857. Phone: (301)443-3685.

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In 1988 the first edition of the *Directory of Graduate Training Programs in Behavior Analysis* was produced and sold by ABA, and a supplement to that edition was published in 1990. A 1991 survey sent to all individuals who had purchased the directory indicated that 95% of respondents had used it, and that the majority of users found the directory useful for reviewing potential graduate schools. A second edition of the directory was published in 1992. This edition was updated to contain more information on the listed programs, including details on course descriptions and faculty interests.

A third edition of the directory is currently in the planning stage. The priority of the new edition is broader coverage of graduate training programs. You can perform a valuable service by encouraging training opportunities not listed to submit their information for inclusion in the third edition (there is no charge for the listing). To obtain more information or a submission packet write to:

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