wholeheartedly opposed to "speculative" ideas? The writings of Berzelius, Davy, Berthollet, Ampère, Dalton, Prout, and many others are full of bold guesses. This leaves the objection that Avogadro's hypothesis required what he called "constituent molecules" (our H_2 or O_2) of elementary substances, and at the time no one could figure out how two or more like atoms could stick together to form them. I for one do not see why this objection does not suffice to explain the neglect of Avogadro's hypothesis.

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Social Psychology

Social Cognition. SUSAN T. FISKE and SHELLEY E. TAYLOR. Addison-Wesley, Reading, Mass., 1984. xviii, 508 pp., illus. Paper, \$16.95. Topics in Social Psychology.

The field of social psychology has historically been the cognitive vanguard of American psychology. During the decades when mainstream psychology was afflicted with a nearly terminal case of operationalism, social psychology was unabashedly receptive to such "mentalistic" constructs as attitudes, stereotypes, and schemata. How could it be otherwise, since the social environment is a *perceived* environment shaped by the expectancies and goals of the actor? For Kurt Lewin in the '30's, a person's behavior was a response to his or her psychological environment. Never mind that Lewin's solipsism was scoffed at by the behaviorists, social psychology has thrived on its varied attempts to cope with the complex processes of mental functioning. Lewin's student Leon Festinger effectively theorized about cognitions and the relations between them, giving rise to broad empirical advances in our understanding of how people deal with inconsistencies of thought. Lewin's friend Fritz Heider tried to distill the wisdom of naïve psychology with the ultimate result that an attributional approach to mental functioning became the dominant focus of social psychology in the '70's. This approach was based on the premise that people act on their causal understandings of social life and therefore it is important to determine, experimentally, how these understandings are reached.

Meanwhile, disenchantment with the sterility of clearly behavioral approaches, the challenge of the computer meta-

phor, and advances in measurement techniques were converting perceptionists and learning theorists into cognitive psychologists. It was perhaps inevitable that developments in social and "natural science" psychology should begin to influence each other as they have increasingly in the past decade. "Social cognition" is the result, an outgrowth of the attributional approach that is especially responsive to the information processing conceptions and measures of cognitive psychology. To an extent, social cognition represents an uneasy marriage between the broad contextualism of the social psychologist and the preference of the cognitivist for fine-grain analyses of attention, perception, memory, and inference. The book under review is an impressive summary of this emergent field.

Fiske and Taylor characterize their domain as the general concern with how people make sense of other people and themselves. Such a complex enterprise does not lend itself to a single theory or a limited set of methods. But what is allegedly new and distinctive about social cognition research is that its practitioners are comfortable with mentalistic explanations, committed to the analysis of thinking processes (rather than outcomes), and open to the continued crossfertilization between cognition and social psychology. One may be skeptical of the claim for the novelty of social cognition research but still be grateful for the rich smorgasbord of ideas, insights, and data that the authors have collected and organized for us.

The book is divided somewhat arbitrarily into sections entitled Elements of Social Cognition and Processes of Social Cognition. Since the elements section includes a treatment of attributional approaches and the processes section focuses on the more recent conceptalizations of attention, memory, and inference, the division makes a certain historical sense. Nevertheless, I find it strangely misleading to treat the complexities of attributional reasoning under the general label "elements of cognition." There is a final section, entitled Beyond Cognition, that presents a discussion of affect, attitudes, and behavior. Such a discussion is essential for a comprehensive understanding of how cognitions function in the active and reactive person.

Three models of the social thinker appear to underlie contemporary research. The first is that of the social thinker as naïve scientist, interested in prediction and control through causal understanding of the surrounding environment. The second is that of the selforiented information processor, especially attentive to self-relevant information and often processing it in self-serving or self-protective ways. The third is that of the "cognitive miser," pressing toward efficient inferential short-cuts and mindless automatic processing. This last model goes hand in hand with the concept of schema, and the authors devote considerable space to the vast empirical literature that shows how our theories and hypotheses affect the ways in which we process available information. Not to have such schematic processing aids would leave us as paralyzed victims of information overload. Perhaps ultimately we will have a clearer picture of how these three models combine to facilitate predictions of thought and behavior, but one can hardly expect the present authors to do much more than suggest that each of the different processing models is appropriate under different circumstances.

In order to evaluate the contribution of this volume it is important to understand to whom it is addressed. It is one of a series designed for undergraduates lacking any particular background in social psychology. Certain stylistic consequences of this orientation are apparent. Individual research studies are referred to and superficially summarized; they are rarely described in sufficient detail to permit critical appraisal. Strings of references validate (for those already familiar with the literature) the authors' extensive scholarship, but the professional reader may yearn for greater depth and sophistication of treatment. Instead, the presentation is interspersed with hypothetical cases, largely from undergraduate life, and with thought experiments. Most of these are intriguing and pedagogically apt, but some readers may feel patronized or vaguely manipulated by anecdotes intended to "make the point" being considered.

All in all, in spite of the deference to undergraduate interests and concerns, this is an ambitious enterprise that goes well beyond pedestrian textbook standards. It is really the first major effort to consider how cognitive and social psychologists have joined hands, and it is carried out with imagination, good sense, and good humor. The book presents the outsider with a clear picture of the dominant contemporary focus in social psychology. It also deals perceptively and engagingly with problems of social and self understanding that must be a concern of every sentient person. Finally, the book gives the professional scholar a remarkably useful bibliography and

will bring him or her up to date in areas where his or her reading has lapsed.

In short, Social Cogniton is timely, balanced, and comprehensive. It may not supplant more general social psychology textbooks, but it will surely be reflected in many a lecture note, with or without acknowledgement of the source. This may not be what the authors and publishers had in mind, but it will be a tribute both to the book's substance and to its style.

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Books Received

Adhesive Joints. Formation, Characteristics, and Testing. K. L. Mittal, Ed. Plenum, New York, 1984. xiv, 931 pp., illus. \$125. From a symposium, Kansas City, Mo., Sept. 1982. Adrenal Diseases in Childhood. Maria I. New and

Lenore S. Levine, Eds. Karger, Basel, 1984. viii, 235 pp., illus. \$99. Pediatric and Adolescent Endocrinology, vol. 13. Advanced Organic Chemistry. Part A, Structure

Advanced Organic Chemistry. Part A, Structure and Mechanisms. Francis A. Carey and Richard J. Sundberg. 2nd ed. Plenum, New York, 1984. xviii, 726 pp., illus. \$59.50; paper, \$16.95. Advances in Analytical Toxicology. Vol. 1. Randall C. Baselt, Ed. Biomedical Publications, Foster City, Calif., 1984. x, 275 pp., illus. \$26. Advances in Cancer Control. Epidemiology and Research. Paul F. Engstrom, Paul N. Anderson, and Lee E. Mortenson, Eds. Liss, New York, 1984. xxii, 460 pp., illus. \$58. Progress in Clinical and Biologi-cal Research, vol. 156. From two meetings, Denver, June 1983, and Washington, D.C., March 1983. Advances in Cell Culture. Vol. 3. Karl Maramor-osch, Ed. Academic Press, Orlando, Fla., 1984. xxii,

Advances in Cellular Neurobiology. Vol. 5. Sergey

Rederoff, Ed. Academic Press, Orlando, Fla., 1984.
 xviii, 375 pp., illus. \$89.
 Advances in Child Development and Behavior. Vol.

Advances in Child Development and Behavior. Vol. 18. Hayne W. Reese, Ed. Academic Press, Orlando, Fla., 1984. xiv, 314 pp. \$34. Advances in Computers. Vol. 23. Marshall C. Yovits, Ed. Academic Press, Orlando, Fla., 1984. xvi, 377 pp., illus. \$48. Advances in Cryogenic Engineering. Vol. 29. R. W. Fast, Ed. Plenum, New York, 1984. xxii, 1049 pp., illus. \$95. From a conference, Colorado Springs, Advances in Cyclic Nucleotide and Partic T.

Advances in Cyclic Nucleotide and Protein Phos-phorylation Research. Vol. 17A. Paul Greengard *et al.*, Eds. Raven, New York, 1984. x, 182 pp. Paper, S17.50. From a conference, Milan, June 1983. Advances in Experimental Social Psychology. Vol.

Id, Theorizing in Social Psychology: Theoretical Perspectives. Leonard Berkowitz, Ed. Academic Press, Orlando, Fla., 1983. xii, 270 pp. \$29.50. Advances in Inflammation Research. Vol. 8. Ger-Linux 2010 (2010)

ald Weissmann, Ed. Raven, New York, 1984. xii, 251 pp., illus. \$52.

Advances in Protein Chemistry. Vol. 36. C. B. Anfinsen, John T. Edsall, and Frederic M. Richards, Eds. Academic Press, Orlando, Fla., 1984. x, 395

Eds. Academic Press, Orlando, Fla., 1984. x, 395 pp., illus. \$52. Advances in Test Anxiety Research. Vol. 3. Henk M. van der Ploeg, Ralf Schwarzer, and Charles D. Spielberger, Eds. Published for the International Society for Text Anxiety Research by Swets and Zeitlinger, Lisse, and Erlbaum, Hillsdale, N.J., 1984. xii, 285 pp., illus. Paper, \$29.95. From a meeting, Louvain, Belgium, 1983. Advances in World Archaeology. Vol. 3. Fred Wendorf and Angela E. Close, Eds. Academic Press, Orlando, Fla., 1984. xxxii, 394 pp., illus. \$65.50. Advances in X-Ray Analysis. Vol. 27. Jerome B

Advances in X-Ray Analysis. Vol. 27. Jerome B.
Cohen et al., Eds. Plenum, New York, 1984. xviii, 579 pp. \$69.50. From a conference, Snowmass, Colo. Aug. 1983.
Artificial Intelligence. Patrick Henry Winston. 2nd ed. Addison-Wesley, Reading, Mass., 1984. xvi, 527 pp., illus. \$29.95.
Astronomical Experiments. Vincent Icke. 3rd ed.

434

Burgess, Minneapolis, 1984. 197 pp., illus. Paper, \$6.95

\$6.95. Astronomy and Astrophysics Abstracts. Vol. 34, Literature 1983, Part 2. S. Böhme *et al.*, Eds. Published for Astronomisches Rechen-Institut by Springer-Verlag, New York, 1984. x, 921 pp. \$68.50. Asymmetric Synthesis. James D. Morrison, Ed. Academic Press, Orlando, Fla., 1983. Vol. 1, Ana-lytical Methods. xiv, 201 pp., illus. \$32. Vol. 2, Stereodifferentiating Addition Reactions, Part A. xiv, 278 pp., illus. \$45. Asymptic Methods in Oueuing Theory. A. A.

Attachesis
 Asymptotic Methods in Queuing Theory. A. A.
 Borovkov. Wiley, New York, 1984. xii, 292 pp.
 \$47.95. Wiley Series in Probability and Mathematical Statistics. Translated from the Russian edition (Moscow, 1980) by D. Newton.
 Atlas of Human Intracranial Anatomy. Margaret M. Waddington. Academy Books, Rutland, Vt., 1984. xii, 254 pp. \$95.
 The Audubon Society Handbook for Butterfly Watchers. Robert Michael Pyle. Illustrations by Sarah Anne Hughes. Scribner, New York, 1984. xiv, 274 pp. \$17.95.

274 pp. \$17.95

274 pp. \$17.95.
Avian Biology. Vol. 7. Donald S. Farner, James R. King, and Kenneth C. Parkes, Eds. Academic Press, Orlando, Fla., 1983. xxiv, 542 pp., illus. \$69.50.
Bacterial Vaccines. René Germanier, Ed. Academic Press, Orlando, Fla., 1984. xiv, 441 pp., illus. \$65.
Beta Blockers in the Treatment of Cardiovascular Disease. John B. Kostis and Eugene A. De Felice, Eds. Raven, New York, 1984. x, 307 pp., illus. \$40.
Biochemistry of Physical Activity. Roy J. Shephard. Thomas, Springfield, Ill., 1984. x, 391 pp., illus. \$44.75. illus. \$44.75

Illus, S44.75. The Biochemistry of the Carotenoids. Vol. 2, Ani-mals. T. W. Goodwin. 2nd ed. Chapman and Hall, London, 1984 (U.S. distributor, Methuen, New York). xvi, 224 pp., illus. \$50. Biodynamics. Circulation. Y. C. Fung. Springer-Verlag, New York, 1984. xii, 404 pp., illus. \$33. Biological Effects of Ultrasound. Mechanisms and Clinical Implications. Recommendations of the Na-tional Council on Radiation Protection and Measure-ments. National Council. on Radiation Protection.

tional Council on Radiation Protection and Measurements. National Council on Radiation Protection and Measurements, Bethesda, Md., 1983. xiv, 266 pp., illus. Paper, \$15. NCRP Report No. 74.
Biological Monitoring and Surveillance of Workers Exposed to Chemicals. Antero Aitio, Vesa Riihimaki, and Harri Vainio, Eds. Hemisphere, Washington, D.C., 1984. xii, 403 pp. \$64.50. From a course, Espoo, Finland, Aug. 1980.
Biological Response Mediators and Modulators. J. Thomas August, Ed. Academic Press, Orlando, Fla., 1983. xx, 254 pp., illus. \$29.50. John Jacob Abel Symposia on Drug Development. From a symposium, Baltimore, June 1982.

Abel Symposia on Drug Development. From a symposium, Baltimore, June 1982.
Biology and Chemistry of the Carbonic Anhydrases. Richard E. Tashian and David Hewett-Emmett, Eds. New York Academy of Sciences, New York, 1984. xiv, 640 pp., illus. Paper, \$140. Annals of the New York Academy of Sciences, vol. 429.
From a conference, New York, Sept. 1983.
Biology of Carbohydrates. Vol. 2. Victor Ginsburg and Phillips W. Robbins, Eds. Wiley-Interscience, New York, 1984. x, 342 pp., illus. \$80.
Bone Marrow Biopsies Updated. New Prospects for Clinical Diagnostics. B. Frisch, Ed. Karger, Basel, 1984. viii, 132 pp., illus. \$58.75. Bibliotheca Haematologica, No. 50. From a symposium, Barcelona, Sept. 1983.
Brain and Information. Event-Related Potentials.

Brain and Information. Event-Related Potentials. Rathe Karrer, Jerome Cohen, and Patricia Teuting, Eds. New York Academy of Sciences, New York, 1984. xiv, 768 pp., illus. Paper, \$169. Annals of the New York Academy of Sciences, vol. 425. From a

conference, Lake Forest, Ill., June 1981. Cannon's Point Plantation, 1794–1860. Living Conditions and Status Patterns in the Old South. John Solomon Otto. Academic Press, Orlando, Fla., 1984. xx, 217 pp., illus. \$42. Cardiovascular Review 1984. Gerald C. Timmis *et al.*, Academic Press, Orlando, Fla., 1984. xxxviii, 705 an \$44.

705 pp. \$44

Catecholamines. Earl Usdin et al., Eds. Liss, New Catecholamines. Earl Usdin et al., Eds. Liss, New York, 1984. Three volumes. Part A, Basic and Peripheral Mechanisms. xxx, 415 pp., illus. \$120. Part B, Neuropharmacology and Central Nervous System—Theoretical Aspects. xxvi, 521 pp., illus. \$140. Part C, Neuropharmacology and Central Ner-vous System—Therapeutic Aspects. xlviii, 275 pp., illus. \$95. Neurology and Neurobiology, vol. 8. From a symposium, Göteborg, Sweden, June 1983. The Cell Biology of Sponges. Tracy L. Simpson, Springer-Verlag, New York, 1984. xx, 662 pp., illus. \$85.

583. Cell Separation. Methods and Selected Applica-tions. Thomas G. Pretlow II and Theresa P. Pretlow, Eds. Academic Press, Orlando, Fla., 1983. Vol. 2, xvi, 327 pp., illus. \$39.50. Vol. 3, xviii, 317 pp., illus. \$47.50 \$47 50

Cellular Ageing. H. W. Sauer, Ed. Karger, Basel, 1984. x. 276 pp., illus. \$88.75. Monographs in Devel-opmental Biology, vol. 17.

Centrifugation. A Practical Approach. D. Rick-wood, Ed. 2nd ed. IRL Press, Washington, D.C., 1984. xii, 352 pp., illus. Paper, \$20. The Cereal Rusts. Vol. 1, Origins, Specificity, Structure, and Physiology. William R. Bushnell and Alan P. Roelfs, Eds. Academic Press, Orlando, Fla., 1984. xx, 546 pp., illus. \$65. Chemistry and Crime. From Sherlock Holmes to Today's Courtroom. Samuel M. Gerber, Ed. Ameri-can Chemical Society, Washington, D.C., 1983. xiv, 136 pp., illus. \$19.95. The Chemistry of Solid Wood. Roger Rowell, Ed. American Chemical Society, Washington, D.C., 1984. x, 614 pp., illus. \$79.95. Advances in Chemis-try Series, 207. From a symposium, Seattle, March 1983. Colonizing Other Worlds. A Field Manual. John

Colonizing Other Worlds. A Field Manual. John W. Macvey. Stein and Day, Briarcliff Manor, N.Y., 1984. 216 pp. \$17.95.

Comparative Analyses of Fish Populations in Natually Acidic and Circumneutral Lakes in Northern

rally Acidic and Circumneutral Lakes in Northern Wisconsin. James G. Wiener. Eastern Energy and Land Use Team, U.S. Fish and Wildlife Service, Kearneysville, W.Va., 1983. xiv, 108 pp., illus. Paper. Air Pollution and Acid Rain Report No. 16. Comparative Neurology of the Optic Tectum. Hor-acio Vanegas, Ed. Plenum, New York, 1984. xx, 850 pp., illus. \$125. Comparison Methods for Queues and Other Sto-chastic Models. Dietrich Stoyan. Daryl J. Daley, Ed. Wiley, New York, 1984. xiv, 217 pp. \$39.95. Wiley Series in Probability and Mathematical Statistics. Translated from the German edition (Berlin, 1977). ComputerSpace. James Wagenvoord. Perigee (Putnam), New York, 1984. 128 pp., illus. Paper, \$14.95. \$14.95.

Conceptual Issues in Alcoholism and Substance Abuse. Joyce H. Lowinson and Barry Stimmel, Eds. Haworth, New York, 1984 x, 102 pp., illus. \$19.95. Originally published in Advances in Alcohol and Substance Abuse, vol. 3, No. 3. Continuities and Discontinuities in Development.

Continuities and Discontinuities in Development. Robert N. Emde and Robert J. Harmon, Eds. Ple-num, New York, 1984. xx, 418 pp., illus. \$39.50. Topics in Developmental Psychobiology. From a meeting, Estes Park, Colo., June 1982. Continuity and Change in Art. The Development of Modes of Representation. Sidney J. Blatt, with Ethel S. Blatt. Erlbaum, Hillsdale, N.J., 1984. xx, 411 pn. illus. \$45

411 pp., illus. \$45

Corrosion in Power Generating Equipment. Mar-kus O. Speidel and Andrejs Atrens, Eds. Plenum, New York, 1984. xxvi, 548 pp., illus. \$79.50. Brown Boveri Symposia Series. From a symposium, Ba-den, Switzerland, Sept. 1983.

Cries of the Wolf Man. Patrick J. Mahony. Inter-national Universities Press, New York, 1984. xii, 185 pp. \$25

Crime, Madness, and Politics in Modern France. The Medical Concept of National Decline. Robert A. Nye. Princeton University Press, Princeton, N.J., 1984. xvi, 368 pp. \$35. Crystal Optics with Spatial Dispersion, and Exci-

tons. V. M. Agranovich and V. L. Ginzburg. 2nd ed. Springer-Verlag, New York, 1984. xii, 441 pp., illus. \$49. Springer Series in Solid-State Sciences, vol. 42. Translated from the Russian edition (Moscow, 1020). 1979)

Current Perspectives in Microbial Ecology. M. J. Klug and C. A. Reddy, Eds. American Society for Microbiology, Washington, D.C., 1984. xii, 710 pp., Illus. \$41. From a symposium, East Lansing, Mich. Aug. 1983.

Aug. 1983.
Disease Resistance in Plants. J. E. Vanderplank.
2nd ed. Academic Press, Orlando, Fla., 1984. xiv,
194 pp., illus. \$34.50.
Distribution, Biology, and Management of Exotic
Fishes. Walter R. Courtenay, Jr., and Jay R.
Stauffer, Jr., Eds. Johns Hopkins University Press,
Baltimore, 1984. xvi, 430 pp., illus. \$40.
The Doctors' Anti-Breast Cancer Diet. Sherwood
L. Gorbach, David R. Zimmerran, and Margo N.

The Doctors' Anti-Breast Cancer Diet. Sherwood L. Gorbach, David R. Zimmerman, and Margo N. Woods, with recipes by Jean Kressy. Simon and Schuster, New York, 1984. 221 pp. \$15.95. Doppler Radar and Weather Observations. Rich-ard J. Doviak and Dušan S. Zrnić. Academic Press, Orlando, Fla., 1984. xviii, 458 pp., illus. \$60. Encyclopedia of Psychology. Raymond J. Corsini *et al.*, Eds. Wiley-Interscience, New York, 1984. Four volumes, illus. xxviii, 481 pp.; vi, 500 pp.; vi, 487 pp.; and vi, 466 pp. \$199.95. Endocrine Correlates of Reproduction. Kyoichiro Ochiai *et al.*, Eds. Japan Scientific Societies Press.

Ochiai *et al.*, Eds. Japan Scientific Societies Press, Tokyo, and Springer-Verlag, New York, 1984. xii, 320 pp., illus. \$37.50.

Environmental Radioactivity. National Council on Radiation Protection and Measurements, Bethesda, Md., 1984. vi, 284 pp., illus. Paper, \$17. Proceedings No. 5. From a meeting, Washington, D.C., April 1983.

Epicurus' Scientific Method. Elizabeth Asmis. Cornell University Press, Ithaca, N.Y., 1984. 385 (Continued on page 470)