

Reading Vygotsky

(Preface to an edited collection of Vygotsky Writings by Rieber and Robinson, in press)
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Writing this preface is truly an astonishment to me for many reasons. It is now more than 40 years since I first encountered the name of Lev Semyonovich Vygotsky, a Russian scholar born just before the start of the 20th Century. By virtue of my training in the middle of the 20th century as an experimental psychologist who specialized in learning, I was reasonably well trained in that form of positivist behavioral sciences which took it as a simple truth that the errors of the originators of the discipline of psychology were a thing of the past. To my generation of experimental psychologists, study the history of psychology was the uplifting story of that long trail of errors that had been overcome by recent scientific advances. Such history served primarily as a cautionary tale about how not to succumb to the temptations of subjective, unscientific speculation and instead master the quantitative methods that had been pioneered in the previous decade that had led psychology out of its dark past into a genuinely scientific future that would benefit human kind.

A corollary of this scientific world view was a strong claim for the continuity of species, such that general laws of human behavior could be studied at least as effectively by studying the behavior of rats as the behavior of college sophomores; the choice of "subject" was a matter of convenience, Rats had the advantage that one could control their histories with moral impunity while at least some consideration had to be given to avoiding harming undergraduates. On the other hand, rats had to be taken

care of over the weekend, while undergraduates were the responsibility of university officials who enforced the procedures of *in locus parentis*.

Needless to say, the same notions of continuity applied to age differences. The study of children was a relatively small, and relatively low status enterprise. The major mechanism of development change favored by psychologists was learning from the environment using procedures which were often directly modeled on procedures initially developed to study rats, dogs, and cats.

Yet another widely held belief, which admitted of a few exceptions, was that by and large, scientific psychology could be adequately mastered by knowing how to read English and moreover, to restrict one's reading primarily to research conducted in the United States. The exceptions do not, so far as I can tell, form a pattern. Frederick Bartlett's experiments on remembering were well known, but his book on Remembering was not. Pavlov was of course required reading because American behaviorists of the 1920s and 30s adopted conditioned reflexes as a major mechanism of learning, but his physiological theories were largely ignored.

This situation was, of course, about to change. In retrospect the signs of change were pervasive. Some were geopolitical. When the Soviet Union put a satellite into space, the term, "sputnik" entered the English language, and suddenly a psychology of learning that could transform American education became a compelling national need. Outstanding physicists, biologists, and mathematicians began joint research projects with psychologists. Perhaps not accidentally, the psychologists began to consider the possibility that rats were not, after all, an adequate model for a model of learning for college students. I take it as more than accidental that the "cognitive revolution" began in Cambridge, Massachusetts, where somehow professors from different departments

at Harvard and MIT discovered their respective disciplines and ends of Massachusetts avenue.

Why is Vygotsky relevant today?

So, one of the first things we might want to think about is why you are reading the preface to a selection of essays by a Soviet (Jewish, Belorussian) psychologist who died seven decades ago after a brief career. Little of his work was published even in Russian during his lifetime, and the number of copies of those publications was very low. Although some his work was known by a few specialists in human development and abnormal psychology during his life time (thanks in part of the efforts of Alexander Luria who was a contributing editor to the *Journal of Genetic Psychology* and in part to Eugenia Hanfmann (1953), who replicated his research on concept formation and published in English, Vygotsky was not well known within his country and had nothing of the international stature of his great contemporary, Piaget, nor of Werner, Kohler, Gessel, and other “father figures” of the study human development. It is only in the past two decades that Vygotsky’s work has become influential in Russia and on the international scene where some of his work has been translated into many languages. It has been influential not only among developmental psychologists, but has become increasingly important other disciplines such as anthropology and sociology and in the application of psychology in such areas as education, human-computer interface design, and the organization of work. What can account for this “Vygotsky boom”?

The Publication of *Thought and Language*

Prior to 1962, when MIT Press published a translation of Vygotsky’s *Language and Thought*, Vygotsky was best known in the United States for a block sorting task that

resembled classification methods in use by American psychologists. The translation was blessed by two circumstances. First, the lead translator, Eugenia Hanfmann, was the daughter of a Russian emigre who had studied in Germany with Kurt Lewin, and for whom Vygotsky was more than a myth of the past. Second, Jerome Bruner, a leader in organizing the cognitive revolution in the United States wrote the preface. Bruner, in part because of a college education in which William McDougall, and Englishman who one of the giants of early American psychology played an important role, in part because he was a member of the Department of Social Relations at Harvard, which retained an historically-oriented, interdisciplinary faculty, was educated enough to respect the intellectual contributions of older psychologists from many countries as well as the potential contributions of other social sciences to psychology. Consequently he was able to draw connections between Vygotsky's ideas and those of other, previously influential scholars in a way that created an "intergenerational bridge" into the 1960's. Secondly, Bruner was himself turning to the study of role of culture in child development with a special focus on education, and hence could appreciate the importance of Vygotsky's formulation of cultural-historical psychology in a clearly understandable manner.

Despite these auspicious advantages, the publication of *Thought and Language* did not evoke massive interest in Vygotsky, although his work did begin attract more attention. There are several potential reasons for its relative lack of impact. First, potential conflict between the US and the USSR reached its zenith in that year, symbolized by the Cuban missile crisis. Displaying enthusiasm for a Soviet psychologist who declared himself a Marxist was, at the very least, to court suspicions of one's allegiances. The translators, in fact, excised a significant portion of the book, either on grounds that it was repetitious or polemical. Nonetheless, Marx, Engles, and Plekhanov

all remain in the text, even if their appearance was abbreviated. Second, the book still required reasonable familiarity with a wide range of psychologists and presumed an interest in developmental psychology, features which were unlikely to find a broad audience at the time. Nor, with the exception of the block sorting experiment, did it offer a simple experimental paradigm that could be expanded upon to encompass a major part of the field of cognitive development. Perhaps significant as well was American fascination with Piaget, who did offer easy-to-repeat cognitive tasks and who directly challenged the dominant American notion that learning is the major force in cognitive development, generating an entire industry of research designed to prove him wrong.

As fate would have it, I had only minimal familiarity with Vygotsky's work when I went to the USSR in the fall of 1962 as a post-doctoral fellow working under the direction of Alexander Luria. I did not choose to work with Luria because he was a colleague of Vygotsky's. I didn't even know he had been a colleague of Vygotsky's and would have made little of the fact had I known so. I was attracted, instead, by research that Luria had published using Pavlovian conditioning methods to the acquisition of word meaning, what was termed "semantic conditioning." I divided my year in Moscow between research on the retention or loss of semantic conditioning in patients with lesions in different parts of their brains, the study of avoidance conditioning in dogs at a laboratory in the Institute of Higher Nervous Activity, and research with E.N. Sokolov and his students on orienting reflexes and psychophysics.

While Luria would encourage me to spend time reading Vygotsky (*Thought and Language* was published in 1962 owing to his initiative), I spent very little time trying to understand Vygotsky's work. The only version of his writings I had access to was in Russian (mail traveled slowly between Cambridge and Moscow at the time) and so far as I could tell, there was little to choose between Vygotsky, with his idea that words begin to mediate thought when children acquire language and American neo-behaviorists who, starting with Margaret Kuenne in the late 1940's had made the same

argument (Kendler & Kendler, 1962; Kuenne, 1946). I was not particularly interested in child development, and did not see the general significance of such claims

Discovering Vygotsky

I have written in another context the long, slow, process through which I came to appreciate and eventually greatly admire, the work of Vygotsky and his students (Cole, 1979). And, of course, Luria was responsible for a good deal of this process, just as he played a critical role in bringing Vygotsky to the attention of world psychology.

One critical event was totally serendipitous. I was sent to Africa to worry about development and education and in a state of total ignorance about appropriate literature to consult on this topic, I contact Luria about his work in Central Asia, work he had planned with Vygotsky. In part I wanted to get a better specification of the tasks that he had used since they ought to provide a useful point of departure for my own work, whatever that might turn out to be. But I also wanted to understand what the *theoretical* relevance of that work was with respect to issues like semantic conditioning and recovery from brain injury. And why the emphasis on development?

The second crucial event was a simple extension of Luria's unflagging efforts to get more of Vygotsky's work published in English. Appreciative of the efforts he had extended on my behalf while I was a post-doctoral fellow, I agreed to help in who, intertwined publishing projects. One was the publication of two of Vygotsky's books (*The History of Higher Psychological Functions* and *Tool and Symbol in Child Development* – the latter perhaps co-authored with Luria, although I did suspect as much at the time). The other was the editing and publication of Luria's autobiography, a brief version of which I had translated for the series on the history of psychology in autobiography.

I found both projects extraordinarily difficult. I enlisted the help of my colleagues Vera John-Steiner and Sylvia Scribner, with the translation of Vygotsky, and myself

spent a lot of time making myself familiar with the sources of Luria's ideas through citations in his autobiography. It soon became clear that the two projects were related because a great number of the "old fashioned" citations I encountered in reading Vygotsky were the same citations I found in Luria. Combined with my research in Africa, which carried me into the topic of culture, cognitive development, and education, the conditions were created which allowed me to make sense of both Luria and Vygotsky.

The Vygotsky "Boom."

I received the Vygotsky manuscripts from Luria in the early 1970's. But even with the expert help of able colleagues and a good translation to work from, I could not convince the publisher with whom Luria had entered into an agreement about the publication of Vygotsky's work that the manuscripts were worth publishing. All of the problems that I had experienced earlier remained in place. The work seemed dated, the polemics either opaque or outdated, and the overall product certain to produce fiscal disaster, not to say personal embarrassment.

Faced with this seemingly unsurmountable barrier, and with help from Luria, whom I visited every year or two and corresponded with regularly, we created a selection of readings from the two manuscripts he had given me to which we added several essays that seemed of an applied nature so that it would be possible for readers to see how the abstract theoretical arguments played out in practice. The result, which was titled *Mind in Society*, was published in 1978. I heaved a great sigh of relief. I had discharged my obligation to Luria and the publisher, thanks in good measure to the hard work of my colleagues.

What happened next was totally unexpected. For reasons I have never learned, Stephen Toulmin was assigned the book to review for the *New York Review of Books*. He titled his article, "The Mozart of Psychology." In his review he argued, as Sylvia Scribner and I had in our introduction, that Vygotsky's work was of great **contemporary**

relevance, despite the fact that it had been published 40 years earlier. In effect, and in brief, the shortcomings of psychology against which Vygotsky struggled in the 1920's, in particular, the centrality of culture and history to human psychological functioning, had not been overcome by his scientific successors. Instead, his dissatisfactions with psychologists of the early 20th century applied with at least as great justification at the century's end.

We had become convinced that Vygotsky and his colleagues had, indeed, formulated a meta-psychology that encompassed the phylogeny, cultural history, ontogeny and moment to moment dynamics of human psychological functioning as a life long process of becoming. Toulmin, to our great surprise agreed.

It is now 25 years since the publication of those essays. Within a very few years, Vygotsky became a fad and as with all fads, the greater noteriety brought with it both genuine evolution and dime store knock offs. Within the former USSR, Vygotsky, who was virtually a forgotten man in 1978 except for a few of his aging followers and a handful of younger scholars, has become a cottage industry generating not only books and articles, but entire departments and institutes.

Within the United States there have now been two additional translations of *Thought and Language* and dozens of books devoted to his ideas, their origins, their virtues, their shortcomings, etc. The current book provides the reader with carefully chosen selections from his writings (a great deal of which, but not all of which, is contained in the Collected works that Robert Rieber labored so long to bring into being).

Combined with the introductory essays by various scholars who have long studied Vygotsky's work, the reader will find here a fine sampling of the domains that Vygotsky studied. The reading will not be easy. It requires patience and reflection. Speaking of my own life experience, the time required will more than recompense the reader and open vistas to thinking about human nature, any one of which can provide the material for a life's work.

Cole, M. (1970). Epilogue. In Luria, A. R. The making of mind. Cambridge, MA, Harvard University Press.

Kendler, H.H. & Kendler, T.S. (1962). Vertical and horizontal processes in problem solving. Psychological Review, 69, 1-16

Kuenne, M. (1946). Experimental investigation of the relation of language to transposition behavior in young children. Journal of Experimental Psychology, 36, 471-490.