Mary Rothbart

- Born 5/22/1940 in Lewistown, Montana
- Spouse: Myron Rothbart
- B.A. (1962) Reed College, Ph.D. (1966) Stanford University

Major Employment:

- University of Oregon – 1984-2002, Professor
- Sackler Institute of Developmental Psychobiology – 1999-Present, Senior Fellow
- University of Oregon – 2002, Distinguished Professor

Major Areas of Work:

- Temperament and Social Development
- Emotional Development
- Development of Attention

SRCD Affiliation:

- Member of the Governing Council, 1999-2005

SRCD ORAL HISTORY INTERVIEW

Mary K. Rothbart

Michael I. Posner
University of Oregon
February 27th, 2009

Posner: This is an interview with Mary K. Rothbart of the University of Oregon, and the interviewer is Michael I. Posner, also of the University of Oregon. We're coworkers and have done studies of child development together. The recording is being made on Friday, the 27th of February at 1:00 in the afternoon in the media section of the University of Oregon library.

Mary, could you describe your family background along with your early experiences and interests, including your educational, occupational characteristics of your parents?

Rothbart: Yes. My father was a high school teacher and principal in a small town in Montana when I was born and my mother was a housewife at that time. But a good deal later when I was in college she went to college also and later became a teacher and reading specialist. We made several moves during my early years. During World War II, my father joined the Civil Service and we moved to Spokane, Washington. Later he was transferred to an Air Force base at Ogden, Utah. I was the oldest of four sisters, and spent much time playing with my sister Carol who was 14 months younger than me.

Posner: Could you say a little bit about your schooling?

Rothbart: Yes. The main thing is that most of my early schooling occurred in Utah. Evolution wasn't taught in the science classes. We had no teacher of physics, so our gym teacher showed a series of films for our class. Generally I was not exposed to the social sciences or aspects of the biological sciences. That meant when I went later to Reed College it was a wonderful experience wakening to a broad range of knowledge.

Posner: I assume that a lot of your early development was tied up with Reed College, so you want to say a little bit about that?

Rothbart: Oh yes, I definitely would. It was, for me, a wonderful school. Up until the time I went to Reed my understanding of knowledge was that you assimilated it, not that you could be involved in its creation. And so I think the idea that one could think for one's self and actually do science was very exciting to me. And the intellectual atmosphere of the place was very strong. Also, there was a lot of work, which I enjoyed.

Posner: Could you say a little bit about some of the people who influenced you at Reed and in your later schooling?

Rothbart: Probably at Reed the major person was Carol Creedon, who was in the developmental area, and also Bill Weist, my thesis advisor, in social psychology. They were both strong influences. Then after I went to Stanford, my major advisor for the four years I was there was Eleanor Maccoby, ---a very strong developmental psychologist who was my major mentor in graduate school. A second strong mentor at Stanford was Robert (Bob) Sears.

Posner: Do you want to mention any significant colleagues at Reed and at Stanford who might have influenced your development?

Rothbart: At Reed I would say it was the whole program. We were given a very traditional training in the humanities and sciences that meant that I was learning from a large number of faculty who were skilled in their fields. I was able to learn how people in different areas thought about questions, how they did research, how they evaluated evidence, and that was very exciting. At Stanford, Eleanor Maccoby and Bob Sears were the two people who affected me most strongly.

Posner: Were there any political events or social events at the time you were in undergraduate or graduate school that influenced any of your later research and writings?

Rothbart: The Vietnam War was on while we were at Stanford, and we marched against the war but didn't get very politically involved. I would say that feminism influenced the fact that I taught a sex differences class at Oregon, yet over the years I became increasingly convinced that there were not so much differences between men and women as there were similarities. And so on gender I've moved from an earlier position that was difference oriented to one that is similarity oriented.

Posner: So would you characterize the development of your ideas in child development as a kind of linear increase or were there certain turning points that were important for your intellectual development?

Rothbart: Well, there was a definite turning point and it didn't occur in connection with my schooling. After obtaining my degree at Stanford, I spent three years at home with our children when they were small, and the differences between the two children were striking. And the differences didn't correspond to individual differences that I had expected to be associated with their birth order. In fact, they were counter to birth order predictions. And of course, since they were both boys, gender wasn't relevant. The most striking thing about their differences was the degree to which those differences mapped onto differences between my husband and me. This led me to start thinking about possible biologically based influences on development.

Posner: Before you got into the more temperament area did you look at some other areas in child development that kind of characterized your earliest interests in the field?

Rothbart: Well, in fact, my major interest in research at Stanford was in social development and the chief theory influencing research at that time was social learning theory. And so I was doing research on influences of birth order of the child on parent behavior and effects of gender on parent's reactions to children. Later, after moving to Oregon, I made a short shift to doing humor research with Diane Pien and with advising from Ray Hyman, From there I went on to study temperament.

Posner: I gather that the study of temperament is some of your most significant contributions and I thought maybe you might say more about how you got interested in it and what events were the most responsible for it.

Rothbart: Well, definitely what I had observed in the home was the major influence. But I was on a special research fellowship from NIMH during the first years after we had moved to Oregon and my husband, Mick, was teaching at the University of Oregon. In doing those humor studies I also observed tremendous individual differences in the emotional expression of children, which further influenced my interest in temperament. And then when I started looking at the temperament field I saw that it had been well begun by Thomas and Chess and their New York Longitudinal study but really hadn't gotten very far beyond their work, even though there was every reason to believe that this was really an important question. What are biologically based differences and how will they affect the developmental trajectories that children take as they grow up?

Posner: Could you reflect a little bit on the strengths of the work that you've done in research and your theoretical contribution?

Rothbart: The strongest theoretical contribution I think came at the very outset when Doug Derryberry and I were discussing temperament, --what it might be, --and came up with a set of two umbrella terms that might characterize the study of the field. One of these was reactivity and the other was self regulation. And these have proven over the years to be helpful for a number of people in different areas, including physiological researchers as well as behavioral researchers' work on temperament. I think another major contribution came when our own parent report and laboratory studies indicated what the general structure of temperament seemed to be. Those differences also seemed to correspond more to the emotional systems than to any kind of style differences as would have been predicted by Thomas & Chess. The third theoretical contribution came through my work with Michael Posner making links between temperamental effortful control and important individual differences in attention and in the brain networks identified as underlying executive attention.

Posner: Well, I know you've just been awarded the Distinguished Contribution Award of the Society for Research and Child Development, and the G. Stanley Hall award from the American Psychological Association, as well as from the American Psychological Foundation, so your work has had a lot of impact and current influence. Could you say a little bit about the way you've influenced various researchers with your work?

Rothbart: First of all, I think we influenced others through the conceptual view of temperament that we developed. Secondly, I was involved in developing a lot of measures for the field, because when I entered the field, we didn't have very good reliable measures to use. And so measures - both questionnaire measures and laboratory assessments of temperament were important. Beyond that, the historical period in which on works is very important in whether a particular area is recognized or not. I think the increasing interest of psychologists in psychobiology, and in the influences on development that go beyond parents, teachers and peers, have now finally given temperament, I would say, its due.

Posner: What are some of your favorite publications that you've had over the years?

Rothbart: Well, the first one would be the one with Doug Derryberry, *Advances in Child Development*. That was I think 1981. The first questionnaire paper on the infant behavior questionnaire, which came out that same year, was also an important paper, followed on individual differences in temperament for children between the ages of three and eight. I believe that the work that you, (Mike Posner) and I have done is best represented in the book *Educating the Human Brain*, published in 2007, I believe, and it is a program of research that I'm very proud of. Finally, I have now completed writing a book on temperament and personality for Seymour Weingarten at Guilford Press, and hope it will be a strong contribution.

Posner: Would you say a few words about your research funding over the years and your experience with funding agencies?

Rothbart: Well, I've had really wonderful support from NIMH, beginning with the special fellowship that I had when I came to the University of Oregon. NIMH also supported my first attempts to develop the measures for children and I remember a site visit team-- led by Joe Campos, I believe, --and they were very supportive and helpful. Later, there were short breaks in funding and those were always kind of traumatic, but all in all, NIMH has came through not only for the temperament research, but also for the research on temperament and after the work that Mike Posner and I have done. I've had only a small amount of NSF funding.

Posner: But you've also served on study sections and kind of contributed to the awards that were given out by NIH. Do you have any reflections on that experience?

Rothbart: That was an inspiring experience even though it required a lot of reading and thought. But the contributions made to the panel meetings by the fine scientists who were on the panel really impressed me. The thing that probably was the most difficult aspect of being on that panel was that we couldn't fund the truly excellent research that just happened to be a little below the funding line. That was always a big disappointment.

Posner: We're going to talk a little about the institutions in which you've worked. You referred to Reed College, where you got your undergraduate degree, and Stanford, where you got you PhD. Could you say a little about the other places that you've worked and some of your experience there?

Rothbart: While I was at home with our children my husband, Myron (Mick) Rothbart, was teaching at McGill University. I did some lecturing at that time, but was not actively involved in that institution. So after Mick had moved to the University of Oregon, I first started working as an adjunct faculty member in psychology and then, as I said, I had the special fellowship that helped support a line of research. That research was on humor, and much of it done with Diane Pien, another faculty member at Oregon.

Shortly after the special fellowship was over--this was about 1973--I wrote a letter to our department in which I pointed out that there were women teaching at lower pay in the department in adjunct positions and asked if the department would reconsider its position on this situation. And indeed, my colleagues did reconsider the situation and hired me as a regular faculty member, also Beverly Fagot and one other woman in the department. Initially I worked at half time; this was increased to full time, probably a couple of years afterwards. And I've been at Oregon ever since. The College of Arts and Sciences gave me a Distinguished Professorship, which I was especially proud of it because of the kind of checkered path I had followed. To have the College gave me the award was very important to me, and I appreciated it a lot.

Posner: Well, this naturally leads into your experience as a teacher and as a trainer of researchers at the doctoral masters and doctoral level. I thought you might be able to describe a little bit about the courses you've taught and your feelings about them and then some of your experience with graduate students.

Rothbart: Probably my favorite course to teach was Social Development, and I always had the students do a fair amount of writing in connection with that course. This was probably because my own training in college included a lot of attempts to write something and then to rewrite it and again to rewrite it. I also taught introductory child development and a course in research methods in psychology, which I really enjoyed. It was a lot of work, but I liked having the chance to organize it around the activities that go into the writing of a scientific paper and taking the students one step at a time through a research project. Over the years I've worked with wonderful graduate students who along with the post docs who have come to Oregon have been, in a number of cases, tremendous colleagues. Again, I would mention Doug Derryberry, Lesa Ellis and Jennifer Simonds and, later, post docs like Stephan Ahadi, Sam Putnam and Maria Gartstein, and many fine graduate students, too many to mention.

Posner: So I know you've been interested in the applications of child development in the real world and have had a lot of influence on that. And I thought you might be able to tell us a little bit about your experiences there, particularly with Birth to Three.

Rothbart: The founding of the organization Birth to Three, which is a parent support organization based in Eugene, but now worldwide in its effects, originally stemmed from the fact that two of the research associates on one of my longitudinal studies and a mother of one of the children in our studies got together and were talking about the isolation that new parents often face when they are bringing home a new baby. Their proposal for Birth to Three received funding and has been an important force for about 30 years now. The most recent thing I've done in connection with Birth to Three was seeking funding for publishing the curriculum of the program, and then working on the writing up of that curriculum--oh, and they gave me an award called Champion for Children, which I appreciate very much.

Posner: We've got to talk a little about your experience with SRCD, when you joined, and what were your earliest contacts in the meeting and your experiences at the biannual meetings.

Rothbart: I believe I joined in the late 1970s, and I do remember the first meeting I attended. It was in 1977 at New Orleans, and this was where I was first describing some of the research that we had done on developing a parent report measure for temperament. And it was a very exciting experience and allowed me to see researchers in action as they confronted one another and reacted to the materials I was presenting.

Posner: Would you have comments about some of the later meetings you went to?

Rothbart: I attended many meetings of SRCD. It's always been a wonderful venue for presenting ideas to other researchers, and for meeting people in the field. I've had a lot of contacts internationally that have come about both through my research and through SRCD.

Posner: And you participated some in the governance of SRCD. Could you say a few words about your experiences there?

Rothbart: I have. I was on the governing council between 1999 and I believe until 2005, and again, some very dedicated members of the field who serve on the governing council. We were looking toward the development of a strategic plan for SRCD. I was on the international affairs committee, trying very hard to make sure that the organization had increasing associations with our outstanding membership abroad.

Posner: What do you think are some of the important changes that have taken place in SRCD over the years?

Rothbart: I think this attempt at strategic planning is important, although I'm not sure what the long-range effects of it are going to be. One of the things I have noticed over the years has been the increase in SRCD publications and the new website geared to public policy, including public policy briefs. I think these have been very important changes.

Posner: I wonder if you would like to say some things about the field of child development in general and how it's changed during the time that you've been in it and what some of the twists and turns of the field are, and particularly in relation to your interests?

Rothbart: Twists and turns, and ups and downs-- as I said, when I was at Stanford social learning theories did hold sway, with the idea that any individual differences we observed were the likely result of parent treatment. But at about my last year in graduate school, Piaget, as presented by John Flavell in his important book, was just then being read and beginning to influence the field through the study of cognitive development. And I would say that in the years since Stanford the influence of social development has waned. The influence of cognitive development has been strengthened, and social development in its broad and important sense, which includes both biologically based differences and the way in which they, through experience, shape the person, has been in a decline. Right now in psychology departments there's also a strong emphasis on cognitive neuroscience and neuro imaging with a continuing strength in the area of cognitive development. The number of faculty members and departments in social development has meanwhile been declining. I believe social development is a powerfully integrative approach to understanding development, providing parents and teachers with the kind of information they need to bring

up children who will be strong and healthy contributors to society. And so I'm hoping that we will in the future be gaining a stronger foothold in the field than we have had.

Posner: We've already started to talk a little bit about your hopes for the future and wanted to know if you'd like to amplify some of your other feelings of hopes for the field over the next 20 years or so?

Rothbart: Although I do often criticize what I've seen as the stranglehold of cognitive neuroscience on the field, neuroscience really is presenting so many possibilities for our understanding of the underpinnings of development. I believe that this work will continue in the future and my hope is that this kind of information can also be linked to the very important behavior of children in their usual settings, which is what we originally wished to understand.

Posner: Well, we want to know a little bit about your interests outside the intellectual fields that you've worked in and a little bit about your family and some of your other interests outside of psychological work.

Rothbart: Well, psychology has definitely been the major story of what I've done. The effects, as I've mentioned, of my children on how I've thought about developmental psychology have been very, very important and I'm very proud of our two sons, one of whom is a sculptor and a media specialist and the other is a mathematician and computer scientist. Both are sources of great pleasure to me. As to additional interests over the years, I've done a fair amount of gardening, and from time to time am a voracious reader. I've enjoyed the out of doors and the Oregon coast, two of the wonderful opportunities for living in this part of the United States.

Posner: Well, thank you very much, Mary.

End of Interview