

Shay Bilchik, Administrator February 1999 #94

Costs and Benefits of Early Childhood Intervention

by Peter W. Greenwood, Ph.D.

In recent years, there has been renewed interest in the influence of early childhood—particularly, the first 3 years of life—on health and development, educational attainment, and economic well-being. Contributing to this interest are research findings indicating that most physical development in the brain occurs by age 3. A recent RAND report, *Investing in Our Children:* What We Know and Don't Know About the Costs and Benefits of Early Childhood Interventions, assembles available evidence on two questions of interest to policymakers, who must allocate resources, and to taxpayers, who provide those resources:

- ◆ Do early interventions targeted at disadvantaged children benefit participating children and their families? After critically reviewing the literature and discounting claims that are not rigorously demonstrated, the report concludes that these programs can provide significant benefits.
- ◆ Might government funds invested early in the lives of children yield compensating decreases in government expenditures? The report examines the possibility that early interventions may save some children and their parents from incurring State expenditures through criminal justice, welfare, and other costs. Updating and refining earlier estimates, the report concludes that, at least for some disadvantaged children and their families, decreased government expenditures might result from early childhood intervention.

The report uses words like "can" and "might" deliberately and does not generalize its conclusions to all types of targeted early interventions—in particular, large-scale programs. It notes limitations in the evidence collected to date that suggest that enhanced evaluations of intervention efforts would be of value to future decisionmaking.

Benefits

The report supports the conclusion that, in some situations, carefully targeted early childhood interventions can yield measurable benefits and that some of those benefits endure for some time after the program has ended.

The report bases this conclusion on a review of nine programs on which evaluations were performed that assessed developmental indicators, educational achievement, economic well-being, and health for program participants and compared the results with a matched control group. In most programs, children in the control group were randomly assigned at program onset. The report includes programs with participant and control groups large enough at program implementation and followup to ensure unbiased results, although resource limitations did not always permit this. This Fact Sheet presents general results from the report and highlights specific outcomes from five of the nine programs.

The programs led to the following advantages for program participants relative to those in the control group:

- Increased emotional or cognitive development for the child, typically in the short run, or improved parent-child relationships.
- ◆ Improved educational processes and outcomes for the child.
- ◆ Enhanced economic self-sufficiency, initially for the parent and later for the child, through increased participation in the labor force, decreased participation in welfare, and higher incomes.
- Decreased criminal activity.
- ◆ Improved health-related indicators such as child abuse, maternal reproductive health, and substance abuse.

The Early Training Project, Perry Preschool, and the Infant Health and Development Project found IQ differences between program participants and control group members that approached or exceeded 10 points at the end of the program. The difference in rates of special education and grade retention at age 15 in Abecedarian project participants exceeded 20 percent. Participants in the Elmira, NY, Prenatal/Early Infancy Project (PEIP) experienced 33 percent fewer emergency room visits through age 4 than children in the control group, and their mothers were on welfare 33 percent less of the time. In the Perry Preschool

program, earnings at age 27 were 60 percent higher among program participants. The report concludes that there is strong evidence to support the proposition that at least some early interventions can benefit participating children and their mothers.

Savings

Are the benefits of targeted early intervention programs sufficient to justify their costs? For the Perry Preschool and the higher-risk families of the Elmira PEIP, best estimates of the savings accrued to government exceed the costs—\$25,000 versus \$12,000 for each family participating in the Perry program; \$24,000 versus \$6,000 for each higher-risk family participating in the Elmira program.

On the basis of research to date, some targeted early intervention programs have substantial favorable effects on child health and development, educational achievement, and economic well-being. When targeted to families who will benefit most, some of these programs have generated savings to the government that exceed program costs.

More To Learn

There is still much that we do not know about these programs—for example, why some programs work and others do not. The report concludes that we need to learn the following:

- ◆ Whether there are optimal program designs.
- How early interventions can best target those who would benefit most.
- Whether the model programs evaluated to date would generate the same benefits and savings if implemented on a larger scale.
- ◆ What the nature of the full range of benefits is.
- ◆ What the implications of the changing social safety net are.

For Further Information

To order a copy of *Investing in Our Children: What We Know and Don't Know About the Costs and Benefits of Early Childhood Interventions*, contact RAND Distribution Services, P.O. Box 2138, Santa Monica, CA 90407–2138; 310–451–7002 (telephone); 310–451–6915 (fax); order@rand.org (e-mail).

Peter W. Greenwood, Director, Criminal Justice Program, RAND, is a coauthor of the report described in this Fact Sheet.

The Office of Juvenile Justice and Delinquency Prevention is a component of the Office of Justice Programs, which also includes the Bureau of Justice Assistance, the Bureau of Justice Statistics, the National Institute of Justice, and the Office for Victims of Crime.

FS-9994

Fact Sheet



Official Business Penalty for Private Use \$300

Washington, DC 20531

PRESORTED STANDARD POSTAGE & FEES PAID DOJ/OJJDP PERMIT NO. G-91

Office of Justice Programs

Office of Juvenile Justice and Delinquency Prevention