#### DOCUMENT RESUME

ED 417 520 EC 306 262

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TITLE The Center for Arts and Sciences, Tulsa, Oklahoma. Final

Performance Report for Javits Grant.

INSTITUTION Tulsa Univ., OK. School for Gifted Children.

SPONS AGENCY Office of Educational Research and Improvement (ED),

Washington, DC.

PUB DATE 1996-05-31

NOTE 13p.

CONTRACT R206A20308-94

PUB TYPE Reports - Descriptive (141) EDRS PRICE MF01/PC01 Plus Postage.

DESCRIPTORS Ability Identification; \*Art Education; Creativity;

Disadvantaged Youth; Drama; Early Childhood Education; \*Early Intervention; Economically Disadvantaged; \*Gifted;

\*Inservice Teacher Education; \*Institutes (Training

Programs); Minority Group Children; Postsecondary Education;

Rural Areas; Summer Programs; \*Talent; Workshops

#### ABSTRACT

This final report describes activities and accomplishments of the Center for Arts and Sciences in Tulsa, Oklahoma, a program designed to bring early intervention services to young, rural, economically disadvantaged, and/or minority gifted students through a series of year-long teacher training events that also included involvement with parents, administrators, and students of teachers in the program. Major activities included: (1) a summer workshop for teachers; (2) a summer practicum for teachers and students; (3) fall convention for teachers, parents, and administrators; (4) the winter drama festival, which included teachers, students, administrators, and parents; and (5) the spring creative producers' convention, which included teachers, students, administrators, and parents. In addition, teachers had several months of independent study prior to the summer workshop and practicum. Following the summer workshop, teachers implemented the active interdisciplinary curriculum in their classrooms, which resulted in original student plays and other products that were performed or exhibited at the arts festivals. Project dissemination activities included 180 inservice presentations in Oklahoma, 8 presentations at international and national conventions, 8 presentations at state conventions, and 3 at summer institutes. (DB)



# FINAL PERFORMANCE REPORT FOR JAVITS GRANT for the CENTER FOR ARTS AND SCIENCES Tulsa, Oklahoma

#### PART I. COVER SHEET

1. Recipient:

University of Tulsa School for Gifted Children 600 South College Tulsa, OK 74104

- 2. PR/Award Number: R206A20308-94
- 3. Project Title:
  The Center for Arts & Sciences
- 4. Contact Person:
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- 6. Project Period: 10/01/92 05/31/96
- 7. Funding for Total Project Period: \$611,379

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## FINAL PERFORMANCE REPORT FOR JAVITS GRANT THE CENTER FOR ARTS AND SCIENCES

#### PART II. PROJECT SUMMARY

The purpose of The Center for Arts and Sciences was to bring early intervention services to young, rural, economically disadvantaged, and/or minority gifted students through a series of year-long, teacher training events. This program also provided year-long involvement with parents, administrators, and students of the teachers in the program. Major events were:

The Summer Workshop for Teachers	60 teachers
The Summer Practicum for Teachers & Students	60 teachers, 300 students
Fall Convention for Parents & Teachers of G/T	60 teachers, 300 parents,
	60 administrators
The Winter Drama Festival	60 teachers, 1000 students,
	60 administrators, 300 parents
The Spring Creative Producers' Convention	60 teachers, 1000 students
	60 administrators, 300 parents

Additionally, teachers had several months of independent study prior to the summer workshop and practicum. In the fall, following the summer workshop, teachers implemented the active interdisciplinary curriculum in their classrooms, which resulted in students writing original plays and creating original products. The plays were performed at the Winter Drama Festival and the products were exhibited at the Spring Creative Producers' Convention.

There was broad dissemination of the project through workshops, conventions, inservice presentations, and the interdisciplinary curriculum books and video tapes.

PRESENTATIONS	Approximate #
180 In-service presentations in Oklahoma	3000
8 Presentations at international and	
national conventions	500
8 Presentations at state conventions	500
3 Summer institutes	300

#### INTERDISCIPLINARY CURRICULUM MATERIALS

IIII	INTERESTS OF THE COUNTY OF THE		
<b>Books-</b>	Awesome Architecture: Patterns in the Built Environment		
	Mother Nature: Through the Eyes of Artists & Scientists		
	Father Time: Inventions & Discoveries Through the Ages		
Videos-	The Four Seasons of the Center for Arts & Sciences		
	Time Travels		
	Word Works		



# PART III. PROJECT ACCOMPLISHMENTS OBJECTIVE 1. PROVIDE EARLY G/T SERVICES THROUGH TEACHER TRAINING

The first objective of the Center for Arts and Sciences was to provide early intervention services to young, rural, economically disadvantaged, and/or minority gifted students. For each of three years, twenty elementary school teachers of young, rural, economically disadvantaged, minority students were selected as Teachers-in-Training at the Center for Arts and Sciences. Teachers involved in our program also had previous training in the use of handson science through a National Science Foundation grant. Each spring pre-workshop evaluation forms, and assignments were sent to the teachers selected for the summer program. This material prepared the teachers for the Summer Practicum and Workshops, which took place during the summer of 1993, 1994, and 1995.

Demographic information of the teachers that were selected, the city where the school was located, grade levels taught, and the approximate percentages of students in their schools in the target populations. Each year had similar demographics.

**DEMOGRAPHICS ON TEACHERS IN TRAINING IN 1993-94** 

City		Grade Approximate % of children in each school in these categories			
		Level	%rural	%ec. disadv.	%minority
<del>1.</del>	Okay	5	2	54	36
	•				6
2.	Sand Spr.	1-3	100	67	
3.	Mounds	3	100	25	43
4.	Owasso	1-5	40	25	12
5.	Beggs	4-5	70	70	20
6.	Beggs	3	70	70	20
7.	Avant	5	100	65	67
8.	Leonard	1-6	100	40	5
9.	Sapulpa	4-5	8	49	23
10.	Bristow	3	50	50	10
11.	Sapulpa	6	100	25	13
12.	Checotah	5	98	75	40
13.	Sand Spr.	1-6	2	24	15
14.	Owasso	K-5	95	5	7
15.	Tulsa	4	0	75	98
16.	Bartlesville	3	40	24	20
17.	Tulsa	2	0	75	98
18.	Broken Arrow	4	17	4	10
19.	Bethany	6	0	31	11
	Tulsa	3	0	55	12



Of the 20 schools, there were 16 schools with African American minorities, 17 schools with American Indian minorities, 11 schools with Hispanic minorities, and 3 schools with Asian minorities. All of the schools had some students who were economically disadvantaged and 16 of the schools had rural students.

Evaluation forms to ascertain pre-workshop and post-workshop knowledge and expertise in interdisciplinary active learning were analyzed. The results were quite positive. Copies of evaluations for all three years of the program are in Part IV. Supplemental Information.

Teachers from the workshops were in continual communication with us regarding their classroom use of the methods and strategies learned in the Summer Workshops. The teachers all began the school year by providing three active, interdisciplinary inservice workshops in their districts. All during the year teachers implemented these methods in their classrooms. They guided students in creating original plays which were presented at The Winter Drama Festival. They guided students in the development of creative products which they brought to The Spring Creative Producers' Convention. Newspaper accounts of how active learning was incorporated in classrooms is included in the Supplemental Information section.

#### **OBJECTIVE 2. PROVIDE PARENT & ADMINISTRATOR SUPPORT**

Each of the teachers in the program was required to have letters of recommendation and support from at least one administrator and five parents. The letters pledged parents and administrators to attend three long-established events held at the University of Tulsa, The Fall Convention for Parents and Teachers of the Gifted, The Winter Drama Festival, and The Spring Creative Producers' Convention. Additionally, each administrator had to state that \$500 would be made available to implement the interdisciplinary curriculum. If such funds were not available, a letter from the district had to state that no funds were available.

Now in its 12th year, The Fall Convention for Parents and Teachers of the Gifted is annually attended by people from all around the state and region. Outstanding speakers addressed the needs and problems of bright children, their parents, and their teachers.

The Winter Drama Festival is annually attended by over 1,000 students, teachers, parents, and administrators. Each year students write and produce original historic plays and perform them at The University of Tulsa. Parents and administrators attend the event with the teachers and their students. All of the plays were based on research done in areas of interest to the students, titles range from "Black History" to "Immigrants Coming to America."

The annual Spring Creative Producers' Convention, now in its 11th year, is an opportunity for students and adults to exhibit their own original products. Teachers help students learn the steps in first-hand research and product development. The process culminates with a trip to The University of Tulsa where these creative products are exhibited, and in some instances, sold. Parents and administrators attend with teachers as a way to show support and involvment in the creative life of their students.



Parents and administrators were very faithful in fulfilling their obligations to support teachers by helping the classroom teachers and attending the functions at the university. Information gained through a follow-up evaluation revealed the following:

- -Ninety percent of the teachers reported that their parents and administrators were "very supportive" or "supportive."
- -One teacher wrote that her parents and administrator were "very supportive. They feel this has helped the children to be more creative...."
- -Another wrote about his fellow teachers and administrators, "They enjoy hearing and seeing their children being excited about school...."
- -A teacher wrote in connection with her parents, "I feel this has helped me to develop better relationships with the parents that have been involved."
- -Another teacher wrote that her parents had learned a lot at the Convention for Parents and Teachers of the Gifted.

#### OBJECTIVE 3. DEVELOP AN INTERDISCIPLINARY CURRICULUM

During the three years of funding, the teaching and consulting staff of the Center for Arts and Sciences developed, field tested, and disseminated active interdisciplinary curriculum materials. The first year's curriculum was "Awesome Architecture: Discovering Patterns in the Built Environment." The active interdisciplinary curriculum developed in the second year was entitled "Mother Nature: Looking at Nature through the Eyes of Artists and Scientists." The third year's curriculum was "Father Time: Inventions and Discoveries in Art and Science Throughout the Ages." All three of these are included with this report. Additionally three videos were produced based on these materials. These are "The Four Seasons of The Center for Arts & Sciences," "Time Travels," and "Word Works."

These active interdisciplinary materials can be used by a whole school or a whole classroom. The methods are open-ended and inclusionary with challenging and interesting activities for gifted students as well as all children in the regular classroom. This curriculum looks at the ways art and science have paralleled one another throughout the ages. Writing, drawing, hands-on science, storytelling, and drama were all incorporated. The topics were selected as ones that encompasses both the arts and the sciences and the concepts addressed were ones that are important for anyone to know. The curriculum was developed and field tested at University School specifically for the Center for Arts and Sciences Summer Workshops.

In developing the curriculum, Roger Taylor's interdisciplinary cube was modified to visually represent the way that concepts, processes, and content were woven together to create a unified integrated whole. One side of the cube shows the interdisciplinary subjects involved, the other side shows the content and concepts taught, and the third side shows the processes and/or the tools used.



#### -INTERDISCIPLINARY

#### PROCESSES INVOLVED ART & SCIENCE

1. Writing, history, music, art

1. Active Learning

1. Importance of observation

2. Drama, storytelling, movement 2. Schoolwide Enrichment 2. Classification in A & S

3. Projects, science, art

3. Talents Unlimited

3. Patterns in A & S

4. Research, history, art

4. Technology

The curriculum was developed as an integrated, interdisciplinary one because of the growing evidence in education that this approach produces greater and more meaningful learning. This approach was based in part on Heidi Jacobs' book, Interdisciplinary Curriculum: Design and Implementation, and in part on the Herman and Hollingsworth book Kinetic Kaleidoscope.

#### **OBJECTIVE 4. PROVIDE COMPETENT LEADERSHIP & PROGRAMS**

Movement and storytelling consultant, Dr. Gail Herman, artist and art historian, Ms. Olivia Marino, and Project Director Dr. Pat Hollingsworth led in the training of teachers during the Summer Teacher Workshop. All of the consultants and staff teachers were involved in curriculum development and field testing. The training of teachers and the development of new curriculum was a long and creative process to which each staff member wholeheartedly contributed.

Dr. Hollingsworth and Dr. Robert Block, University of Oklahoma Tulsa Medical College, coordinated and planned the fall Convention for Parents and Teachers of the Gifted, as they have done since 1986.

Dr. Kelble and Dr. Howard, Project Directors for the National Science Foundation grant for hands-on science, were involved in the selection of the teachers for the Center for Arts and Sciences. Dr. Hollingsworth consulted with the NSF Project Directors regarding teachers who wished to have more than one year of training at the Center for Arts and Sciences. They concur that teachers should be allowed to return for additional training at the Center for Arts and Sciences.

Dr. Dale Johnson led the evaluation work done for the three years of The Center for Arts and Sciences. He was helped by a variety of people including Susan Smith, Dr. Jean Ann Foley, and Elizabeth Giddens. All aspects of the program, including the competence of the leadership, were highly rated each of the three years of operation. Both quantitative and qualitative data were gathered and are included with this report.

From Dr. Johnson's & Dr. Foley's evaluations:

- -100% of the teachers strongly agreed with the statement, "The lessons evidenced adequate preparation and planning on the part of the instructors."
- -80% strongly agreed and 20% agreed that "Generally, instructional staff evidenced sufficient knowledge os what was being taught."
- -"The participants praised the workshop leaders as very well organized and knowledgeable."



#### **OBJECTIVE 5. PROVIDE AN EFFECTIVE PRACTICUM**

There were two aspects of the Summer Workshop & Practicum. Part of the day was for observing and working with students and part of the day was devoted entirely to teacher training. Concepts and ideas were introduced and discussed with the adults and then observed in the practicum classes with students.

The curriculum developed by the center staff was used with students during the summer practicum. Scholarships were given each year to rural, minority, and economically disadvantaged students in grades K-6. The purpose of these scholarships was to encourage expanded and alternative gifted assessment of minority, rural, and/or economically disadvantaged students. In an effort to find untapped potential, students may qualify for the program through gifted behaviors rather than gifted test taking. Students, parents, and teachers were encouraged to nominate candidates based on examples of the student's work in creative endeavors, leadership, and artistic talents.

For the practicum, students were divided into older and younger elementary students. The younger group was called Jigsaw and the older group called Mosaic. Each group contained approximately 50 students. Both Jigsaw and Mosaic were divided into four groups of 12 or 13 students who rotated through four classes: research, writing, drama, and projects.

Each day students met for a short time as a large group in order to introduce or enlarge upon the concepts of the day. Speakers, dressed in costumes representing the time period, introduce the concept of the day using posters, slides, overhead transparencies, or other engaging visuals. This was done in a lively engaging way that actively involves students. Special guest speakers with particular expertise were invited to participate.

Following the opening session, students attended four classes that focused upon extending and refining the introductory concepts - 1. Writing, 2. Drama and Storytelling, 3. Hands-on Research: History, Social Studies, Science, Computers, and 4. Projects: Science, Art, Music, all focus on the introductory concepts. The arts were integral to all classes. Each class used aspects of the arts, such as the visual arts, movement, construction, music, drama, or storytelling.

**Processes Involved.** There were a variety of important processes that were taught and used in the practicum and workshop. They included:

-The Schoolwide Enrichment Model. The work of Joseph Renzulli and Sally Reis, in particular, The Schoolwide Enrichment Model, structures the curriculum so that it provides experiences particularly suited for developing gifted behaviors. The unit provides what Renzulli calls Type I and Type II activities. Type I activities were those that encourage exploration into subjects often not addressed in the regular curriculum, for example, the history of architecture. Type II activities are learning-how-to-learn skills, such as writing, notetaking, computer usage, and interview skills to name a few. The purpose of both Type I and Type II activities was to encourage students to want and to be able to do in-depth research into a real



problem of interest to them. These are called Type IIIs. Involvement in Type I and Type II activities often lead students into doing Type III projects.

-Talents Unlimited Model. Talents Unlimited, which was developed by Carol Schlichter based on the theoretical model of Calvin Taylor. The Talents Unlimited Model can be considered a Type II program because it teaches learning-how-to-learn skills. Students learn Productive Thinking, Planning, Communication Skills, Decision Making, and Forecasting in the context of academic learning. There are specific steps to follow in each of the Talents. Research has shown that consistent use of Talents over time produces not only increases in specific talents but also in standardized test scores.

-Active Learning. The framework for active learning was based in part on Robert Marzano's book A Different Kind of Classroom and in part on the arts, which included drama, storytelling, movement, music, art criticism, and art production. Students were involved in activities that engage them mentally, emotionally, creatively, and physically. In other words, body and mind are actively engaged in the learning process.

-Technology. Students and teachers used computers, videos, camcorders as part of the learning experience. Students also had access to computers for word processing, to obtain information from Prodigy or from the CD ROM, or to play a variety of games related to the current topic. The computers were an important and necessary part of the Interest Development Centers and hands-on learning. Because of the way computers engage students, they were seen as an aspect of active learning.

#### **WORKSHOP EFFECTIVENESS**

From Dr. Johnson's evaluation, 80% of teachers strongly agreed and 20% agreed with the following statement: "Working with and observing children in an actual teaching situation was a beneficial instructional strategy for the workshop."

From evaluator, Dr. Jean Ann Foley, "The Teacher's In Training (TNT) workshop accomplished its major objective: to train teachers of young, minority, and economically disadvantaged gifted students to use an interdisciplinary approach to teaching that emphasizes the connection between arts and sciences." Also from Dr. Foley, "The written materials and the interview with Dr. Hollingsworth reflected a well organized and well thought out program. There was a solid rationale for each component of the workshop core. The method of communication with the teachers, receive feedback, and validate the teacher importance."

Below are typical findings from Dr. Dale Johnson, the lead evaluator:

- -73.3% of the respondents "strongly agreed" and 26.7% "agreed" they had enhanced ability to use an interdisciplinary approach to teaching.
- -93.3% of the respondents "strongly agreed" or "agreed" that the handout materials were helpful in furthering their understanding of the topics presented.
- -100% of the respondents "strongly agreed" that lessons evidenced preparation and planning by instructors.



- -73.3% strongly agreed and 26.7 agreed with the statement, "I am satisfied with the over-all quality of the instruction in the workshop. The full evaluation is included in the appendix.
- -On a ten point scale, with 10 being excellent, the average was 9.4 for the quality of the workshop.
- -On a ten point scale, with 10 being yes, the average was 9.8 for recommending the workshop to colleagues.

#### TEACHER QUOTES 6 MONTHS AFTER SUMMER WORKSHOP

-Six months after her summer training, a teacher wrote, "In using the new approaches in interdisciplinary curriculum that I received this summer, I have noticed an excitement from my students about the subjects that we are covering. I have also noticed an increase in my students confidence in approaching writing, research, drama, and art."

-Another teacher wrote, "I believe the active interdisciplinary curriculum that we studied last summer turned some of my reluctant students on to school and gave them a curiosity to go beyond what we learned in the classroom." Her class was featured in color in <a href="The Tulsa">The Tulsa</a> World.

-One teacher wrote that through the plays her students were "able to tell the story of African-American history without anger or shame. (They) worked together in a way I only dreamed possible."

#### IDENTIFICATION OF PREVIOUSLY UNIDENTIFIED GIFTS & TALENTS

Following the summer training program, teachers were asked if they now noticed more students with gifts and talented than they had previously. The following are gifts and talents identified in previously unidentified students:

- -ability to be expressive
- -creativity in writing
- -creativity in drama
- -creativity in movement
- -creativity in art
- -ability to memorize
- -perseverance in tasks
- -appreciation of beauty
- -creative thinking
- -talent in visual & performing art
- -research abilities in young children

Teachers from the 1993 Summer Workshop identified 166 students as possessing gifts and talents they previously had not noticed. These gifts and talents were identified in the following populations: 70 rural students, 30 economically disadvantaged students, 35 American Indian students, 16 African American students, 11 Hispanic students, and 4 Asian students.



#### IV. SUPPLEMENTAL INFORMATION - DISSEMINATION

#### A. Presentations

- -Storrs, CT Summers of 1993, 1994, 1995. Dr. Gail Herman shared information about the activities of the grant at Confratute at the University of Connecticut.
- -Toronto, Canada 1993. Three of the Center for Arts and Sciences consultants, Dr. Pat Hollingsworth, Dr. Gail Herman, and Stephen Hollingsworth, presented at the World Conference for Gifted Children held in Toronto in August of 1993. The topic was active learning aspects of The Center for Arts and Sciences and included activities from the "Awesome Architecture" curriculum.
- -Atlanta, GA 1993. Five of the teachers and consultants, Dr. Pat Hollingsworth, Dr. Gail Herman, Debi Foster, Olivia Marino, and Kim Harper, presented at the National Association for Gifted Children. There were three different presentation for a total of seven hours of information about the Javits funded Center for Arts and Sciences. The presentations went into the theoretical rational for the active interdisciplinary curriculum as well as demonstrating actual classroom practices.
- -Washington, D.C. 1993. In December, 1993, two teachers and the principal investigator, Alicia Parent, Keith Gaddy, and Dr. Pat Hollingsworth, presented at the Javits meeting in Washington, D.C. The presentation was attended by Dr. Gilbert Clark and Dr. Enid Zimmerman, leaders in both art and gifted education.
- -Washington, D.C. 1994. In December, 1994, Pat Hollingsworth presented an overview of the Awesome Architecture and the Mother Nature Curriculum to the annual Javits meeting in Washington, D.C.
- -Oklahoma City, OK 1994. Three teachers, Katie Abercrombie, Debi Foster, Alicia Parent, and the project director, Dr. Pat Hollingsworth presented at the Oklahoma Association for Gifted Children in February 1994. The presentation demonstrated the way the active interdisciplinary curriculum could be used with students from elementary through high school ages.
- -Lafayette, IN 1993. Dr. Hollingsworth, project director, gave the keynote address and conducted workshops at the Gifted/Talented Education Conference entitled "Challenging Artistically Gifted/Talented Students" in Lafayette, Indiana in March 1994. Dr. Gilbert Clark and Dr. Enid Zimmerman invited Dr. Hollingsworth to be the keynote speaker after seeing her presentation at the Javits meeting in Washington, D.C. in December 1993.
- -Baltimore, MD 1994. Dr. Gail Herman presented activities concerned with the grant at the National Art Education Association Convention in April 1994.
- -Frostburg, MD 1994. Dr. Herman presented "Awesome Architecture" at the Children's Literature Conference also in April 1994.
- -Lawrence, KS 1994. Dr. Hollingsworth presented a paper at the Ester Katz Rosen Symposium in Lawrence, Kansas in the fall of 1994 on the effectiveness of the interdisciplinary active learning curriculum developed for the Javits grant.



-Salt Lake City, UT 1994. Pat Hollingsworth, Debi Foster, Alicia Parent, and Keith Gaddy presented the Mother Nature curriculum at the National Association for Gifted Children. Pat Hollingsworth and Gail Herman presented the theory and background of the development of these materials also at NAGC in Salt Lake.

-Sand Springs, OK 1995. Dr. Hollingsworth and Kim Harper presented an overview of Awesome Architecture and Mother Nature for the Sand Springs Staff Development day.

-Tulsa, OK 1995. A group of teachers from the Center for Arts and Sciences presented Mother Nature for the Oklahoma Association for Gifted, Creative, and Talented.

-Tampa, FL 1995. Presentation of Father Time at National Association for Gifted Children by University School staff and consultant Gail Herman.

-Sand Springs, OK 1996. Dr. Hollingsworth and University School staff presented active learning concepts at Sand Springs Staff Development.

-Oklahoma City, OK 1996. University School staff & Dr. Hollingsworth presented active learning activities from the book Father Time.

-Indianapolis, IN 1996. Dr. Gail Herman and Dr. Pat Hollingsworth will present active learning concepts at the National Association for Gifted Children this fall.

#### B. Other Types of Dissemination

#### -State Teachers' Conventions 1993

Through the coordination of our National Science Foundation consultant, Dr. Eileen Kelble, and University of Tulsa art professor, Virgil Lampton, both the Oklahoma Science Teachers and the Oklahoma Art Education Association met together using the Center of Arts and Sciences as a convention focal point. This was somewhat of a first in our region, having two such diverse groups meet to look at ways to integrate science and art in the curriculum. An exhibit of the children's art work put together by staff of the Center for Arts and Sciences showed ways that art and science can be integrated.

#### -Videos

A videotape, The Four Seasons of the Center for Arts and Sciences, was distributed to teachers involved in our program. It is a ten minute tape, set to the music of Vivaldi, that vividly shows what an active interdisciplinary curriculum looks like and explains why it is important. The video has been shown to appreciative audiences in Washington, D.C., Tulsa, Sand Springs, Oklahoma City, and Lafayette, Indiana. Two additional videos were created to accompany the three books created for this grant. The videos were "Time Travels," which shows how the art work was used, and "Work Works," which shows how the writing was done.

#### -Brochure

A brochure also entitled, The Four Seasons of the Center for Arts and Sciences, was widely distributed at conferences and through the mail. Copies were distributed at the Conference for the Artistically Talented in Lafayette, Indiana and at the Oklahoma Association for Gifted, Creative, and Talented in Oklahoma City.



#### -Inservice Training

Approximately 3,000 persons received inservice training through a series of three workshops conducted by the 60 teachers from our summer programs. Each teacher presented three active interdisciplinary workshops in local school districts.

#### -Newspapers

There were many articles about the work teachers in the grant have done, copies of which are in Part IV. Supplemental Information. Our state gifted organization, Oklahoma Association for Gifted, Creative, and Talented had articles in their newsletters. Dr. Kelble and Dr. Howard had an article in their NSF newsletter and announced the summer scholarships to their teachers involved in their grant.

#### -Scholarships

Over 200 summer scholarships for rural, economically disadvantaged, and minority gifted students were given to attend Awesome Architecture, Mother Nature, and Father Time.

#### -Network News Ouarterly

The Network News Quarterly has included articles about the workings of the Center. The NNQ is received by persons all over the United States. The NNQ has featured the teachers selected for the Center, information about the summer practicum and the other elements of the program. About 12,000 copies of the NNQ were distributed during the three years of the grant.

#### -NAGC Division Newsletter

The National Association for Gifted Children Special Schools Division newsletter, Alliance, carried an article about the Center for Arts and Sciences in its spring issue. It gave an overview of the goals and purposes of the Center, as well as an article about the National Science Foundation Summer Institute with whom the Center coordinates.

#### -Letters

Letter of congratulations were sent to the teachers selected for the Center. Congratulation letters were sent to each teacher's administrator, as well as to each teacher's local newspaper. Letters from parents, teachers, and administrators who enjoyed the programs offered by the center were frequent.

#### -Radio Interviews

Project Director, Pat Hollingsworth, was interviewed by two Tulsa radio stations about the work of the Center. One of the interviews was by Dr. Robert Donaldson on his program World View, which has aired twice on our local NPR station.

#### -Gifted Child Today

Dr. Dorothy Sisk, guest editor for the special Gifted Child Today issue on Javits grants, requested that Dr. Hollingsworth write about the Center for Arts and Sciences. The article was published in their September/October 1993 issue.





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