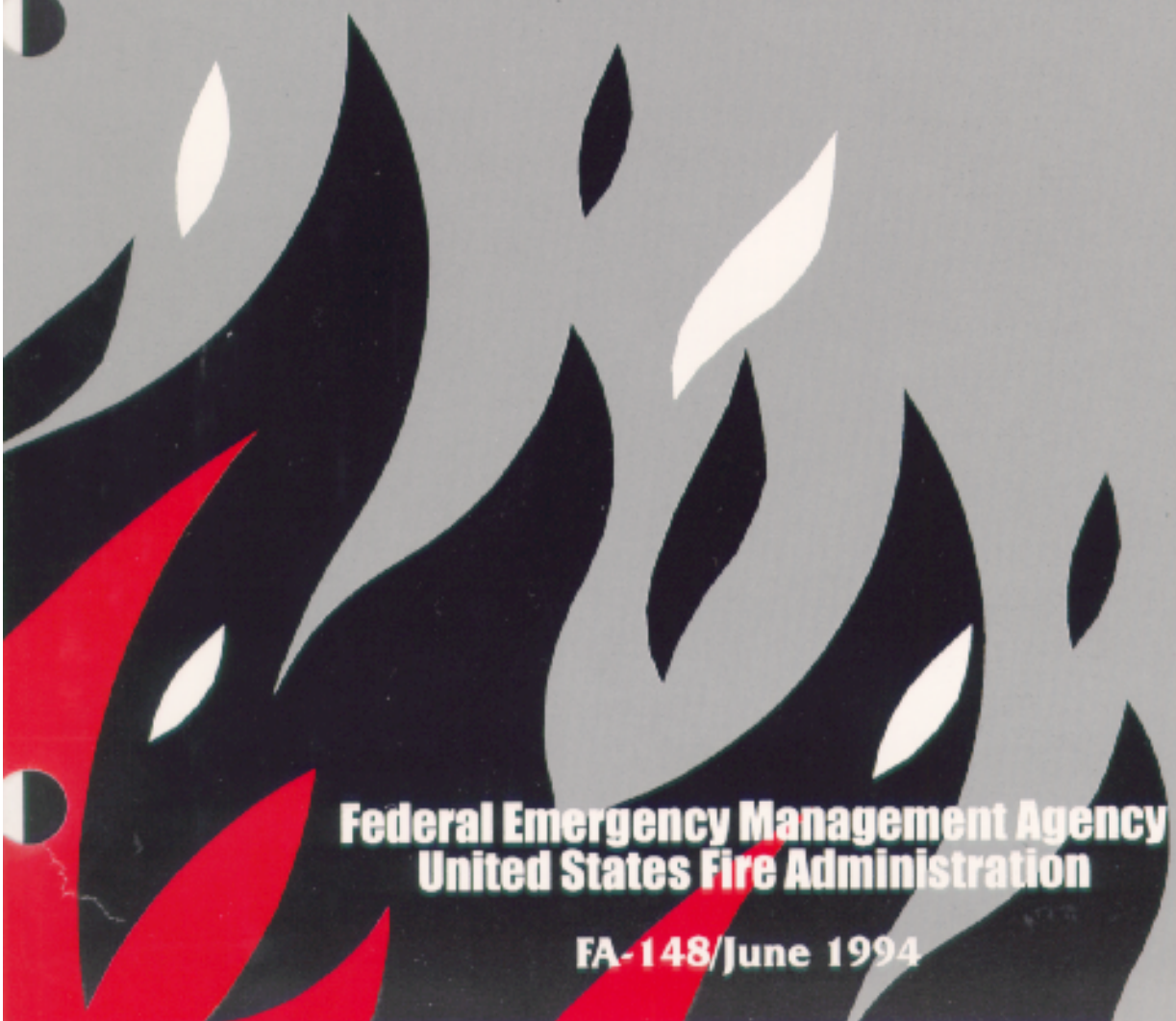
The National Juvenile Firesetter/Arson Control and Prevention Program

Executive Summary



Federal Emergency Management Agency
United States Fire Administration

FA-148/June 1994

This document was scanned from hard copy to portable document format (PDF) and edited to 99.5% accuracy. Some formatting errors not detected during the optical character recognition process may appear.

Controlling Juvenile Firesetting: An Evaluation of Three Regional Pilot Programs

Executive Summary

Background

Juveniles are responsible for a significant proportion of both the accidental and intentional fires that occur each year in the United States. Since the mid-1970s, national, state, and local officials have been turning more attention to the problem of juvenile firesetting and have experimented with various approaches to reducing it. Nonetheless, many experts believe that there are significant gaps in our knowledge and practice.

In response to these concerns, in 1987 the Office of Juvenile Justice and Delinquency Prevention (OJJDP) and the U.S. Fire Administration (USFA) began a new research and development program intended to conceptualize, design, develop, and evaluate a variety of community-based approaches to prevent and control juvenile firesetting. The initiative was known as the National Juvenile Firesetter / Arson Control and Prevention Program (NJF/ACP).

The National Juvenile Firesetter/Arson Control and Prevention Program (NJF/ACP)

The NJF/ACP began with a nationwide assessment of juvenile firesetter programming, conducted by the Institute for Social Analysis (ISA). Based on that assessment, ISA produced a comprehensive set of materials to heighten awareness of juvenile firesetter issues and to guide implementation of model programs. Instead of advocating a single program model, the NJF/ACP materials define seven components common to effective juvenile firesetter programs:

- a **program management component,** to make key program decisions, coordinate interagency efforts, and foster inter-agency support;

- a **screening and evaluation component,** to identify and evaluate children who have been involved in fire-setting:

- an **intervention services component,** to provide primary prevention, early intervention, and/or treatment for juveniles, especially those who have already set fires or shown an unusual interest in fire;

- a **referral component,** to link the program with the full range of agencies that might help identify juvenile firesetters or provide services to them and their families;

- a **publicity and outreach component,** to raise public awareness of the pro gram and encourage early identification of juvenile firesetters;

- a **monitoring component,** to track the program's identification and treatment of juvenile firesetters;

- a **juvenile justice system component,** to forge relationships with juvenile justice agencies that often handle juvenile firesetters.

Developers of juvenile firesetter programs are urged to incorporate all these components in some form. However, the NJF/ACP materials encourage flexibility, emphasizing that programs must be tailored to the characteristics of the local firesetting problem as well as the political and economic environment.

To test the usefulness of the NJF/ACP materials, OJJDP sponsored three juvenile firesetter pilot programs in Colorado, Oklahoma, and Utah, chosen through a competitive process. Each program received an award of $20,000 in October 1991, which supported project operations through December 1992.

The Evaluation

OJJDP engaged the American Institutes for Research (AIR) to conduct an evaluation of the three pilot juvenile firesetter programs. The evaluation had two primary aims: to assess the implementation process in the test jurisdictions, and to evaluate the utility of the NJF/ACP resource materials and training so that they could be modified if needed. Data for the evaluation were collected during two rounds of site visits to each pilot program, telephone monitoring of program progress, and analysis of data from the monitoring systems developed by each individual program.

The Pilot Programs

The three grantees were:

- The Adam and Dorothy Miller Lifesafety Education Center, a not-for- profit organization in Parker, Colorado. This program targeted Colorado's 18th Judicial District, covering four counties and 34 fire agencies. Fire departments in Parker, Aurora, and Castlewood helped develop the proposal.

---

[1] Although OJJDP, the USFA, and the evaluation team were also interested in assessing how well the programs controlled juvenile firesetting, it became evident early in the evaluation that the pace of program implementation, the capabilities of local data systems, and limited evaluation resources would preclude assessing these outcomes.

- The Association of Central Oklahoma Governments, the council of governments serving the Oklahoma City metropolitan area. Oklahoma City's Fire Department helped prepare the proposal. This program targeted a four-county area with 35 fire departments.

- West Valley City, Utah, with support from the West Valley Fire Department.

` The program targeted a single county, containing Salt Lake City West Valley City, and 11 other fire agencies.

Thus, all three grantees proposed to implement regional or countywide programs for juvenile firesetters. The population of these jurisdictions ranged from 435,000 in Colorado to 900,000 in Oklahoma, and each included urban, suburban, and rural areas. In all three sites a few fire departments had been operating programs to screen, evaluate, and refer juvenile firesetters before the grant award. The grantees proposed to capitalize on this experience, extending juvenile firesetter programs to non-participating departments, and enhancing program quality areawide through coordination, training, publicity, and systematic monitoring.

Interestingly, grant applicants had not been required or encouraged to take a regional approach involving multiple departments. In fact, the NJF/ACP resource materials focus primarily on single-city programs because that was what was operating when the materials were developed. The pilot programs would be breaking new ground. From the standpoint of the evaluation, this meant that although the pilot programs would not provide an optimal test of the NJF/ACP materials, they would offer an ideal opportunity to learn more about a new variation on juvenile firesetter programs.

Program Accomplishments

All three projects ultimately hoped to influence the firesetting behavior of juveniles in their jurisdictions. During the grant period, however, they focused primarily on making structural changes and enhancing capabilities that would support this longer term goal.

System-level changes

The projects made noteworthy progress in several areas.

Establishing a multi-agency management structure. All three programs established a multi-agency task force, board, or committee that set policy for the juvenile firesetter efforts, made key decisions, and carried them out. In Utah the group consisted of only five members. Both Colorado and Oklahoma developed much larger task forces, with representation from fire departments, mental health agencies, schools, justice agencies, and other audiences. In both these sites fire service personnel predominated in the day-to-day decisionmaking and program effort, however. Colorado's and Oklahoma's task forces still

remained active several months after the grant expired. The future of the Utah group was uncertain because of staff turnover in key city positions.

- **Enhancing local capabilities to screen and educate juvenile firesetters.** All three pilot programs focused on early intervention - identifying, screening, and evaluating youth who had been involved with fire, and referring them for further education or treatment if deemed necessary. The juvenile firesetter program vested responsibility for screening and evaluation in the local fire departments within the program's boundaries. The programs' role was to provide training opportunities to fire department personnel and others, thereby extending evaluation capabilities throughout the target area. The programs also assisted local departments by providing them with new resource materials such as guidebooks, manuals, videotapes, or VCRs. Two of the three sites, Colorado and Oklahoma, made an effort to develop consistent screening policies or procedures areawide.

  On average, the programs doubled the number of departments with some capability to screen and assess juvenile firesetters in their target areas. They all employed screening forms and procedures that were developed under FEMA-USFA auspices and now are used by programs throughout the country to screen firesetters and gauge their risk of future firesetting.

- **Establishing linkages with the mental health and social services system.** Mental health agencies participated on the task forces in both Colorado and Oklahoma, and a mental health representative was one of the key committee members in Utah. Since the fire agencies in Utah already had strong working relationships with mental health, this area was not a program priority. In contrast, both Colorado and Oklahoma were aggressive in reaching out to the mental health and social service agencies about juvenile firesetting. Colorado developed a resource list of mental health providers, and worked closely with the counseling department in the Children's Hospital Burn Unit. The Oklahoma project pilot-tested a formal referral relationship between one of the area's several Child Guidance Clinics and its largest fire department. This successful referral process is now being replicated by other area fire departments and clinics.

- **Conducting an information campaign.** All the pilot programs engaged in publicity and outreach activities such as publishing brochures for elementary school youth, constructing billboards to advertise services, developing public service announcements, or working to get more mass media coverage. The Oklahoma and Utah programs focused on reaching the general public, while Colorado concentrated more on reaching professional audiences that might participate in the program's task forces or workshops.

- **Establishing linkages to the juvenile justice system.** With strong and visible support from the State Attorney General, Colorado achieved substantial participation in its task force and in training activities from district attorneys, probation officers, and law enforcement personnel. The other two programs made less progress in this arena. However, in Utah the program worked closely with the juvenile's court's pre-existing educational program for juvenile firesetters; and in Oklahoma the program

met with juvenile justice system personnel to work out a mutual understanding about the roles of each in handling juvenile firesetters.

There were some areas of weaker implementation:

- **Extending juvenile firesetter approaches throughout the target area.** None of the programs succeeded in involving every fire department in their area. Departments that were small, had limited budgets, relied heavily on volunteer firefighters, or were relatively remote geographically were especially difficult to engage.

- **Establishing a monitoring system.** Although all of the programs made a commitment to monitoring, which was an important step in itself, all had difficulty putting a common system into place. Stumbling blocks included the technical requirements of developing forms and quality control procedures, the need for a central repository of information, and restricted access to confidential data about juveniles.

In both these areas, the programs' original goals were probably too ambiguous given the time frame and resource levels of their grants. All in all, however, we conclude these modest short-term grants stimulated considerable improvements in juvenile firesetter programming at the three pilot sites.

Interventions with juvenile firesetters

In addition to bringing about changes in local capabilities and structures, the pilot programs also screened and evaluated the firesetting behaviors of over 600 children. Descriptive data from each program's monitoring system provide information about the children and families involved. However, the results must be interpreted cautiously because of incomplete reporting and differences in the forms and procedures across sites. The reporting periods differed across sites as well; Colorado's statistics cover 12 months, Oklahoma's cover 13 months, and Utah's cover 17 months (but some Utah departments did not provide any reports for the first several months).

Table 1 summarizes information about 372 referrals to Colorado, 253 referrals to Oklahoma, and 88 referrals to Utah.'

- In Colorado and Utah parents and other family members were the most common source of referrals to the program, while fire departments ranked second. In Oklahoma the reverse was true, possibly because the program launched its public information campaign late in the grant period.

- The three programs served a predominately white, male population. The majority of the youth lived in two-parent families. In the two sites reporting on parental smoking behavior, the majority of the youth had a parent who smoked, perhaps making it easier to obtain the implements needed to start a fire.

[1]Most frequencies are based on fewer cases because of missing information, however.

- There were pronounced age differences across sites. Compared to the other two sites, the Colorado program was much more involved with older children: 43.3 percent of their referrals were age 12 and up, versus 16.7 percent in Oklahoma, and 15.6 percent in Utah. At the other end of the age spectrum, children age 6 and under accounted for only 16 percent of referrals in Colorado, but 33.7 percent of the Oklahoma referrals, and 36.4 percent of the Utah referrals. The age differences probably reflect differences in targeting as well subtle distinctions in the way referral agencies perceived the programs, rather than differences in the nature of juvenile firesetting across jurisdictions.

- A substantial minority of the referred youth had been involved in previous firesetting incidents.

A comparison of the characteristics of the youth in four age groups - under 5, age 5 to 9, age 10 to 13, and 14 and up - generally supported the prevailing view (FEMA, 1978) that there are differences between younger and older juvenile firesetters. Among the juveniles screened by all three programs, the younger juvenile firesetters were:

- more likely to have acted alone
- less likely to live in a two-parent household
- more likely to have a parent who smokes
- more likely to have set a fire indoors or at their own residence
- more Likely to have done damage over $100
- more likely to have started a fire involving injury or death.

Table 1. Personal and Family Characteristics of Juveniles Referred to the Juvenile Firesetter Programs

Characteristics	Colorado (n=372)	Oklahoma (n=253)	Utah (n=88)
Source of Referral	45.0	24.0	67.6
Parents/Guardians/Relatives	28.6	57.3	23.0
Fire Departments	2.8	10.1	1.4
Law Enforcement/Prosecutors/Courts	13.9	5.7	
Schools	9.3	2.8	8.2
Others	n=353	n=246	n=74
Total			
Age	4.3	20.6	15.6
<5	11.7	13.1	20.8
5-6	22.7	26.2	33.7
7-9	18.0	23.4	14.3
10-11	26.8	10.4	14.3
12-13	16.5	6.3	1.3
14+	n=35I	n=252	n=77
Total			
Average age	10.3 years	8.2 years	7.8 years
Sex	86.6	89.3	82.3
Male	13.4	10.7	17.7
Female	n=372	n=252	n=79
Total			
Race	86.4	71.8	98.4
White	10.8	19.4	
African American/Black	1.9	4.8	1.6
Hispanic	0.9	4.0	
Other	n=361	n=252	n=61
Total			
Marital status of Cuslodial Parent/Guardian	65.6	51.5	63.1
Married/Remarried	9.2	16.1	11.1
Single	22.9	28.9	25.4
Divorced/Separated	0.8	2.5	
Widowed	1.5		
Other	n=262	n=242	n=63
Total			
Parent or Guardian Smokes?	NA	69.6	52.6
Yes	NA	30.4	47.4
No	NA	n=227	n=19
Total			
Fire History	*NA*	40.6	35.4
Involved in Previous Fire	NA	59.4	64.6
No Known Fires	NA	n=202	n=65
Total			
For Previous Firesetters, Number of Previous Fires'	33.3	21.7	NA
1	28.1	26.1	NA
2	15.8	24.6	NA
3	7.0	5.8	NA
4	12.3	17.4	NA
5-9	3.5	4.3	NA
10+	n=57	n=69	NA
Total			

[1] Based on information known to fire departments or reported in screening interviews with child or family.

[2] No data are reported for Colorado because the Colorado forms did not distinguish between "missing data" and "no previous fire history."

Fortunately, however, few cases involved any injury, and most did not involve large amounts of fire damage. Two fires in Colorado resulted in deaths, however. In Colorado and Oklahoma total damages for all cases screened by the program exceeded $400,000 at each site. (Damage data were not available for Utah.)

Significant proportions of the children screened by the juvenile firesetter programs - about two-thirds in Colorado and Oklahoma - were rated as needing further evaluation by mental health services. Two factors contributed to these high percentages. In Colorado some larger departments reserved the relatively time-consuming screening procedure for the most fire-involved youth. Other youth were referred directly to an educational program for firesetters. In Oklahoma some departments requested a second assessment from a mental health provider in most cases. In about 40 percent of the cases where the outcome of this second assessment was known, the mental health agency recommended further counseling.

Most children and families who were referred to the projects - whether or not they were assessed as needing mental health follow-up - were also the beneficiaries of some type of fire education.

Lessons for Regional Firesetter Efforts

While the programs made great strides in improving the coordination and delivery of juvenile firesetter services, their plans may have been too ambiguous. They expected milestones to be reached too fast and expansion to occur too quickly. These are **important considerations when considering a regional firesetter effort - limiting the scope and goals of the program to a manageable level and establishing a realistic timetable.**

While we do not want to over-generalize from the experiences of three programs, these pilot projects do suggest several lessons about the circumstances that foster regional efforts.

1. Unlike firesetter programs designed to serve a single fire department or district, the function of a regional effort is to organize the individual efforts of several departments to screen, educate, and refer juvenile firesetters. **An organization that already spans the boundaries of the region and that already has experience building and maintaining networks may be a more effective program vehicle than an individual fire department.**

2. While an individual department may not be the optimal agency to manage a juvenile firesetter network, **the leadership and involvement of a fire department with a successful juvenile firesetter program may be critical to the long-term success of the regional program.**

3. Many of the service agencies to which juvenile firesetters are referred are already regionalized. **Obviously, regional efforts should take advantage of whatever regionalized services and coordinating mechanisms already exist.**

4. Since regional programs may transcend the jurisdictional boundaries of the criminal justice, fire, mental health, education, and protective services systems, they face a challenging task in educating relevant officials about the seriousness of juvenile firesetting and enlisting their aid. However, **a high-ranking government official can serve as a catalyst to galvanize the involvement and support of diverse agencies.**

Recommendations for Agencies Developing Juvenile Firesetter Programs

At the risk of stating the obvious, we encourage agencies considering juvenile firesetter programs or already implementing them to **take advantage of the body of materials and expertise that has been accumulated over the past few years.** The volumes developed by ISA for the National Juvenile Firesetter/Arson Control and Prevention Program are an exceptional and comprehensive resource document for the program planner.

We would like to reiterate one of the underpinnings of ISA's approach - that **programs should build on the existing resources for firesetters in a community,, and fit the program design to the exigencies of the local environment.**

In addition to building on existing capacities, **programs should start small and grow incrementally as they gain experience and acceptance.** As a corollary, we recommend that a jurisdiction **develop a juvenile firesetter program in an individual fire department before attempting a regional effort.**

Furthermore, jurisdictions should think in terms of developing a juvenile firesetter **capability** rather than a single **program.** In line with this notion, we believe it is useful to consider the entire continuum of services from fire prevention education, to early intervention for the juvenile exhibiting inappropriate fire behavior, to treatment for the serious firesetter, to court-directed controls for the arsonist.

Programs should also pay increased attention to the educational and referral services that they provide. Programs must present basic fire safety concepts and information about the consequences of firesetting to children of different ages and different levels of fire involvement. This **requires a range of appropriate educational materials and techniques.** Arranging **training for mental health professionals in the dynamics and treatment of firesetters** can bolster the services available to the program's clientele.

The NJF/ACP's emphasis on the importance of a juvenile justice linkage is on the mark. But, juvenile justice involvement in firesetting does not have to be limited to the arson end of the spectrum. The pilot programs tapped juvenile justice expertise to consolidate procedures for handling firesetters and to review the legality of collecting information on juveniles. To address the full continuum of fire behaviors we need to engage all of the agencies that deal with a piece of the problem.

As technological advances increasingly protect us from accidental fires and alert us to fires of any origin, the human factor is likely to account for a larger share of fire injuries and mortality. Intercepting problem fire behavior at an early stage is likely to become an imperative. We hope that fire, mental health, juvenile justice, education, and other youth-serving agencies will begin addressing the problems now.