

Agency being nominated DeKalb County Fire Rescue Department (DCFR)

Provide the program name and a brief description in this box.

Name: Merger of Fire and EMS Departments

Description: With tremendous inefficiencies within the separate fire and EMS Departments, DeKalb County looked for a road to improvement. After much research and with no "model" to follow, DeKalb County worked to form a consolidated Fire Rescue Department. Key objectives were to integrate the command structure and system operations from two departments with disparate operational tactics, management protocols, and culture differences. New efficiencies in the program provided additional resources, decreased response times, created significant improvement in the Cardiac Arrest Save Rate (ROSC) percentage, a significant decrease in fire loss, and enhanced firefighter and civilian safety. Also, an important Federal Appeals Court victory validated that cross-trained paramedics met the FLSA firefighter overtime exemption.

Date the nominated project/activity was originally implemented November 20, 2001

Month/Year

*Minimum one-year operational
period required for submission*

Nominator's name and title Ronald D'Acchioli, Fiscal Officer

Agency or organization DeKalb County Fire Rescue Department

IAFC Division Southeastern

Address 1950 West Exchange Place,

City Tucker State GA Zip 30084 Country USA

Phone 678-300-1883 Fax 678-406-7812 Email rldacchioli@co.dekalb.ga.us

The fire chief or chief executive officer must sign this nomination form.

Name of Fire Chief/EFO David Foster, Director/Fire Chief

Chief/EFO's signature  Date 5/1/2009

Phone 678-406-7731 Email dafoster@co.dekalb.ga.us

(if different from nominator)

1. Please describe the nature of the project/activity being nominated, using the space provided. Be specific.

Merger of Fire and EMS:

As part of Metro Atlanta, DeKalb County, Georgia has a population of 740,000 across a number of cities, within 260 square miles. Fire and Emergency Medical Services (EMS) are provided by the DeKalb County Fire Rescue Department (DCFR). With 201,300 responses in 2008, DCFR is among the busiest in the United States. Prior to November 2001, Fire and EMS services were provided by two, separate departments (Fire and EMS). The systems were cumbersome and inefficient, creating an environment where significant improvements were required. **The nature of the project and its primary goal was to increase the efficiency and effectiveness of Fire and EMS operations.**

It must be stated up front that the merger has not been without significant challenges. The greatest of which was combining the cultures of two distinctly different organizations. Over the past 6 years, as a result of this integration, the department has seen measurable efficiencies in a number of areas, including operational tactics, training, finance, logistics/supply, and the apparatus purchase and replacement program. In the end, the success of this merger must be attributed to the commitment and professionalism of the men and women of DCFR.

From a service delivery and fiscal responsibility perspective, and in an effort to set the baseline, it is important to outline some of the issues in a pre-merger environment. These included, but were not limited to the following: response times over 10 minutes, fire losses of \$55M annually, cardiac arrest save rate (ROSC) at 7%, overtime costs of \$2.5M annually, No Ambulance to Send (NATS) + or - 80 times/month, number of sworn firefighters - 600 and number of sworn EMS personnel - 200.

Identifying the processes and organization of the fire rescue model was an important first step to a successful merger. Hoping to gain from prior experience, national research was conducted to identify a model from another fire rescue department. However, due to the size and complexity of DeKalb County, it was difficult to identify a relevant model. Key objectives were to integrate the command structure and system operations from two departments with disparate operational and management protocols. The integration occurred over a multi-year, phased-in timetable, as described below:

- To underscore the commitment to an integrated department, the County recruited and hired a Director/Fire Chief with Fire and EMS experience.
- During the first stages of the merger, cross-training was voluntary, however, with new department leadership, all Firefighters and Paramedics were cross-trained, resulting in 800 cross-trained personnel.
- All personnel and operations were integrated within a single chain of command reporting to the Chief of Operations. This resulted in a reduction in the number of supervisory positions.
- Ambulance staffing was changed from paramedic partners to a Fire Medic and a Firefighter/EMT model. A second paramedic is dispatched to life-threatening emergencies. "Ambulances" were changed to "Rescues" by adding firefighting equipment and being dispatched to fires.
- The reduction of supervisors and changes in ambulance staffing resulted in the addition of eight Rescues, utilizing existing staff.
- Previously, Rescue Captains worked alone, self-dispatching to non life-threatening calls. These Rescue Captains were teamed with a Firefighter/EMT on "Squad" vehicles equipped with ALS, firefighting and extrication tools. Today, five ALS light rescue Squads, distributed throughout the County, are dispatched along with other Operations Division apparatus.
- Through a competitive contract, a private ambulance service was integrated into the DeKalb system. This public-private partnership created a true multi-tiered system that exists today. The contract requires 5 dedicated BLS units (24/7) that are strategically located throughout the county, dispatched by DeKalb 911, and responding from DCFR fire stations. This relationship allows DCFR ALS resources to remain available for critical patients.
- An innovative electronic Quality Improvement (QI) Program was developed. Specifically, Fire and EMS responses are reviewed electronically. Calls not meeting preset protocols are flagged and investigated. The QI system has identified a number of deficiencies and, as a result, EMS protocols have been adjusted, patient care skills enhanced, and fire ground tactics show dramatic, quantifiable improvement.

A final challenge to the merger was a lawsuit filed in June 2005 by six paramedics who disagreed that they met the partial overtime exemption established by the Fair Labor Standards Act, 29 U.S.C. 201. The primary issue was whether the group of paramedics, who are employed by DeKalb County Fire Rescue Department and trained in fire suppression, had the "responsibility to engage in fire suppression" and therefore exempt from overtime until they met the 53 hour threshold. The District Court granted the Department's motion for summary judgment and dismissed all of the paramedic's claims. The paramedics appealed to the United States Court of Appeals for the Eleventh Circuit, where the decision of the district court was upheld.

2. Why is this project/activity innovative and/or creative? Be specific.

The project provided resolution to several serious issues facing DeKalb County and many other communities nationwide. **The development of the project required an innovative approach.** The framers were confronted with several key issues that needed to be addressed, for example:

What is the right model for a "Fire Rescue Department?" Is it a transport or non-transport model? Will it deploy ALS Engines, Squads, or both? What are the levels of patient care? Do paramedics become cross-trained firefighters? Do firefighters become cross-trained EMTs? If so, is it voluntary or mandatory? How to keep overtime within budget? What shifts do a combined department work, 40 hours or 53 hours? If 53 hours, what about paramedic overtime issues? Chain of command, organization structure? How to combine the cultures of Fire and EMS departments?

Today, the merged department operates under a single chain of command. All personnel are required to cross-train. Because the minimum level of emergency medical technician in Georgia during 2003 was EMT-Intermediate, all apparatus were stocked with EMT-I medical equipment. Recognizing the national shortage of paramedics, the Department initiated a unique public-private partnership with a private ambulance company. The private ambulance company provides 5 BLS ambulances to DeKalb County 24/7. These units are equipped with DeKalb County radios and are dispatched with DCFR units by DeKalb County 911. The partnership responds to 65,000 EMS calls annually (42,000 of those patients are transported to area hospitals). The primary purpose of this project was to keep the 19 DeKalb ALS Rescue Ambulances available for critical calls. As a result, there has been a 300% increase in the number of patients that survive a cardiac arrest. The ALS rescue ambulances, staffed with a Fire Medic and Firefighter/EMT are also part of the initial dispatch to all working fires. Personnel assigned to these units augment staffing to meet NFPA Standards. The impact here is a dramatic decrease in DeKalb County fire loss, from a high of \$55M annually, to the current level of \$12M annually. Recently, a pioneering electronic quality improvement program was developed and implemented. This program provides objective oversight of patient care and fire ground tactics. This has resulted in protocol enhancements in EMS and tactical improvements in suppression scenarios.

In the end, there are three important benefits realized from this successful merger; 1) several capital expenditures are now funded through cost savings and operational improvements; 2) the amount of personnel needed to meet increased demand is reduced due to cross training in conjunction with combined use vehicles and; 3) a stronger incident command system was developed

3. Describe community or citizen participation in the planning or initiation of the project/activity. Be specific.

Project Planning & Initiation

Prior to the merger, almost every day, the media reported on the quality issues of fire suppression and emergency medical service care on the evening news. Response times were high. Several times each day there were no ambulances to respond on critical calls, and, at \$2.5M annually, overtime expenditures were well over budget. As you may imagine, this created a public outcry demanding service delivery and fiscal improvements. The citizens of DeKalb County very clear on their demand to improve services.

A major study was commissioned to establish the criteria for an effective merger of Fire and EMS in late 2000. As a result, pursuant to Executive Order 1-3 and General Order DPS 01-10, the DeKalb County Fire and Rescue Services was formally established on November 20, 2001. The department is comprised of personnel and other resources previously allocated to the DeKalb County Department of Public Safety, Bureau of Fire Services and the Emergency Medical Services Bureau. Expanded career paths and compensation now exist for employees cross-trained and assigned to fire and rescue responsibilities.

4. Describe any improvements in the delivery of services and cost savings that resulted from this project or activity.

Service Delivery Improvements & Cost Savings

Six years post-merger, key performance data continue to be tracked and analyzed. The results below provide a contrast from pre-and post-merger perspectives:

	<u>Pre-Merger</u>	<u>Post-Merger</u>
Response Times	over 10 minutes	5 minutes
Fire Losses	\$55M annual (02)	\$12M (03-08)
Cardiac Arrest/Save Rate	7%	21%
Annual Overtime Costs	\$2.5M	\$40K (03-08)
EMD Protocols	Not used	Implemented
No Ambulance to Send to critical calls	Over 80 Times/Month	0 (03-08)
# Firefighter Personnel	600	800
# EMS Personnel	200	800
EMS Gross Revenue	\$3.7M Annual	\$6.2M Annual (08)
EMS per patient revenue collections	Avg \$146 per patient	Avg \$260 per patient
Average # ambulances (existing staff)	12 ALS	19 ALS, 5 BLS
Light rescue ALS squads (existing staff)	0	5
Battalions (existing staff)	4	5
EMS Quality Improvement	none	100% IS review/trended
Fire Suppression Quality Improvement	post incident critique	100% IS review/trended
Average number of ALS apparatus	12	37

It is important to note that DCFR was awarded the 2008 SAFER Manpower Grant. With a federal share of \$6.9M, and a total value of \$14.4M, this is the largest award approved for a fire rescue department since the inception of the SAFER Program in 2005. The award allows DCFR to add 64 personnel to ensure NFPA-recommended 4-person staffing on all first-in apparatus. We believe that the demonstrated commitment to efficiency and effectiveness had a significant impact on the award decision. As important, these additional resources will serve to improve upon post-merger performance.

The synergies created and service delivery improvements, as a result of the merger, are still being realized and quantified, including results from:

- Combined training academy for Fire and EMS.
- Integrated logistics and supply operations (operating supplies, uniforms, etc.).
- Combination Capital Improvement (CIP) requests.
- Integrated financial and budget management.
- Dual purpose apparatus purchases.
- Integrated command structure.
- An integrated career development methodology that removes all barriers (racial, gender, etc.).
- Integrated recruitment and hiring.
- Comprehensive, department-wide strategic planning.

The DCFR annual budget averages \$70,000,000. From a fiscal responsibility perspective, this merger has allowed the combined department to end the year at or below budget for the past 5 years.

SUMMARY SHEET

Contact person

Name Ron D'Acchioli Title Fiscal Officer

Organization DeKalb County Fire Rescue Department

Address 1950 West Exchange Place

City Tucker State GA Zip 30084 Country USA

Phone 678-300-1883 Fax 678-406-7812 Email rdacchioli@co.dekalb.ga.us

Other contacts for media purposes (if not nominator/contact)

Name Captain Eric Jackson, Public Information Officer

Phone 678-406-7741 Email eljackson@co.dekalb.ga.us

Name of project/activity:

Merger of Fire and EMS Departments

Description of project/activity:

Merger of Inefficient Fire and EMS Departments

The newly integrated fire/rescue department utilized the resources from both former departments to streamline and cross-train. All personnel and operations were integrated within a single chain of command reporting to the Chief of Operations. This resulted in a reduction in the number of supervisory positions. Ambulance staffing was changed from paramedic partners to a Fire Medic and Firefighter/EMT model. A second paramedic is dispatched to life-threatening emergencies. "Ambulances" were changed to "Rescues" by adding firefighting equipment and being dispatched to fires. It is a transport model, with over 42,000 patients transported annually. ALS engines and Rescues are deployed daily. All personnel are cross-trained to Firefighter/EMTs. The cultures of Fire and EMS departments have been successfully integrated.

Describe planning and/or initiation of the project or activity:

Project Planning

In 2000, due to ongoing issues with separate Fire and EMS Departments, the decision was made to integrate. Program development and implementation and methods of progression were carefully calculated to maximize cost effectiveness through overtime savings, combined use vehicle capability and personnel cross-training. The implementation plan described projected cost savings, cost avoidance and customer service improvements. The cost savings achieved through integration provide for some of the future infrastructure improvements necessary to support a growing community the size of DeKalb County, GA. In the end, pursuant to Executive Order 1-3 and General Order DPS 01-10, the DeKalb County Fire and Rescue Services was formally established on November 20, 2001.

Briefly summarize the cost effectiveness or improvement of service delivery:

Service Delivery Improvements

Response times reduced from over 10 minutes to less than 6 minutes; Cardiac arrest save rates (ROSC) dramatically improved from 7% to 21%; Annual overtime costs reduced from a high of \$2,000,000 to less than \$40,000 annually; Fire losses reduced from \$55,000,000 to \$12,000,000 annually; No Ambulance to Send (NATS) to critical calls reduced from 80+ times per month to zero; EMS Gross Revenue increased from \$3.7M annual to \$6.2M annual; Increase in ALS units from 12 to 19 (using existing staff); Comprehensive Quality Improvement Programs for Suppression and Emergency Medical Services was initiated; DCFR has maintained expenses at or below budget for the past 5 years.