

Recruitment and Retention, 2001 and 2012

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In the spring of 2012, the Center for Rural Pennsylvania and the Pennsylvania Fire and Emergency Services Institute conducted a mail survey of Pennsylvania fire chiefs to identify firefighter recruitment and retention patterns.



The Center compared the results of the survey to a similar survey of fire chiefs it conducted in 2001.

The current survey found that:

- 52 percent of respondent companies had a net increase in firefighters;
- the top two firefighter recruitment methods used by fire companies were word of mouth, and family and friends; and
- firefighters leave service because they were moving from their current area, had job commitments, had family commitments, and lost interest in firefighting.

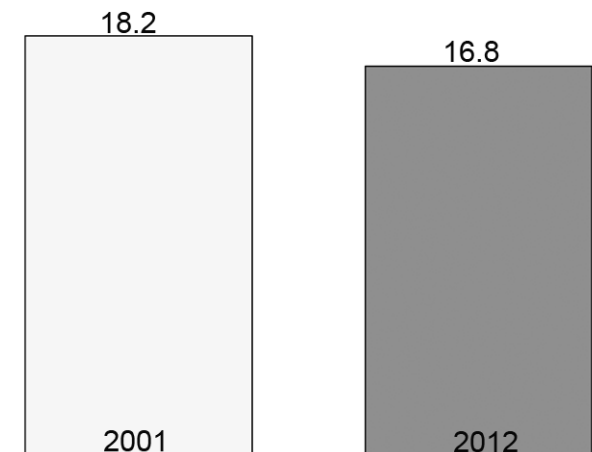
The results also found that fire companies, on average, had 17 fundraising events and responded to 551 fire calls per year.

Findings

Number of Firefighters Who Respond to Calls

In 2001, survey respondents reported that 18.2 firefighters, on average, regularly responded to calls. In 2012, the average was 16.8 members.

Average Number of Firefighters
 Who Regularly Responded to Calls, 2001 and 2012



Survey Objectives and Methods

Objectives

The Center for Rural Pennsylvania and the Pennsylvania Fire and Emergency Services Institute conducted two statewide surveys of fire chiefs in the spring of 2001 and 2012. With a few exceptions, the questions in both surveys were identical.

The objectives of both surveys were to identify patterns in recruitment and retention of firefighters across Pennsylvania and to measure the capacity of fire companies to meet their communities' emergency needs. This report focuses on the first objective of identifying patterns in the recruitment and retention of firefighters and to determine if any changes have occurred in those patterns over the 11-year time frame. Another report will focus on fire company capacity.

The 2001 survey results, which were published in January 2002, are available on the Center for Rural Pennsylvania's web site at www.rural.palegislature.us/documents/factsheets/Fire_Survey_2002.pdf.

Methods

The 2001 and 2012 surveys were mailed to all Pennsylvania fire company chiefs in both paid and volunteer fire companies.

In 2001, the sample population for the survey was 2,462 fire companies. From the sample population, 883 usable surveys were returned, for a response rate of 36 percent. The margin of error was 2.6 percent at the 95 percent confidence level.

In 2012, the sample population was 2,290 fire companies. Out of the sample population, 601 usable surveys were returned, for a response rate of 26 percent. The margin of error was 3.4 percent at the 95 percent confidence level.

Data limitations

Under-representation of paid fire companies: While the survey was sent to all fire companies, paid fire companies may be under-represented in the results since the majority of Pennsylvania fire companies (93 percent) are made up of volunteers (Governor's Center for Local Government Services).

Different definitions of fire company member and active fire company member: In field testing the survey in 2001, some chiefs considered all members to be active, while others considered only those who regularly respond to calls as active. To avoid confusion, the Center included definitions in the 2001 and 2012 surveys and added three separate questions on

membership. The first asked for the total number of members; the second asked for the total number of "active members"; and the third asked for the total number of members who regularly respond to calls. Despite the questions and definitions provided, the results indicate that some respondents did not make the distinction between active members and members. Therefore, unless otherwise noted, this analysis profiles members who regularly respond to calls.

2001 and 2012 survey responses are only comparable at the aggregate level: The responses to both surveys were anonymous, so individual responses from fire companies in 2001 could not be compared with individual responses in 2012. Responses were, therefore, compared in aggregate.

A chief's opinion may be different from rank-and-file members: In many ways, the position of fire chief is one of management. His or her views on why members join or leave the company may differ from those who actually join or leave.

Recoding/calculating variables

Rural/urban: The Center classified fire companies as rural or urban based on the county in which they were located. Rural fire companies were in counties where the population density was below the statewide average of 284 persons per square mile. Urban fire companies were located in counties where the population density was at or above the statewide density.

Net change in firefighters: The Center calculated the net change in firefighters by subtracting the number of new members who joined the company in the past 2 years from the number of those who left the company or became inactive during the same period. This variable of net change was then classified into four categories as follows: companies that lost members; companies that had no change in members; companies that gained one to four new members; and companies that gained five or more new members.

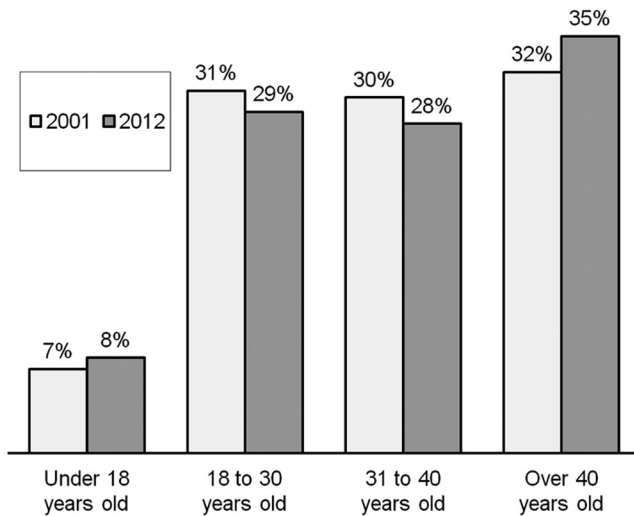
In both the 2001 and 2012 surveys, questions that were left blank on membership, age cohorts, fundraising events, the number of female members, fire calls, new members, and members who left were interpreted to mean "none" and were therefore coded as zero.

This analysis focuses on firefighters who regularly respond to calls. In the text below, the terms "firefighter" and "member" are synonymous.

Age of Firefighters

Based on their age, firefighters in 2012 were nearly evenly divided into three groups: 18 to 30 year olds (29 percent); 31 to 40 year olds (28 percent); and over age 40 (35 percent). Firefighters under 18 years old made up 8 percent of members. Compared to those in 2001, firefighters in 2012 were slightly older.

Range of Firefighters by Age
2001 and 2012

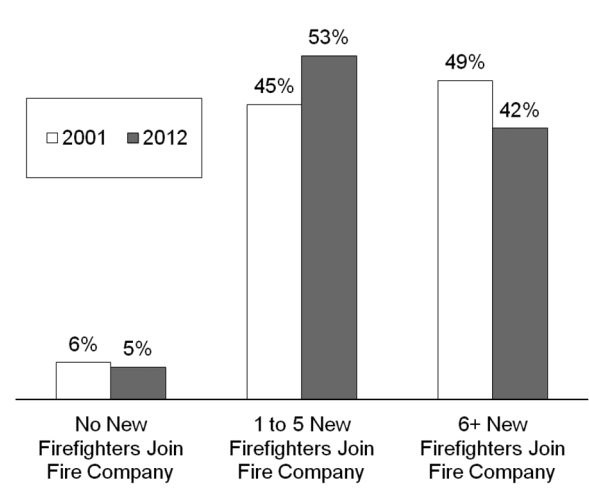


New Members

In 2012, 95 percent of respondents said one or more firefighters joined their company within the past 2 years. On average, companies gained 5.8 new firefighters.

In 2001, 94 percent of respondents said new firefighters joined their company. The average gain per company was 6.9 firefighters.

Fire Companies Without/With New Firefighters Over Past 2 Years, 2001 and 2012

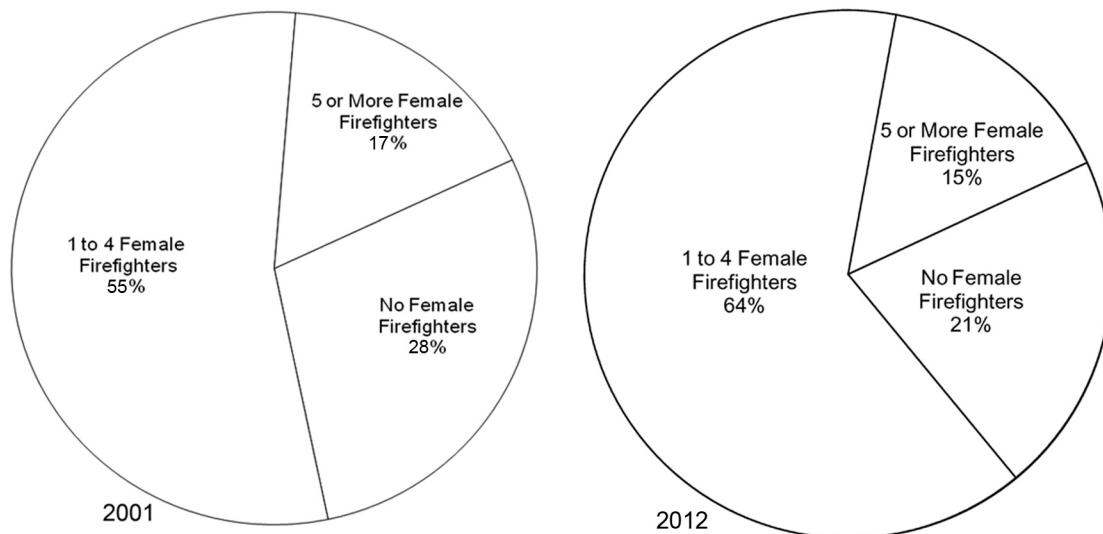


Female Firefighters

In 2012, 79 percent of fire companies had one or more female firefighters. Among fire companies with female firefighters, the average number of females was 2.5, or 15 percent of all firefighters.

In 2001, 72 percent of companies had one or more female firefighters. The average number of female firefighters was 2.6, or 14 percent of all firefighters.

Fire Companies with Female Firefighters, 2001 and 2012



Recruitment Methods

In 2001 and 2012, the top two recruitment methods among fire companies were word of mouth and family and friends.

In 2012, 89 percent of respondents used word of mouth and 71 percent used family and friends.

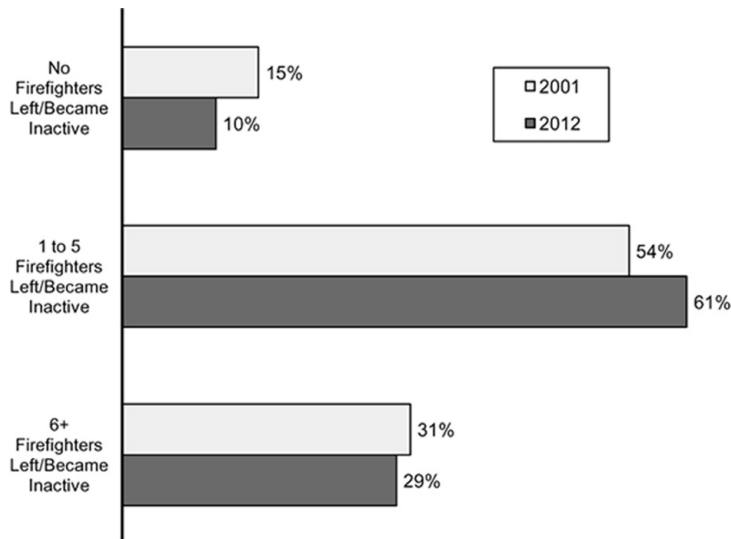
In 2001, 92 percent of respondents used word of mouth and 67 percent used family and friends.

Methods Used by Fire Companies to Recruit New Members, 2001 and 2012

	2001	2012
Word of Mouth	92%	89%
Family/Friends	67%	71%
Open House	29%	32%
Newsletter/Flyer	27%	24%
School/Business Presentation	19%	19%
Fire Police	10%	9%
Social Club	5%	5%
Paid Advertisement	5%	4%
Other Method	4%	12%

Note: Totals do not add up to 100 percent due to multiple responses.

Range of Firefighters Who Left Their Company or Became Inactive Over the Past 2 Years 2001 and 2012



Firefighter Retention

In 2012, 90 percent of respondents said one or more firefighters left their company or became inactive over the past 2 years. On average, 4.8 firefighters left these companies.

In 2001, 85 percent of respondents said they lost firefighters over the past 2 years. On average, these companies lost 5.0 firefighters.

Reasons for Leaving Fire Company or Becoming Inactive Over the Past 2 Years 2001 and 2012

	2001	2012
Moved Away	63%	58%
Job Commitments	51%	52%
Family Commitments	42%	44%
Lack of Interest	42%	35%
Personality Conflicts	38%	34%
School/College	24%	30%
Disagreement with Leadership	23%	22%
Retirement/Old Age	34%	21%
Expulsion	17%	17%
Disliked Training	12%	13%
Illness/Disability	9%	11%
Other	6%	11%

Note: Totals do not add up to 100 percent due to multiple responses.

Reasons for Leaving

In 2012, respondents identified the following as the top four reasons as to why firefighters left the company: moved away (58 percent), job commitments (52 percent), family commitments (44 percent), and lack of interest (35 percent).

The same four reasons topped the list in 2001 as well.

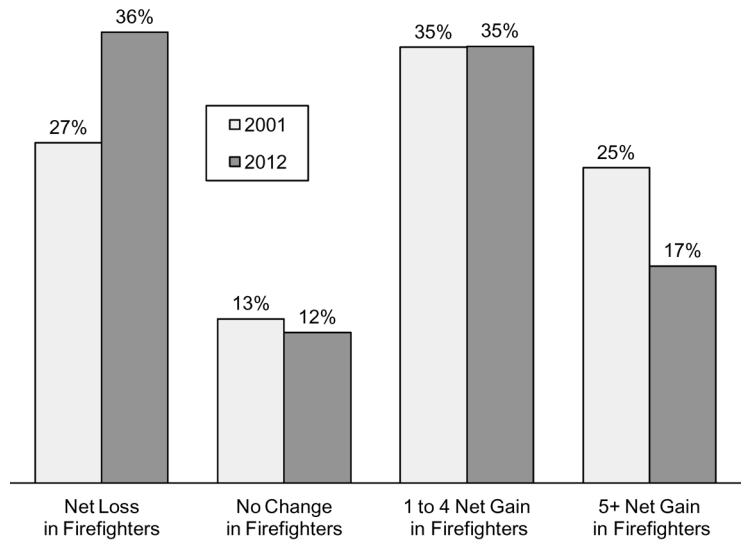
Net Change in Firefighters by Fire Company
2001 and 2012

Net Change in Firefighters

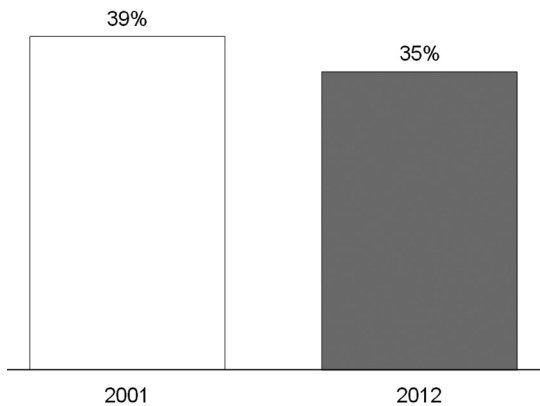
Subtracting the number of firefighters who joined the company from those who left or became inactive during the same period produces the net change.

Overall, in 2012, 52 percent of respondent companies had a net increase in firefighters.

In 2012, fire companies had a net gain of about one new firefighter. In 2001, fire companies had a net gain of about two new firefighters.



Percent of Firefighters Who Are Elected or Appointed Officials, 2001 and 2012



Elected or Appointed Officials

In 2012, 35 percent of respondents said one or more firefighters was an elected or appointed local government official.

In 2001, 39 percent said one or more firefighters was a local government official.

Working in First-Due Area

According to the respondents, the majority of firefighters did not work in their first-due, or primary coverage, area in both 2012 and 2001.

In 2012, 84 percent of fire companies had 25 percent or less firefighters who worked in their first-due area. In 2001, 86 percent of fire companies had 25 percent or less firefighters working in their first-due area.

However, in 2012, 70 percent of respondents said their firefighters regularly left work to respond to fire calls, and, in 2001, 77 percent said the same.

Percent of Firefighters Who Work Within First-Due Area
2001 and 2012

	2001	2012
None - No Firefighters Work in First Due Area	14%	16%
1% to 25% Firefighters Work in First Due Area	72%	68%
26% to 50% Firefighters Work in First Due Area	8%	8%
51% or More Firefighters Work in First Due Area	6%	8%

Analysis

Understanding the Net Change in Firefighters

The net change in firefighters is an important indicator of how well fire companies are able to recruit and retain members. As indicated above, fire companies had a net gain of about one new firefighter in 2012 compared to a net gain of about two new firefighters in 2001.

To take a closer look at the characteristics of fire companies with a net change in firefighters in 2012, the Center identified four groups of companies as follows: net loss in firefighters, no net change in firefighters, one to four net gain in firefighters, and five or more net gain in firefighters.

Net Loss in Firefighters

Thirty-six percent of fire companies had a net loss in firefighters. On average, these companies gained 4.0 members and lost 7.2 members, leaving them with an overall loss of 3.2 members.

These companies had, on average, 16.0 firefighters and, over the past 2 years, responded to an average of 586 calls.

Fifty-three percent were located in a rural county and 47 percent were in an urban county. Most (56 percent) served populations of less than 5,000.

Sixty-four percent required firefighters to participate in monthly training to remain active in the fire company and 59 percent of companies had an operating budget under \$100,000.

On average, these companies had 19.4 fundraising events and 73 percent of companies required firefighter participation in these events.

To recruit new members, 49 percent used only informal networks, such as family and friends and word of mouth.

According to the survey results, 24 percent of firefighters left these companies for personal reasons; 6 percent for company-related reasons; and 70 percent for a combination of personal and company-related reasons.

No Net Change in Firefighters

Twelve percent of fire companies had no net change in firefighters. On average, these companies gained 4.9 new members and lost 4.9 members.

These companies had, on average, 15.5 firefighters and, over the past 2 years, responded to an average of 520 calls.

Fifty-one percent were located in an urban county and 49 percent were in a rural county. Fifty-eight percent served a population of less than 5,000.

Fifty-five percent required firefighters to participate in monthly training to remain active in the fire company, and 56 percent had operating budgets under \$100,000.

On average, these companies had 18.2 fundraising events each year and 65 percent required firefighter participation in these events.

To recruit new members, 49 percent used informal networks only and 51 percent used a combination of formal and informal methods.

According to the survey results, 34 percent of firefighters left the company for personal reasons; 9 percent for company-related reasons; and 57 percent for a combination of personal and company-related reasons.

One to Four Net Gain in Firefighters

Thirty-five percent of fire companies had a net increase of one to four firefighters. On average, these companies had an increase of 5.3 members and lost 2.9 members, for an average net increase of 2.4 members.

These companies had, on average, 15.6 members and, over the past 2 years, responded to an average of 490 calls.

Fifty-four percent were located in an urban county and 46 percent were in a rural county. Most (57 percent) served a population of less than 5,000.

Seventy-two percent required firefighters to participate in monthly training to remain active, and 68 percent had operating budgets under \$100,000.

On average, these companies had 15.7 fundraising events each year and 76 percent required firefighter participation in the events.

To recruit new members, companies primarily relied on informal networks (49 percent).

According to the survey results, 42 percent of firefighters left the company for personal reasons; 10 percent for company-related reasons; and 48 percent for a combination of both reasons.

Five or More Net Gain in Firefighters

Seventeen percent of fire companies had a net increase of five or more firefighters. On average, these companies had an increase of 11.1 members and lost 3.7 members, for an average net increase of 7.4 members.

These companies had, on average, 21.6 members who regularly responded to calls and, over the past 2 years, responded to an average of 622 calls.

Sixty-three percent were located in an urban county and 37 percent were in a rural county. Sixty-two percent served a population of more than 5,000.

Seventy-two percent required firefighters to participate in monthly training to remain active, and 56 percent had operating budgets of \$100,000 or more.

On average, these companies had 16.1 fundraising events each year and 66 percent required firefighter participation in these events.

To recruit new members, the majority of companies (70 percent) relied on a combination of informal and formal recruiting methods.

According to the survey results, 23 percent of firefighters left the company for personal reasons; 6 percent for company-related reasons; and 71 percent for a combination of both.

Summary

Larger Companies Are More Successful in Recruiting/Retaining Members

In general, the larger the fire company, the more successful it was in recruiting and retaining firefighters. Additionally, larger companies tended to have bigger budgets and responded to more fire calls compared to smaller and mid-size companies.

Female Firefighters Are Still in Short Supply

While it is not unusual for fire companies to have female firefighters, it is unusual for companies to have more than a handful of female firefighters. The 2012 survey results indicated that while the majority of companies (79 percent) had at least one female firefighter, the average company had less than three female firefighters.

Most Fire Companies Are Able to Recruit Firefighters

The 2012 survey results indicated that more than 95 percent of fire companies recruited one or more firefighters. On average, companies recruited six new firefighters, and the majority of these new recruits were between the ages of 18 and 30 years old. Overall, companies had an average net increase of one new firefighter in 2012.

Too Many Fundraisers Are Negatively Affecting Firefighter Retention

Only one variable was correlated with the number of fundraising events—retention. The number of fundraising events was not correlated with the size of the fire company, the number of firefighters, the number of new firefighters, or the net change in firefighters. So, it appears that the more fundraising events the company sponsored the more firefighters that left the company or became inactive. This finding could suggest that many fundraising events may contribute to the loss of firefighters; but it does not necessarily deter new firefighters from joining.

Little Change in the Number of Firefighters

Data from the 2001 survey showed that the average fire company had 18.2 firefighters who regularly responded to calls. In 2012, the average was 16.8 firefighters. The difference between 2001 and 2012 was not statistically significant. While some companies may have seen a decline in the number of firefighters who respond to calls, most have seen little or no change.

Pennsylvania Firefighters: Recruitment and Retention, 2001 and 2012

	2001 (n=883)	2012 (n=601)
Average # Firefighters Who Regularly Respond to Calls		
Average # Firefighters	18.2	16.8
Recruitment		
No New Firefighters Joined the Company	6%	5%
1 to 5 New Firefighters Joined the Company	45%	53%
6+ New Firefighters Joined the Company	49%	42%
Average # Firefighters Who Joined in the Last Two years	6.9	5.8
Retention		
No Firefighters Left the Company	15%	10%
1 to 5 Firefighters Left the Company	55%	61%
6+ Firefighters Left the Company	31%	29%
Average # Firefighters Who Left in the Last Two years	5.0	4.8
Net Change in Firefighters		
Companies with Net Loss in Firefighters	27%	36%
Companies with No Change in Firefighters	13%	12%
Companies with Net Gain of 1 to 4 Firefighters	35%	35%
Companies with Net Gain of 5 or More Firefighters	25%	17%
Average Net Change in Firefighters	1.9	0.9
Average # Female Firefighters		
Average # Female Firefighters	2.6	2.5
Age of Firefighters		
Under 18 Years Old, 2012	7%	8%
18 to 30 Years Old, 2012	31%	29%
31 to 40 Years Old, 2012	30%	28%
40 Years Old and Older, 2012	32%	35%
% of Firefighters Who Work in First-Due Area		
None - No Firefighters	14%	16%
1% to 25% Firefighters	72%	68%
26% to 50% Firefighters	8%	8%
50% or More Firefighters	6%	8%
Do Firefighters Regularly Leave Work to Respond to Calls?		
No	21%	29%
Yes	77%	70%
Unsure	2%	1%
Training		
Training Required to <u>Become</u> a Firefighter	86%	85%
Monthly Training Required to <u>Remain</u> a Firefighter	60%	67%
Fire Calls		
Average # Fire Calls Over Past 2 years	n.a.	551.1
Current Operating Budget		
<\$50,000	47%	28%
\$50,000 to \$99,999	29%	32%
\$100,000+	24%	40%
Fundraising		
Average # Fundraising Events	n.a.	17.4
Companies that Require Firefighters to Participate in Fundraising Events	n.a.	72%