1999 NATIONWIDE LEPC SURVEY
MAY 17, 2000

Mark Starik
William C. Adams
Polly A. Berman
Krishnan Sudharsan

Center for Environmental Policy and Sustainability Management
Department of Public Administration
Department of Strategic Management and Public Policy
The George Washington University
Washington, D.C. 20052
202-994-5621

Grant funding for this research
provided by the
Chemical Emergency Preparedness
& Prevention Office of the
U.S. Environmental Protection Agency

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ACKNOWLEDGEMENTS

We thank the Chemical Emergency Preparedness and Prevention Office (CEPPO) of the U.S. Environmental Protection Agency, including Sherry Fielding, Kathy Jones, Bill Finan, and Dan Waldeck. In addition, we thank our colleagues in the Department of Strategic Management and Public Policy, the Department of Public Administration, the Center for Environmental Policy and Sustainability Management, and The George Washington University School of Business and Public Management.

The judgements and findings of this study are ultimately those of the researchers and are not necessarily those of any of the individuals or organizations cited above.

Mark Starik
William C. Adams
Polly Berman
Krishnan Sudharsan

Washington, D.C.
May, 2000

Executive Summary

From October 1999 through February 2000, researchers from The George Washington University completed 2,106 mail and fax surveys of Local Emergency Planning Committees (LEPCs) in the U.S. This research effort achieved a completion rate of 50.8% of the total number of 4,145 LEPCs in the U.S. known to EPA. Respondents were asked to complete an eight-page survey and submit the survey to the researchers. However, if the respondent considered the LEPC to be "Inactive", a short, one-page survey, provided to all survey recipients, could be returned to summarize the main status and reasons for inactivity of the LEPC. These respondents did not need to complete and return the eight-page survey.

The present study is a follow-up to a similar study conducted in 1994 by The George Washington University for the U.S. EPA Chemical Emergency Preparedness and Prevention Office.

While the 1994 study was useful in providing a picture of the status of LEPCs, the sampling technique utilized for the survey was criticized as being overly-dependent on state residential population size. Therefore, the 1999 survey responded to this criticism by surveying the entire population of LEPCs rather than sampling the LEPC population by state demographics.

Both the 1994 and the 1999 surveys were designed to provide a snapshot of LEPCs at the point in time in which they were conducted. Where possible, the current researchers have provided comparative information between the 1994 and the 1999 survey data. It is important to note, however, that due to the change in selection methodology, any comparisons between 1994 and 1999 results are not statistically significant.

The main findings of the 1999 survey research are highlighted below.

Legend for 1999 LEPC Survey Responses		
Categories of LEPCs	**Total Number**	**Percentage**
All Known LEPCs/LEPCs Surveyed	4145	100%
Total LEPCs Responding to Survey	2106	50.8% of All Known LEPCs
LEPCs Responding to 8-page Survey	1711	81.2% of Total Respondents
LEPCs Responding to 1-page Survey	395	18.8% of Total Respondents
Active LEPCs Responding to 8-page Survey	1244	59.1% of Total Respondents
Inactive LEPCs Responding to 8-page Survey	467	22.2% of Total Respondents

Activity Level of LEPCs

- The majority of LEPCs responding to the 1999 survey served rural areas and residential populations under 50,000. Among the four U.S. regions, more LEPCs responded from the Northeastern region than any of the others, but not disproportionately so, compared to the number of total number of known LEPCs located in that region. In fact, the Northeastern region was somewhat underrepresented by the number of LEPCs responding from that region, and the other three regions were somewhat overrepresented.

- LEPCs responding to the 1999 survey were 59.1% "Compliant" or "Mostly Compliant" and 40.9% "Not Compliant". Those LEPCs in low residential population, in the Northeastern and Southern regions of the U.S., and in rural areas had higher percentages of "Not Compliant" profiles than LEPCs in other areas.

- LEPCs responding to the 1999 survey were classified as 26.5% "Very Proactive", 33.7% "Somewhat Proactive", and 38.9% "Not Proactive". Those LEPCs in medium residential population, in Midwestern, and in urban areas had higher percentages of "Very Proactive" profiles than LEPCs in other areas.

- Of those LEPCs that responded to the short one-page survey and were therefore self-classified as "Inactive", 64.3% were once active but became inactive over the years. According to the respondents to the 8-page survey and classified by the researchers as "Inactive", more of these LEPCs served low residential populations and were located in the Northeast or South, than LEPCs responding to the 1999 survey in general.

- Even with the stricter methodological standards of the 1999 survey, more LEPCs were "Active" than were "Inactive". "Active" LEPCs are slightly overrepresentated in mid-population, in Midwestern, and in urban areas, compared to all LEPCs responding to the 1999 survey. The following are the main findings related to the activity of "Active" LEPCs:

  -- Large majorities of "Active" LEPCs have chairpersons, emergency coordinators, and information coordinators. Additionally,"Active" LEPCs averaged 23 members and most reported holding regular meetings.

  -- Over three-fourths of "Active" LEPCs reported having completed and submitted emergency response plans to their respective SERCs. An additional 15.6% of the "Active" LEPCs reported mostly completing their respective emergency response plans.

-- "Active" LEPCs identified the *List of Lists*, the NRT-2 publication entitled *Developing a Hazardous Materials Exercise Program*, and *Technical Guidance for Hazards Analysis* (Green Book) to be very useful resources. "Active" LEPCs also considered CAMEO and ALOHA to be very useful software packages. Finally, "Active" LEPCs identified LEPC technical assistance, LEPC training sessions, and industry technical assistance as the most useful training and assistance programs.

Role of LEPCs in Prevention

The 1999 survey of LEPCs indicates that LEPCs have taken on an important role in prevention of chemical emergencies.

- LEPCs viewed themselves as having an important role in the prevention of chemical emergencies, since 76.1% of "Active" LEPC respondents indicated that LEPCs should play at least a moderate role in the prevention of chemical emergencies.

- Nearly half, or 48.5%, of "Active" LEPCs reported that they had made hazard reduction, accident prevention, or pollution prevention recommendations to industry or local government.

- Over half, or 57.0%, of "Active" LEPC respondents indicated that they provided assistance to local businesses, citing information, planning, and training as the types of assistance most typically provided.

Role of LEPCs in Counter-Terrorism

- Based on the results of the 1999 survey, EPA is well on its way to achieving its counter-terrorism goal for LEPCs. EPA's goal is to ensure that at least 50% of LEPCs incorporate counter-terrorism activities into their respective emergency response plans by 2005. As of 1999, 40.3% of active LEPCs, or 23.8% of all responding LEPCs indicated they had incorporated counter-terrorism measures into their emergency response plans.

Impact of Technology on LEPCs

- More "Active" LEPCs today are utilizing computer databases for their Tier I/II forms than they did in 1994, which indicates that LEPCs are increasingly able to gain access to information technology to assist them in handling their chemical inventory information.

- While the most common form of communication for "Active" LEPCs is through the SERC newsletter and mailings and EPA Regional newspapers, LEPCs would prefer to gain information from the EPA via e-mail. Thus, a communications system needs to be developed which permits exchange of information between EPA and LEPCs by e-mail. While CEPPO has developed a website to exchange information with the LEPCs, it appears that the website can be further promoted and made available to LEPCs by also developing an electronic listserv to promote direct contact by EPA to LEPCs.

Chemical Accident Prevention: A Natural Evolution

The U.S. EPA became involved in chemical emergency response in 1985 with the launch of its Chemical Emergency Preparedness Program (CEPP), a voluntary program to encourage state and local authorities to identify hazards in their areas and to plan for potential chemical emergencies. This local planning complemented emergency response planning carried out at the national and regional levels by the National Response Team and Regional Response Teams.

The following year, Congress enacted the Emergency Planning and Community Right-to-Know Act of 1986 (EPCRA), also known as Title III of the Superfund Amendments and Reauthorization Act (SARA). This law required states to establish State Emergency Response Commissions (SERCs) that would then set up Local Emergency Planning Committees (LEPCs), made up of representatives from the public safety, health care, and local industry sectors, to develop emergency response plans for each community. EPCRA also required facilities to make information available to the public regarding on-site hazardous chemicals. EPCRA's right-to-know reporting requirements were meant to foster a valuable dialogue between industry and local communities on hazards to help citizens become more informed about the presence of hazardous chemicals that might affect public health and the environment.

Most SERCs set up one LEPC for each county in the state, but a few used much smaller jurisdictions, such as townships, and a few others used much larger multi-county districts. For instance, the New England area, with traditionally very locally-based government, has a much higher representation of LEPCs than the rest of the United States, accounting for almost 20% of the total LEPC population.

By October of 1988, LEPCs needed to submit an emergency response plan to their respective SERCs. Among other things, these plans were to specify the quantity and location of stored or transported "Extremely Hazardous Substances",

procedures for emergency response, public notification, and evacuation in the case of chemical emergency.

EPA established its Chemical Accident Prevention Program in 1986 and integrated it with the Chemical Emergency Preparedness Program. Through these programs, EPA began to work with other stakeholder groups to increase knowledge of prevention practices and to encourage industry to improve facility safety.

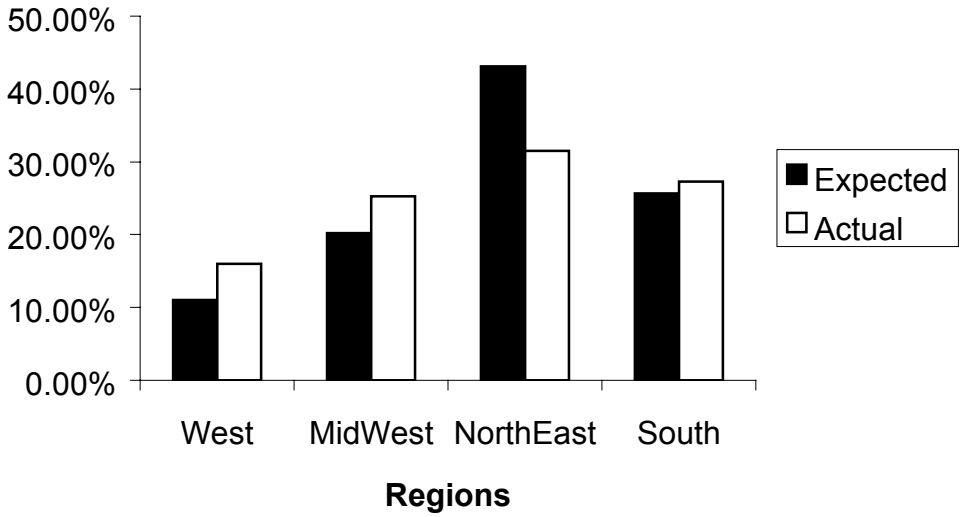
Under the Clean Air Act (CAA) Amendments of 1990, facilities were required to prepare risk management plans that summarized a hazard assessment, accident prevention program, and emergency response program. In addition, each state was required to set up programs to provide small businesses with technical assistance on the CAA and to help them comply with the Act's regulations. These small business programs needed to include assistance related to accidental release prevention and detection. EPA was charged with the development of regulations and guidance for the response, prevention, and detection of accidental releases associated with these hazardous substances. Acting on the principle that chemical hazards are a local issue, EPA has worked through the existing SERC and LEPC structures to implement the CAA Amendments of 1990.

Thus, an examination of the regulations aimed at reducing chemical accidents indicates an evolution from emergency response, through preparedness, to prevention. This continuum demonstrates the potential for LEPCs to serve as a basis for partnership among government, industry, and the public, as each of these groups is now playing a key role in preventing accidental releases of hazardous chemicals.

LEPCs at the Turn of The Century

Table 1 identifies characteristics of LEPCs by residential population, regional location, and service area characteristics, respectively. The majority of LEPCs responding to the current survey serve rural areas (60.1%) and residential populations under 50,000 (66.0%), with the major variations by region. Nearly a third operate in the NorthEast (31.5%) and only about a sixth (16.0%) operate in the West. Figure 1 illustrates that LEPCs from the NorthEast were underrepresented and LEPCs from the West and MidWest were slightly overrepresented, compared to the regional distribution of all known LEPCs.

Figure 1: Expected versus Actual Regional Distributions of LEPCs



To provide more information on the characteristics of LEPCs, they were first examined according to level of compliance with EPCRA requirements, and then to level of proactivity in going beyond these legal requirements. A comparison of compliance and proactivity was then conducted to determine more specific interactions among the LEPCs in abiding by both the letter and the spirit of the EPCRA law. Next, the LEPCs were segmented according to actual activity status. The characteristics of "Inactive" and "Active" LEPCs were examined. From that point onward, the report describes the attributes of only "Active" LEPCs, regardless of their specific level of compliance and/or proactivity.

Compliance and Proactivity Classifications of LEPCs

Compliance Classifications

The 1999 survey focused on eight central provisions of the EPCRA law, as described below:

- having a chairperson;
- having a community emergency coordinator;
- having an information/communications coordinator;
- holding regular meetings;
- advertising meetings to the public;

- developing an emergency response plan, and submitting it to the SERC;
- publishing newspaper notice about availability of emergency response plan; and,
- reviewing the plan in the past year.

Figure 2: LEPC Compliance Classifications
2106 LEPCs Reporting

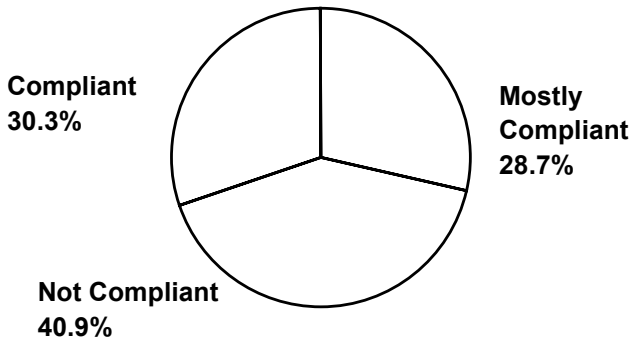


Figure 2 indicates the compliance level of LEPCs by three classifications: "Compliant", "Mostly Compliant", and "Not Compliant." These classifications are described below. Further, Table 2 identifies the compliance classifications of LEPCs by LEPC residential population size, region, and service area characteristics. "Not Compliant" LEPCs were located in disproportionately low population areas and rural areas and in either the Northeastern or Southern regions of the U.S., compared to all LEPC respondents. The level of LEPC compliance in 1999 appears to have diminished compared to 1994 compliance levels, which were as follows: 44% "Compliant", 35.0% "Mostly Compliant", and 21.0% "Not Compliant".

Compliant LEPCs

A total of 30.3% of the 2106 LEPCs responding were classified as "Compliant", indicating that they fulfilled at least seven of eight of the EPCRA provisions.

All of the "Compliant" LEPCs reported having a chairperson, 98.6% a community emergency coordinator, and 90.1% an information coordinator. Additionally, 98% of the "Compliant" LEPCs reported having regular meetings, and 95.1% advertised these meetings to the public. 79.3% of these "Compliant" LEPCs reported publishing notices in the newspapers about their meetings and about the availability of their emergency response plans.

As completion and submission of an emergency response plan is of primary relevance to compliance, it is important to note that 90.3% of the "Compliant" LEPCs had submitted a completed emergency response plan to their respective SERCs. The remaining 9.7% indicated that they had either partially completed (2.5%) or mostly completed (7.2%) their plans. Of the 90.3% "Compliant" LEPCs that indicated they had submitted completed emergency response plans to their

respective SERCs, 94.5% reviewed these plans during the past year. Every one of the remaining 9.7% who had mostly or partially completed emergency response plans reported reviewing their plans during the past year.

Mostly Compliant LEPCs

A total of 28.7% of the 2106 LEPCs responding reported they fulfilled either five or six of these requirements, but fell short on two or three, and, therefore, were classified as "Mostly Compliant" LEPCs.

98.7% of these "Mostly Compliant" LEPCs reported having a chairperson, 87.1% a community emergency coordinator, and 68.6% an information coordinator. 77% of the "Mostly Compliant" LEPCs stated they held regular meetings, and 63% advertised these meetings to the public. Only 29.1% of the "Mostly Compliant" LEPCs published notices in the newspaper about their meetings and about the availability of their emergency response plans.

Further, 59.7% of these "Mostly Compliant" LEPCs reported completing an emergency response plan and submitted it to their respective SERC. Of these LEPCs, 68.4% indicated they reviewed the emergency response plan during the past year, 24.4% 1-2 years ago, 6.4% over 2 years ago, with less than 1% indicating they never reviewed their emergency response plan.

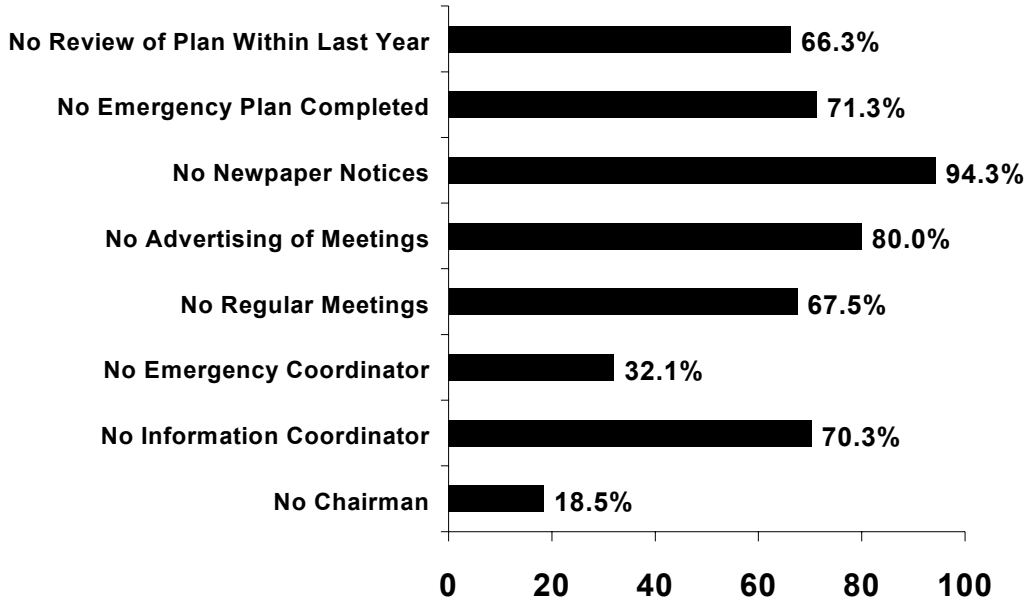
Finally, 36.3% of the remaining "Mostly Compliant" LEPCs reported either mostly completing (24.6%) or partially completing (11.7%) their emergency response plans, with 4% indicating little or no progress on the development of an emergency response plan. The majority of these LEPCs, however, indicated they had reviewed their incomplete plans during the past year. Fully 76.5% of these latter LEPCs reported their emergency response plans were mostly completed, while 64.8% reported their emergency response plans were partially completed.

Not Compliant LEPCs

The remaining 40.9% of 2106 LEPCs either responded to the eight page survey and reported that they fulfilled four or fewer of the EPCRA provisions, or returned the one-page survey, and, therefore, were classified as "Not Compliant". "Not Compliant" LEPCs that returned the eight-page survey reported that 18.5% did not have chairpersons, 32.1% did not have community emergency coordinators, and 70.3% did not have information coordinators. Only 32.5% of "Not Compliant" LEPCs held regular meetings and only 20.0% advertised the meetings they did have to the public. The "Not Compliant" LEPCs overwhelmingly did not publicize the availability of meetings or their respective emergency response plans in newspapers (94.3%).

Only 28.7% of the “Not Compliant” LEPCs reported submitting completed emergency response plans to their respective SERC, with another 28.2% reporting having mostly completed their emergency response plans. The remaining 43.1% of “Not Compliant” LEPCs reported partial completion of emergency response plans (20.4%) or little or no progress on their emergency response plans (22.7%).

Figure 3: "Not Compliant" LEPC Compliance Problems
467 LEPCs Reporting



About a third (33.8%) of “Not Compliant” LEPCs indicated they had reviewed their plans within the past year, and nearly half (49.5%) reported they had reviewed their plans between 1 and 2 years ago. The remaining 16.8% of “Not Compliant” LEPCs reported either reviewing their plans over 2 years ago (13.2%) or never (3.6%). Figure 3 indicates the frequencies that "Not Compliant" LEPCs reported in 8 categories.

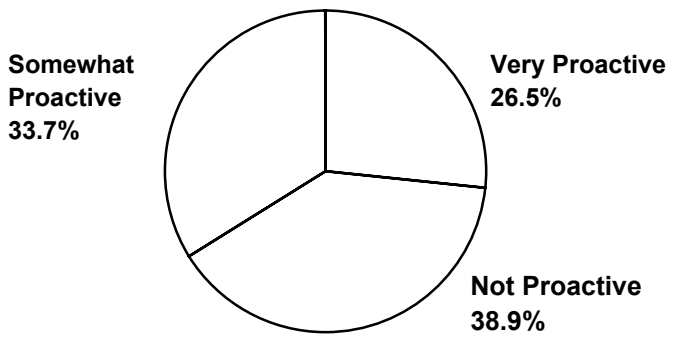
Proactivity Classifications

While LEPC compliance with the above EPCRA provisions is mandatory, many LEPCs reported going beyond these legal minimum requirements, particularly in the following areas:

- meeting quarterly or more often;
- making informed hazard reduction, accident prevention, or pollution prevention recommendations to industry or local government;
- incorporating risk management information into its emergency plan, or having a strategy to incorporate risk management information into its emergency response plan within the year;
- updating the plan in the past year; and,
- practicing the plan in the past year.

Figure 4 indicates the frequency that LEPCs reported they went beyond complying with EPCRA, that is, the frequency they were proactive in managing local emergency plans and responses. 26.5% of LEPCs indicated they had adopted a majority (at least three out of five) of these proactive measures, and were thus categorized as "Very Proactive", while 33.7% reported that they had taken at least

Figure 4: LEPC Proactivity Classifications
2106 LEPCs Reporting



one of the proactive steps above, and were classified as "Somewhat Proactive". It appears that the level of proactivity has also diminished between 1994 and 1999, as 37.0% of LEPCs reported being "Very Proactive" in 1994, 28.0% of LEPCs were "Somewhat Proactive" in 1994, and 25.0% of LEPCs were "Not Proactive" six years ago. Figure 5 indicates the frequency that LEPCs reported going beyond EPCRA compliance in 5 categories.

Figure 5: LEPC Proactivity Category Frequencies
2106 LEPCs Reporting

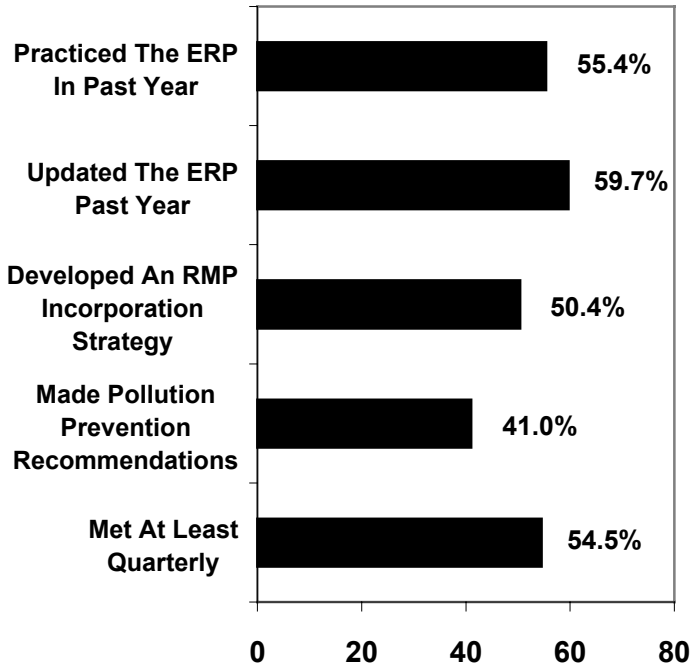


Table 3 highlights LEPC residential population size, region, and service area characteristics by the proactivity classifications. LEPCs in medium-population, Midwestern, and urban areas had higher percentages of "Very Proactive" profiles than did LEPCs in other areas.

Very Proactive LEPCs

The beyond-compliance areas that the 26.5% "Very Proactive" LEPCs reported activity were: meeting quarterly or more often (86.7%), making hazard reduction, accident prevention, or pollution prevention recommendations to industry or local government (78.7%), and developing a strategy for incorporating risk management information into emergency response plan (84.6%). In fact, over half (53.9%) of the "Very Proactive" LEPCs indicated they had already incorporated risk management information into their emergency response plans. Of the 80.7% of the "Very Proactive" LEPCs that reported having completed emergency response

plans submitted to their SERC, 93.7% reported having updated their plans during the past year and the same percentage reporting having practiced their plans during the past year.

Somewhat Proactive LEPCs

The 33.7% "Somewhat Proactive" LEPCs reported substantial activity in the areas of updating and practicing their emergency response plans. 67.8% of "Somewhat Proactive" LEPCs reported completing emergency response plans and submitted the plans to their SERC. 61.6% of "Somewhat Proactive" LEPCs reported updating their plans during the past year and 54.8% had practiced their plans within the past year. Almost half (46.8%) of the "Somewhat Proactive" LEPCs indicated they had a strategy for incorporating risk management information into their emergency response plans.

Not Proactive LEPCs

38.9% of LEPCs reported no proactivity measures, and were therefore classified as "Not Proactive". Of these "Not Proactive" LEPCs, about half (53.8%) said they had completed emergency response plans submitted to their respective SERCs. The majority of the "Not Proactive" LEPCs reported last updating (42.0%) or practicing (38.2%) their plans between 1 and 2 years ago.

Comparing Compliance and Proactivity Criteria

The extent to which LEPCs reported that they both complied with the law and took a proactive approach to chemical emergency planning and prevention is central to this research. Having previously reviewed each of these areas separately, the question remains how compliance and proactive approaches interact.

Table 4 compares LEPCs by compliance level and level of proactivity.
One might expect that only those LEPCs that are compliant would go beyond the law and implement the proactive measures described above. Yet, the actual pattern of activity is more complicated.

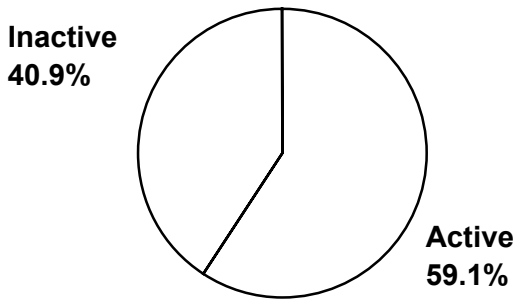
Apparently some LEPCs, while not meeting the letter of the law, may nonetheless be abiding by its spirit. As expected, the more compliant LEPCs were also those more inclined to be more proactive, as 18.0% were both "Compliant" and "Very Proactive" and 10.9% were "Compliant" and "Somewhat Proactive". But, 7.1% of LEPCs were very proactive while being "Mostly Compliant", with 15.7% of LEPCs demonstrating at least some proactivity while being "Mostly Compliant". Thus, proactivity does not begin only after legal compliance is attained. Some LEPCs reported taking valuable proactive steps, even if they were bypassing certain legal basics.

Further, an analysis of Table 2 and Table 3 indicates that LEPCs representing rural populations, areas under 50,000, or in the Northeastern or Southern regions of the United States had higher percentages of combined "Not Compliant-Not Proactive" profiles than did LEPCs representing other areas.

Active and Inactive Characteristics of LEPCs

As described previously, LEPCs were then segmented according to actual activity status. As indicated in Figure 6, out of the total responding population of LEPCs (2,106), 40.9% (862) were classified as "Inactive" and 59.1% (1,244) "Active". Almost twice the percentage of LEPCs were classified as "Inactive" in 1999, compared with 1994, when only 21.0% of LEPCs were found to be "Inactive".

Figure 6: LEPC Activity Classifications 2106 LEPCs Reporting



The characteristics of "Inactive" and "Active" LEPCs in 1999 are examined below in greater detail. After this examination, the remainder of the report describes the attributes of only the "Active" LEPCs, regardless of their specific level of compliance and/or proactivity.

Characteristics of Inactive LEPCs

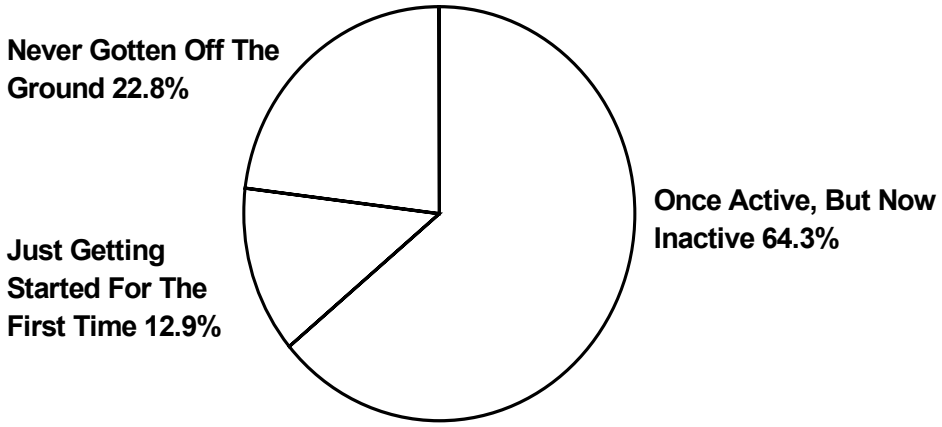
Responding LEPCs were classified as "Inactive" if:

a. The chairperson of the LEPC acknowledged that the LEPC was "Inactive" through completion of the short, one-page survey specifically designed for those LEPCs that were not active; or

b. They were classified as "Not Compliant" in the above analysis (e.g., they fulfilled fewer than five of the eight surveyed compliance requirements), using the eight-page returned survey.

As detailed in the methodology section of this report, LEPCs were provided both the long, eight-page survey as well as the short, one-page survey. Each LEPC respondent selected which of the two surveys that would be completed based on self-assessments of their individual LEPC activity status.

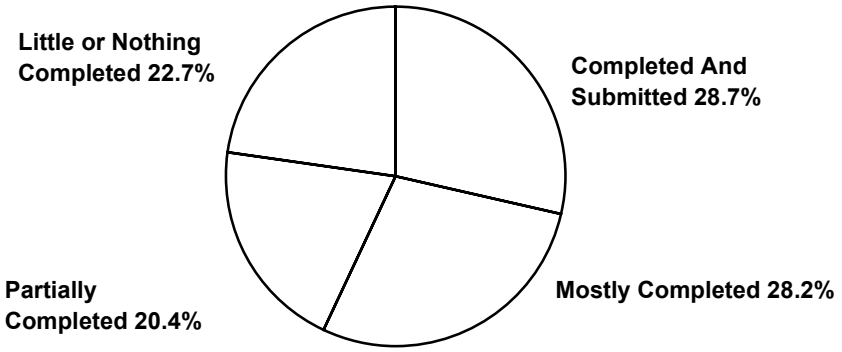
Figure 7: Reasons for LEPC Inactivity
395 LEPCs Reporting



The short, one-page survey asked the LEPCs to describe the reasons for their inactivity (See Figure 7). Out of the total 2,106 survey respondents, 395 (18.7%) completed the short, one-page survey (about 1 out of every 6 respondents). 22.8% of these LEPCs indicated that they were "Inactive" because their LEPCs had "never gotten off the ground", and 12.9% deemed themselves as "Inactive" because they were "just getting started for the first time". However, the majority of these "Inactive" LEPCs once had a formal emergency response plan completed but had since become inactive (64.3%). The reasons these chairpersons gave to explain their "Inactive" status included a lack of serious local chemical risks (15.7%), a lack of local interest and participation (22.0%), and a lack of financial support (6.8%). Nearly half (42.6%) of these "Inactive" LEPCs indicated that 2 or more of these reasons contributed to their inactive status, and 12.9% indicated "other" reasons for their inactivity.

More detail about the characteristics of "Inactive" LEPCs can be ascertained from those LEPCs that completed the eight-page survey. As stated above, these are the LEPCs the researchers classified as "Not Compliant", and thus their characteristics match the characteristics of the "Not Compliant" LEPCs from the previous section. Table 5 identifies the characteristics of "Inactive" LEPCs based on population size, region, and service area. "Inactive" LEPCs , compared to all responding LEPCs, are disproportionately rural(68.5%), are located in the Northeast (35.7%) or South (30.4%), and serve populations under 50,000 (81%). Further, the majority of these "Inactive" LEPCs reported that they mostly completed their emergency response plans (58.6%), with 16.2% reported having completed the emergency response plans and submitted the plans to their respective SERCs. The other 25.2% reported either partial or little-to-no progress on their emergency response plans. Figure 8 illustrates that about a quarter of Inactive LEPCs are classified in each of the four emergency response plan categories.

Figure 8: Inactive LEPCs Emergency Response Plan Status
467 LEPCs Reporting



Characteristics of Active LEPCs

In contrast to "Inactive" LEPCs, all other LEPCs described below are classified as "Active" LEPCs. Table 6 indicates the population size, region, and service area characteristics of these "Active" LEPCs. Active LEPCs are slightly overrepresented in mid-population, Midwestern, and urban areas, compared to respondent LEPCs in general.

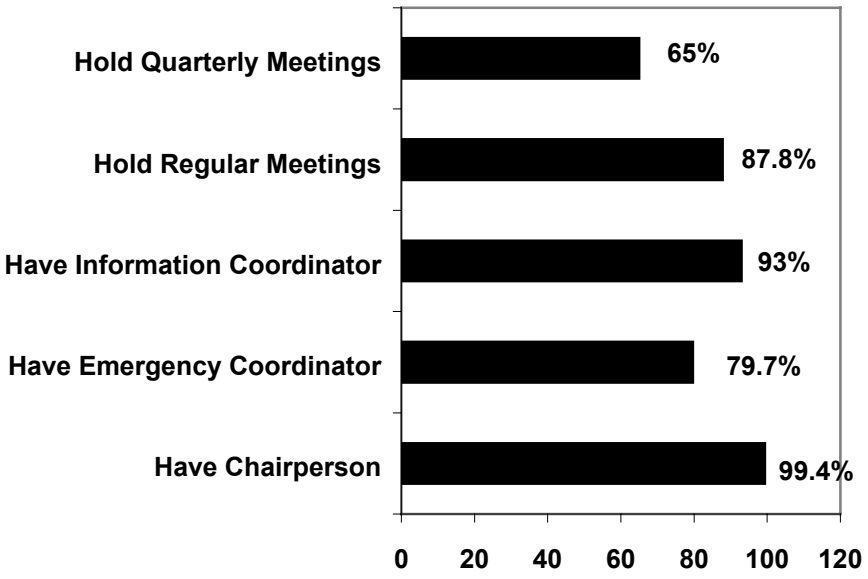
The remainder of this study reports trends and analyses exclusively pertaining to these "Active" LEPCs.

How are Active LEPCs Doing?

Structures and Procedures

Large majorities of "Active" LEPCs reported that they had a chairperson (99.4%), an emergency coordinator (79.7%), and an information coordinator (93.0%). Most (87.8%) reported holding regular meetings, and 65.0% of those holding regular meetings did so at least quarterly (See Figure 9). These "Active" LEPCs reported averaging 23 members.

Figure 9: Active LEPC Structures & Procedures
1244 LEPCs Reporting



Public Communications

An important EPCRA theme is ensuring and encouraging public accessibility to emergency response information. The following were survey response patterns of "Active" LEPCs, relating to public communications:

- 57.5% of 'Active" LEPCs reported receiving no requests for information in the past year, and of those "Active" LEPCs that did receive requests for information, the average number of requests was 7. Of these requests, the information requested was reported as follows:

  - 1 out of every 7 requests was for RMP information,
  - 3 out of every 7 requests were for other EPCRA information, and
  - 3 out of every 7 requests were for other information.
  - LEPC request fulfillment was rarely deemed insufficient by the requesters, and, in fact, 97.2% of LEPCs reported never being notified of providing insufficient responses to requests for information.

- Only 48.6% of "Active" LEPCs received training in effective risk communication. When received, state government was the most frequently (49.0%) cited source of this training, and local government was cited as the second most frequent source of training (25.9%).

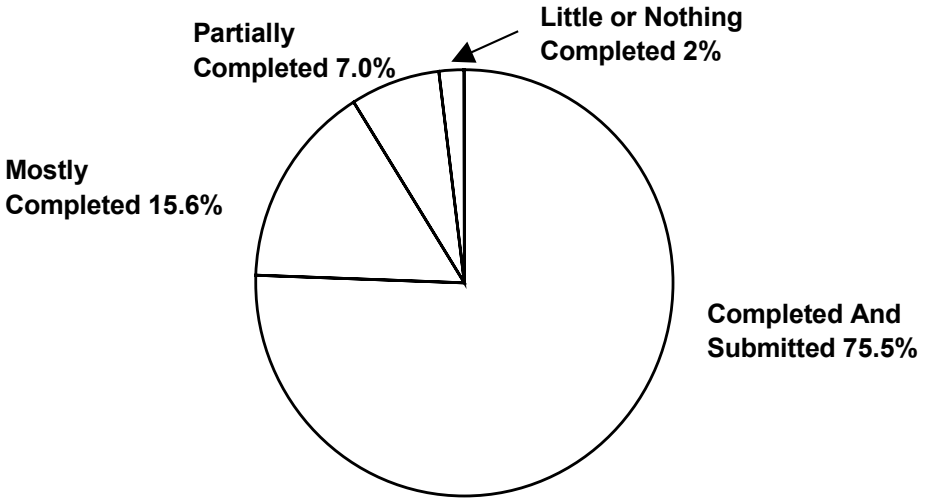
- Most (79.5%) of "Active" LEPCs reported advertising their meetings to the local public.

- While only half (54.9%) of the "Active" LEPCs reported publishing the mandated annual newspaper notice about the public availability of the emergency plan and the EPCRA data, 90.9% reported that they had adopted procedures to make the emergency response plans and EPCRA data available to the public. Newspaper was favored as the method of choice among public notification methods, with 70.1% of "Active" LEPCs reporting utilizing newspapers as the channel to communicate the availability of the plan. However, it appears that public meetings were another useful forum for making emergency response plans and EPCRA data available to the public, with 50.8% of "Active" LEPCs reporting this method of public communication. Public meetings are required under PL 106.40, and while we cannot say for certain, it appears that the law may have affected the number of public meetings.

Emergency Response Plans

Most (75.5%) of the "Active" LEPCs reported submitting a completed emergency response plan to their respective SERCs. Additionally, 15.5% reported their plans were "mostly completed", with 6.9% reporting only partial completion and less

Figure 10: Active LEPCs Emergency Response Plan Status
1244 LEPCs Reporting



than 2% reporting little or no completion on their emergency response plans (See Figure 10).

As indicated in Table 7, the major patterns that emerged related to emergency response plan progress and activity were that the highest completion rates were reported in LEPC population areas greater than 1,000,000, the lowest completion rates were reported in areas of 50,000 or less, and that LEPCs in urban areas had higher rates of completion than those in rural areas.

As in the 1994 study, "Active" LEPCs in 1999 reported giving their plans significant attention. Specifically, the following patterns of "Active" LEPCs related to reviewing, updating, and practicing emergency response were found in 1999:

- More than four-fifths (81.7%) reported reviewing their plans in the past year.

- Nearly three-quarters (74.6%) reported updating their plans in the past year.

- Many (69.1%) reported practicing their respective plans in the past year. Of these LEPCs, over 90% reported having local government, EMS, fire, and police participation in the practice exercise, and over 50% reported including participation by state government, hospitals, and industry.

- Neary half (47.2%) reported revising their plans as a result of these practice exercises.

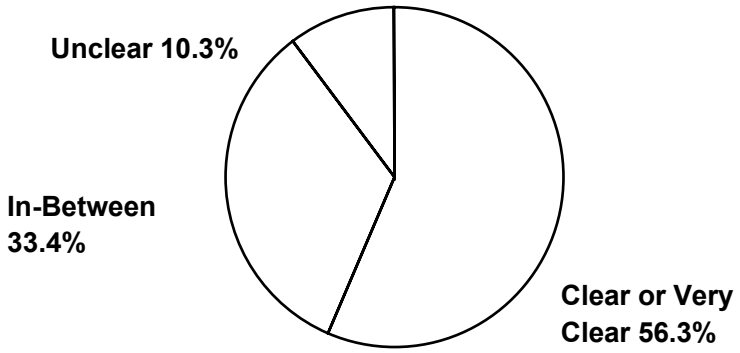
- Most (83.6%) reported developing site-specific emergency plans.

- More than half (53.9%) reported using their plans to respond to a chemical emergency, attesting to the importance of maintaining an updated, operable plan. 98.0% of the LEPCs reported that their respective emergency response plans proved effective in responding to chemical emergencies, and 46.0% reported that they had updated their plan as a result of the response action.

- A large majority (87.4%) of LEPCs emergency response plans reported incorporation of the shelter-in-place option for personal protection.
-
- A similar majority (86.8%) of emergency response teams identified in LEPC emergency response plans had received training that met or exceeded the EPA and OSHA training requirements.

Clarity of SARA Title III Mandates

Figure 11: Clarity of SARA Title III Mandates
1244 LEPCs Reporting



Clarity of federal mandates is a continuing issue in many SARA III mandates were to them. As indicated by Figure 11, 56.3% responded that these were "clear" or "very clear", while 10.3% stated that they were "unclear" or "very unclear", with 33.4% "in between".

Other than funding, LEPCs stated that they could benefit from additional EPA assistance in the areas of training and information relating to SARA Title III regulations.

Priorities for Improvement

Similar to the 1994 survey, this study requested that LEPC chairpersons indicate their three top priorities, from a list of 15 items, for improving their respective LEPCs. These items were:

1. Administration of the LEPC
2. Communicating with the public
3. Communicating with facilities in the community
4. Conducting (jurisdiction-wide) hazard analyses
5. Determining the level of risk in the jurisdiction
6. Developing/reviewing emergency response plans
7. Identifying non-reporting facilities
8. Conducting safety audits or other methods to reduce risks at the facility level
9. Developing training programs
10. Conducting drills and exercises
11. Filing and automating hazard data
12. Using CAMEO or other automated information management systems
13. Outreach/communicating with the public
14. Integrating other scenarios (e.g., counter-terrorism, natural disasters) into emergency plans
15. Understanding and using RMP information

The most frequently selected priorities were 1) identifying non-reporting facilities, 2) developing training programs, and 3) using CAMEO or other automated information management systems.

Survey respondents rarely selected communicating with facilities in the community, developing/reviewing emergency response plans, or administration of LEPCs as priority areas for improvement.

Familiarity and Usefulness of LEPC Assistance and Support

Also similar to the 1994 survey, this study requested that LEPC chairpersons indicate the usefulness of 39 different types of support or assistance that LEPCs may have received: 14 EPA tools and publications, three other publications, six software programs, ten training and assistance programs, and six types of meetings.

Familiar Resources – For an LEPC chairperson to indicate whether or not support or assistance was useful, he or she needed to be familiar with these sources.

- Of the 14 EPA tools and publications which were considered familiar sources, LEPC chairpersons considered the following to be "very useful":
  - List of Lists (42.9%)
  - Developing a Hazardous Materials Exercise Program (NRT-2) (32.2%)
  - Technical Guidance for Hazards Analysis (Green Book) (28.3%).

- Other publications included the SERC newsletter, industry publications and trade publications. Of these, LEPCs considered the SERC newsletter (31.2%) to be "very useful".

- Of the six software packages, LEPCs considered the CAMEO (56.4%) and ALOHA (44.4%) packages to be "very useful".

- Of the ten training and assistance programs, LEPC person-to-person technical assistance (43.8%), training sessions conducted by the LEPC (44.5%), and, industry person-to-person technical assistance (41.2%) were assessed as "very useful".

- Finally, of the six types of meetings, LEPC leaders thought the SERC/LEPC meetings (41.6%), the statewide LEPC meetings (36.8%), and the Hazardous Material Spills Conference (27.1%) were "very useful".

- The poorest usefulness ratings of any resources with which LEPC chairpersons were familiar were given to:
  - Technical Assistance Bulletins (11.0%)
  - EPA's Accident Investigation Reports (14.2%)
  - RMP Guidance for Implementing Agencies (15.4%).

Unfamiliar Resources – LEPCs seem relatively familiar with the publications available to support and assist them in their activities. Further, they seem to be aware of the training opportunities and technical assistance that is available to them. However, while the CAMEO and ALOHA software was well-known and considered "very useful", most LEPCs were not familiar with the other software designed to assist them. Specifically, 56.5% of LEPCs are not aware of RMP*Info, 61.4% of LEPCs were not familiar with RMP*Review, and 61.3% of them did not know about RMP*Comp. Further, 59.5% are not aware of the Landview III software. Regarding the meetings designed to bring LEPCs together with information and assistance sources, most LEPCs reported the NASTTPO Conference (79.5% were not aware of it), the NGA Meeting (73.6% were unaware of it), and the CAMEO Conference (66.2% were unaware of it).

Role of LEPCs in Prevention

The reduction and prevention of hazards is a very important, though not mandated, role of LEPCs. Prevention activities may include providing chemical hazards information to the public, working with local businesses to operate safely, or recommending ways to reduce chemical hazards, improve chemical processes, or prevent accidents. Three out of every four (76.1%) LEPCs indicated their opinion that LEPCs should play at least a moderate role in the prevention of chemical emergencies.

Nearly half (48.5%) of "Active" LEPCs reported that they had made hazard reduction, accident prevention, or pollution prevention recommendations to industry or local government. Over half (57.0%) of "Active" LEPC respondents indicated that they also provided assistance to local businesses, citing information, planning, and training as the types of assistance most typically provided.

Few (18.0%) of the LEPCs reported "high" involvement with large businesses, and still fewer (12.4%) reported "high" involvement with small businesses.

Several sets of questions were only asked on the 1999 survey. One such set of questions was related to LEPC involvement with Risk Management Programs (RMPs). Most (61.3%) of the LEPCs reported working with industry in preparation of the RMP, and 78.7% reported that they intended to obtain RMPs for the facilities in their respective communities, primarily directly from facilities (73.4%). About half (54.7%) reported that they reviewed one or more RMPs for the facilities in these communities, averaging, among those who reported one or more facilities, about 5 facilities. Nearly half, or 48.1%, reported they had a strategy for incorporating RMP information into their respective emergency response plans, while 35.5% of LEPCs reported they had already incorporated data into their respective emergency response plans. 52.9% of those that worked with the RMP information found it to be at least moderately useful.

Regarding LEPC awareness of their authority to request MSDS and chemical inventory information below the thresholds established by EPA, 82.3% of "Active" LEPCs indicated that they were aware of this authority.

Role of LEPCs in Counter-Terrorism

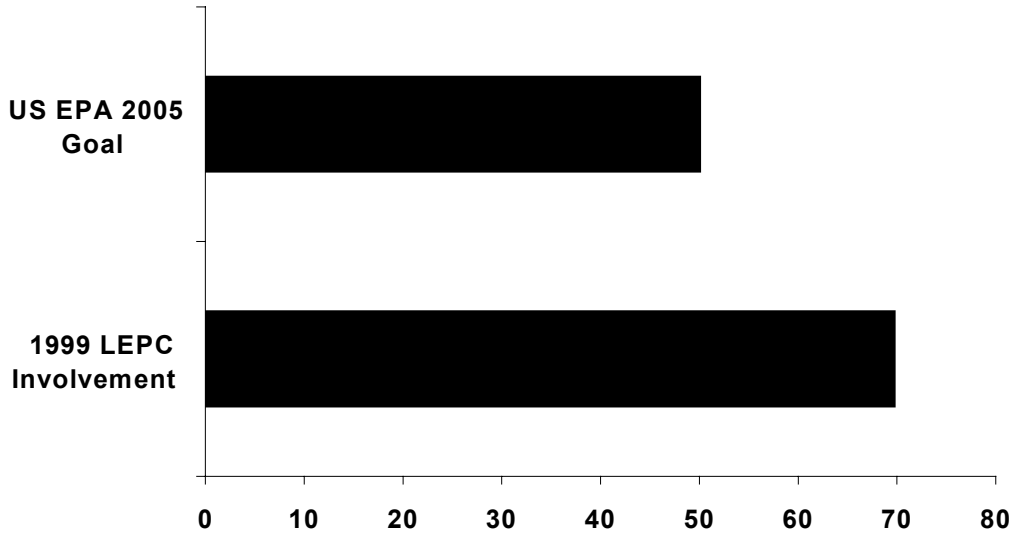
Under the Emergency Planning and Community Right-to-Know Act (EPCRA), the EPA is charged with preparing for and responding to emergencies involving oil, hazardous substances, and certain radiological materials – any of which could be a component of a weapon of mass destruction. In addition, the President has given

EPA responsibility for some counter-terrorism activities, including assisting the FBI in determining what sort of hazardous substance may be, or has been, released in a terrorist incident as well as following an incident, assisting with environmental monitoring, decontamination efforts, and long-term site clean-up operations.

EPA supports the Federal counter-terrorism program by helping state and local responders to plan for emergencies, training first responders, and providing resources in the event of a terrorist incident.

Since much of EPA's involvement in the Federal counter-terrorism program focuses on the local level, this survey posed several questions related to the involvement of LEPCs in counter-terrorism programs. A goal of the U.S. EPA is to have 50% of LEPCs revise their emergency response plans to incorporate counter-terrorism risks by 2005.

Figure 12: US EPA 2005 Goal for LEPC Involvement in Counterterrorism Programs



Surprisingly, 69.7% of the "Active" LEPCs reported already being involved in the Domestic Preparedness Counter-Terrorism Training Program for large cities, sponsored by the U.S. Department of Defense, the Department of Justice, and/or some other organization (See Figure 12). Many (40.3%) of the "Active" LEPCs indicated that they had already incorporated counter-terrorism risks and preparedness techniques into their respective emergency response plans, and 13.6% indicated they had conducted a counter-terrorism exercise.

Impact of Technology on LEPCs

Y2K Readiness

Y2K was an important issue for the United States, and the world, at the time the 1999 survey was written and sent to LEPCs. Thus, several questions related to Y2K issues were included on the survey.

Regarding the Y2K questions, 48.7% of the "Active" LEPCs reported *studying* Y2K impacts on local chemical and other facilities to a significant extent, and an additional 35.5% *studied* Y2K probems to a slight extent. Once studied, 41.5% of the LEPCs reported *addressing* these potential impacts to a significant extent, and 36.2% reported *addressing* potential Y2K impacts to a slight extent.

Information Systems

With the increased use of the Internet and computer technology, the current research was designed to identify any trends in the type of information systems utilized by the LEPCs between 1994 and 1999.

Information from Industry

Active LEPCs participating in the 1999 study had an average of 100 facilities reporting to them. In 1999, 28.5% of these LEPCs reported they used both computer databases and paper filing systems for their Tier I/II forms, an increase from 27% in 1994. A similar increase occurred in the use of only computer databases, with 21.5% reported only using computer databases in 1999 compared to 18% in 1994. A decrease in the reported use of only paper filing systems occurred between 1994 and 1999, as 55% of LEPCs reported using only paper filing systems in 1994 compared to 46.6% 1999. Only 3.4% of "Active" LEPCs reported that they had no information system for managing this chemical inventory information in 1999.

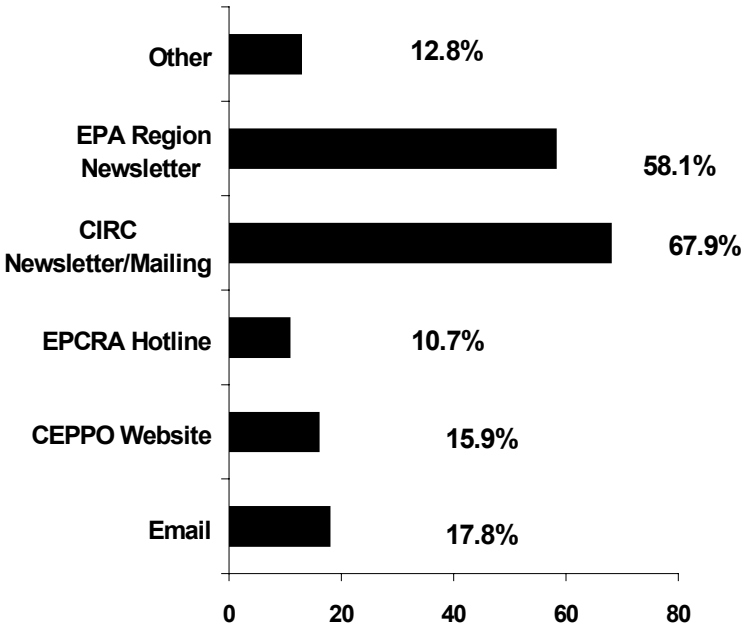
Information from EPA

As indicated in Figure 13, systems currently used by LEPCs to receive information from EPA (more than one system can be used by each LEPC) are as follows: 17.8% reported using e-mail, 15.9% the CEPPO website, 10.7% the EPCRA hotline, 67.9% the SERC newsletter/mailing, 58.1% the EPA region newsletter, and 12.8% some other method of information system.

When asked their preferred method of obtaining information from EPA, LEPCs ranked the above methods in the following order (from most preferred to least preferred method):

1. E-mail
2. SERC newsletter/mailing
3. EPA Region newsletter
4. CEPPO website
5. EPCRA hotline

Figure 13: Current Information Used by LEPCs
1244 LEPCs Reporting



Implications and Recommendations

Based on the results of the 1999 survey, and comparing appropriate trends of LEPC activity from 1994 to 1999, the following implications and recommendations are provided to EPA and other interested stakeholders by the researchers.

Activity Level of LEPCs

- The majority of LEPCs responding to the 1999 survey served rural areas and residential populations under 50,000. The major variations in LEPCs that responded were based on regional distribution across the United States, with nearly one-third operating in the Northeast and only about one-sixth operating in the West. However, compared to the distribution of all known LEPCs, the response rate of Northeast LEPCs was somewhat underrepresented, and those of the other regions somewhat overrepresented.

- LEPCs responding to the 1999 survey were 59.1% "Compliant" or "Mostly Compliant" with 40.9% responding classified as "Not Compliant". Those LEPCs classified as "Not Compliant" disproportionately represented low population and rural areas and the Northeastern or Southern regions of the United States.

- LEPCs responding to the 1999 survey were classified as 26.5% "Very Proactive", 33.7% "Somewhat Proactive", and 38.9% "Not Proactive". "Very Proactive" LEPCs disproportionately represented medium residential population, MidWestern, and urban areas.

- Most "Inactive" LEPCs reported having been once active, but having become inactive over the years. "Inactive" LEPCs disproportionately represented the Northeast and Southern U.S. regions and rural areas and those with populations under 50,000.

- Even with the stricter methodological standards of the 1999 survey, more responding LEPCs were classified as "Active" than "Inactive". "Active" LEPCs were slightly overrepresented in mid-population, Midwestern, and urban areas. The following are main findings related to the activity of "Active" LEPCs:

    - Large majorities of "Active" LEPCs have chairpersons, emergency coordinators, and information coordinators. Additionally, most "Active" LEPCs hold regular meetings and average 23 members.

    - Over three-fourths of "Active" LEPCs reported having completed and submitted emergency response plans to their respective SERCs. An

additional 15.6% of the "Active" LEPCs have reported mostly completed their emergency response plans.

- The "Active" LEPCs identified the *List of Lists*, the NRT-2 publication entitled *Developing a Hazardous Materials Exercise Program*, and *Technical Guidance for Hazards Analysis* (Green Book) to be very useful resources. "Active" LEPCs consider CAMEO and ALOHA to be very useful software packages. "Active" LEPCs identified LEPC technical assistance, LEPC training sessions, and industry technical assistance as the most useful training and assistance programs.

Role of LEPCs in Prevention

The 1999 survey of LEPCs demonstrates that LEPCs have taken on an important role in prevention of chemical emergencies.

- LEPCs view themselves as having an important role in the prevention of chemical emergencies, for 76.1% of the "Active" LEPC respondents indicated their opinion that LEPCs should play at least a moderate role in the prevention of chemical emergencies.

- Nearly half, or 48.5%, of "Active" LEPCs reported that they had made hazard reduction, accident prevention, or pollution prevention recommendations to industry or local government.

- LEPCs were also asked whether or not they provided technical assistance to local businesses, and, if so, what type of assistance they provided. Over half, or 57.0%, of LEPC respondents indicated that they did provide assistance to local businesses, citing information, planning, and training as the types of assistance most typically provided.

Role of LEPCs in Counter-Terrorism

- Based on the results of this survey, EPA is well on its way to achieving its counter-terrorism goal for LEPCs. EPA's goal is to have 50% of LEPCs incorporate counter-terrorism activities into their emergency response plans by 2005. At this point 40% of active LEPCs, or 11% of all known LEPCs have incorporated counter-terrorism measures into their emergency response plans. It appears that LEPCs provide an excellent mechanism for implementing the nation's counter-terrorism activities.

Impact of Technology on LEPCs

- More LEPCs today are utilizing computer databases for their Tier I/II forms than they did in 1994, which may indicate that LEPCs are able to gain access to information technology to assist them in handling their chemical inventory information.

- While the most common form of communication with LEPCs is through the SERC newsletter and mailings as well as through EPA Regional newspapers, LEPCs would prefer to gain information from the EPA via e-mail. Thus, a communications system needs to be developed which permits exchange of information between EPA and LEPCs by e-mail. While CEPPO has developed a website to exchange information with the LEPCs, it appears that the website can be furthered promoted and made available to LEPCs by first developing an electronic listserv to promote direct contact by EPA to LEPCs.

Methodology Summary

Population Based Survey – The 1994 survey analysis used a weighted sample that employed a state-based count which in turn was based on state residential population, meant to account for those states that have many more LEPCs than would be justified by the proportion of their state population. This technique was severely criticized by EPA's stakeholders following completion of the 1994 survey, who felt that the weighting inaccurately reflected the dynamic of the LEPCs at the local level. Thus, in order to respond to the criticism, the 1999 surveyed all known LEPCs. The researchers surveyed all 4,144 existing LEPCs in 1999. The results of this report are based on the 2,106 (50.82%) that responded to the survey.

Comparisons to 1994 Population-Weighted Survey – In order to gain insight into the different snapshots of LEPC trends from 1994 to 1999, comparisons are made to the 1994 survey in some areas throughout this report. The 1994 survey utilized a residential population-weighted random sample that surveyed one LEPC per every 120,000 residents of a state. The 1994 sampling technique is very different from the population technique utilized in 1999 that does not factor in residential differences between states

but surveyed every LEPC in the United States. It is important to note that these comparisons are being made from a sample to a population between years and using different methodologies. It is therefore important to recognize that any comparisons made are not statistically significant.

Questionnaire – The 1999 survey borrowed from and amended the 1994 instrument. Several changes were made and sections added to the present study's questionnaire based on discussions between the researchers and EPA CEPPO staff. These changes reflect either changes in or additions to the regulations for LEPCs or current issues of importance to EPA and other relevant stakeholders. An eight-page survey was the primary questionnaire. However, as described previously in this report, those LEPCs classifying themselves as "Inactive" were permitted to complete a short, one-page survey. Copies of these surveys are reprinted in Appendix B.

Survey Contacts – Five communication initiatives were once again undertaken in the 1999 survey, the same number of contacts as in the 1994 study.

- October 15-17, 1999: An initial mailing of the cover letter, survey, and return envelope with postage pre-paid were mailed to all known U.S. LEPC chairpersons.

- November 10, 1999: A first reminder postcard was mailed to all LEPC chairperson non-respondents.

- December 1-5, 1999: A second mailing of a revised cover letter, survey, short, one-page survey for "Inactive" LEPCs, and a return envelope with postage pre-paid were mailed to all LEPCs which had not yet responded.

- January 3-5, 2000: A second reminder postcard was mailed to all LEPC chairperson non-respondents.

- February 4-17, 2000: Telephone calls with follow-up faxes of a second revised cover letter, survey, and short, one-page survey were made to all LEPC non-respondents.

Regional Groups – The same four U.S. regions that were used in the 1994 report, based on the EPA's ten regions, were again used for the present study. The map in Appendix C illustrates how the EPA regions were combined to form these four broader regions that correspond closely to conventional groupings.

Appendix A: LEPC Survey Questionnaires

The George Washington University
Center for Environmental Policy

1999 NATIONWIDE LEPC SURVEY

OMB Control No. 2050-0162 • Approved: 06/21/1999 • Approval Expires: 06/30/2002

General

1. Does your LEPC have:
   a chairperson? ❑Yes ❑No
   a community emergency coordinator? ❑Yes ❑No
   an information/communications coordinator? ❑Yes ❑No
2. How many individuals are currently members of your LEPC (excluding those who only belong to subcommittees)? _____
3. Does your LEPC hold regular meetings? ❑Yes ❑No
4. How many times has your LEPC met in the last 12 months? _____
5. Does your LEPC advertise its meetings to the public? ❑Yes ❑No
6. What size population does your LEPC serve?
   ❑ Less than 50,000
   ❑ 50,001 to 100,000
   ❑ 100,001 to 500,000
   ❑ 500,001 to 1,000,000
   ❑ 1,000,001 or more
7. How would you best describe your LEPC service area? ❑Urban ❑Suburban ❑Rural
8. How many facilities report to your LEPC? _____
9. How does your LEPC manage facility chemical inventory information (Tier I/II forms)?
   ❑Computer database
   ❑Paper filing
   ❑No system

Public Information

10. Does your LEPC have procedures to make your emergency response plan and EPCRA information available to the public? ❑Yes ❑No
    10a. If yes, how does your LEPC notify the public that this information is available? (Check all that apply:)
    ❑ brochures ❑ radio/TV
    ❑ newspaper ❑ public meetings
    ❑ other _____
11. During the past 12 months, has your LEPC published notice in the newspaper about the availability of this information? ❑Yes ❑No
12. How many public requests for information has your LEPC received in the last 12 months? (Please include requests from industry, environmental organizations, and trade associations, as well as all other citizens.)
    _____ total requests
    12a. If you have received at least one request, how many were for...
    RMP . . . . . ____
    TRI . . . . . ____
    Other EPCRA ____
    All Other . . . . ____
    12b. How many times did the requesters notify your LEPC that the information provided was not sufficient? _____
13. Have LEPC members received any training in effective risk communication? ❑Yes ❑No
    13a. If yes, who provided the training? (Check all that apply:)
    ❑Federal govt.
    ❑State govt.
    ❑Local govt.
    ❑Private firm
    ❑Other

Local Involvement

14. Has your LEPC made any hazard reduction, accident prevention, or pollution prevention recommendations to industry or local government? ❑Yes ❑No
15. Does your LEPC provide technical assistance to local businesses? ❑Yes ❑No
    15a. If yes, what type of assistance? _____
16. What is your LEPC's level of involvement with large businesses (e.g., chemical manufacturing plant, oil refinery) in your community?
    ❑High
    ❑Medium
    ❑Low
    ❑Not involved
17. What is your LEPC's level of involvement with small businesses (e.g., propane distributor, ammonia refrigeration, chemical warehouse) in your community?
    ❑High
    ❑Medium
    ❑Low
    ❑Not involved

Risk Management Program

18. Has your LEPC worked with industry in preparation for the Risk Management Program? ❑Yes ❑No
19. Does your LEPC intend to obtain Risk Management Plans (RMPs) for the facilities in your community? ❑Yes ❑No
    19a. If yes, from whom?
    ❑Federal government
    ❑State government
    ❑Directly from facilities
    ❑Other _____
    19b. Has your LEPC reviewed any RMPs for the facilities in your community? ❑Yes ❑No
    If yes, how many RMPs were reviewed? _____
    19c. Does your LEPC have a strategy for incorporating (within the next 12 months) RMP information into its emergency response plan? ❑Yes ❑No
20. Has your LEPC incorporated RMP data into its emergency response plan? ❑Yes ❑No
21. For your LEPC, how useful is the information in an RMP?
    ❑very useful
    ❑moderately useful
    ❑slightly useful
    ❑not at all useful
    ❑no opinion

Emergency Response Plan

22. How far along is your emergency response plan?
    ❑Completed and submitted to SERC
    ❑Mostly completed
    ❑Partially completed
    ❑Little or nothing completed
    [If little or nothing, please go to Q-30.]
23. When did you last review the plan?
    ❑Last 11 months
    ❑1-2 years ago
    ❑Over 2 yrs. ago
    ❑Never
24. When did you last update the plan?
    ❑Last 11 months
    ❑1-2 years ago
    ❑Over 2 yrs. ago
    ❑Never
25. When did you last conduct a practice exercise using your plan?
    ❑Last 11 months
    ❑1-2 years ago
    ❑Over 2 yrs. ago
    ❑Never
    25a. Who participated? (Check all that apply:)
    ❑ local ❑ state ❑ EMS
    ❑ hospitals ❑ industry
    ❑ fire ❑ police ❑other
    25b. If you had an exercise, did you revise your plan as a result of the exercise? ❑Yes ❑No
26. Has your LEPC developed (or obtained from individual facilities) site-specific emergency plans? ❑Yes ❑No
27. Have local responders ever used your LEPC plan to respond to a chemical emergency? ❑Yes ❑No
    27a. If yes, was your LEPC emergency response plan effective? ❑Yes ❑No
    27b. Was your plan updated as a result of the response action? ❑Yes ❑No
28. Are the emergency response teams identified in your plan receiving training which meets the requirements of EPA and OSHA? ❑Yes ❑No
29. Is the shelter-in place option for personal protection incorporated into your emergency response plan? ❑Yes ❑No

Y2K

30. To what extent has your LEPC studied the potential Y2K (year 2000 computer problem) impacts on local chemical and other facilities?
    ❑Great extent
    ❑Significant extent
    ❑Slight extent
    ❑No extent
31. To what extent has your LEPC addressed these potential Y2K impacts on chemical and other facilities?
    ❑Great extent
    ❑Significant extent
    ❑Slight extent
    ❑No extent

32. Please check the degree of usefulness of the following types of support or assistance that your LEPC may have received:	Very useful	Some-what useful	Not useful	Don't know: Not familiar
Software				
CAMEO – emergency operations software				
ALOHA – air modeling program				
Landview III				
RMP*Info				
RMP*Review				
RMP*Comp				
Training Sessions				
Conducted by EPA				
Conducted by another Federal agency				
Conducted by SERC				
Conducted by LEPC				
Conducted by industry				
Person-to-Person Technical Assistance				
From EPA regional offices				
From other Federal agencies				
From the SERC				
From the LEPC				
From industry				
Meetings				
National Governors Association Meeting				
Hazardous Materials Spills Conference				
State-wide LEPC Meetings				
CAMEO99 Conference				
SERC/LEPC Meeting				
NASTTPO Conference				

32. Please check the degree of usefulness of the following types of support or assistance that your LEPC may have received:	Very useful	Some-what useful	Not useful	Don't know: Not familiar
EPA Tools & Publications				
Developing a Hazardous Materials Exercise Program (NRT-2)				
Technical Guidance for Hazardous Analysis (Green Book)				
RMPs Are on the Way!				
Chemicals in Your Community				
Managing Chemicals Safely				
Guides to Chemical Risk Management (National Safety Council)				
Technical Assistance Bulletins (e.g., Title III on Indian Lands)				
Chemical Safety Alerts (e.g., Hazards of Ammonia Releases, Explosion Hazard from Ammonium Nitrate)				
EPA's Accident Investigation Reports (e.g., Tosco Refinery Report, Surpass Chemical Co. Report)				
Title III Consolidated List of Lists				
RMP Guidance for Industry				
RMP Guidance for Implementing Agencies				
Factsheets (e.g., RMP, One Plan, RMP Network, EPCRA)				
Federal Register Notices				
Other Publications				
SERC newsletter				
Industry publications				
Trade publications (e.g., Right-to-Know News)				

★ Counter-Terrorism

33. Has or will your LEPC be involved in the Domestic Preparedness Counter-Terrorism Training Program sponsored by Department of Defense and/or Department of Justice, for the 120 largest U.S. cities? ❑Yes ❑No

33a. If no, has your LEPC received counter-terrorism training from another organization? ❑Yes ❑No

34. Has your LEPC incorporated counter-terrorism risks and preparedness techniques into its emergency response plan? ❑Yes ❑No

35. Has your LEPC had a counter-terrorism exercise? ❑Yes ❑No

★ Miscellaneous Issues

36. At this time, do you believe LEPCs should play a role in the prevention of chemical emergencies? (Prevention activities may include: providing chemical hazards information to the public, working with local businesses to operate safely, recommending ways to reduce chemical hazards, improve chemical processes, or prevent accidents)
- ❑ Significant role
- ❑ Moderate role
- ❑ Minimal role
- ❑ No role
- ❑ Undecided; no opinion

37. Are you aware of your LEPC's authority to request MSDS and chemical inventory information below the thresholds established by EPA? ❑Yes ❑No

38. How clear to you are the Federal legal mandates for LEPCs in SARA Title III?
- ❑ Very clear ❑ Clear
- ❑ In-between
- ❑ Unclear ❑ Very unclear

39. Other than funding, what assistance from EPA would be most useful to your LEPC?

_____

40. How does your LEPC currently receive information from EPA? (Please check all that apply:)
- ❑ E-mail
- ❑ CEPPO Website
- ❑ EPCRA Hotline
- ❑ SERC Newsletter/mailing
- ❑ EPA-Region Newsletter
- ❑ Other: _____

41. How would your LEPC prefer to receive information from EPA? Please rank options from your top preference (=1) to least favorite.
- ____ E-mail
- ____ CEPPO Website
- ____ EPCRA Hotline
- ____ SERC Newsletter/mailing
- ____ EPA-Region Newsletter
- ____ Other: _____

Over to last page →

42. Please answer both columns.	Does your LEPC need MAJOR IMPROVE-MENT in this area?	Does your LEPC need OUTSIDE ASSISTANCE in this area?
A. Administration of your LEPC	❑ Yes ❑ No	❑ Yes ❑ No
B. Communicating with the public	❑ Yes ❑ No	❑ Yes ❑ No
C. Communicating with facilities in the community	❑ Yes ❑ No	❑ Yes ❑ No
D. Conducting (jurisdiction-wide) hazard analyses	❑ Yes ❑ No	❑ Yes ❑ No
E. Determining the level of risk in your jurisdiction	❑ Yes ❑ No	❑ Yes ❑ No
F. Developing/reviewing emergency response plans	❑ Yes ❑ No	❑ Yes ❑ No
G. Identifying non-reporting facilities	❑ Yes ❑ No	❑ Yes ❑ No
H. Conducting safety audits or other methods to reduce risks at the facility level	❑ Yes ❑ No	❑ Yes ❑ No
I. Developing training programs	❑ Yes ❑ No	❑ Yes ❑ No
J. Conducting drills and exercises	❑ Yes ❑ No	❑ Yes ❑ No
K. Filing and automating hazard data	❑ Yes ❑ No	❑ Yes ❑ No
L. Using CAMEO or other automated information management systems	❑ Yes ❑ No	❑ Yes ❑ No
M. Outreach/communicating with the public	❑ Yes ❑ No	❑ Yes ❑ No
N. Integrating other scenarios (e.g., counter-terrorism, natural disasters) into emergency plans	❑ Yes ❑ No	❑ Yes ❑ No
O. Understanding and using RMP information	❑ Yes ❑ No	❑ Yes ❑ No

43. Please use the categories in the list above ("A" through "O") to identify your top three priorities (if any) for improving your LEPC: (1) ____ (2) ____ (3) ____

44. (Optional) Please enclose a separate page if you wish to offer any additional comments about the assistance that EPA and CEPPO provide to your LEPC, or about any LEPC-related issues. Thank you for your help with this research.

Short-Form for Inactive LEPCs*

1. **Which one best describes your LEPC?**

- ❑ It has never "gotten off the ground", has no meetings, and has no plan.
- ❑ Just getting started for the first time.
- ❑ A formal emergency plan was once completed, but LEPC became inactive (no regular meetings or plan updates).

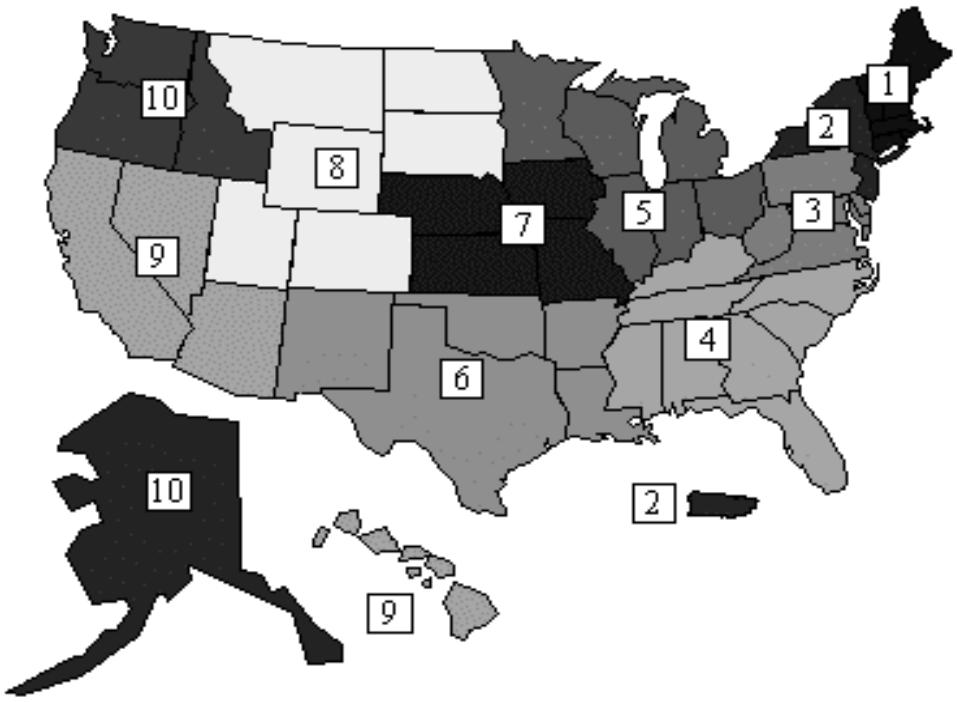
2. Main reasons for this LEPC inactivity: (Please check all that apply.)

- ❑ Lack of serious chemical risks here.
- ❑ Lack of local interest & participation.
- ❑ Lack of financial support.
- ❑ Other: _____

3. How many times has your LEPC met in the last 12 months? _____

(*Return in Stamped Envelope)

Appendix B: Regional Map



EPA Regions:
Region 1 - Connecticut, Maine, Massachusetts, New Hampshire, Rhode Island, & Vermont

Region 2 - New Jersey, New York and the territories of Puerto Rico & the U.S. Virgin Islands

Region 3 - Delaware, Maryland, Pennsylvania, Virginia, West Virginia, & the District of Columbia

Region 4 - Alabama, Florida, Georgia, Kentucky, Mississippi, North Carolina, South Carolina, & Tennessee

Region 5 - Illinois, Indiana, Michigan, Minnesota, Ohio, & Wisconsin

Region 6 - Arkansas, Louisiana, New Mexico, Oklahoma, & Texas

Region 7 - Iowa, Kansas, Missouri, & Nebraska

Region 8 - Colorado, Montana, North Dakota, South Dakota, Utah, & Wyoming

Region 9 - Arizona, California, Hawaii, Nevada, and the territories of Guam & American Samoa

Region 10 - Alaska, Idaho, Oregon, & Washington

Survey Regions:

West: EPA Regions 8, 9 & 10
MidWest: EPA Regions 5 & 7
NorthEast: EPA Regions 1, 2 & 3
South: EPA Regions 4 & 6

NOTE: Tribes are included in the EPA Region according to the state within which they are located.

Appendix C: Survey Population and Distribution of Respondents

State	LEPC Population Surveyed	LEPC Population Responding
Alaska (AK)	19	14
Alabama (AL)	68	44
Arkansas (AR)	78	37
Arizona (AZ)	16	10
California (CA)	6	5
Colorado (CO)	65	36
Connecticut (CT)	160	81
District of Columbia (DC)	1	0
Delaware (DE)	4	2
Florida (FL)	11	9
Georgia (GA)	15	13
Hawaii (HI)	4	4
Iowa (IA)	90	55
Idaho (ID)	47	30
Illinois (IL)	103	51
Indiana (IN)	89	62
Kansas (KS)	120	68
Kentucky (KY)	121	60
Louisiana (LA)	64	37
Massachusetts (MA)	348	131
Maryland (MD)	24	15
Maine (MD)	16	11
Michigan (MI)	90	53
Minnesota (MN)	8	4
Missouri (MO)	88	60
Mississippi (MS)	82	31
Montana (MT)	59	35
North Carolina (NC)	100	64
North Dakota (ND)	55	32
Nebraska (NE)	93	54
New Hampshire (NH)	234	92
New Jersey (NJ)	571	137
New Mexico (NM)	31	13
Nevada (NV)	19	15
New York (NY)	58	43
Ohio (OH)	87	72
Oklahoma (OK)	79	38
Oregon (OR)	1	0
Pennsylvania (PA)	65	44
Rhode Island (RI)	9	6
South Carolina (SC)	46	35
South Dakota (SD)	62	38
Tennessee (TN)	88	42
Texas (TX)	281	151
Utah (UT)	32	24
Virginia (VA)	109	62
Vermont (VT)	10	7
Washington (WA)	47	35
Wisconsin (WI)	71	54
West Virginia (WV)	54	29
Wyoming (WY)	23	19
Puerto Rico, Territories, & Tribes	124	42
Total	**4145**	**2106**

Appendix D: Detailed Data Analysis Tables

Table 1: Overall LEPC Characteristics 2106 LEPCs Reporting	
LEPC Service Population	
< 50,000	66.0%
50,001 – 100,000	15.7%
100,001 – 500,000	14.3%
500,001 – 1,000,000	2.2%
> 1,000,000	1.9%
Region	
West	16.0%
MidWest	25.3%
NorthEast	31.5%
South	27.3%
LEPC Service Area Description	
Urban	11.2%
Suburban	20.5%
Rural	60.1%
Suburban and Rural	2.3%
Urban and Rural	2.4%
Urban and Suburban	1.1%
Urban, Suburban, and Rural	2.4%

Table 2: Overall LEPC Characteristics by Compliance Level 2106 LEPCs Reporting			
	Compliant	**Mostly Compliant**	**Not Compliant**
All LEPCs	30.3%	28.7%	40.9%
LEPC Service Population			
< 50,000	30.2%	35.6%	34.2%
50,001 – 100,000	48.7%	33.8%	17.5%
100,001 – 500,000	51.4%	34.7%	13.9%
500,001 – 1,000,000	70.3%	29.7%	0.0%
> 1,000,000	36.4%	33.3%	30.3%
Region			
West	22.6%	36.9%	40.5%
MidWest	44.8%	25.9%	29.3%
NorthEast	24.0%	29.6%	46.5%
South	28.7%	25.6%	45.6%
LEPC Service Area Description			
Urban	45.0%	36.1%	18.8%
Suburban	35.9%	35.1%	29.0%
Rural	33.2%	34.8%	32.0%
Suburban and Rural	41.0%	43.6%	15.4%
Urban and Rural	47.5%	47.5%	5.0%
Urban and Suburban	73.7%	26.3%	0.0%
Urban, Suburban, and Rural	68.3%	19.5%	12.2%

Table 3: LEPC Characteristics by Proactivity Level 2106 LEPCs Responding			
	Very Proactive	**Somewhat Proactive**	**Not Proactive**
All LEPCs	26.5%	33.7%	39.8%
LEPC Service Population			
< 50,000	26.1%	41.7%	32.2%
50,001 – 100,000	41.6%	39.8%	18.6%
100,001 – 500,000	46.9%	40.8%	12.2%
500,001 – 1,000,000	66.7%	19.4%	13.9%
> 1,000,000	33.3%	51.5%	15.2%
Region			
West	26.2%	33.3%	40.5%
MidWest	34.1%	36.2%	29.6%
NorthEast	21.9%	34.7%	43.4%
South	25.0%	30.2%	44.8%
LEPC Service Area Description			
Urban	43.2%	38.9%	17.9%
Suburban	29.9%	46.8%	23.3%
Rural	29.1%	38.8%	32.1%
Suburban and Rural	43.6%	46.2%	10.3%
Urban and Rural	45.0%	50.0%	5.0%
Urban and Suburban	57.9%	36.8%	5.3%
Urban, Suburban, and Rural	51.2%	39.0%	9.8%

Table 4: Compliance Levels by Proactivity Levels 2106 LEPCs Reporting				
	Very Proactive	**Somewhat Proactive**	**Not Proactive**	**Row Totals**
Compliant	18.0%	10.9%	1.5%	30.4%
Mostly Compliant	7.1%	15.7%	5.8%	28.7%
Not Compliant	1.4%	7.0%	32.5%	40.9%
Column Totals	26.5%	33.7%	39.8%	100%

Table 5: Inactive LEPC Characteristics 467 LEPCs Reporting	
All Inactive LEPCs	100%
LEPC Service Population	
< 50,000	81.0%
50,001 – 100,000	9.8%
100,001 – 500,000	7.1%
500,001 – 1,000,000	0.0%
> 1,000,000	2.1%
Region	
West	15.8%
MidWest	18.1%
NorthEast	35.7%
South	30.4%
LEPC Service Area Description	
Urban	7.6%
Suburban	21.2%
Rural	68.5%
Suburban and Rural	1.3%
Urban and Rural	0.4%
Urban and Suburban	0.0%
Urban, Suburban, and Rural	1.1%

Table 6: Active LEPC Characteristics 1244 LEPCs Reporting	
All LEPCs	100%
LEPC Service Population	
< 50,000	60.2%
50,001 – 100,000	17.9%
100,001 – 500,000	17.0%
500,001 – 1,000,000	3.0%
> 1,000,000	1.9%
Region	
West	16.1%
MidWest	30.3%
NorthEast	28.5%
South	25.1%
LEPC Service Area Description	
Urban	12.7%
Suburban	20.2%
Rural	56.8%
Suburban and Rural	2.7%
Urban and Rural	3.1%
Urban and Suburban	1.6%
Urban, Suburban, and Rural	2.9%

Table 7: Active LEPC Characteristics Related to Progress on Emergency Response Plan 1244 LEPCs Reporting				
	Completed Emergency Plan Submitted to SERC	**Mostly Completed Emergency Plan**	**Partial Completion of Emergency Plan**	**Little or No Completion of Emergency Plan**
All Active LEPCs	75.6%	15.5%	6.9%	1.9%
LEPC Service Population				
< 50,000	71.9%	16.9%	8.9%	2.3%
50,001 – 100,000	76.6%	15.8%	6.3%	1.4%
100,001 – 500,000	83.4%	12.8%	2.4%	1.4%
500,001 – 1,000,000	89.2%	5.4%	2.7%	2.7%
> 1,000,000	95.7%	4.3%	0.0%	0.0%
Region				
West	64.0%	21.0%	11.5%	3.5%
MidWest	79.3%	13.0%	5.3%	2.4%
NorthEast	81.4%	13.8%	4.2%	0.6%
South	72.1%	17.0%	9.0%	1.9%
LEPC Service Area Description				
Urban	83.9%	11.6%	3.2%	1.3%
Suburban	80.2%	14.6%	4.5%	0.8%
Rural	71.2%	17.3%	9.1%	2.4%
Suburban and Rural	72.7%	15.2%	6.1%	6.1%
Urban and Rural	71.1%	18.4%	7.9%	2.6%
Urban and Suburban	89.5%	10.5%	0.0%	0.0%
Urban, Suburban, and Rural	88.9%	80.3%	2.8%	0.0%

Table 8: Frequency of Support or Assistance Degree of Usefulness 1711 LEPCs Reporting				
	Very Useful	**Some-What Useful**	**Not Useful**	**Don't Know; Not Familiar**
EPA Tools and Publications				
Developing a Hazardous materials Exercise Program (NRT-2)	28.2%	43.7%	4.1%	24%
Technical guidance for Hazardous Analysis (Green book)	24.9%	42.7%	5.2%	27.2%
RMPs Are on the Way!	14.2%	38.4%	10.4%	36.9%
Chemicals in Your Community	24.1%	42.8%	5.7%	27.4%
Managing Chemicals Safely	18.9%	39.4%	5.9%	35.9%
Guides to Chemical Risk Management (National Safety Council)	16.9%	35.0%	5.7%	42.4%
Technical Assistance Bulletins (e.g., Title III on Indian Lands)	10.1%	26.7%	12.9%	50.4%
Chemical Safety Alerts (e.g., Hazards of Ammonia Releases, Explosion Hazard)	24.4%	34.4%	5.5%	35.8%
EPA's Accident Investigation Reports (e.g., Tosco Refinery Report)	12.6%	25.4%	11.7%	50.2%
Title III Consolidated List of Lists	37.6%	30.7%	6.6%	25.1%
RMP Guidance for Industry	15.5%	33.6%	10.6%	40.3%
RMP Guidance for Implementing Agencies	13.6%	32.2%	10.3%	43.8%
Factsheets (e.g., One plan, RMP Network, EPCRA)	17.9%	32.9%	9.9%	39.3%
Federal Register Notices	15.2%	35.4%	13.9%	35.6%
Other Publications				
SERC newsletter	27.3%	42.4%	5.1%	25.3%
Industry Publications	14.6%	39.1%	9.9%	36.3%
Trade Publications (e.g., Right to Know News)	18.4%	38.9%	8.4%	34.3%

	Very Useful	Some-What Useful	Not Useful	Don't Know; Not Familiar
Software				
CAMEO - emergency operations software	50.7%	26.0%	6.5%	16.8%
ALOHA – air modeling program	39.5%	25.7%	8.1%	26.8%
Landview III	13.8%	14.1%	8.9%	63.2%
RMP*Info	8.0%	23.5%	8.1%	60.4%
RMP*Review	6.2%	19.8%	9.0%	65%
RMP*Comp	6.9%	19.1%	8.8%	65.2%
Training Sessions				
Conducted by EPA	28.2%	26.2%	4.7%	40.9%
Conducted by another Federal Agency	24.1%	28.4%	4.6%	43.0%
Conducted by SERC	29.7%	30.8%	5.6%	33.9%
Conducted by LEPC	38.3%	31.4%	3.9%	26.5%
Conducted by Industry	30.1%	28.7%	5.0%	36.1%
Person-to-Person Technical Assistance				
From EPA Regional Offices	28.1%	28.4%	6.0%	37.4%
From other Federal Agencies	21.7%	32.0%	5.4%	40.9%
From the SERC	33.4%	33.1%	6.0%	27.4%
From the LEPC	37.2%	34.1%	3.9%	24.8%
From Industry	35.7%	30.8%	4.3%	29.1%
Meetings				
National Governors Association Meeting	5.2%	9.4%	10.4%	74.9%
Hazardous Materials Spills Conference	23.5%	20.9%	6.4%	49.2%
State-wide LEPC Meetings	32.2%	27.6%	5.5%	34.7%
CAMEO99 Conference	9.2%	11.5%	9.5%	69.8%
SERC/LEPC Meeting	35.2%	29.2%	4.8%	30.8%
NASTTPO Conference	3.8%	6.7%	8.2%	81.3%