Communicating in Crisis

Recommendations to Improve Communication and Emergency Preparedness with Charlotte-Mecklenburg’s Non-English Speaking Population

Presented by the Charlotte-Mecklenburg International Emergency Preparedness Task Force to:

Mayor Pat McCrory, City of Charlotte
Vice-Chairman Dan Ramirez, Mecklenburg County Commission
Charlotte-Mecklenburg Emergency Management Team

August 27, 2003
# Table of Contents

I. **Executive Summary**  
Pg. 2

II. **Acknowledgements**  
Task Force Members  
Pg. 3  
Individual Contributors  
Pg. 4

III. **Background**  
State Emergency Response Commission  
Pg. 5  
Local Emergency Response Initiatives  
Pg. 5  
Charlotte-Mecklenburg’s All Hazards Plan  
Pg. 7

IV. **Methodology**  
Community Oriented Primary Care Model  
Pg. 7  
Survey Methodology  
Pg. 9

V. **Recommendations**  
Hub and Spoke Model  
Pg. 10  
Community Volunteers  
Pg. 12  
Coordinating Outreach Initiatives  
Pg. 13  
Enhanced Warning System  
Pg. 14  
Review Committee  
Pg. 14

VI. **Conclusion**  
Pg. 15

VII. **Appendices**  
Appendix A: Telephone Tree Model  
Pg. 16  
Appendix B: CMPD Patrol District and Population Map  
Pg. 17  
Appendix C: Ethnic populations by CMPD response area  
Pg. 18  
Appendix D: CMPD ESL Population Mapping  
Pg. 19  
Appendix E: CMPD Map with Apartment Complex overlay  
Pg. 20  
Incident Command System  
Pg. 6  
COPC Process  
Pg. 8  
Hub and Spoke Model  
Pg. 11
I. Executive Summary

In the spirit of proactive government, Charlotte-Mecklenburg is addressing the needs of the community. In December of 2002, a severe ice storm crippled North Carolina and particularly Mecklenburg County. Massive power outages that lasted over five days in some areas resulted in dangerous living conditions for City and County residents. The Charlotte-Mecklenburg Emergency Management Team immediately began coordinating emergency response agencies and was successful responding to life threatening events during this crisis. However, language and cultural barriers resulted in many immigrant communities suffering a disproportionate number of health-related illnesses associated with the ice storm. The leading cause of illness was carbon monoxide poisoning. There were approximately 100 carbon monoxide poisonings throughout Mecklenburg County and over one-half involved the Hispanic community.

Although the City of Charlotte and Mecklenburg County responded immediately to the emergency crisis that existed, language and cultural barriers presented challenges in disseminating the warnings to the non-English speaking community. An assessment of the response to the crisis revealed deficiencies in communicating with this growing segment of the population in Charlotte-Mecklenburg. Traditional means of communicating with this population proved ineffective.

In partnership with the Mayor’s International Cabinet, Charlotte Mayor Pat McCrory and Mecklenburg County Commissioner Dan Ramirez created a task force to develop recommendations for improving communication to the non-English speaking community in the event of a crisis. The task force was selected from a gathering of individuals on January 21, 2003, brought together by the Mayor’s International Cabinet, to brainstorm ideas on how to enhance communication with this population. All members of the task force represent various international communities and organizations.

The task force met bi-weekly for two months and developed the following report. The name chosen for the group was the Charlotte-Mecklenburg International Emergency Preparedness Task Force and the mission statement developed is as follows:

“\textit{The Charlotte-Mecklenburg International Emergency Preparedness Task Force will make recommendations to City and County service providers to establish procedures and identify resources, that will enhance communication with and educational outreach to our non-English speaking population in Charlotte-Mecklenburg in the event of a crisis.}”

This report fulfills the mission of the task force by providing City and County emergency responders and service providers with recommendations to enhance communication in the event of a crisis and develop yearlong crisis preparedness education to the non-English speaking community in Charlotte-Mecklenburg.
II. Acknowledgements

International Emergency Preparedness Task Force Members:

Sgt. Diego Anselmo (Chairperson)  
Charlotte-Mecklenburg Police Department  
International Relations Unit  
(Member, Mayor’s International Cabinet)

Maria Anderson, MPH  
Director  
Carolinias Center for Injury Prevention and Control  
Mecklenburg Safe Communities Program

Dr. Nini Bautista, PhD  
President  
Filipino-American community

Astrid Chirinos  
President  
Diverso Global Strategies  
(Vice Chair, Mayor’s International Cabinet)

Vladimir Chopko  
Services Division Manager  
Office Environments  
(Russian community)

Maryanne Dailey  
Director of Operations  
Better Business Bureau

Jesus Hernandez, FNP  
Presbyterian School of Nursing  
Novant Health

Haywood Homsley  
International Services  
Charlotte-Mecklenburg Schools

Mohammad Ismail  
Architect  
Little Diversified Architectural Consulting  
(Arab American & Muslim communities)

Doe B. Juhnn  
Korean JC  
Asian-American Chamber of Commerce

Lena Neau  
Armenian Church and Cultural Association
The Task Force wishes to thank the following individuals for their contributions:

Dan Ramirez
Vice Chair, Mecklenburg County Commission

Deborah Bright
Assistant County Manager for Diversity
Mecklenburg County

Julie Hill
Director of Corporate Communications
City of Charlotte

D.C. Lucchesi
Public Service and Information Specialist
Mecklenburg County Health Department

Dr. Wynn Mabry, MD
Director of Homeland Security
Mecklenburg County

Dennis Marstall
Assistant to the Mayor
City of Charlotte

Cindy Stringham-Smith
Executive Director
Mayor’s International Cabinet
III. Background

Rapid response communication has always been an important component of emergency preparedness. Establishing an effective emergency response system has the dual purpose of minimizing the number of affected individuals while assuring the community that during a crisis there will be a structured response.

In order to gain a better understanding of the structure of an appropriate response system, the task force members searched for information on what different agencies and localities have already established.

A. State Emergency Response Commission (SERC):

At the state level, the Emergency Planning and Community Right-to-Know Act of 1986\(^1\) requires each state to set up a *State Emergency Response Commission*, or *SERC*. Currently 50 states and the U.S. territories have established these commissions (Indian tribes have the option of functioning as an independent SERC or as part of the state in which the tribe is located). Among the duties of the SERC are:

- Designate local emergency planning districts within the state;
- Appoint a Local Emergency Planning Committee (LEPC) to serve each district;
- Coordinate and supervise the activities of the local committees;
- Coordinate proposals for and distribution of training grant funds;
- Review local emergency response plans annually;
- Notify Environmental Protection Agency (EPA) of all facilities in the state that are either covered under emergency planning requirements, or have been designated as subject to these requirements by the SERC or the Governor\(^2\).

The overall role of the SERC is to ensure that state programs are integrated with federal law in order to strengthen enforcement.

B. Local Emergency Response Initiatives (the Incident Command System):

At a local level, the *Incident Command System (ICS)* is a management system that integrates multiple agencies and emergency response disciplines into a common organization and is a model currently being adopted by many communities across the nation. It was originally developed in southern California after a series of wild fires threatened the environment and the community. Some of the problems that the ICS was designed to solve and that were faced during the California wild fires included:

- Lack of common organization between agencies (different agencies had different organizational structures, terminology, etc.);

---

1. [http://es.epa.gov/techinfo/facts/pro-act6.html](http://es.epa.gov/techinfo/facts/pro-act6.html); Title 42, Chapter 116 US CFR
2. [http://www.nysemo.state.ny.us/SERC/commissions.htm](http://www.nysemo.state.ny.us/SERC/commissions.htm)
• Poor on-scene and inter-agency communications (old equipment, outdated procedures and mixed messages hampered communications);
• Inadequate joint planning (each agency did its own planning and implemented it on its own);
• Lack of valid and timely intelligence (no one had the responsibility to compile intelligence information from different agencies);
• Inadequate resource management (different agencies did not know where available equipment was located); and
• Limited prediction capability (no one knew the magnitude of the crisis or the elements that initiated or facilitated its spread).

The ICS was designed in a modular format in which each agency’s structure is analyzed and interconnected to others according to function, span-of-control, unit integrity, and functionality of guidelines, while clearly defining assignments and improving communication. The complexity of the ICS model varies depending on the magnitude of the incident\(^3\). The goal is to improve the flow of information between agencies, develop a single collective approach, reduce or eliminate … duplication of efforts\(^4\). Most of the state level programs reviewed by this task force follow this format to some extent.

The Incident Command System (ICS) modular format, courtesy of Fire protection Publications.


---

\(^3\) Auf der Heide, Erik, Disaster Response. Principles of Preparation and Coordination, Chapter 7: The Incident Command System by Robert L. Irwin.

\(^4\) Ibid
C. Charlotte-Mecklenburg’s “All Hazards” Plan:

The Charlotte-Mecklenburg County Integrated Response Plan for All Hazards is a plan developed to provide guidance to the Emergency Management Team in the event of a crisis. This plan meets or exceeds all federal and state response planning requirements. The All Hazard plan can be used in isolated incidents or for emergencies that affect an entire municipality or multi-county area. Within the plan, under Section VIII titled Concept of Operation, “the major areas of concern are: proper and timely notification, adequate transportation to move affected population, informing the public in an accurate and timely manner, and proper activation of shelter and evacuation procedures.

It is within this section the task force believes these recommendations can build upon the All Hazard Plan. Section VIII (Concept of Operation), subsection E provides for accurate and timely information to the general public regarding protective action recommendation. Although the information may be timely and accurate to the mainstream community, inherent cultural and language barriers may limit effective communication procedures in immigrant and non-English speaking communities.

IV. Task Force Methodology

A. Community Oriented Primary Care Model:

As the task force reviewed each model, it became apparent that a key factor, interaction with the community, was being omitted. There seemed to be a general assumption that the systems would function at each point of contact with the affected community in an effective manner. This, however, has not always been the case. The effectiveness of the emergency response system is reduced in a community where the diversity of population presents many language and cultural barriers. Some of the activities potentially compromised include:

- A timely release of accurate information;
- Facilitated flow of information;
- Promotion and protection of the welfare of the community or affected individuals;
- Use of the crisis to educate the public on broader related issues in order to prevent similar issues from occurring in the future.

For many immigrants the ways of responding and coping with each crisis vary, depending upon their country or community of origin. If they are new to the area, they most likely will not be familiar with the roles each agency performs within the emergency response system during a crisis. Some of these agencies may be inaccessible or even avoided by the immigrant population under normal circumstances due to misconceptions or lack of familiarity.

Many public health models developed outside of the United States have had to take cultural differences into consideration. One such model is the Community Oriented
Primary Care model (COPC) that was originated in response to disparities in socio-economic status within the South African community, and it has ultimately served as a worldwide model for the integration of clinical medicine and public health approaches to individuals and communities.

The COPC has been defined as a 4-step process\(^5\):

1. Definition of a practice community;
2. Identification of a health problem;
3. Intervention to improve the health problem; and
4. Evaluation of the intervention to modify and improve its effect on health.

For the purpose of this task force, the practice community has been defined as the non-English speaking population and the health problem is defined as the emergency situation that may occur, such as the ice storm that brought down power lines in Charlotte-Mecklenburg in December 2002. After reviewing several emergency response models, the task force concluded that the most appropriate methodology would be to evaluate the current response system in a pre-, during and post-crisis set up. These three stages, identified following another public health model, the Haddon Matrix for injury prevention, helped in defining concrete stages in which to set up interventions to improve awareness within the international population and establish contact points for distributing information through culturally appropriate means.

Community Oriented Primary Care Model

---

B. **Survey Methodology:**

Task force participants were assigned to survey current communication practices of organizations that either respond to crisis or provide services to members of the non-English speaking community. The survey asked the following questions:

1. Name of Organization:
2. Address:
3. Telephone Number:
4. Contact Person: (name, title, telephone number, email address)
5. Back-up contact person:
6. Person Surveyed: (name, title, telephone number, email address)
7. Service provided:
8. Current communication practices: (Request written procedures if possible)
9. Other resources the organization uses:
10. Educational information available
11. Language capabilities:
12. What do you recommend we do to improve communication with our non-English speaking community in the event of a crisis?

The following agencies/organizations were surveyed as part of this task force:

1. City of Charlotte Corporate Communications
2. Mecklenburg County Public Service & Information
3. Charlotte-Mecklenburg Police Department
4. Charlotte Fire Department
5. Mecklenburg County EMS Agency
6. Mecklenburg County Health Department
7. Faith Community
8. Non-Profit Organizations (United Way)
9. Red Cross

The completed surveys were then discussed at subsequent meetings of the task force. Recommendations were based on the agencies limitations in communications and current practices with the non-English speaking community.

V. **Recommendations**

Emergency response methodology should incorporate the most effective means to reach a population before, during and after a crisis. Therefore, the task force believes that year-long education is a vital component to an effective response to a crisis. Many of the following recommendations will overlap between immediate response in a crisis and the educational components needed to prevent or minimize the effects of the crisis before and after.
A. **Hub and Spoke Model:** *The task force recommends that the Hub and Spoke Model be used to communicate emergency information to the international communities in Charlotte-Mecklenburg.*

1. **Pre-Crisis:**

   The Hub and Spoke Model is used in the private sector as a model to improve production, and works on the principle that there needs to be several contact points within the community in order to present materials through different avenues. The Hub and Spoke Model can be used as a means of identifying contact points within the non-English speaking community in Charlotte-Mecklenburg for rapid and effective communication of emergency information. Each agency, organization or community leader will represent a spoke and have the responsibility of establishing a contact point within the community. The hub is the actual information needed by the community to more effectively deal with a crisis. The information is assembled by emergency response agencies that respond to a crisis.

   The contact points (spokes) will be identified from the Mayor’s International Cabinet’s database of international community leaders in Charlotte. This database will be made available to all emergency response agencies to use to disseminate and communicate crisis information. In the event of a crisis, the process of communicating emergency information to these contacts can be expedited by the Charlotte-Mecklenburg Police Department’s (CMPD) Geo Notify System, an automated telephone calling service.

   **Potential Spokes of Communication:**
   a. School system (Public and Private) – CMS currently has a geo notify system of communications with student population
   b. Faith Community – Identify community name, numbers and constituents represented
   c. Media (Mainstream and International) – Identify organizations
   d. Non-profits (International Outreach Organizations) – Identify name, numbers
   e. Sports Organizations – Name and number and constituents represented
   f. Community Leaders – Name and number and constituents represented
   g. Apartment Association – Establish telephone tree to notify all apartment managers
   h. Volunteers – Red Cross and the Citizen Corps (CMPD bilingual Volunteer Program)
Note: This model shows some agencies, organizations or community leaders involved during a crisis. These are represented as spokes that would contact the community with prevention information necessary to minimize or avoid the effects of a crisis. Also it is necessary to point out that these organizations must reach a consensus on the information prior to being distributed so that no mixed messages or misinformation is being distributed. This format can be followed before, during or after a crisis.

2. During a Crisis: The task force recommends, when feasible, that community leaders establish telephone trees where the last person notified contacts the leader to ensure a comprehensive notification of the community they serve. (See Appendix A for example).

During a crisis the agencies, organizations and individuals identified within the spokes can be notified through the CMPD Geo Notify system. The Geo Notify system is an automated telephone calling service. A message can be recorded and then disseminated within a geographic area and/or a group of specific
telephone numbers. The Geo Notify message can advise the recipient to respond by pressing another number to receive the message in a different language. The task force recommends that pre-scripted messages be available in different languages to facilitate this method of notification. Officer Craig Allen of the CMPD maintains the Geo Notify system and assured the task force that a telephone group of international community leaders can be established within the Geo Notify system and activated immediately in the event of a crisis. The community leaders and organizational leaders will then be tasked with notifying their respected constituents for the dissemination of the information. The leaders can seek assistance from volunteers for the dissemination of this information. Details regarding how volunteers can be used will be explained later in this report.

3. **Post-Crisis (Assessment/Evaluation/Maintenance):**

   The Geo Notify system of international contacts must be tested quarterly to ensure adequate response. The database of contacts must be maintained and updated by the Mayor’s International Cabinet as leaders within the community are replaced. This information must then be relayed to the CMPD to update their Geo Notify group.

4. **Year-long Education:** The task force recommends that the leaders identified through the Mayor’s International Cabinet take classes that provide a foundation for crisis response. Examples of such classes are the Disaster Preparedness classes offered through the Red Cross or classes offered through the Citizens Corps.

   For the year-long educational process, agencies that have information related to crisis response can use these international contacts to reach the non-English speaking community. Agencies surveyed by the task force commented that reaching the international community with educational material was difficult. Having a list of community leaders would facilitate educational outreach. Those leaders can further be recruited to participate in additional disaster preparedness training, such as the classes offered through the Red Cross or the Citizen Corps.

B. **Community Volunteers:** The taskforce recommends that the effort be made to recruit and train bilingual volunteers for the Citizen Corps and the Red Cross Crisis Preparedness Team and assign them to emergency response agencies like the Police Department and Fire Department.

1. **Pre-Crisis:**

   The Police Department has almost 20 Spanish-speaking volunteers that can immediately receive the crisis preparedness training and begin the educational process. The volunteers can be trained on how best to respond to a crisis and provide educational information to the community. The volunteers can be informed of resources within the community, like United Way’s 211 system, that
can assist with obtaining other information. When there is a crisis these volunteers can be assigned to officers who patrol neighborhoods with large concentrations of non-English speaking residents. (See Appendix B)

2. **During a Crisis:**

   Ensure that a Red Cross liaison to the Emergency Management Team coordinates the Red Cross’ bilingual volunteer resources. The CMPD will coordinate the response of the citizen corps’ bilingual (Spanish/English) volunteers assigned to the International Relations Unit. Currently, CMPD Spanish-speaking volunteers are assigned to officers that patrol districts where there are a large concentration of Hispanics. (See Appendix B).

3. **Post-Crisis:**

   Volunteers will evaluate the effectiveness of their response and identify other issues or training needs of a community. This information will be made available to the Red Cross liaison and the CMPD Citizen Corp Volunteer Coordinator.

C. **Coordinating Outreach Initiatives:** The task force surveyed city and county agencies involved in the Emergency Response System and found that educational outreach is occurring. However, it is limited in scope and language capabilities. *The taskforce recommends that the following materials be developed:*

1. **Crisis Response Manual:**

   The task force recommends that City and County agencies coordinate their educational outreach material and create a comprehensive crisis response manual. The manual then should be translated into various languages for distribution and available on agencies’ web sites. If agencies combine resources it will reduce costs that can be redistributed to the translation costs.

2. **Crisis Response Video:**

   Another recommendation is that a video be produced that provides general tips on crisis response. The aforementioned crisis response manual can be used as a guide for the video format. This video can initially be done in English and then dubbed in various languages. A video that educates the community on appropriate crisis response will overcome any literacy issues.

   Both of these recommendations have proven successful in the Police Department’s efforts to reach the international community. Both the translations and the dubbing of the video must be professionally done to ensure proper language usage and accountability.
D. **Enhance Warning System:** The task force recommends that the Emergency Broadcast System messages for television and radio be translated into several languages.

1. **Pre-Crisis:**
   Task Force members surveyed Time Warner Cable and learned the Emergency Broadcast System only provides its warning in English. Time Warner Cable has multiple stations that broadcast in other languages. The task force recommends that these warnings be pre-scripted and translated in several languages and available to all media when a crisis arises.

2. **During a Crisis:**
   The translated pre-scripted messages should run concurrently with the English language message in the form of a crawl at the bottom of the television screen. The Task force recommends that these messages remain simple and short to ensure clear understanding in the various languages. At the very least the task force recommends a picture be broadcast illustrating the crisis that is occurring. The Emergency Broadcast System warnings for radio also could be pre-scripted and translated in several languages and broadcast along with the English language message on the appropriate stations.

3. **Post-Crisis:**
   The effectiveness of these messages will be determined by a survey of the non-English speaking community once the crisis has past. Additional pre-scripted messages on appropriate crisis response may need to be developed, translated and available to the Emergency Management Team.

E. **Review Committee:** The task force recommends that an agency or committee be responsible for monitoring the effectiveness of the enhanced communication procedures to the international community.

1. **Task Force Response under the Mayor's International Cabinet (MIC):**
   The task force believes the Mayor’s International Cabinet can perform the role of monitoring the effectiveness of the enhanced communication procedures to the international community. If an issue arises regarding communication with the non-English speaking community, the Mayor's International Cabinet can form a task force to look at the specific issue and provide recommendations. As both City and County agencies are part of the Emergency Response System, any task force created should include individuals representing both the City and the County.

2. **Stand-alone Subcommittee under Mecklenburg County Minority Affairs:**
   In the event that a more permanent and ongoing interface is desired between the Emergency Management Team and the international community, an
alternative recommendation would be to establish a volunteer standing subcommittee to be formed as part of the Mecklenburg County Minority Affairs Committee. This subcommittee would provide resources and direction to agencies on how best to communicate with the non-English speaking community in the event of a crisis. The committee must consist of people not only representative of the diverse community but also with an expertise in emergency response to crisis. As both City and County agencies are part of the Emergency Response System, any task force created should include individuals representing both the City and the County.

VI. Conclusion:

The International Preparedness Task Force is confident that this report, and the recommendations contain within this report will enhance communication and educational outreach to our non-English speaking community in the event of a crisis. Emergency agencies and service organizations interviewed by task force members were instrumental in the development of this report. Effective communication and educational outreach are key components in responding appropriately to a crisis. These recommendations build on our current Emergency Response Plan by taking into consideration community issues that may hinder the effective response to a crisis. Language and cultural barriers intrinsic in our growing immigrant population must be considered if we want to overcome the challenges we faced during the December ice storm of 2002, and have an emergency response plan that effectively addresses the needs of all of the residents of Charlotte-Mecklenburg.
Appendix A: Sample Telephone Tree for Community Contacts

The volunteers can be coordinated through the Citizen Corp (CMPD) and/or the Red Cross
Appendix B: Charlotte-Mecklenburg Police Department Patrol Districts and Population Density

Charlotte-Mecklenburg Police Department Patrol Districts and Population Density

Population data presented on this report is based on Census 2010 block level data released as part of the Census 2000 Redistricting Data (Public Law 94-171) Summary File for North Carolina prepared by the U.S. Census Bureau, 2001.
Appendix C: Ethnic Populations by Response Area
Charlotte-Mecklenburg Police Department

Ethnicity by Response Area
Source: US Census 2000

![Bar chart showing Hispanic and Asian populations by district.](chart.png)