Background
An important part of Community Risk Reduction programs, home safety visits, has been singled out as one of the more effective measures that the fire service can take to improve public safety. A key component of the CRR home visiting programs is the provision of smoke alarms. How to best evaluate the home safety visit component of CRR is not yet well established. Vision 20/20 partnered with the Johns Hopkins Center for Research and Policy to address this gap in our understanding. The specific aims of this project were to:

Aim 1- Conduct a series of key informant interviews with CRR national leaders, fire department (FD) leadership and prevention staff, who have experience in the delivery of CRR home visiting programs to learn about current practices and suggestions for improving the evaluation of CRR home visiting programs.

Aim 2- Synthesize key informant interview data and generate recommendations on the following five evaluation metrics: 1) Selection of Areas for CRR Home Visits; 2) Training Fire Department Personnel; 3) Partnerships; 4) In-Home Data Collection; and 5) Program Evaluation.

Methods
Data to address these aims came from 10 key informant interviews with a variety of leaders in CRR programs and in fire departments, as well as from a review of 10 relevant documents provided by Vision 20/20. A total of 27 specific recommendations across the five evaluation metrics emerged from the interviews.

Results
Evaluation Metric 1: Selection of Areas for CRR Home Visits
1. Acknowledge that there is variation in how fire departments identify their high-risk homes and that there is value in the insider knowledge of firefighters who have been on the front lines.
2. Communicate the added value of systematic approaches to supplement this insider knowledge, and offer specific easy-to-use guidance on assessing risk.
3. Continue responding to community requests after a fire event to take advantage of the heightened interest by communities.
4. Consider special targeting and needs of vulnerable populations such as communities of immigrants, those with hearing loss, and older adults.

Evaluation Metric 2: Training Fire Department Personnel
5. Educate everyone about the value of data, using real world examples of the impact of data on telling your story, and for garnering resources and support.
6. Agree on common data elements that everyone can collect and that can be aggregated across departments.
7. Use people in leadership positions to provide training and facilitate culture change regarding the importance of data and how to use it effectively.
8. Consider training people for specific tasks in the home to increase quality and consistency in data collection.
9. Agencies funding CRR should require training as a component of grant funding.
10. Educate on where smoke alarms should be installed and how to inform residents’ of its features (e.g., to handle nuisance alarms).
11. Use shadowing for field experience as part of the training.
12. Identify firefighters who are interested in prevention to train for home visits versus those with an interest in only suppression activities, if possible.

**Evaluation Metric 3: Partnerships**

13. Provide ideas for partnerships – any service organization that goes into homes could be an important partner (e.g., Meals on Wheels, nurse and senior home visiting programs) in addition to other potential partners in private and public sectors.

14. Have fire service engage with other agencies that provide social programs and cross-refer to each others’ services.

15. Describe what resources and plans need to be in place to make a successful partnership to avoid problems in implementation (e.g., understand your partners’ population).

**Evaluation Metric 4: In-Home Data Collection**

16. Highlight the importance and use of data for local and national purposes (can help to show the impact and importance of CRR).

17. Affirm the subjective value of these programs to the community (e.g., positive responses from residents) and firefighter appreciation of prevention.

18. Simplify and streamline data to be collected and methods of data collection, but be flexible (e.g., use technology if you’re comfortable with it, but can also use paper and pencil).

19. Provide incentives and reinforcement for accurate and timely data collection (e.g., leadership involvement).

20. Find effective and efficient ways of collecting follow up data.

21. Designate one person to be solely responsible for collecting data in the home, while someone else installs smoke alarms and provides appropriate educational messages and materials.

22. Maximize accurate and complete data entry by using electronic devices and real time data entry that can be checked by someone in a remote location for quality control.

23. Review run data to look for changes in causes of fires – proxy for possible impact of education on behavior change of residents.

**Evaluation Metric 5: Program Evaluation**

24. Let fire services know that they can do longer term analyses and how to do that; consider partnering fire departments and other agencies that have done such analyses with those that have not (e.g., a mentoring program).

25. Collect anecdotal stories of residents’ satisfaction with the program.

26. Following-up 6 months after the initial home visit is ideal, recognizing that it takes resources: time, staffing, etc. However, doing so can help measure behavior change and impact. Consider doing in person or mailing a survey.

27. Surveying about process measures of the visit can be done by leaving a survey with a self-addressed, stamped envelope with the resident at the end of the home visit.

**Conclusions**

To our knowledge, this was the first effort to systematically collect information from fire service personnel on how to evaluate CRR home visit programs. Through this effort we collected valuable information from a variety of frontline members of the fire service, representing exemplar, paid, and combination departments, from various parts of the country. Home safety visit programs that involve firefighters and community partners traveling door-to-door to provide fire prevention education and install smoke alarms where needed have been implemented to prevent injuries and deaths resulting from residential fires. However, how best to evaluate home visiting programs to maximize community participation and prevention remains uncertain. Results from this project shed some new light on how to approach strengthening the evaluation of CRR home visiting programs.