

2017

# How do communities proactively address lead remediation? : community case studies from Iowa

Dr. Angie L. Carter

*Augustana College, Rock Island Illinois*

Emma Nordmeyer

*Augustana College, Rock Island Illinois*

Follow this and additional works at: <http://digitalcommons.augustana.edu/swliscott>



Part of the [Civic and Community Engagement Commons](#), [Environmental Public Health Commons](#), and the [Public Health Education and Promotion Commons](#)

---

## Augustana Digital Commons Citation

Carter, Dr. Angie L. and Nordmeyer, Emma. "How do communities proactively address lead remediation? : community case studies from Iowa" (2017). *2016-2017: Scott County, Iowa and the Scott County Health Department*.

<http://digitalcommons.augustana.edu/swliscott/10>

This Student Paper is brought to you for free and open access by the Sustainable Working Landscapes Initiative at Augustana Digital Commons. It has been accepted for inclusion in 2016-2017: Scott County, Iowa and the Scott County Health Department by an authorized administrator of Augustana Digital Commons. For more information, please contact [digitalcommons@augustana.edu](mailto:digitalcommons@augustana.edu).

# Augustana College



## *How do communities proactively address lead remediation? Community case studies from Iowa*

### **Fall 2016 • Sustainable Working Landscapes Initiative**

Dr. Angie Carter • Teaching Fellow • Department of Sociology, Anthropology, and Social Welfare

Emma Nordmeyer • Sociology and Spanish

Students in Sociology 206: Contemporary Social Issues

Augustana College  
639 38th Street  
Rock Island, Illinois 61201



# Table of Contents

- Acknowledgements..... 3
- The Sustainable Working Landscapes Initiative (SWLI) ..... 3
- EXECUTIVE SUMMARY ..... 4
  - Project Summary ..... 4
  - Overview ..... 5
  - Recommendations ..... 5
- INTRODUCTION ..... 6
- CHALLENGES ..... 8
- RECOMMENDATIONS ..... 8
  - Sources of Funding..... 8
  - Community Involvement..... 11
  - Public Education and Information Campaigns..... 13
- CONCLUSION..... 16
- APPENDIX A: DEMOGRAPHICS ..... 18
- APPENDIX B: COMMUNITY CONTACTS..... 19

## **Acknowledgements**

Thank you to Dr. Angie Carter and all the students in the Fall 2016 Contemporary Social Issues class for contributing to this project. Special thanks to the community partners from Dubuque, Black Hawk, Linn, Marshall, and Polk Counties who shared their experiences with our class.

## **The Sustainable Working Landscapes Initiative (SWLI)**

The concept of the Upper Mississippi Center for Sustainable Communities (UMC) came from exploratory meetings with more than 125 on and off-campus community stakeholders between January and August of 2013. The need was clear: our area's urban and rural communities have identified many environmental and economic sustainability issues and do not have the staff, expertise, time or funding to address them. The vision of the UMC was to mobilize Augustana's faculty and students to help communities solve the social, economic, and environmental challenges facing the rural and urban landscapes of the Upper Mississippi region by integrating the study of these current, local issues into coursework taught on campus. After two pilot years, the UMC implemented a unique collaborative learning model named the Sustainable Working Landscapes Initiative.

The Sustainable Working Landscapes Initiative is modeled after the Sustainable Cities Year Program at the University of Oregon. Augustana College is the only exclusively undergraduate institution in the country to adapt this highly successful program to a residential liberal arts setting. The model creates a full one-year partnership between Augustana and a city/county partner, matching existing courses from multiple departments and other learning experiences (independent study, senior inquiry, internships) with community-identified and driven sustainability problems. The SWLI also helps cities and counties achieve their economic, social, and environmental sustainability goals while working with limited resources.

The Sustainable Working Landscapes Initiative represents a paradigm shift for service learning experiences in higher education. Instead of asking groups and communities to participate in initiatives that originate in academia, the UMC asks communities to identify their most pressing social, economic, and sustainability challenges. It then provides these groups and communities with the human and academic resources of Augustana College faculty and students to help them address the challenges. This is not a one-time group of volunteers. SWLI student and faculty participants commit to supplying three, 10 week terms of sustained research, study and work in the classroom and in the field. The UMC is establishing enduring relationships between Augustana and these constituents so they can continue to work together to find creative solutions, test and evaluate their effectiveness, and try again as challenges and problems change.

# EXECUTIVE SUMMARY

## Project Summary

Lead poisoning is an environmental as well as social problem. Areas with older housing and higher rates of poverty are also the areas with the most lead poisoned children. Though the United States banned the use of lead paint in 1978 and lead poisoning is preventable, lead poisoning remains a public health problem. Homes built before 1978 may pose risk of lead paint exposure, but of special concern to Scott County are the number of homes built before 1950.

Scott County, Iowa is home to some of the oldest housing units in the U.S. Iowa ranks fifth among the states in the percentage of housing built before 1950 and third in percentage of housing built before 1940<sup>1</sup>. While the national average of pre-1950 homes is 22.3%, Scott County's pre-1950 housing stock is 30%<sup>2</sup>. Pre-1950 housing stock rises to 77% in the census tracts 106 through 112 in the City of Davenport.<sup>3</sup> It is in these pre-1950 homes where children in Iowa are most at risk.

Scott County's poverty level of 7.7% exceeds the state average, and the incidence of lead poisoning at 2.2% is more than double the national average of 1.0%<sup>4</sup>. The incidence of lead poisoning in the census tracts 106 through 112 in the City of Davenport reaches 3.8%, nearly quadruple the national average<sup>5</sup>.

In 2016, Scott County Health Department officials reached out to the Sustainable Working Landscapes Initiative (SWLI) program at Augustana College to begin a partnership addressing this environmental problem in our community. Teams of students in the Fall 2016 Contemporary Social Issues class conducted sociological case studies of communities in Iowa that are proactively addressing lead remediation through combinations of United States Department of Housing and Urban Development (HUD) and private funding. Groups of students conducted case studies in Dubuque, Linn, Polk, Marshall, and Black Hawk counties in Iowa. Students researched the demographics of these areas as well as successes, lessons learned, challenges, local partnerships, and sources of funding for these programs. The students worked to identify key questions and concerns, as well as goals, for the case studies and presented these to the Scott County Public Health Department contacts at the conclusion of the fall term.

---

<sup>1</sup> Scott County Health Department. 2016. "Childhood Lead Poisoning Prevention: Environmental, Jurisdictional, Sociological, and Public Health Considerations" Proposal submitted to Sustainable Working Landscapes Initiative. Augustana College, Rock Island, IL.

<sup>2</sup> Ibid.

<sup>3</sup> Ibid.

<sup>4</sup> Ibid.

<sup>5</sup> Ibid.

During the Winter 2016 term, student interns compiled findings from these case studies into the following report. For the sake of brevity, we only include information which we felt was most relevant and useful to Scott County.

## **Overview**

The layout of this report is as follows: First, we identify the most common obstacles communities faced and how they were overcome. Then, we provide recommendations for improvements in Scott County, with special emphasis in sources of funding, community partnerships, and public education and information campaigns. Finally, we provide information regarding demographics and community contact information. It is our hope that these recommendations will be useful in helping to inform next steps in the improvement of environmental health in our community.

## **Recommendations**

In this report, we focus on the recommendations based on lessons learned from other communities in Iowa. We summarize three areas of recommendations: 1) Sources of Funding, 2) Community Partnerships, and 3) Public Education and Information Campaigns.

- Our top recommendation is that Scott County investigate potential partnerships in schools, local higher education institutions, hospitals, churches, and local non-profits.
- We also recommend that Scott County investigate alternative sources of funding, including foundation grants and charity donations. These funds could be used to supplement HUD grants or as an alternative to HUD grants.
- Finally, we recommend that Scott County expand on its existing resources through public educational campaigns, advertising, and translation of online resources.

## INTRODUCTION

Scott County, Iowa is home to some of the oldest housing units in the U.S. The United States banned the use of lead paint in 1978. Homes built before that date may pose risk of lead paint exposure, but of special concern to Scott County are the number of homes built before 1950. It is in these pre-1950 homes where children in Iowa are most at risk.

Iowa ranks fifth among the states in the percentage of housing built before 1950 and third in percentage of housing built before 1940<sup>6</sup>. While the national average of pre-1950 homes is 22.3%, Scott County's pre-1950 housing stock is 30%<sup>7</sup>. Pre-1950 housing stock rises to 77% in the census tracts 106 through 112 in the City of Davenport.<sup>8</sup>

Lead poisoning is an environmental as well as social problem. Consistent with environmental harm across the country, socio-economic status and race are indicators of vulnerability when it comes to risk of lead poisoning in Scott County. Areas with older housing and higher rates of poverty are also the areas with the most lead poisoned children. The county's poverty level of 7.7% exceeds the state average, and the incidence of lead poisoning at 2.2% is more than double the national average of 1.0%<sup>9</sup>. The incidence of lead poisoning in the census tracts 106 through 112 in the City of Davenport reaches 3.8%, nearly quadruple the national average<sup>10</sup>.

The problem is further complicated by the realities of a mobile rental population. In Davenport, the areas of homes most likely to have lead paint are located in neighborhoods with high rates of rentals, adding further challenges to the remediation of lead in homes when the homes are not owner-occupied and the families may move from one home to another.

According to the Center for Disease Control (CDC), there is no level of lead considered safe for children. Lead poses a health hazard even in small amounts and is especially hazardous to young children. Children under six years old are at greater risk for lead poisoning since they have more hand-to-mouth contact. Children who have been lead poisoned suffer from learning disabilities and developmental deficits, along with symptoms which include: irritability, loss of appetite, weight loss, fatigue, abdominal pain, and vomiting<sup>11</sup>. If left unchecked, lead poisoning can lead

---

<sup>6</sup> Scott County Health Department. 2016 "Childhood Lead Poisoning Prevention: Environmental, Jurisdictional, Sociological, and Public Health Considerations." Proposal to Augustana College's Sustainable Working Landscapes Initiative.

<sup>7</sup> Ibid.

<sup>8</sup> Ibid.

<sup>9</sup> Ibid.

<sup>10</sup> Ibid.

<sup>11</sup> Mayo Clinic Staff. "Lead Poisoning." *Mayo Clinic*. Mayo Foundation for Medical Education and Research, n.d. Web. 2 Oct. 2016.

to pain, digestive problems, behavioral problems, loss of developmental skills, and seizures. In Scott County, a moving average of 50 children have a blood lead level greater than 5 micrograms per deciliter of blood, the level at which the Centers for Disease Control recommends public health interventions. However, most lead hazard prevention programs, including that of Scott County, will begin treatment when a child has lead levels  $\geq 10\mu\text{dL}$ .

Most lead hazard prevention programs use United States Department of Housing and Urban Development (HUD) grants as a main source of funding. In 2007 and 2011, the City of Davenport received \$2.5 million in HUD funding for remediation of homes where children were at risk of lead poisoning, however there remains much work to do. To date, the City of Davenport has no stated plans to apply for future grant cycle funding. The lack of funding will hamper efforts to remediate lead contaminated housing in Scott County, and perpetuate the problem of lead poisoning of children in the county. The County estimates that approximately 81% of the housing in Scott County was built prior to 1978 and over 30% was built prior to 1950<sup>12</sup>. The risk of lead poisoning raises substantially in census tracts 106 through 112 in the City of Davenport where this rises to 96% of housing was built prior to 1978 and 77% before 1950<sup>13</sup>. The previous cycles of HUD funding remediated approximately 300 lead-contaminated houses in which children 6 years of age or younger lived, but the City estimates that over 2,000 housing units in the target area are in substandard condition needing substantial repairs<sup>14</sup>. Challenges with administration of the HUD grant resulted in fewer properties to be remediated than planned and disillusionment of partners<sup>15</sup>.

Institutional barriers have proved to be a major obstacle in using HUD funds to combat lead hazards proactively. To date, the city and county take mostly reactive measures in treating lead hazards. The County is currently studying pathways for alternative funding mechanisms outside of or beyond HUD grants. In addition, partnerships must continue to be built to leverage existing and alternative resources within the community and provide greater flexibility in proactive interventions than allowed through HUD funding.

In this report, we focus on the recommendations based on lessons learned from other communities in Iowa.

The layout of this report is as follows: First, we identify the most common obstacles communities faced and how they were overcome. Then, we provide recommendations for improvements in Scott County, with special emphasis in sources of funding, community

---

<sup>12</sup> Scott County Health Department. 2016 “Childhood Lead Poisoning Prevention: Environmental, Jurisdictional, Sociological, and Public Health Considerations.” Proposal to Augustana College’s Sustainable Working Landscapes Initiative.

<sup>13</sup> Ibid.

<sup>14</sup> Ibid

<sup>15</sup> Ibid.

partnerships, and public education and information campaigns. Finally, we provide information regarding demographics and community contact information. It is our hope that these recommendations will be useful in helping to inform next steps in the improvement of environmental health in our community.

## **CHALLENGES**

The challenges in the other communities we studied were similar to those faced in Scott County: historical homes, rental homes, institutional challenges, and limitations in the use of HUD funding.

Similarly to Davenport, the most vulnerable areas in the communities we studied were those with higher rates of older homes and poverty. This is a huge problem because those with less income are the ones who are less equipped to deal with the realities of lead hazards. The restrictions on HUD money prevent homes from being remediated if they are not completely structurally sound and if the remediation cannot be finished completely. For poor families that cannot make up the difference between the actual cost of remediation and the grants given to them with money out of pocket, then they must continue to live in a dangerous home. Lead paint was originally used because it was a cheaper, more durable paint. The cheaper the paint used, the cheaper the house could be sold for, and so the most vulnerable of the population was targeted, creating a sacrifice zone. Oftentimes, new homeowners or renters may not know all of their rights when purchasing a new home or renting one. These realities underscore the importance of framing the problem of lead paint poisoning as an environmental justice issue in our community.

Additionally, as expected, communities in Iowa also face the challenge that county health departments cannot intervene in a lead poisoning situation until a child has 10 micrograms per deciliter. This is concerning given the CDC guideline of 5 micrograms per deciliter.

## **RECOMMENDATIONS**

### **Sources of Funding**

Lack of funding has presented a major problem to public health officials in Scott County. In order to use HUD funding for lead remediation, the home must be structurally sound. However, many homes that require lead remediation are not structurally sound, so HUD funds cannot be used. This problem creates a vicious cycle for Scott County and is a major obstacle. However, other counties in Iowa have been successful in using HUD funds in combination with other programs.

We recommend that Scott County further investigate different ways to use HUD funding. The City of Dubuque received 3.2 million dollars in their last HUD grant and used most of this money for their Lead Hazard Control and Healthy Homes program. This program in Dubuque helps provide lead hazard certification classes, paying contractors and property inspectors, and funding awareness campaigns. Federal funding could potentially be used for preventative, proactive measures in a lead hazard control program. Other communities used HUD grants to fund smaller-scale lead remediation projects.

We recommend that Scott County continue to investigate their own and their potential partners' eligibility for Community Development Block Grants (CDBGs) and make use of these funds for lead hazard prevention. CDBGs are another source of federal funding for lead hazard prevention. CDBGs are more flexible than traditional HUD grants. CDBGs can be used as an alternative or in addition to HUD funding. Furthermore, CDBGs encourage local awareness and citizen participation from low-to-moderate income citizens. CDBG grantees are required to develop a community involvement plan. By raising awareness, Scott County could help prevent existing lead problems from worsening and tackle lead hazards sooner. In some jurisdictions, CDBGs are an entitlement program, and in others they are non-entitlement.

Additionally, Scott County should seek out nonprofits rooted in the Quad City area to fund lead hazard prevention. Contacting local organizations rather than national ones increases the likelihood that Scott County will receive funding, since locally based organizations are more likely to be sensitive to the cause. In places where HUD funding fell short, locally based nonprofits provided extra funding. Philanthropic organizations such as the Martha Ellen-Tye Foundation, Hawkeye Community Action Program, and the Four Mounds Foundation helped provide extra funding for lead prevention efforts in other counties.

It is interesting to note that Black Hawk County does not apply for funding at the county level. Instead, they rely upon community partnerships with many public health nurses, students from the University of Northern Iowa, and their own staff goes door-to-door and partners with the city of Waterloo as needed. Waterloo, a major city within Black Hawk county, applies for grants, such as Community Development Block (CDBG) and Housing and Urban Development (HUD) grants separately from the county. For some years, Waterloo received the HUD grant as well the CDBG but in this most recent funding cycle the city did not receive the HUD grant. Danielle Rohret, an employee of the city of Waterloo's Lead Program, said this was because of their stats improving over recent years, meaning that the number of elevated blood lead levels have gone down within the city limits. As of 2016, Waterloo is only able to use the funding from the CDBG. Because this can only benefit low-income households and neighborhoods, Waterloo bases family eligibility on household income; they must make less than \$52,400 a year for a family of four. This is the only way a house owner is able to access the funds given by the

CDBG and these funds only reach about 10-15 families (several hundred if Waterloo received the HUD grant).

The City of Marshalltown in Marshall County and the Lead Hazard Control Program there receive most of their funding from federal sources. Their main source of funds is the HUD grant, which gives \$3.4 million. The rest is from smaller grants and donations, with the remainder consisting of out of pocket funds. They also receive funds from the Martha Ellen Tye Foundation, as well as agencies that will match some of the federal funds. The Martha Ellen Tye Foundation is a locally based philanthropic organization and is used to provide grants for the community's needs. The main partner of the LHCP is the Mid-Iowa Community Action. The organization was established in 1965, and is known for educating people in communities and helping families in poverty. The organization works towards strengthening communities and bringing relief for those in poverty. The LHCP is also partnered with Iowa Valley Continuing Education, Marshall County Community Foundation, Healthy Homes, and state approved agencies that train certified workers<sup>16</sup>.

Polk County receives most of their funding through HUD. Their latest HUD grant was received in October 2016. Since 2008, Polk County has been granted 3 HUD grants totaling 2.5 million dollars. The Polk County Board of Supervisors provides the funding Dubuque, Iowa gets, about 3.2 million dollars in HUD grant funding. In addition to HUD, the Polk County Board of Supervisors allocates funding for lead remediation through an annual budget line item. This money is not a grant but is part of the county's annual budget that they allocate to public health. The county also receives money from a separate Polk County Housing Trust Fund that receives a national grant from an organization called Health Build to help with household improvements in families where children have asthma.

Dubuque received 3.2 million in HUD funding and uses \$2,900,000 for the Lead Hazard Control Program. This program funds remediation in 136 housing units for families with low and very low housing income with children. Some of the areas that this program covers is: 1) providing a safer lead free housing arrangement for children around the neighborhoods 2) having professional lead paint certifications in the city such as having more contractors, program inspectors and property owners 3) more public awareness by educating their people with the risks and danger of lead paint poisoning, and 4) promotions for the city, so having community partnerships come help with the problem. All of these factors come into play for the city and make it a better place to live for everyone who is being affected by the lead contamination areas.

---

<sup>16</sup> Brown, Joyce. "Lead Hazard Control Program." Telephone interview. 15 Sept. 2016.

## Community Involvement

Scott County should look for partnerships that would provide assistance at various steps of the process. Local partnerships help simplify the lead treatment process and take some burden off of families affected by lead paint hazards. For example, the Lead Hazard Control Program in Marshalltown works with the local library to provide temporary housing for families whose homes are being remediated. The organization owns two houses near the library which are lead safe and fully furnished. The city subsidizes the rent and pays for the maintenance and utilities of the houses. The Packaging Company of America provides boxes for moving household belongings to and from temporary housing, and the Home Rental Center provides discounted trailers for storage. Investing in such partnerships can ensure that programs persist even in the absence of federal dollars.

We recommend that Scott County expand its lead hazard prevention program by partnering with local schools, nonprofits, and volunteer organizations. Every community we studied strongly recommended community partnerships in developing a lead hazard prevention program. Local organizations can help in various ways. When grants are not readily available, local organizations may still be able to provide assistance or leverage of other funds.

The Childhood Lead Poisoning Prevention Program (CLPPP) for Dubuque County has seen great success in decreasing the percentage of childhood lead poisonings out of the number of children tested since the program began in 1994. Partnerships with local high schools and health clinics have been very successful. The Dubuque CLPPP was launched in 1994 and works to “reduce the prevalence of childhood lead poisoning”<sup>17</sup>. This program is a joint effort by the City’s Health Services and the Housing and Community Development Departments. The target population for the program includes children ages six and under. The CLPPP of Dubuque works diligently to identify and manage the cases of those children with elevated blood lead levels, aid in identifying and controlling sources of lead in the community, survey elevated blood lead levels in young children to monitor progress, and provide lead education and outreach to the Dubuque county community<sup>18</sup>. The county has seen great success through the use of this program and as of 2010, lead poisoning had decreased from 14% of children tested in 1994 to 3%<sup>19</sup>. The great strides that this program has made within the community were highlighted in a recent pamphlet that was used as part of the materials for Dubuque’s “International Award for

---

<sup>17</sup> Childhood Lead Poisoning Prevention Program (CLPPP)." *IDPH*. Iowa Dept. of Public Health, n.d. Web. 12 Oct. 2016.

<sup>18</sup> *Ibid*.

<sup>19</sup> *International Award for Liveable Communities*. Dubuque: City of Dubuque, 2010. Print.

Livable Communities” award in 2010. As the city of Dubuque continued to develop and become more of a sustainability-minded community, it became increasingly important to the entire county to address this potential threat of lead to young children. Similar connections could be made in Davenport to local sustainability initiatives.



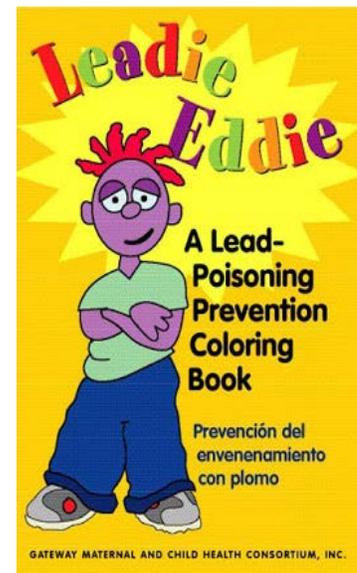
**Figure 1** Dubuque's HEART program partners with schools

Several communities in Iowa have lead poisoning prevention programs with local schools. One noteworthy program is Dubuque’s House Education and Rehabilitation Training (HEART) program. This program trains at-risk high school students in lead remediation. Students in the HEART program spend half the day in regular classes and half on-site to complete community service. This program has treated 27 properties since its foundation in 2003 and has a 92% graduation rate. The program is funded and staffed through the nonprofit organization, Four Mounds<sup>20</sup>. Students also earn stipends through their work in which a portion of the money is put into bank accounts that the program helps them open. Their pay is given through community business partners and a foundation matches the money that the individuals make so that they can pursue further schooling after graduation. A similar program in

Scott County high schools could help by giving opportunities to at-risk youth and by making the remediation process more efficient.

Another noteworthy educational partnership program is the “Leadie Eddie” program in Polk County. Leadie Eddie (Figure 2) is an educational cartoon character used to teach children to eat healthy, wash their hands, and look out for warning signs in their homes in order to prevent lead poisoning. Schools in Scott County should use Leadie Eddie or a similar campaign to teach children about lead hazards.

Several communities utilize local hospitals in their lead hazard prevention programs. Black Hawk and Dubuque Counties use door-to-door home inspection services from local nurses. In these programs, travelling nurses go to low-income neighborhoods to assess lead poisoning risk at each home. Homes built before 1950 are likely to be located in low-income neighborhoods, so the nurses target these areas. Nurses do a visual inspection of each home. If the



**Figure 2** Leadie Eddie educates children in Polk County

<sup>20</sup> See <http://www.fourmounds.org/missionprograms/heartprogram/tabid/106/default.aspx>

home has potential lead hazards, the children in the home are tested and the family is provided with further resources. Cedar Falls and Waterloo partner with the University of Northern Iowa public health nurses and environmental health interns and students to do lead testing and hazard prevention education as part their door-to-door nutrition program. Dubuque partners with visiting nurses from Unity Point hospitals in their door-to-door program. There are several Unity Point locations in the Quad Cities, so we strongly recommend that Scott County utilize this resource.

The City of Cedar Rapids Housing Services and Linn County Public Health have a great partnership in their use of HUD funds and this partnership has been active for over 20 years. Housing Services provides comprehensive rehabilitation, emergency assistance, HOME programming, and other CDBG funding for the City. The Section 8 program is also run out of this office. The CDBG areas have always been a part of the target area specified in all rounds of the Lead Hazard Control Grant.

In our research, we saw great potential for future partnerships with Augustana College. Public health or pre-medicine students could gain hands-on experience as interns with the lead hazard prevention program in Scott County. These students could conduct door-to-door home inspections, similar to the Visiting Nurse programs in Black Hawk County and Dubuque County. Additionally, marketing students could help in creating an outreach campaign.

## **Public Education and Information Campaigns**

Proactive measures through public education and information campaigns will greatly reduce lead poisoning risk. In most cases, a home cannot be abated or remediated unless a young child has a confirmed elevated blood level. However, there are several ways in which Scott County can be proactive by raising awareness.

Scott County already has helpful information regarding lead poisoning on its website. We recommend that they make this information more accessible to the public. Some communities use local radio and television networks to inform residents through informational campaigns and advertisements. A quick segment on a local radio station could reach a large number of residents at little or no cost to the county. Using radio stations is an especially effective way of reaching out to people of lower socioeconomic standing, who are at a greater risk for lead poisoning. In order to combat lead poisoning, Scott County should consider making a marketing and/or social media campaign to raise awareness, increasing its staff, partnering with local hospitals and schools, or using Public Health student interns to do preliminary home inspections.

Scott County’s website currently has a wealth of information on sources of lead poisoning and safety tips. We recommend that Scott County further improve its webpage by providing information regarding the application process, funding, eligibility, as well as providing resources in Spanish. For future improvements, we recommend that Scott County hire Spanish-speaking staff members, inspectors, and contractors in its lead hazard prevention program. Students from Augustana College or volunteers from the community could also serve as translators in updating this important information.

In our research, we noticed that most communities have detailed web pages outlining the procedure for lead hazard remediation. Improving the webpage to make this information accessible to Spanish language speakers is a low-cost, easy improvement that helps spread awareness. Many communities—such as Marshall County—have information about lead hazard safety information available in English and Spanish on their websites. These communities also have applications for lead inspection available in English and Spanish. As of now, the lead hazard safety information on Scott County’s website is exclusively in English. According to the most recent census data, 6.4% of Scott County’s population is Hispanic or Latino—roughly 10,000 people. Scott County should reach out to this segment of the population in its lead hazard prevention efforts. We recommend that Scott County make Spanish versions of “Keeping Your Home Lead Safe” and “Has Your Child Been Tested” for its website. Marshall County’s website could be a model as it currently includes information on signs of lead hazards, symptoms of lead poisoning, income eligibility guidelines, and links to a home inspection application in English and Spanish.

Scott County could also use social media and videos to create a media campaign for its lead hazard prevention program. Social media could get information out easily to large amounts of people. A college student or communications staff member could run social media for Scott County.

Many communities use television, radio, and other forms of advertisement to spread awareness. Radio and TV ads can be run at little to no cost to the county. Advertisements on public transportation can be especially useful in spreading awareness in low-income neighborhoods.

In Cedar Rapids, HUD grant funds are used to target older home areas with direct mailings about lead hazards, as well as marketing strategies cover the entire City such as Cedar Rapids magazine, Facebook, TV commercial on cable, local media stories (TV and newspaper), and events where staff are present to meet with residents and discuss grants, attending neighborhood associations, schools, daycares, provider offices, City/County/Healthy Homes websites.

One great model of a public information campaign is Linn County’s Cedar Rapids Hazard Hunters<sup>21</sup>, an online resource (Figure 2) to educate community members about potential lead paint hazards in their homes. A downloadable map online clearly shows areas of the city where the majority of homes were built pre-1978 and may be eligible for the Lead Hazard Hunters program. The resources were developed through a Lead Hazard Control Grant through HUD and are available online for homeowners, tenants, and landlords. Their online resources feature a short video explaining how to check to see if your home qualifies for the grant and sharing resources. In addition, the website features an “Apply Today” button for homeowners and landlords to apply right now. The GIS maps created by Augustana College could help to create maps educating community members and leaders about where lead hazards are of special concern.

**IS YOUR HOUSE SAFE?**

Your home is more likely to have lead-based paint if:

- ▶ It was built before 1978
- ▶ It is located within the Danger Zone shown on this map
  - ▶ An area roughly bound by 11th Street, E Avenue and Edgewood Road NW; 1st Avenue W; Rockford Road and Wilson Avenue SW; J Avenue, I-380, 32nd Street and 29th Street NE; 1st Avenue E; Forest Drive; 19th Street and 15th Avenue SE

**HELP FOR YOUR HOME**

The City of Cedar Rapids and Linn County Public Health have a program that can help you find and fix lead-paint problems for **little or no cost to you**. There is a grant that can help both homeowners and landlords. If you live in a Danger Zone, you might qualify – especially if children under 6 live with you. **Plus, it's FREE to find out if you are eligible.**

**Thanks to a Lead Hazard Control Grant** from the Department of Housing and Urban Development (HUD), **we can help those who qualify with:**

- ▶ Inspection costs
- ▶ Improvement costs
- ▶ Healthy Homes assessments and education
- ▶ Relocation assistance during repairs

**Homeowners and landlords:** It costs nothing to find out if you're eligible. **Visit CRHazardHunters.com or call 319-286-5872 today.**

**HAZARD HUNTERS**  
CEDAR RAPIDS  
City of Five Seasons

**CRHazardHunters.com**  
KEEPING KIDS SAFE FROM LEAD-BASED PAINT

Figure 3 Cedar Rapids Hazard Hunters Graphic

<sup>21</sup> See CRHazardHunters.com

Some counties provide help to families who might be at risk of lead poisoning when there is not a confirmed case through door-to-door programs and other interventions. Visiting nurses and environmental and public health interns and students could help lead door-to-door screening programs. In the Quad Cities area, similar partnership opportunities may be found with local hospitals, St. Ambrose University, and / or Augustana College.

In Dubuque, families who are low-income, have made multiple trips to the ER recently, and whose children miss school often are provided with lead assessments. Many communities in Iowa will inspect homes before a child has confirmed elevated blood levels. In Cedar Rapids, the county relies upon community partnerships with many public health nurses, students from the University of Northern Iowa, and their own staff to go door-to-door and partner with the city of Waterloo as needed.

We encourage Scott County to pay special attention to communities that are at greater risk for lead hazards. Low-income neighborhoods may have older homes, which are likely to have lead paint. Historically, lead paint was inexpensive and used in cheaper homes, putting low-income families at even greater risk. Scott County should consider using marketing campaigns to specifically reach out to low-income areas. Scott County should also pay special attention to racial and ethnic minorities, especially those living in low-income areas. We also recommend that Scott County make the “Lead Busters Club” information more accessible to the public. A marketing campaign could help raise awareness, especially among at-risk groups such as low-income families and families with young children.

## **CONCLUSION**

Lead poisoning in our community is an environmental justice concern. Solving the lead poisoning problem is more than just repainting, it means tackling bigger problems, too. Knowing that children in lower-income homes are most vulnerable to lead poisoning should inspire partners to look at immediate as well as long-term solutions. Recognizing the intersecting systems of inequality at play and why these children are more likely to be poisoned is essential to finding a sustainable solution long-term. Community partnerships can help to address the problem through an environmental justice framework, reaching vulnerable populations through every day interactions and relationships.

Overall, community partnerships help Iowa lead hazard prevention programs by raising awareness and increasing efficiency. The importance of community outreach cannot be overstated. Community partnerships are essential to any public health campaign. We strongly recommend that Scott County build partnerships with local schools, hospitals, and charities in order to expand the lead hazard prevention program. Reaching out to local resources gets the

community more involved and raises awareness for this problem, making work easier for Scott County officials.

As Mr. Kozin from Polk County shared with our class, the temptation to apply for grants can distract from the importance of building partnerships with existing programs that are already spending money on fixing homes. He recommended finding these programs that are grounded in community to build sustainability within lead poisoning prevention efforts. Whether or not a big federal grant is obtained, these local partnerships can continue to help provide resources and leverage for county efforts.

Our top recommendation is that Scott County investigate potential partnerships in schools, local higher education institutions, hospitals, churches, and local non-profits.

We also recommend that Scott County investigate alternative sources of funding, including block grants and charity donations. These funds could be used to supplement HUD grants or as an alternative to HUD grants.

Finally, we recommend that Scott County expand on its existing resources through public educational campaigns, advertising, and translation of online resources.

We hope that Scott County will use this formation to the best of their ability for the betterment of the community.

## APPENDIX A: DEMOGRAPHICS

County	Population	Median Household Income	Owner-Occupied Housing Unit Rate	% Pre-1950s Housing Units*	Children Tested*	Number $\geq 10\mu\text{dL}$ *	Proactive Measures	Funding
Scott	172,126	\$53,704	68.1%	30.6%	6548	266	Currently researching	HUD in the past
Dubuque	97,125	\$54,605	72.4%	38.9%	2622	95	Partnerships w/hospitals & high schools	HUD Lead Hazard Control & Healthy Homes
Black Hawk	133	\$48,369	67.5%	32.3%	5654	284	Partnerships w/hospitals, universities, ads	HUD, CDBG, partnership leverage
Linn	219,916	\$59,322	73.6%	26.6%	7,323	263	Hawkeye Area Comm Action Program	HUD, IA Department of Public Health, CDBG
Polk	467,711	\$60,061	67.6%	27.1%	14,383	339	“Leadie Eddie” educational program;	HUD, County Supervisors, County Housing Trust Fund, County Health Department

\*Figures based on 2009 estimates.

Sources: Census.gov, Iowa Department of Public Health

## APPENDIX B: COMMUNITY CONTACTS

<b>Black Hawk County (Cedar Falls &amp; Waterloo)</b>	
<p>Mike Prideaux Black Hawk County Health Department Childhood Lead Poisoning Prevention Program Coordinator <a href="mailto:mprideaux@co.black-hawk.ia.us">mprideaux@co.black-hawk.ia.us</a> (319)-292-2206</p>	<p>Danielle Rohret Waterloo Lead Program <a href="mailto:danielle.rohret@waterloo.ia.org">danielle.rohret@waterloo.ia.org</a> (319)-291-4429</p>
<b>Dubuque County (City of Dubuque)</b>	
<p>Kim Glaser Lead Paint Program Manager (563)-690-6088</p>	<p>Robert Boge Dubuque Safe and Healthy Homes General Housing Specialist (563)-690-6073</p>
<b>Linn County (Cedar Rapids)</b>	
<p>Ann E. Olson Healthy Homes Program Coordinator <a href="mailto:Ann.Olson@linncounty.org">Ann.Olson@linncounty.org</a> (319) 892-6056</p> <p>Jane Drapeaux Chief Executive Director of HACAP Phone: (319)393-7811</p>	<p>Art Anderson Housing and Healthy Homes Specialist (319) 286-5179</p>
<b>Marshall County (Marshalltown)</b>	
<p>Joyce Brown Lead Hazard Control Program Manager (641) 754-6583</p>	
<b>Polk County (Des Moines)</b>	
<p>Rick Kozin Polk County Health Department Director <a href="mailto:rick.kozin@polkcountyiowa.gov">rick.kozin@polkcountyiowa.gov</a> (515)-286-3926</p>	<p>Joelle Stolte Polk County Health Department Lead Prevention Program Manager <a href="mailto:joelle.stolte@polkcountyiowa.gov">joelle.stolte@polkcountyiowa.gov</a> (515)-286-3749</p>

<b>Medical Partnerships</b>	
Iowa Lead Poisoning Prevention Program: (800)-972-202 Iowa Poison Control Center (Business Inquiry): (712)-279-3710 Unity Point Dubuque Visiting Nurses Association: (563) 556-6200 Unity Point Rock Island: (309)-779-5000	
<b>Other Partnerships</b>	
Iowa State Housing Trust Fund: (515) 725-4956 Four Mounds Foundation: (563)-557-7292 Martha-Ellen Tye Foundation: (641) 752-8340 Hawkeye Community Action Program: (319)-393-7811 Iowa Valley Continuing Education: (641)-752-4645 Mid-Iowa Community Action: (641) 752-7162	
<b>Augustana College Contacts</b>	
Michael Reisner Upper Mississippi Center Program Director <a href="mailto:MichaelReisner@augustana.edu">MichaelReisner@augustana.edu</a> (309) 794-3418	Angie Carter Sociology Teaching Fellow <a href="mailto:angiecarter@augustana.edu">angiecarter@augustana.edu</a> (309) 794-7214
Doug Tschopp Entrepreneurial Center Director <a href="mailto:dougtschopp@augustana.edu">dougtschopp@augustana.edu</a> (309) 794-7426	Rosalie Starenko Upper Mississippi Center Program Manager <a href="mailto:rosaliestarenko@augustana.edu">rosaliestarenko@augustana.edu</a> (309) 794 7359
Paul Croll Sociology Department Chair <a href="mailto:paulcroll@augustana.edu">paulcroll@augustana.edu</a> (309) 794-7649	Emma Nordmeyer Sustainable Working Landscapes Initiative Writing Intern Sociology and Spanish Major <a href="mailto:emmanordmeyer15@augustana.edu">emmanordmeyer15@augustana.edu</a>
Carolyn Hough Public Health Department Chair <a href="mailto:CarolynHough@augustana.edu">CarolynHough@augustana.edu</a> (309) 794-7676	