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Problem-Oriented Guides for Police
Problem-Specific Guides Series
No. 9

COPS
COMMUNITY ORIENTED POLICING SERVICES
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# Graffiti

Deborah Lamm Weisel

www.cops.usdoj.gov

Center for
Problem-Oriented Policing

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Deborah Lamm Weisel

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The Internet references cited in this publication were valid as of May 2009. Given that URLs and web sites are in constant flux, neither the author nor the COPS Office can vouch for their current validity.

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## About the Problem-Specific Guide Series

The *Problem-Specific Guides* summarize knowledge about how police can reduce the harm caused by specific crime and disorder problems. They are guides to prevention and to improving the overall response to incidents, not to investigating offenses or handling specific incidents. Neither do they cover all of the technical details about how to implement specific responses. The guides are written for police—of whatever rank or assignment—who must address the specific problem the guides cover. The guides will be most useful to officers who:

- **Understand basic problem-oriented policing principles and methods. The guides are not primers in problem-oriented policing.** They deal only briefly with the initial decision to focus on a particular problem, methods to analyze the problem, and means to assess the results of a problem-oriented policing project. They are designed to help police decide how best to analyze and address a problem they have already identified. (A companion series of *Problem-Solving Tools* guides has been produced to aid in various aspects of problem analysis and assessment.)
- **Can look at a problem in depth.** Depending on the complexity of the problem, you should be prepared to spend perhaps weeks, or even months, analyzing and responding to it. Carefully studying a problem before responding helps you design the right strategy, one that is most likely to work in your community. You should not blindly adopt the responses others have used; you must decide whether they are appropriate to your local situation. What is true in one place may not be true elsewhere; what works in one place may not work everywhere.

- **Are willing to consider new ways of doing police business.** The guides describe responses that other police departments have used or that researchers have tested. While not all of these responses will be appropriate to your particular problem, they should help give a broader view of the kinds of things you could do. You may think you cannot implement some of these responses in your jurisdiction, but perhaps you can. In many places, when police have discovered a more effective response, they have succeeded in having laws and policies changed, improving the response to the problem. (A companion series of *Response Guides* has been produced to help you understand how commonly-used police responses work on a variety of problems.)
- **Understand the value and the limits of research knowledge.** For some types of problems, a lot of useful research is available to the police; for other problems, little is available. Accordingly, some guides in this series summarize existing research whereas other guides illustrate the need for more research on that particular problem. Regardless, research has not provided definitive answers to all the questions you might have about the problem. The research may help get you started in designing your own responses, but it cannot tell you exactly what to do. This will depend greatly on the particular nature of your local problem. In the interest of keeping the guides readable, not every piece of relevant research has been cited, nor has every point been attributed to its sources. To have done so would have overwhelmed and distracted the reader. The references listed at the end of each guide are those drawn on most heavily; they are not a complete bibliography of research on the subject.

- **Are willing to work with others to find effective solutions to the problem.** The police alone cannot implement many of the responses discussed in the guides. They must frequently implement them in partnership with other responsible private and public bodies including other government agencies, non-governmental organizations, private businesses, public utilities, community groups, and individual citizens. An effective problem-solver must know how to forge genuine partnerships with others and be prepared to invest considerable effort in making these partnerships work. Each guide identifies particular individuals or groups in the community with whom police might work to improve the overall response to that problem. Thorough analysis of problems often reveals that individuals and groups other than the police are in a stronger position to address problems and that police ought to shift some greater responsibility to them to do so. Response Guide No. 3, *Shifting and Sharing Responsibility for Public Safety Problems,* provides further discussion of this topic.

The COPS Office defines community policing as "a philosophy that promotes organizational strategies, which support the systematic use of partnerships and problem-solving techniques, to proactively address the immediate conditions that give rise to public safety issues such as crime, social disorder, and fear of crime." These guides emphasize problem-solving and police-community partnerships in the context of addressing specific public safety problems. For the most part, the organizational strategies that can facilitate *problem-solving and police-community partnerships* vary considerably and discussion of them is beyond the scope of these guides.

These guides have drawn on research findings and police practices in the United States, the United Kingdom, Canada, Australia, New Zealand, the Netherlands, and Scandinavia. Even though laws, customs and police practices vary from country to country, it is apparent that the police everywhere experience common problems. In a world that is becoming increasingly interconnected, it is important that police be aware of research and successful practices beyond the borders of their own countries.

Each guide is informed by a thorough review of the research literature and reported police practice, and each guide is anonymously peer-reviewed by a line police officer, a police executive and a researcher prior to publication. The review process is independently managed by the COPS Office, which solicits the reviews.

The COPS Office and the authors encourage you to provide feedback on this guide and to report on your own agency's experiences dealing with a similar problem. Your agency may have effectively addressed a problem using responses not considered in these guides and your experiences and knowledge could benefit others. This information will be used to update the guides. If you wish to provide feedback and share your experiences it should be sent via e-mail to askCOPSRC@usdoj.gov.

For more information about problem-oriented policing, visit the Center for Problem-Oriented Policing online at www.popcenter.org.

This website offers free online access to:

- The *Problem-Specific Guides* series
- The companion Response Guides and *Problem-Solving Tools* series
- Special publications on crime analysis and on policing terrorism
- Instructional information about problem-oriented policing and related topics
- An interactive problem-oriented policing training exercise
- An interactive *Problem Analysis Module*
- Online access to important police research and practices
- Information about problem-oriented policing conferences and award programs.

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The project team that developed the guide series comprised Herman Goldstein (University of Wisconsin Law School), Ronald V. Clarke (Rutgers University), John E. Eck (University of Cincinnati), Michael S. Scott (University of Wisconsin Law School), Rana Sampson (Police Consultant), and Deborah Lamm Weisel (North Carolina State University.)

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Karin Schmerler, Rita Varano, and Nancy Leach oversaw the project for the COPS Office and research for the guides was conducted at the Criminal Justice Library at Rutgers University by Phyllis Schultze. Suzanne Fregly edited this guide.

# Contents

## The Problem of Graffiti

This guide addresses effective responses to the problem of graffiti–the wide range of markings, etchings and paintings that deface public or private property.[§] In recent decades, graffiti has become an extensive problem, spreading from the largest cities to other locales. Despite the common association of graffiti with gangs, graffiti is widely found in jurisdictions of all sizes, and graffiti offenders are by no means limited to gangs.

[§]Although graffiti is also found within public or private property (such as in schools), this guide primarily addresses graffiti in places open to public view.

Because of its rising prevalence in many areas–and the high costs typically associated with cleanup and prevention–graffiti is often viewed as a persistent, if not an intractable, problem. Few graffiti offenders are apprehended, and some change their methods and locations in response to possible apprehension and cleanups.

As with most forms of vandalism, graffiti is not routinely reported to police. Many people think that graffiti is not a police or "real crime" problem, or that the police can do little about it. Because graffiti is not routinely reported to police or other agencies, its true scope is unknown. But graffiti has become a major concern, and the mass media, including movies and websites glamorizing or promoting graffiti as an acceptable form of urban street art, have contributed to its spread.

Although graffiti is a common problem, its intensity varies substantially from place to place. While a single incident of graffiti does not seem serious, graffiti has a serious cumulative effect; its initial appearance in a location appears to attract more graffiti. Local graffiti patterns appear to emerge over time, thus graffiti takes distinctive forms, is found in different locations, and may be associated with varying motives of graffiti offenders. These varying attributes offer important clues to the control and prevention of graffiti.

For many people, graffiti's presence suggests the government's failure to protect citizens and control lawbreakers. There are huge public costs associated with graffiti; an estimated $12 billion a year is spent cleaning up graffiti in the United States. Graffiti contributes to lost revenue associated with reduced ridership on transit systems, reduced retail sales, and declines in property value. In addition, graffiti generates the perception of blight and heightens fear of gang activity.

*Kip Kellogg*

Graffiti offenders risk injury by placing graffiti on places such as this railroad bridge spanning a river.

## Related Problems

Graffiti is not an isolated problem. It is often related to other crime and disorder problems, including:

- Public disorder, such as littering, public urination, and loitering
- Shoplifting of materials needed for graffiti, such as paint and markers[1]
- Gangs and gang violence, as gang graffiti conveys threats and identifies turf boundaries
- Property destruction, such as broken windows or slashed bus or train seats.

## Factors Contributing to Graffiti

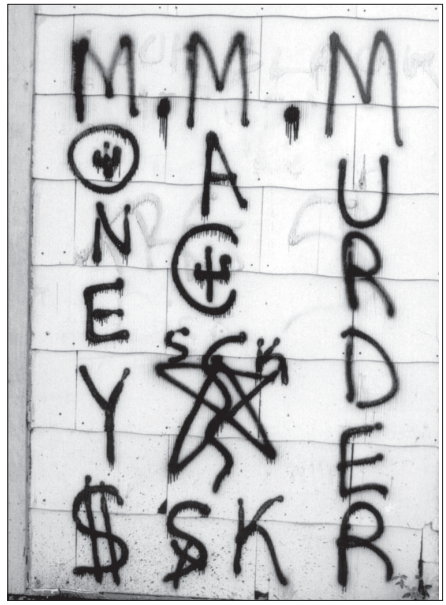
Understanding the factors that contribute to your problem will help you frame your own local analysis questions, determine good effectiveness measures, recognize key intervention points, and select appropriate responses.

### *Types of Graffiti*

There are different types of graffiti. The major types include:

- Gang graffiti, often used by gangs to mark turf or convey threats of violence, and sometimes copycat graffiti, which mimics gang graffiti
- Tagger graffiti, ranging from high-volume simple hits to complex street art
- Conventional graffiti, often isolated or spontaneous acts of "youthful exuberance," but sometimes malicious or vindictive
- Ideological graffiti, such as political or hate graffiti, which conveys political messages or racial, religious, or ethnic slurs.

*Bob Morris*




Gang graffiti marks territory and conveys threats.

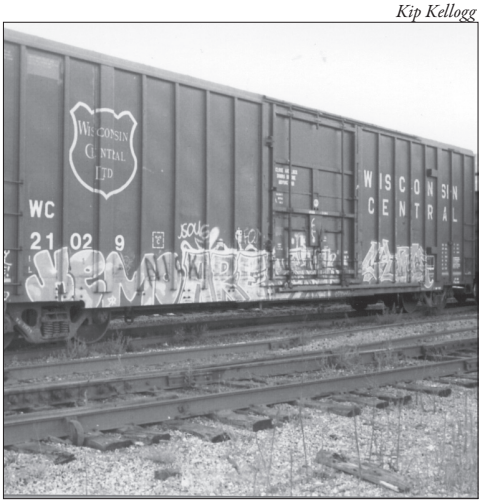
In areas where graffiti is prevalent, gang and tagger graffiti are the most common types found. While other forms of graffiti may be troublesome, they typically are not as widespread. The proportion of graffiti attributable to differing motives varies widely from one jurisdiction to another.§ The major types of graffiti are discussed later.

## Common Targets and Locations of Graffiti

Graffiti typically is placed on public property, or private property adjacent to public space. It is commonly found in transportation systems–on inner and outer sides of trains, subways and buses, and in transit stations and shelters. It is also commonly found on vehicles; walls facing streets; street, freeway and traffic signs; statues and monuments; and bridges. In addition, it appears on vending machines, park benches, utility poles, utility boxes, billboards, trees, streets, sidewalks, parking garages, schools, business and residence walls, garages, fences, and sheds. In short, graffiti appears almost any place open to public view.

§A count in a San Diego area with a lot of graffiti showed that about 50 percent was gang graffiti, 40 percent was tagger graffiti, and 10 percent was non-group graffiti (San Diego Police Department 2000). In nearby Chula Vista (California), only 19 percent of graffiti was gang-related (Chula Vista Police Department 1999). Although the counting methods likely differ, these proportions suggest how the breakdown of types of graffiti varies from one jurisdiction to another.

*Kip Kellogg*




Graffiti is commonly found in transportation systems, such as on the side of this railroad car.

Graffiti tends to recur in some locations. In fact, areas where graffiti has been painted over–especially with contrasting colors–may be a magnet to be revandalized.§ Some offenders are highly tenacious–conducting a psychological battle with authorities or owners for their claim over an area or specific location. Such tenacity appears to be related to an escalating defiance of authority.

Graffiti locations are often characterized by the absence of anyone with direct responsibility for the area. This includes public areas, schools, vacant buildings,[2] and buildings with absentee landlords. Offenders also target locations with poor lighting and little oversight by police or security personnel.

§Most sources suggest that paint-over colors should closely match, rather than contrast with, the base. Contrasting paint-overs are presumed to attract or challenge graffiti offenders to repaint their graffiti; the painted-over area provides a canvass to frame new graffiti.

Some targets and locations appear particularly vulnerable to graffiti:

- Easy-to-reach targets, such as signs
- Particularly hard-to-reach locations, such as freeway overpasses
- Highly visible locations, such as building walls
- Locations where a wall or fence is the primary security, and where there are few windows, employees, or passersby
- Locations where oversight is cyclical during the day or week, or where people are intimidated by graffiti offenders
- Mobile targets, such as trains or buses, which generate wide exposure for the graffiti
- Places where gang members congregate–taverns, bowling alleys, convenience store parking lots, and residential developments with many children or youth.

*Kip Kellogg*

Graffiti often appears in hard-to-reach yet highly visible locations, such as on the upper-story windows of this warehouse.

In addition, two types of surfaces attract graffiti:

- Light-colored surfaces. Dark surfaces do not generally attract as much graffiti, but can be marred with light-colored paint.
- Large and plain surfaces. Surfaces without windows or doors may be appealing for large-scale projects. Smooth surfaces especially attract offenders who use felt-tip markers.

## *Motives of Offenders*

While making graffiti does not offer material reward to offenders, contrary to public opinion, it does have meaning. Rather than being a senseless destruction of property, graffiti fulfills certain psychological needs, including providing excitement and action, a sense of control, and an element of risk. The different types of graffiti are associated with different motives, although these drives may overlap.§ Distinguishing between types of graffiti and associated motives is a critical step for developing an effective response.

Historically, much conventional graffiti has represented a youthful "rite of passage"–part of a phase of experimental behavior. Such graffiti is usually spontaneous and not malicious in nature; indeed, spontaneous graffiti has often been characterized as play, adventure, or exuberance. Spontaneous graffiti may reflect local traditions and appear on "fair targets" such as abandoned buildings or schools. Communities have often tolerated such graffiti.

The motives for some types of conventional graffiti may include anger and hostility toward society, and the vandalism thus fulfills some personal psychological need.[3] The graffiti may arise from boredom, despair, resentment, failure, and/or frustration, in which case it may be vindictive or malicious.

A related type of graffiti is ideological. Ideological graffiti expresses hostility or a grievance–often quite explicitly. Such graffiti is usually easily identified by its content, reflecting a political, religious, ethnic, or other bias. Offenders may strategically target certain locations to further the message.

§The description of types of graffiti and motives of graffiti offenders draws from broader typologies and motives associated with vandalism. See, for example, Coffield (1991) and Cohen (1973).

In contrast to conventional and ideological graffiti, the primary motive for gang graffiti is tactical; the graffiti serves as a public form of communication–to mark turf, convey threats, or boast of achievements.[4]

Some tagger graffiti may involve creative expression, providing a source of great pride in the creation of complex works of art. Most taggers seek notoriety and recognition of their graffiti–they attach status to having their work seen. Thus, prolonged visibility due to the sheer volume, scale and complexity of the graffiti,[§] and placement of the graffiti in hard-to-reach places[§§] or in transit systems, enhance the vandal's satisfaction.[5] Because recognition is important, the tagger tends to express the same motif–the graffiti's style and content are replicated over and over again, becoming the tagger's unique signature.

Participation in graffiti is often inadvertently encouraged through police contacts, media attention and public recognition of it through advertising or art displays–all can serve to enhance the offender's reputation or notoriety.[6]

[§]This includes complex, artistic graffiti known as masterpieces.

[§§]Taggers in California used climbing equipment to tag freeway overpasses, knowing their tags would be highly visible for extended periods, until the road was shut down for paint-overs (Beatty 1990). Hard-to-reach places also provide an element of danger of apprehension or physical risk, contributing to the vandal's reputation.

## Types of Graffiti and Associated Motives

| Type of Graffiti | Features | Motives |
|---|---|---|
| Gang[§] | • Gang name or symbol, including hand signs<br>• Gang member name(s) or nickname(s), or sometimes a roll-call listing of members<br>• Numbers[§§]<br>• Distinctive, stylized alphabets[§§§]<br>• Key visible locations<br>• Enemy names and symbols, or allies' names | • Mark turf<br>• Threaten violence<br>• Boast of achievements<br>• Honor the slain<br>• Insult/taunt other gangs |
| Common Tagger[§§§§] | • High-volume, accessible locations<br>• High-visibility, hard-to-reach locations<br>• May be stylized but simple name or nickname tag or symbols[§§§§§]<br>• Tenacious (keep retagging) | • Notoriety or prestige<br>• Defiance of authority |
| Artistic Tagger | • Colorful and complex pictures known as masterpieces or pieces | • Artistic prestige or recognition |
| Conventional Graffiti: Spontaneous | • Sporadic episodes or isolated incidents | • Play<br>• Rite of passage<br>• Excitement<br>• Impulsive |
| Conventional Graffiti: Malicious or Vindictive | • Sporadic, isolated or systematic incidents | • Anger<br>• Boredom<br>• Resentment<br>• Failure<br>• Despair |
| Ideological | • Offensive content or symbols<br>• Racial, ethnic or religious slurs<br>• Specific targets, such as synagogues<br>• Highly legible<br>• Slogans | • Anger<br>• Hate<br>• Political<br>• Hostility<br>• Defiance |

[§]Copycat graffiti looks like gang graffiti and may be the work of gang wanna-bes or youths seeking excitement.

[§§]Offenders commonly use numbers as code in gang graffiti. A number may represent the corresponding position in the alphabet (e.g., 13 = M, for the Mexican Mafia), or represent a penal or police radio code.

[§§§]Stylized alphabets include bubble letters, block letters, backwards letters, and Old English script.

[§§§§]Tagbangers, a derivative of tagging crews and gangs, are characterized by competition with other crews. Thus crossed-out tags are features of their graffiti.

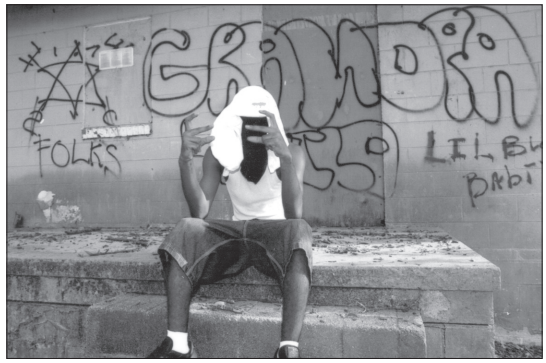
[§§§§§]The single-line writing of a name is usually known as a tag, while slightly more complex tags, including those with two colors or bubble letters, are known as throw-ups.

## *Characteristics and Patterns of Graffiti Offenders*

Graffiti offenders are typically young and male. In one study, most offenders were ages 15 to 23; many of the offenders were students. Offenders may typically be male, inner-city blacks and Latinos, but female, as well as white and Asian, participation is growing.[7] The profile clearly does not apply in some places where the population is predominantly white. Tagging is not restricted by class lines.

In Sydney, Australia, graffiti offenders, while mostly boys, include girls; offenders are typically ages 13 to 17.[8] In San Diego, all the taggers identified within a two-mile area were male, and 72 percent were 16 or younger.[9]

*Bob Morris*




Young male gang members may engage in a substantial amount of graffiti.

Graffiti offenders typically operate in groups, with perhaps 15 to 20 percent operating alone.[10] In addition to the varying motives for differing types of graffiti, peer pressure, boredom, lack of supervision, lack of activities, low academic achievement, and youth unemployment contribute to participation in graffiti.

Graffiti offenders often use spray paint, although they may also produce graffiti with large markers or by etching, the latter especially on glass surfaces.[§] Spray paint is widely available, easily concealed, easily and quickly used on a variety of surfaces, and available in different colors with different nozzles to change line widths–these factors make spray paint suitable for a range of offenders.[§§]

The making of graffiti is characterized by anonymity–hence relative safety from detection and apprehension. Most offenders work quickly, when few people are around. Graffiti predominantly occurs late on weekend nights, though there is little systematic evidence about this. In British transit studies, graffiti incidents typically occurred in off-peak or non-rush hours.[11] In Bridgeport, Connecticut, graffiti incidents were concentrated from 5 p.m. to 4 a.m. Thursdays through Sundays.[12] A San Diego study showed that routes leading away from schools were hit more frequently, suggesting a concentration in after-school hours Monday through Friday. Offenders tagged school walls daily.[13]

There is widespread concern that participation in graffiti may be an initial or gateway offense from which offenders may graduate to more sophisticated or harmful crimes. Graffiti is sometimes associated with truancy, and can involve drug and/or alcohol use. Graffiti offenders who operate as members of gangs or crews may also engage in fighting.

[§]Other tools for graffiti include shoe polish, rocks, razors, glass cutters, and glass etching fluid. Glass etching fluids include acids, such as Etch Bath and Armour Etch, developed as hobby products for decorating glass. Vandals squirt or rub the acids onto glass.

[§§]Vandals may adapt or modify tools and practices to cleaning methods. In New York City, when transit system personnel used paint solvents to remove graffiti, offenders adapted by spraying a surface with epoxy, writing their graffiti and then coating the surface with shellac, which proved very difficult to remove.

## Understanding Your Local Problem

You must combine the basic facts provided above with a more specific understanding of your local problem. Analyzing the local problem helps in designing a more effective response strategy.

### Asking Key Questions About Graffiti

The following are some critical questions you should ask in analyzing your particular problem of graffiti, even if the answers are not always readily available. If you fail to answer these questions, you may select the wrong response.

#### *Victims*

- Whom does the graffiti directly victimize (e.g., homeowners, apartment managers, business owners, transit systems, utilities, public works, others)?
- Whom does the graffiti indirectly affect (e.g., people who see the graffiti)? How fearful are these people? What activities does graffiti affect (e.g., shopping, use of recreational areas and public transit)? (Community or other surveys may be necessary to answer these questions.)

#### *Amount of Graffiti*

- How much graffiti is there? (Visual surveys are necessary to answer questions about the amount of graffiti.)
- How many individual tags or separate pieces of graffiti are there?
- How big is the graffiti (e.g., in square feet)?
- How many graffiti locations are there?
- How many graffiti-related calls for service, incident reports, or hotline reports are there?

## Types of Graffiti

- Are there different types of graffiti? How many of each type?
- What are the content and unique characteristics of the graffiti? (Some agencies photograph or videotape graffiti to create an intelligence database noting key characteristics, to link graffiti to chronic offenders.)[§]
- What appear to be the motives for the graffiti?
- Is the graffiti simple or complex? Small or large? Single-colored or multicolored?
- Is the graffiti isolated or grouped?
- What do offenders use to make the graffiti (e.g., spray paint, marking pens, etching devices)?

## Locations/Times

- Where does the graffiti occur? (Maps of graffiti can be particularly illuminating, revealing its distribution across a large area.[§§] See Figure 1.)
- What are the specific locations where the graffiti occurs (e.g., addresses or, more precisely, Global Positioning System locations for sites without addresses, such as in parks or along railroad tracks)?
- How close is the graffiti to graffiti-generators such as schools?
- What are the characteristics of the locations in which graffiti is prevalent? Are the locations residences, schools? Are they close to stores–what type, with what hours–or bus stops–what running times?
- What are the characteristics of graffiti targets? Are the targets signs, walls, fences, buses, trains?
- What are the physical environment's characteristics, including lighting, access, roads, surface types, and other relevant factors?
- When does the graffiti occur? Time of day? (using last known graffiti-free time)? Day of week?
- Do the peak times correspond with other events?

[§]See Otto, Maly, and Schismenos (2000) for more information about this technology, as used in Akron, Ohio.

[§§]Maps of graffiti have been used to map gang violence and gang territory. See, for example, Kennedy, Braga, and Piehl (1997).

*San Diego Police Department*

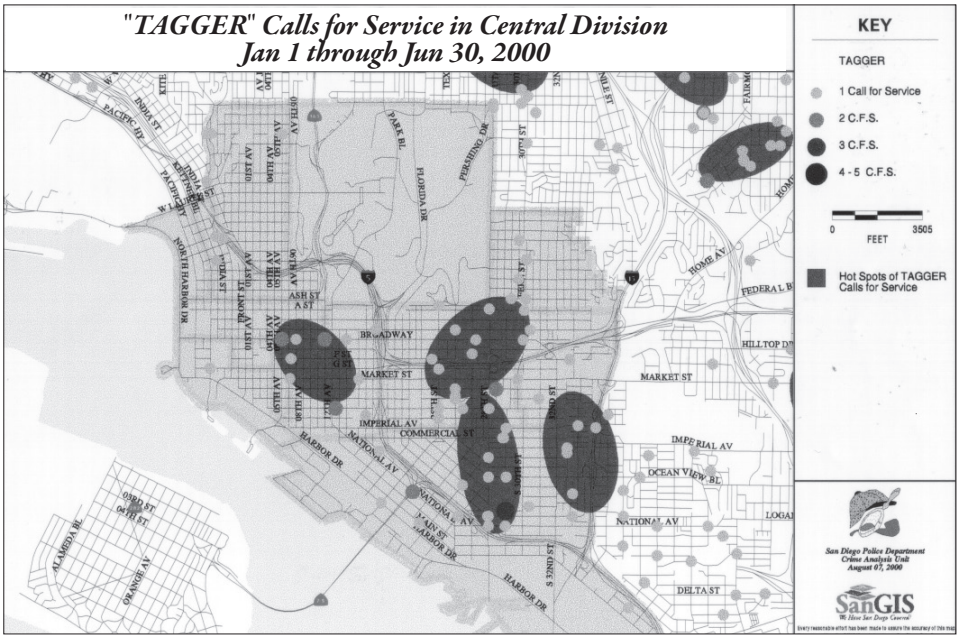



Fig. 1. Map showing locations of graffiti.

## *Offenders*

- What are the offenders' characteristics (e.g., age, gender, student)?
- Where do the offenders live, go to school, or work? How do these locations correspond to graffiti locations and/or police contacts?[§]
- What is the pattern of offending? For example, is the graffiti spontaneous or planned, intermittent or regular?
- What are the offenders' motives? (Offenders can be interviewed to collect this information. Undercover investigations, stings, surveillance, and graffiti content analysis can reveal more about offenders' practices.[§§])
- Are offenders lone operators or part of a group?
- Does drug and/or alcohol use contribute to graffiti?
- Is graffiti associated with other violations, such as truancy?

[§]Photographs of offenders and their address information can also be linked to maps.

[§§]Police in some cities have posed as film crews, interviewing taggers about their practices.

## Measuring Your Effectiveness

Measurement allows you to determine to what degree your efforts have succeeded, and suggests how you might modify your responses if they are not producing the intended results. You should take measures of your problem *before* you implement responses, to determine how serious the problem is, and *after* you implement them, to determine whether they have been effective. All measures should be taken in both the target area and the surrounding area. (For more detailed guidance on measuring effectiveness, see the companion guide to this series, *Assessing Responses to Problems: An Introductory Guide for Police Problem-Solvers*.)

Research shows that graffiti can be substantially reduced, and sometimes eliminated. The following are potentially useful measures of the effectiveness of responses to graffiti. To track possible displacement, such measures should be routine:

- Amount or size of graffiti
- Number and type of graffiti locations
- Content and type of graffiti
- Length of time graffiti-prone surfaces stay clean
- Public fear and perceptions about the amount of graffiti (may be assessed through surveys of citizens, changes in use of public space and transit systems, changes in retail sales, and other indirect measures).

Some jurisdictions track the numbers of arrests made, gallons of paint applied or square feet covered, amount of graffiti removed, or money spent on graffiti eradication;[14] these measures indicate how much effort has been put into the anti-graffiti initiative, but they do not tell you if the *amount* or *nature* of graffiti has changed in any way.§ You should choose measures based on the responses chosen; for example, if paint sales are limited, you should place more emphasis on tracking the type of graffiti tool used. Tools do change; for example, some offenders have begun using glass etching fluid.

§Because many anti-graffiti strategies are quite expensive, a cost-benefit analysis will provide a baseline measure of benefits associated with specific costs of different strategies.

It is widely believed that graffiti is easily displaced,§ but evidence of such displacement is scant. The notion that graffiti is an intractable problem that is easily displaced has been fueled by haphazard and piecemeal crime prevention measures.[15] Useful measures of graffiti will assess the extent to which graffiti is reduced or moved to different locations, or reflect a change in offenders' tactics. While graffiti offenders can be persistent and adaptive, there is no reason to assume that displacement will be complete; indeed, successful responses may have a widespread effect.

§The response to graffiti in the New York subway system resulted in some reported displacement to buses, garbage trucks, walls, and other objects in the city (Butterfield 1988; Coffield 1991).

## Responses to the Problem of Graffiti

Your analysis of your local problem should give you a better understanding of the factors contributing to it. Once you have analyzed your local problem and established a baseline for measuring effectiveness, you should consider possible responses to address the problem.

The following response strategies provide a foundation of ideas for addressing your particular problem. These strategies are drawn from a variety of research studies and police reports. Several of these strategies may apply to your community's problem. It is critical that you tailor responses to local circumstances, and that you can justify each response based on reliable analysis. In most cases, an effective strategy will involve implementing several different responses. Law enforcement responses alone are seldom effective in reducing or solving the problem. Do not limit yourself to considering what police can do: give careful consideration to who else in your community shares responsibility for the problem and can help police better respond to it.

Graffiti is not solely a police problem. The police role should be one of support and assistance. Effective responses to graffiti may combine management practices, design and maintenance, and involve the general public, individual victims, criminal justice officials such as prosecutors and judges, and others. Responses to graffiti should be comprehensive and coordinated, while costs and available resources should be carefully evaluated.

Responses to graffiti must be thorough and consistent, as some offenders may be highly opportunistic, adaptive, and tenacious. Responses should include ways to monitor graffiti and address changes in time, location, and methods of applying it.

## Reducing Rewards to Offenders

Rapid identification and removal of graffiti has been shown to reduce its occurrence.§ This approach directly addresses the motives of many offenders by reducing the notoriety associated with graffiti's visibility. The two-step process involves routine monitoring to quickly spot graffiti and rapid removal of the graffiti. In New York's successful approach to transit graffiti, it was initially removed within two hours of identification.§§ In St. Petersburg, Florida, business owners are required to remove graffiti within 48 hours.[16]

§This "law of diminishing vandalism" is that persistence in cleaning up pays off. See Sloan-Howitt and Kelling (1990); Scott (1989); Cheetham (1994); Clarke (1978); and *Governing* (1994).

§§If graffiti cannot be removed quickly, trains are taken out of service. For train stations, graffiti is removed within 72 hours. Similar quick cleanups have occurred in Philadelphia (Scott 1989). In London, graffiti is cleaned from large stations within 24 hours.

**1. Detecting graffiti rapidly and routinely.** There are two primary ways to gather information about the incidence and location of graffiti: systematic monitoring of graffiti-prone locations, and increased reporting. Both are used to rapidly detect graffiti incidents; document the location and time of occurrences, and content of graffiti; and to trigger responses.

- **Monitoring graffiti-prone locations routinely.** Quick detection of graffiti provides better information for developing effective interventions. A graffiti database can be used to track incidents and illuminate patterns, identify chronic offenders and/or interpret gang activities or plans encoded in graffiti. Monitoring may include documenting graffiti through photographs or video. In some places, graffiti provides a barometer of gang activity and relations between gangs.

### Addressing Transit Graffiti in New York City

The experiences of the New York City Transit System illustrate varying approaches to graffiti. Graffiti began to appear on subway trains in the 1960s; by 1970, it was a huge problem. The public was fearful, and ridership on trains declined.

The motive for the graffiti was "getting up" and getting noticed; there were no indications the graffiti was gang-related. Instead, the graffitists or taggers sought to build their reputation through the sheer quantity of their graffiti. As competition among them increased, they distinguished themselves through writing style, embellishment, graffiti size, and location–either in unusual spots or in previously unmarked spots. One prolific vandal produced 10,000 graffiti markings.

Despite the severity of its ongoing fiscal crisis, New York City adopted a variety of anti-graffiti strategies in the 1970s: punishing offenders by making them clean up trains marked with graffiti; using fencing with razor wires to protect the vast train yards; and developing materials to ease graffiti removal, materials that were later found to be environmentally hazardous. The methods all failed to substantially reduce the amount of graffiti.

In 1984, the city adopted a system to monitor trains and clean those marked with graffiti within two hours; otherwise, they took the cars out of service. They also began to store clean trains in highly secure yards that featured 24-hour-a-day work crews, enhanced lighting, routine fence maintenance, and undercover police. The initiative focused on the most problematic times, locations, and train lines; initially, all trains were monitored, but random checks were later successfully used to maintain clean trains. In addition, repeat offenders were targeted for parental contact and enhanced penalties.

In contrast to the earlier initiatives, this anti-graffiti effort began with a handful of trains (those detected with graffiti) and built up to cover the entire system. Importantly, rather than focusing on using the criminal justice system, this approach addressed the offenders' underlying motives. Immediately removing graffiti-marked trains from service severely limited the vandals' exposure.

To monitor graffiti-prone locations, Phoenix has used night vision and digital cameras, while Philadelphia and Sydney have used closed-circuit television (CCTV). In Philadelphia and on Los Angeles buses, plainclothes officers have monitored graffiti. In other jurisdictions, Neighborhood Watch and other groups systematically monitor graffiti. In Lakewood, Colorado, citizens' academy graduates take graffiti reports, photograph graffiti and monitor graffiti locations. In New South Wales, "graffiti spotters" have this role. Employees such as bus drivers or maintenance workers can immediately report vandalism through two-way radio.

- **Increasing reporting of graffiti and offenders.**§ Anonymous graffiti hotlines, some operating 24 hours a day, collect information about graffiti incidents. Communities have also used cell phone reporting, voice mail, emergency cell service, and connection to neighborhood watch groups.

  Some jurisdictions pay graffiti reporters' cell phone charges. In London, people can use free telephones in transit stations to report offenses. In other jurisdictions, transit riders are encouraged to report graffiti and offenders. Numerous jurisdictions offer a cash reward of $200 to $1,000 if a tip leads to a conviction.

  In some jurisdictions, graffiti reports may be suppressed due to concerns about retaliation by gang members or taggers. Widespread public participation in both open and anonymous reporting usually addresses these concerns, but police should be aware of this potential problem.

**2. Removing graffiti rapidly.** One of the most promising responses to graffiti is consistently getting rid of it, and doing so quickly. The removal process may vary substantially depending on the type of graffiti tool and the type of material vandalized.§ Many of the methods are time-consuming and can be quite expensive, so a jurisdiction must be able to tap sufficient resources to fully implement this approach. Some types of cleanup–including paint-

§Police usually encourage citizens to call 911 regarding graffiti in progress; they discourage citizens from confronting offenders. Citizens can report graffiti not in progress to hotlines.

overs–may be affected by cold or wet weather. Removal may be time-targeted, such as during predawn hours, to further reduce exposure. Rapid removal is key, and many jurisdictions try to remove graffiti within 24 to 48 hours; in some obscure locations, such as drainage ditches, graffiti may be removed less quickly.

There are four major types of removal or cover-ups:

- **Painting over graffiti.** Painting over graffiti appears to be the most common and relatively cheapest method of removing it. Although paint-overs can be expensive if recurring, the approach is widely accessible, and usually requires no special skills or technology. Some cities provide recycled paints for free; some cities have cleanups funded by contributions; and in some cities, businesses donate paint. Property owners victimized by graffiti offenders often supply their own paint. They can match chips of paint at home supply stores. Once they make a paint match, they should keep a supply of the paint readily available. In areas with heavy graffiti, property owners can unify colors (e.g., of alley walls and fences) to make routine paint-overs easier. Painting over graffiti may require the use of a sealer to prevent bleeding through.
- **Removing graffiti chemically.** There are a variety of chemical removal products available, but care should be taken in selecting one. The use of some removal products on certain porous surfaces may create a shadow of the graffiti. Paint companies sometimes donate paint-removal supplies.
- **Cleaning graffiti off.** Depending on the surface and marking agent, many surfaces can be cleaned of graffiti. Methods include sandblasting with high-pressure hot-water jets–and sometimes baking soda–to remove graffiti from cement and other unpainted surfaces, although this, too, can be expensive and leave a shadow. Lasers to remove graffiti are becoming available.
- **Replacing signs, materials and other items vandalized.** Replacement is appropriate for materials from which graffiti cannot be painted over, chemically removed, or cleaned.

[§]The type of surface graffiti is placed on is a major factor because graffiti-removal products may damage some surfaces. The type of marking agent is also a factor: some paints are reversible. There is a wide range of graffiti removal products available, including chemical sprays, aerosols, gels, and poultices. Cleaners are either alkaline or acidic; the latter can damage masonry, and neutralizing techniques must be incorporated when using either. Physical removal methods include low- and high-pressure water cleaning, often with detergents, and sandblasting. Physical removal is more expensive, and is typically used for large areas where other methods have failed.

The source of labor for removing graffiti may vary. Cleanup squads may consist of volunteers, employees, or adjudicated offenders. Graffiti removal may be coercive. A large number of jurisdictions hold the property owner responsible for graffiti removal. Sanctioning victims requires that they clean graffiti up quickly or get fined.[17] Citizens may get paint or physical assistance from volunteers, if needed. Cities can use nuisance ordinances, zoning codes, or graffiti ordinances to force owners to clean up quickly, which may be necessary for absentee owners. Alternatively, some cities clean up graffiti and then bill the owner. Some cities do the first cleanup for free; the owner then has responsibility for subsequent cleanups.

Numerous jurisdictions use graffiti removal as a court-ordered sanction for offenders and other misdemeanants. In some jurisdictions, such sanctions require victim restitution, reflecting a restorative justice approach.

## Increasing the Risk of Detection

Because graffiti offenders usually operate in darkness, where there is little chance of being seen, few are apprehended. Increasing the likelihood of their being detected increases the risk of apprehension.

**3. Increasing natural observation of graffiti-prone locations**. The likelihood of detecting offenders can be increased by installing, upgrading or maintaining lighting. (While most offenders operate in the dark, additional lighting may actually attract graffiti in some isolated or remote locations. An alternative is to install motion-activated lighting, which may signal unauthorized property use.) In addition, shrubbery or trees that conceal areas can be removed. Sight lines can be improved where vision is obscured in other ways.

Other methods to increase observation involve design, such as eliminating blind spots of underpasses, or park paths, installing windows or building parking lots within view of residences and designing spacious areas with good visibility.

**4. Increasing formal observation of graffiti-prone locations.** Observation of graffiti-prone locations can be improved systematically through use of police, security personnel, Neighborhood Watch, and employees with other primary duties (such as bus drivers, ticket agents, newsstand staff, lobby concierges, and on-site/residential property managers). Such observation may include the use of uniformed or undercover personnel or covert surveillance, and may target fixed locations or mobile locations such as buses and trains.

**5. Increasing electronic security**. Formal observation of graffiti-prone locations can be carried out via electronic methods. CCTV has shown promising evidence of reducing vandalism, including graffiti.[18] CCTV is widely used to deter potential offenders, apprehend offenders in the act or after the fact, and provide evidence in prosecutions. There are substantial up-front and operating costs to CCTV, and decisions must be made as to whether cameras will be actively or passively monitored, or activated by motion detectors. If CCTV is to be used for evidence, good picture quality, adequate lighting, and follow-up investigation are necessary. If CCTV is to be used to apprehend offenders in progress, it must be actively monitored. Signs warning of CCTV are often posted to discourage offenders; such deterrence may contribute to graffiti's spread to other locations. There is also evidence that CCTV's crime prevention benefits may spread to other locations.

CCTV will not be effective everywhere, but can be adapted. For example, video surveillance with infrared technology has been used on buses, while electronic surveillance robots monitor CCTV screens in some jurisdictions, and emit warning alarms. Portable CCTV can also be used, and dummy CCTV has been effectively used to supplement the real thing. Other types of electronic security include infrared beams, which are used around trains in London.

Use of CCTV may result in reduced vigilance, as electronic surveillance may create a false sense of security. But the presence of CCTV may also reassure citizens, and public support for it is often high.

**6. Conducting publicity campaigns.** On their own, publicity campaigns are of limited effectiveness. However, many publicity efforts are combined with other strategies. A number of publicity campaigns can be described as beautification efforts, consisting of community cleanup days to eliminate graffiti, litter, and other signs of disorder. In many jurisdictions, these cleanup days require volunteers, but some may involve court-adjudicated offenders who are working off community service time. In contrast to the systematic graffiti removal described above, publicity campaigns are usually one-time or episodic cleanups of specific areas.

An extension of the cleanup programs are ownership initiatives such as Adopt-a-Block, Adopt-a-Bus, Adopt-a-Station, or other efforts to maintain the "cared for" environment in public areas. Some of the adoption schemes involve painting murals on transit shelters, invoking a presumed conscience that deters graffiti offenders from marring others' artistic endeavors. It is assumed that graffiti is easier to detect where no other graffiti exists, and cleaned areas invoke a sense of ownership and responsibility among users of the areas.

Other publicity efforts include posters to publicize anti-graffiti efforts, public service announcements, flyers, brochures, and the like. Publicity campaigns often include information on the harms of graffiti, the costs of graffiti, how to detect a graffiti offender, and how to report graffiti. This educational effort is often targeted at parents, schools, businesses, civic groups, transit system users, and/or the general public. Publicity and educational campaigns have been shown to be effective in reducing graffiti when used to publicize surveillance of vandalized buses; the effects even extended beyond the crime prevention targets.[19]

Publicity campaigns often discourage the use of graffiti in advertising and art exhibits, as well as media coverage of graffiti, recognizing that such attention serves to further contribute to the notoriety graffiti offenders seek. Care is taken to avoid glorifying graffiti, and generating more of it as a result.

## Increasing the Difficulty of Offending

**7. Vandal-proofing graffiti-prone locations.** Graffiti offenders can be thwarted by vandal-proofing vulnerable surfaces in vulnerable areas, a process that often involves modifying surface textures. Anti-graffiti coverings and surfaces make surfaces easy to clean, difficult to write on, or both. There are six primary types:

- Paint-like products such as polyurethane-based coatings are resistant to graffiti and easy to clean. These are suitable for steel, concrete, and brickwork.§ Sealers on concrete prevent absorption.
- Wash-off coatings–known as sacrificial coatings–are wax or silicon applications on walls or buildings. When hot water is applied, these coatings break down, allowing graffiti to be washed off.§§
- Textured surfaces are not attractive targets for graffiti, as they obscure legibility. Such surfaces are particularly difficult for offenders to draw on or paint. Such surfaces include deeply grooved surfaces and rough surfaces§§§ such as exposed rock, rough cement, and dimpled stainless steel, like that used in London telephone kiosks.
- Dark or colorful surfaces make graffiti less visible, thus deterring offenders. Dark surfaces are more difficult to mark up, although light paint can be used. Colorful or busy surfaces, such as advertisements on the sides of buses, deflect graffiti.[20] Flecked or spotted wall surfaces also mask graffiti.
- Non-solid surfaces, such as open-grill storefront security screens rather than solid panels, may deflect graffiti.
- Easily cleaned materials may be installed in highly vulnerable areas. These include vitreous-enamel panels§§§§ or glazed ceramic tiles from which graffiti washes off; wired glass that can be cleaned with scrapers;§§§§§ polyester film over glass; plastic laminates, which make for easier cleaning; and signs with surfaces resistant to marker pens and spray paint.

§Some of these products may produce toxic fumes in case of fire.

§§These coatings must be reapplied; the surface dissolves when graffiti is cleaned off.

§§§These surfaces are harder to mark, but are difficult to clean.

§§§§These washable walls are used in larger London train stations.

§§§§§The alternative, polycarbonate surfaces become hazy.

Some materials cannot be effectively protected from graffiti. Graffiti-prone surfaces can be replaced with standard-sized, inexpensive materials. These include transparent, replaceable glass or polycarbonate panels in bus shelters, and replaceable polycarbonate covering signs.

**8. Controlling access to graffiti-prone locations.** Controlling access to graffiti-prone locations physically bars offenders from vulnerable areas. Means of access control include:

- Graffiti hoods to buffer freeway signs
- Metal baffles on sign poles, which work like squirrel baffles on bird feeders
- Walls, fences, locked alleys, barriers, chasms, and rails, sometimes supplemented by barbed wire
- Recessed walls
- Dense or thorny plants, or climbing vines
- Razor wire or jagged metal wrapped around sign poles.§

In some cases, signs have been moved out of reach of vandals, while bus stops and other frequently vandalized targets have been relocated.

Environmental design to limit access to graffiti surfaces can best be incorporated into planning and construction, but may also be adapted to existing structures. An example of effective environmental design is the recessed walls of the Washington, D.C., metro system; subway walls are physically separated from the public.

Police or security patrols, guards and dogs may supplement access control. Access to residential or commercial properties may be restricted to those with resident or employee identification cards, while visitor access may be controlled through entry phones.

§Some of these measures impose social costs by making areas look like war zones. Access controls with forbidding appearances may be better left to isolated areas.

Much like environmental design, situational design reduces the opportunity for graffiti. The absence of toilets, seating, fast food, and lockers in transit stations effectively discourages potential offenders from loitering. In Hong Kong, a limited life to transit tickets encourages people to quickly move through stations before their tickets expire, thus discouraging loitering. In Washington, D.C., the subway system generally closes at midnight on weekdays and somewhat later on weekends, thus limiting opportunities for vandalism. Since graffiti often takes place late at night, limiting hours reduces opportunities for vandalism at times when there are typically few other riders or employees to deter the offender or witness the offense.

**9. Focusing on chronic offenders.** Approaches that focus *exclusively* on enforcement to control offenders have had little effect on the amount of graffiti.[21] Apprehending and prosecuting graffiti offenders is difficult. Graffiti is not routinely reported to police, it is difficult to catch offenders in the act, and may be impossible to find witnesses or tangible evidence of graffiti offenses. In addition, police have competing priorities, and sanctions against offenders are often weak, consisting of community service and fines.

Some graffiti offenders are prolific; a small group typically accounts for a large portion of all offenses. Efforts that focus on chronic offenders show promise. Chronic offenders can be identified through graffiti investigations. Since offenders tend to replicate their graffiti, it has unique characteristics, like a signature, and different incidents or tags can be linked to a single offender. Some taggers practice their tags in notebooks or take photographs to document their efforts; these may be used as evidence to link offenders to graffiti incidents.

Some police conduct surveillance of known offenders and/or high-risk hot spots, collaborate with schools to detect offenders, and monitor chronic offenders, particularly those on probation. Police may use extensive intelligence databases to record information about graffiti content, locations, and offenders. Such databases may include photographs or video of graffiti, mug shots of offenders, and maps of graffiti locations.

## Responses With Limited Effectiveness

Numerous responses have been incorporated into efforts to control graffiti. Most have not been carefully evaluated, and are thus of unknown effectiveness. Any response can be effective if it increases the difficulties of offending and reduces the rewards for it. Many responses, however, are quite difficult to enforce.

**10. Controlling graffiti tools.** A number of jurisdictions have tried to control the tools used for graffiti. Boston and other cities have banned the sale of large, wide-tipped markers. In addition, bans on spray paint sales to minors have been widely used in recent years.[§] Some jurisdictions require stores to be licensed for and to limit spray paint sales, and require buyers to furnish their name and address. In some jurisdictions, juvenile possession of spray paint or large, indelible markers without supervision is a misdemeanor.

Efforts have been made to reduce shoplifting of spray paint by placing stock away from exits and removing it from open displays. Instead, stock is often stored behind counters, in storerooms or in locked display cases. Some jurisdictions require stores to place markers in full view of clerks. Industry efforts have also been made to regulate graffiti tools. Spray valves can be modified, and restricted-use caps limited, so that offenders cannot change caps.[§§] Some jurisdictions encourage proper disposal of contractor painting materials so that graffiti offenders cannot access them.

While there have been no evaluations of efforts that limit graffiti tools, enforcing local ordinances that do so can be difficult. Although restrictions on possession of supplies may provide an additional enforcement tool, graffiti offenders are rarely apprehended. In many tagging groups, one person carries the graffiti supplies, making it more difficult to obtain the evidence that may be necessary for a conviction.

**11. Channeling behavior into more acceptable activities.** A lot of anti-graffiti efforts have involved designating particular areas or locations as legitimate places for graffiti.[§§§] Graffiti walls or boards are often obtained through contributions from businesses. While artists may have to have a painting permit to participate, paint for such projects is often contributed.

Similarly, some jurisdictions have commissioned murals to cover up graffiti or improve the community's appearance. These murals are often located where graffiti has posed a problem. Graffiti offenders appear to respect the artwork on such murals, but the surfaces can be protected with anti-graffiti coating. Murals and walls showcase artists' work and may reduce incentives to vandalize. Similar initiatives to divert offenders have included art classes or programs for reformed offenders, some of which involve a contract or pledge not to produce further graffiti. These efforts may be effective in reducing the amount of graffiti in specific locations.

**12. Providing alternative activities and services.** A variety of programs have been developed to address the needs of graffiti offenders who are bored, unsupervised or unemployed. These programs include mentoring, job training, counseling, tutoring, and family services. Many of these programs focus on building pride and self-esteem. Some help youth to leave gangs. Others provide alternative activities, such as sports.

**13. Involving youth in developing programs**. Youth are often involved in anti-graffiti efforts to increase their sense of ownership. In Denmark, youth were involved in selecting the design and colors of buses and bus platforms. Officials there also engage in "alternative conflict solving," and meet monthly with youth to address hostility and improve communication with those who are disaffected. Anti-graffiti posters for publicity campaigns are designed through student competitions, and peer pressure is used to discourage graffiti.

Some anti-graffiti programs involve educating youth about the harms and costs of graffiti. The youth-targeted message that graffiti is uncool is conveyed through subway and bus posters, and television and radio commercials. Sports figures may endorse the message to add potency to it.

In some cases, former graffiti offenders create murals with anti-graffiti messages, give public talks, counsel other offenders, and organize graffiti cleanups.

**14. Expanding applicable laws.** A wide variety of laws have been passed in cities and counties across the United States, providing police and prosecutors with additional tools to charge and punish offenders. In some cases, existing ordinances or statutes have been applied in new ways, including enforcing civil trespassing laws; applying nuisance abatement, which can force gangs to clean up graffiti; labeling gangs as unincorporated associations, to pursue criminal conspiracy charges; applying civil injunctions requiring offenders to stay away from certain areas; enforcing anti-loitering ordinances; and applying sanctions that enhance dispositions or sentences for gang members. In addition, many jurisdictions routinely use criminal mischief, malicious mischief, property destruction, vandalism, and criminal trespass statutes or ordinances in charging graffiti offenders.

**15. Holding parents accountable.** In some communities, efforts are made to educate parents in recognizing signs of graffiti offending. Parents are held accountable for juvenile offenders' actions, and may be sanctioned with fines, cleanup costs and even jail for failure to control or supervise their children. Structured juvenile diversion programs may involve parents in meeting conditions imposed on offenders.

**16. Increasing sanctions for offenders.** Across the United States, jurisdictions have increased the sanctions against graffiti offenders. Some sanctions are targeted specifically at juveniles. For example, California suspends or defers the award of driver's licenses for one year; offenders can do community service to reduce the suspension time.

§Chicago has had such a ban since 1980.

§§Graffiti offenders prefer interchangeable caps, allowing them to combine thick and thin lines. Wide caps or other caps from oven cleaners or spray starch are especially desirable.

§§§Nugent (1998) describes a graffiti wall in Washington, D.C's Lafayette Park; Coffield (1991) notes the painting of a Southampton, England, garage.

Many jurisdictions use graffiti cleanup for community service to avoid adjudication, as a condition of probation, or as part of a disposition or sentence. Some communities have restorative justice initiatives in which face-to-face victim-offender reconciliation occurs, a contract is signed, and offenders pay restitution.

In some jurisdictions, students are suspended or expelled from school for graffiti offenses. A large number of jurisdictions have involved courts in treating graffiti incidents seriously, systematically imposing fines, community service and even jail time on chronic offenders.

**17. Applying new technologies.** A wide range of new anti-graffiti technologies have not been tested, used extensively or evaluated. Some may be effective in specific settings under certain conditions.

New anti-graffiti technologies include the following:

- Listening devices positioned at chronic graffiti locations. The devices detect sounds such as spraying of paint cans, alerting police to offenses.
- Motion detectors combined with sprinkler systems. Caltrans used this technology in Orange County, California, but offenders broke off sprinkler heads.
- Lasers for graffiti removal.

Since developing or purchasing new technologies may be quite costly for most jurisdictions, such responses should be carefully evaluated first. New technologies to respond to graffiti will likely continue to become available.

**18. Establishing juvenile curfews.** Juvenile curfews have been widely adopted in the United States to address a variety of juvenile crime. For the most part, tenacious offenders can avoid detection, and police agencies must invest a substantial amount of effort to enforce curfews. While curfews may have some benefits in very narrowly defined situations, their contribution to graffiti reduction are unlikely to be substantial.

**19. Warning offenders.** Many jurisdictions warn graffiti offenders about the costs of being apprehended. Sydney found that warnings of dire consequences do not work, and media attention glorifies and reinforces graffiti.[22] Most warnings are intended to increase the perception of risk of detection and apprehension. Offenders, however, tend to accurately perceive that risks of apprehension are fairly low. Some warnings relate to increased sanctions for graffiti offenses. If offenders do not believe the risk of apprehension is high, they are unlikely to be concerned about the penalties for offending.§ Warnings directed at chronic offenders may be more effective than general warnings.

§In some limited studies of bathroom graffiti (Mueller et al. 2000; Watson 1996), posting signs warning of sanctions, containing positive messages appealing to altruism, or conveying neutral messages–"Please do not write on these walls"–resulted in a decline in graffiti.

## Summary of Responses to Graffiti

The table below summarizes the responses to graffiti, the mechanism by which they are intended to work, the conditions under which they ought to work best, and some factors you should consider before implementing a particular response. It is critical that you tailor responses to local circumstances, and that you can justify each response based on reliable analysis. In most cases, an effective strategy will involve implementing several different responses. Law enforcement responses alone are seldom effective in reducing or solving the problem.

| Response No. | Page No. | Response | How It Works | Works Best If… | Considerations |
|---|---|---|---|---|---|
| *Reducing Rewards to Offenders* | | | | | |
| **1** | 20 | Detecting graffiti rapidly and routinely | Permits rapid removal | …locations are regularly monitored | Requires commitment and resources–efforts should not be piecemeal; can involve employees, police, citizens, hotlines, and other means |
| **2** | **22** | Removing graffiti rapidly | Reduces time graffiti is visible, thus thwarting offenders' objective of having graffiti be widely seen | …removal is very quick and consistent | Removal may be expensive, difficult and/or coercive (e.g., victims, as well as offenders, may be sanctioned) |
| *Increasing the Risk of Detection* | | | | | |
| **3** | **24** | Increasing natural observation of graffiti-prone locations | Increases risk of detection | …graffiti occurs in low-visibility places | Efforts to improve lighting, reduce shrubbery and improve sight lines are most effective if the area is not isolated for long periods of time |

| Response No. | Page No. | Response | How It Works | Works Best If… | Considerations |
|---|---|---|---|---|---|
| 4 | 25 | Increasing formal observation of graffiti-prone locations | Increases risk of detection; information can aid investigations | …there are high-risk hot spots | Can use undercover personnel, other employees and electronic means; easily available; can be used on transit systems |
| 5 | 26 | Increasing electronic security | Increases risk of detection | …offenders are targeting large areas such as transit lots | Can be cost-effective; information can aid investigations |
| 6 | 26 | Conducting publicity campaigns | Increases risk of detection | …information is widely disseminated, and risk of detection increases | May contribute to increased graffiti reports and extend deterrent effect |
| *Increasing the Difficulty of Offending* | | | | | |
| 7 | 27 | Vandal-proofing graffiti-prone locations | Increases difficulty of applying graffiti (may also decrease graffiti visibility, reducing motives); some methods facilitate removal | …there are chronic graffiti locations | Can be expensive if done retroactively; offenders may change their methods or targets; may stimulate and challenge offenders; some measures, such as using grooved, slanted or heavily textured walls, or otherwise unappealing graffiti surfaces, can be very effective; may be unsightly |
| 8 | 28 | Controlling access to graffiti-prone locations | Makes it more difficult to access or vandalize properties | …property or operations can support design changes | May be expensive, but very effective; may best be incorporated into construction and planning designs; most effective if behavior is also regulated, such as in apartment complexes or transit stations |
| 9 | 29 | Focusing on chronic offenders | Increases risk of detection of prolific graffiti offenders | …there is a small group of chronic offenders | Requires offender identification and follow-up |

| Response No. | Page No. | Response | How It Works | Works Best If… | Considerations |
|---|---|---|---|---|---|
| *Responses with Limited Effectiveness* | | | | | |
| 10 | 30 | Controlling graffiti tools | Makes it more difficult for offenders to get paint or markers | …offenders are easily deterred and merchants comply | Difficult to enforce; offenders can seek tools elsewhere; tools are easily accessed, transported, and hidden |
| 11 | 31 | Channeling behavior into more acceptable activities | Intended to provide creative outlets | …offenders are artistically motivated | Graffiti boards and walls can be placed in highly visible locations; they appear to attract little vandalism; they may not attract the target group |
| 12 | 31 | Providing alternative activities and services | Intended to engage and provide supervision to youth | ….offenders are jobless, bored, or unsupervised | Difficult to identify and involve chronic offenders; programs may be expensive |
| 13 | 31 | Involving youth in developing programs | Intended to engage and provide supervision to youth | …offenders are not highly invested in the graffiti lifestyle | Little deterrent effect for chronic offenders |
| 14 | 32 | Expanding applicable laws | Increases threat of punishment to deter offenders | …laws target particular problems | Can be time-consuming; offenders believe they won't get caught, so they don't worry about punishment |
| 15 | 32 | Holding parents accountable | Involves parents in controlling offenders' behavior | ….offenders are juveniles | Offenders can often hide behavior from parents; parents may have little control |
| 16 | 32 | Increasing sanctions for offenders | Raises the risks associated with graffiti | …combined with investigative<br><br>enforcement activities | Because apprehension of offenders is low, may have little deterrent effect; sanctions should be applied systematically; requires collaboration with prosecutors and judges; can consist of fines, community service, or loss of driver's license |

| Response No. | Page No. | Response | How It Works | Works Best If… | Considerations |
|---|---|---|---|---|---|
| 17 | 33 | Applying new technologies | Reduces motives, deflects or diverts offenders, or increases detection | …the technology fits the problem | May be expensive and require substantial adaptation or experimentation |
| 18 | 33 | Establishing juvenile curfews | Increases the risk of detection for certain offenders | …graffiti typically occurs late at night and offenders are juveniles | Difficult to enforce |
| 19 | 34 | Warning offenders | Intended to increase fear of detection | …detection is increased and consequences are unpleasant | Apprehension of offenders is low; warnings of dire consequences may not be effective |

## Endnotes

1 Castleman (1982); Sloan-Howitt and Kelling (1990).
2 Coffield (1991).
3 Wilson (1988).
4 Ley and Cybrinsky (1974); Klein (1995).
5 Coffield (1991).
6 Gomez (1993); Ferrell (1995).
7 Gomez (1993).
8 Wilson (1987).
9 San Diego Police Department (2000).
10 Clarke (1978); Coffield (1991).
11 Wilson (1987).
12 Bridgeport Police Department (1999).
13 San Diego Police Department (2000).
14 Sampson and Scott (2000).
15 Wilson (1988).
16 *Governing* (1994).
17 Nugent (1998).
18 Poyner (1988); Tilley (1998).
19 Poyner (1988).
20 Eastel and Wilson (1991).
21 Gomez (1993).
22 Wilson (1988).

## References

Beatty, J. (1990). "Zap! You've Been Tagged!" *Time*, Sept. 10, p. 43.

Bridgeport Police Department (1999). *Problem-Solving Partnership Grant Progress Report to the Office of Community Oriented Policing Services* (August). Bridgeport (Connecticut): Bridgeport Police Department.

Butterfield, F. (1988). "On New York Walls, the Fading of Graffiti." *New York Times*, May 6, p. B1.

Castleman, C. (1982). *Subway Graffiti in New York*. London: MIT Press.

Cheetham, D. (1994). *Dealing With Vandalism–A Guide to the Control of Vandalism*. London: Construction Industry Research and Information Association.

Chula Vista Police Department (1999). C*ity of Chula Vista Recent Graffiti Trends*. Chula Vista (California): Chula Vista Police Department.

Clarke, R. (ed.) (1978). *Tackling Vandalism*. Home Office Research Study, No. 47. London: Her Majesty's Stationery Office.

Coffield, F. (1991). *Vandalism and Graffiti: The State of the Art*. London: Calhouste Gulbenkian Foundation.

Cohen, S. (1973). "Property Destruction: Motives and Meanings." In C. Ward (ed.), *Vandalism*. London: The Architectural Press.

Eastel, P., and P. Wilson (1991). *Preventing Crime on Transport: Rail, Buses, Taxis, Planes*. Canberra: Australian Institute of Criminology.

Ferrell, J. (1995). "Urban Graffiti: Crime, Control and Resistance." *Youth and Society* 27(1):73–89.

Gomez, M. (1993). "The Writing on Our Walls: Finding Solutions Through Distinguishing Graffiti Art From Graffiti Vandalism." *University of Michigan Journal of Law Reform* 26(3):633–708.

*Governing* (1994). "Graffiti." August, p. 42.

Kennedy, D. (1997). "Pulling Levers: Chronic Offenders, High-Crime Settings and a Theory of Prevention." *Valparaiso University Law Review* 31:449–483.

Kennedy, D., A. Braga and A. Piehl (1997). "(Un)Known Universe: Mapping Gangs and Gang Violence in Boston." In D. Weisburd and T. McEwen (eds.), *Crime Mapping and Crime Prevention*. Monsey (New York): Criminal Justice Press.

Klein, M. (1995). *The American Street Gang*. New York: Oxford University Press.

Ley, D., and R. Cybrinsky (1974). "Urban Graffiti As Territorial Markers." *Annals of the Association of American Geographers* 64:491–501.

Mueller, M., J. Moore, A. Doggett, and D. Tingstrom (2000). "The Effectiveness of Contingency-Specific and Contingency-Nonspecific Prompts in Controlling Bathroom Graffiti." *Journal of Applied Behavior Analysis* 33(1):89–92.

Nugent, H. (1998). "Gang Graffiti." *Addressing Community Gang Problems: A Practical Guide*. Washington, D.C.: Bureau of Justice Assistance.

Otto, A., K. Maly and D. Schismenos (2000). "Cracking Down on Gangs With GIS." In N. La Vigne and J. Wartell (eds.), *Successful Crime Mapping Case Studies*, Vol. 2. Washington, D.C.: Police Executive Research Forum.

Poyner, B. (1988). "Video Cameras and Bus Vandalism." *Journal of Security Administration* 11:44–51.

Sampson, R., and M. Scott (2000). *Tackling Crime and Other Public-Safety Problems: Case Studies in Problem-Solving*. Washington, D.C.: U.S. Department of Justice, Office of Community Oriented Policing Services.

San Diego Police Department (2000). "Mid-City Graffiti Project." Submission for the Herman Goldstein Award for Excellence in Problem-Oriented Policing.

Scott, D. (1989). "Graffiti Wipeout." *FBI Law Enforcement Bulletin* (December):10–14.

Sloan-Howitt, M., and G. Kelling (1990). "Subway Graffiti in New York City: 'Getting Up' vs. 'Meaning It and Cleaning It.'" *Security Journal* 1(3):131–136.

Tilley, N. (1998). "Evaluating the Effectiveness of CCTV Schemes." In C. Norris, J. Moran and G. Armstrong (eds.), *Surveillance, Closed Circuit Television and Social Control*. Brookfield (Vermont): Ashgate Publishing Co.

Watson, S. (1996). "A Prompt Plus Delayed Contingency Procedure for Reducing Bathroom Graffiti." *Journal of Applied Behavior Analysis* 29(1):121–124.

Wilson, P. (1988). "Preventing Vandalism and Graffiti." *Journal of Security Administration* 11(2):28–35.

_____(1987). "Research Brief No. 6: Graffiti and Vandalism on Public Transport." Trends and Issues. Canberra: Australian Institute of Criminology.

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