

CONTROLLING THE OCCUPATIONAL EXPOSURE TO TUBERCULOSIS: REPORT ON SITE VISITS TO 9 HOMELESS SHELTERS

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SECTION 1:

STUDY SCOPE AND METHODOLOGY

Scope of this Study

This study of current homeless shelter practices for controlling the exposure of homeless workers to the occupational risk of tuberculosis is based on site visits to nine homeless shelters. The study examined several issues. These issues include:

- o Defining attributes of the homeless population and the shelters which serve them.
 - ∅ Percentage of homeless persons that would meet OSHA's definition of a suspected infectious TB case;
 - ∅ Turnover among the homeless who use shelters;
 - ∅ Trends in the number of homeless persons served in shelters;
 - ∅ Number, location and types (e.g., family-oriented, walk-in, all-male) of homeless shelters.
- o Defining the attributes of the work and workers that occurs within homeless shelters.
 - ∅ Employee turnover in homeless shelters;
 - ∅ Types of benefits offered to homeless shelter employees (e.g., health insurance);
- o Identifying current practices with respect to TB in homeless shelters, along with past experience with TB.
 - ∅ Criteria currently used by some homeless shelters to identify suspected infectious TB cases;
 - ∅ Current practices used in homeless shelters to address TB hazards so that baseline compliance with the proposed standard can be determined. Of particular concern to OSHA are: (1) methods of isolation; and (2) how suspected TB cases are handled.
 - ∅ Number of TB skin test conversions and active cases among the homeless and homeless shelter employees;
 - ∅ Number or proportion of homeless shelter workers who are unpaid volunteers;

- o Assessing the operational characteristics of homeless shelters, including the extent to which homeless shelters currently voluntarily follow any portions of OSHA's proposed regulation;
 - ∅ Assessing economic characteristic of homeless shelters, including: (1) the costs of running a shelter; (2) revenue sources; (3) how costs are accommodated as the number of homeless persons served increases; and (4) opportunities for cost pass-through.
- o Assessing alternatives, if necessary, to improve the operational and economic feasibility of controlling the transmission of TB in homeless shelters.
 - ∅ Feasibility of hospitals providing cards to the homeless indicating TB skin test status.

In addition, OSHA has noted that the federal Occupational Safety and Health Act applies to employees, not bona fide volunteers. However, OSHA understands that some states may, as a matter of law, require facilities to provide volunteers with protections established by OSHA standards. OSHA thus requested information on:

- o The protection against TB infection currently offered to shelter employees and volunteers;
- o What states, if any, require employers to provide volunteers in the sectors affected by this proposed standard with the same protections as they provide to employees? How many volunteers might be affected by such requirements?

Site Selection

OSHA requested nine site visits for this study, four each in two different urban areas and one in a rural community. The site selection process involved three steps:

1. First, the selected cities were required to have certain qualifying attributes in order to be selected. These qualifying attributes included: (1) having a potentially high homeless shelter population with TB or with symptoms suggesting TB;¹ (2) having a wide breadth and variety of potential homeless shelters from which to select;² and (3) having a sizable homeless population.

¹ The authors concluded that Southern cities would not meet this qualifying criteria because most such cities have relatively low rates of TB.

² "Breadth" includes the type of shelter (e.g., men only, women only, etc.). "Variety" includes variations among

2. Second, the selected cities were required to not have any disqualifying characteristics. In particular, the cities of New York, Los Angeles, Chicago were disqualified due to their unique attributes based on size. Other factors that were seen as potentially skewing the nature of the community, its homeless population, or its homeless programs, were also considered in the selection process (e.g., large university, state capital).
3. Third, the selected cities were required to be somewhat geographically diverse.

The nine site visits were, by definition of the project's scope, to be limited to two communities. Non-Southern cities were identified by geographic region. The potential selection sample was identified as follows:

Table 1
Cities from which Site Selection Made

	West	Midwest	East
North	Seattle San Francisco	Detroit Cleveland Columbus	Philadelphia Pittsburgh
Mid-Region	Denver Las Vegas	St. Louis Cincinnati	Baltimore

From these potential selections, the cities of Detroit and Baltimore were chosen based on the factors described above.

Within the selected cities, specific shelters were selected. Based on the most recent HUD homeless shelter survey,³ the authors segmented shelters into small (fewer than 25 beds), medium (25 - 50 beds) and large (over 50 beds). In addition, the authors divided shelters into two basic types of shelters: (1) those serving men alone, and (2) those not simply serving men alone.

As per OSHA direction, the study *excluded*: (1) sexual abuse/domestic violence shelters; (2) shelters for runaway youths; (3) shelters that provide primarily substance abuse services; and (4) shelters that provide transitional housing rather than emergency temporary shelter. Finally, the authors excluded

common types (e.g., small vs. big, open all year vs. open seasonally, etc.).

³ U.S. Department of Housing and Urban Development, A Report on the 1988 National Survey of Shelters for the Homeless (March 1989).

shelters that are not homeless "facilities" as defined by HUD regulations governing the Emergency Shelter Grant (ESG) program.

In sum, the two primary selection criteria used were: (1) size (small/medium/large) and clientele (men/not-men). In addition, OSHA asked that at least one "rural" shelter be included. Based on these criteria, the authors made site visits to the shelters listed in Table 2.

Table 2
Shelters Visited in Tuberculosis Study

Shelter	No. Beds	No. Employees (fulltime + parttime)	No. Volunteers	Case Mgmt or Not	Urban or Rural	Population Served /a/	Affiliated with Parent?	Operating Since
A	15	0	800 (all)	No	Rural	All	No	1993
B	55	11	ad hoc	No	Urban	SM only /b/	Yes	n/a /c/
C	226	24	ad hoc	Yes	Urban	SM only	No	1992
D	35	18	"a couple"	Yes	Urban	SW only	Yes	1964
E	30	13	ad hoc	Yes	Urban	All	Yes	1991
F	25	4	80/year	No	Urban	SM, SW, AC	No	1988
G	90	18	0	No	Urban	SM only	No	1956
H	60	22	115/year	Yes	Urban	SW, WC	Yes	1981
I	50	5	ad hoc	No	Urban	SM only	No	1875
<p>NOTES:</p> <p>/a/ SM=single men. SW=single women. AC=adults with children. MC=men with children. WC=women with children.</p> <p>/b/ Shelter B had a women only component to it, which was not studied for this project.</p> <p>/c/ Shelter B has been in operation "forever" according to staff. No exact date was known for the first year of operation.</p> <p>/d/ Neither the term "volunteer" nor the term "employee" is used in a technical sense.</p>								

SECTION 2: TYPES OF HOMELESS SHELTERS

Defining and Classifying Homeless Shelters

General Classifications of Homeless Shelters

The phrase "homeless shelter" is not a term-of-art, but rather a colloquialism referring to a wide range of services, facilities and programs. The term is certainly not definitional; a variety of institutions may or may not fall within the purview of "homeless shelter." "Homeless" is defined by federal statute. Under this statute, the term "homeless" or "homeless individual or homeless person" includes both:

1. an individual who lacks a fixed, regular, and adequate nighttime residence; and
2. an individual who has a primary nighttime residence that is:
 - (a) a supervised publicly or privately operated shelter designed to provide temporary living accommodations (including welfare hotels, congregate shelters, and transitional housing for the mentally ill); or
 - (b) an institution that provides a temporary residence for individuals intended to be institutionalized; or
 - (c) a public or private place not designed for, or ordinarily used as, a regular sleeping accommodation for human beings.⁴

This definition is generally relied upon in federal programs.⁵ Given this definition, at a broad level, "homeless shelters" might be divided into three basic program types:

- o **Emergency shelter:** Emergency shelters are generally considered to provide short-term (an undefined term) housing without supportive services (also an undefined term). Even more directly, "emergency shelters" are frequently defined to be those shelters receiving funding through the federal Emergency Shelter Grants Program (ESG), a program funded through the U.S. Department of Housing and Urban Development (HUD).

⁴ 42 U.S.C.A. sec. 11302.

⁵ Homeless individual as defined under this section for purposes of-- (a) housing for rural homeless and migrant farmworkers, see, 42 U.S.C.A. sec. 1486; (b) Job Corps centers for homeless families, see, 29 U.S.C.A. sec. 703a; (c) job training partnership, see, 29 U.S.C.A. sec. 1503; (d) low-income housing credit, see, 26 U.S.C.A. sec. 42; (e) youth build program, see, 42 U.S.C.A. sec. 12899f; (f) application for rental housing assistance under Shelter Plus Care Program, see, 42 U.S.C.A. sec. 11403c.; (g) preference for sales for homeless families--Federal Deposit Insurance Corporation, see, 12 U.S.C.A. sec. 1821.

- o **Supportive housing:** Supportive housing is generally viewed as temporary housing linked with social services tailored to the special needs of the people being housed. According to one commentator, "the term `supportive housing' became widespread in 1987 when HUD, under the Stewart B. McKinney Homeless Assistance Act, created the Supportive Housing Demonstration Program, which provided funds to develop and operate transitional and permanent housing for homeless populations."⁶
- o **Transitional housing:** Transitional housing services involve programs for people without "homes" that involve neither "emergency shelter" nor "supportive housing." Transitional housing is demarcated by the provision of supportive services. "Residents of transitional housing were typically expected to move to permanent housing within 24 months. The supportive services ranged from employment assistance, job training, and job placement to mental health care, child care, transportation, and case management."⁷ While all transitional housing provides supportive services, not all homeless shelters that provide supportive services are considered to be transitional housing.

Classifying "homeless shelters" is made more difficult by the fact that in many (if not most) instances, the categorization of any given facility as a particular *type* of institution depends not on any inherent (or objective) characteristic of the shelter (or its client base), but rather upon its *funding* source. A program's source of program dollars, of course, is unrelated to the risk of TB exposure to workers.

The popular image of a homeless shelter, perhaps, is reflective of shelters such as Shelter B or Shelter G in this study, with the facility providing exclusively overnight sleeping accommodations to men who would otherwise be on the streets. This popular image, however, overlooks nearly half of all homeless persons. At first blush, there may appear to be a bright line distinction between "emergency shelter" and "transitional housing."

Transitional housing is viewed more as a program, with social services the primary focus, than as housing. The major focus of transitional housing is to help people increase their coping and life management skills to resolve crises in their lives, gain access to community-based resources, and move into independent permanent housing.⁸

The differences between the two, however, are not so clear.

⁶ Diane Glauber, "The Evolution of Supportive Housing," 18 *Shelterforce* 4(12) (1996).

⁷ U.S. General Accounting Office, *Homelessness: McKinney Act Programs and Funding through Fiscal Year 1993*, at 29 (1994).

⁸ Glauber, *supra*, at 12.

Emergency shelters and transitional housing programs have a finite length of stay, which may vary anywhere from a few nights for emergency shelter to two years for transitional housing. With stays of up to three months, emergency shelter in one part of the country is called transitional housing in another.⁹

As a general rule, though it is certainly a "rule of thumb" rather than a legal, programmatic, or universal distinction, "emergency shelters are short term, whereas transitional shelters are long term, allowing stays from three months to two years, and providing services or case management."¹⁰ In particular, however, emergency shelters may provide --they often are required by funders to provide-- supportive or social services. Providing supportive social services, therefore, is not a distinguishing characteristic. For shelters that do not receive federal funding, the "transitional housing" versus "emergency shelter" distinction is even less important.

Even for federally-funded programs, the distinction does not specifically include one *genre* of shelters while excluding another. Consider that the Emergency Shelter Grant program (ESG) is a HUD program, funded through the Stewart McKinney Homeless Assistance Act, that funds, *inter alia*, "the payment of certain operating expenses and essential services in connection with emergency shelters for the homeless."¹¹ An "emergency shelter" is defined as:

any facility, the primary purpose of which is to provide temporary or transitional shelter for the homeless in general, or to specific populations of the homeless.¹²

As can be seen, a facility may provide "temporary *or* transitional" housing and still be considered an *emergency* shelter.

A further complicating factor in distinguishing between an "emergency shelter" and a "transitional housing" facility is the mixing of functions within the same or related shelters. Shelter B, for example, has an emergency overnight shelter for men under the same roof (and operating under the same name) as a shelter for women providing housing for up to 60 days. Similarly, Shelter I operates an emergency overnight shelter for men as well as a long-term recovery program for men. Both are in the same physical facility and operate under the same name. To say that a "homeless shelter" provides only short-term shelter and not longer-term shelter is thus often contrary to fact.

Shelters for Particular Sub-Populations of Homeless Persons or Individuals

⁹ Id., at 12.

¹⁰ Maryland Dept. of Human Resources, Annual Report on Homelessness, FY 1996.

¹¹ 24 C.F.R. 576.1 (1998).

¹² 24 C.F.R. 576.3 (1998).

HUD's definition of the coverage of its "emergency shelter" program includes temporary shelter "to specific populations of the homeless."¹³ Three types of such "homeless shelters" are of particular note:

- ∅ Domestic violence shelters
- ∅ Runaway youth shelters
- ∅ Substance abuse shelters directed exclusively toward homeless persons as part of a continuum of care.

Domestic Violence Shelters

Domestic violence shelters represent a type of shelter for persons with no "home" to which they may return. Domestic violence shelters are not, however, necessarily funded through sources dedicated exclusively to "domestic violence" shelters. They may receive dollars through emergency shelter, transitional housing, or supportive housing programs.

Runaway Shelters

"Runaway shelters" represent an additional type of "homeless shelter." Housing for "runaway youth" is funded as transitional housing, through the "Transitional Living Program for Homeless Youth" (TLP). Among the purposes of TLP is to "provide stable, safe living accommodations while a homeless youth is a program participant."¹⁴ Deciding whether or not a runaway shelter is also a "homeless" shelter is complicated by the fact that, whether or not a shelter receives homeless shelter funding, not all residents are "homeless." TLP defines "homeless youth" as an individual not younger than 16 nor older than 21 "for whom it is not possible to live in a safe environment with a relative; and who has no other safe alternative living arrangement."¹⁵ According to guidelines promulgated by the U.S. Department of Health and Human Services (HHS), "it is estimated that about one fourth of the youth serviced by runaway and homeless youth programs are homeless."¹⁶ Using TLP funds, "overall different types of transitional living program models have been developed and effectively implemented to service homeless youth."¹⁷

¹³ 24 C.F.R. 576.3 (1998).

¹⁴ 57 Fed. Reg. 30304-01 (July 8, 1992)

¹⁵ 57 Fed. Reg. at 30304.

¹⁶ Id.

¹⁷ Id.

From the perspective of HUD's Emergency Shelter Grants program, both runaway shelters and domestic violence shelters are "homeless shelters." ESG regulations explicitly include both "battered spouses" and "runaway children" within the definition of "homeless persons."¹⁸

Substance Abuse Shelters

The site visit process revealed a striking absence of long-term shelters for single men. The long-term shelters that were found offered services exclusively to women and to families (with either one or two parents present). Shelter officials who, at the time of a site visit, were queried on this absence indicated that long-term homeless shelters for single men were simply not known as homeless shelters. They were instead known as "substance abuse" shelters.

Nature of "Accommodations" Provided

Outside of the definitional problems of institutions providing overnight housing, further complication arises from institutions that provide "shelter" *not* involving overnight sleeping accommodations. Most notably within this *genre* of homeless shelters are "warming places" (also sometimes known as warming houses, warming shelters, or day shelters). Warming places involve facilities where homeless persons can find inside space for a term of hours.¹⁹ Operated during cold weather months, warming places provide a refuge from the weather for persons who otherwise have no place to go.

HUD's "emergency shelter" grants program supports the conclusion that a facility need not offer overnight sleeping to be considered a homeless shelter. ESG funds "temporary shelters." In its definition of terms, no indication is given that a necessary element of being such a "shelter" is the provision of overnight sleeping accommodations. Indeed, HUD explicitly recognized the status of warming shelters and drop-in centers as "homeless shelters" in promulgating its regulations for the ESG program. Originally, the HUD regulations provided that facilities were required to provide "overnight sleeping accommodations" in order to be considered an "emergency shelter." In response to HUD's notice of proposed rulemaking, however, the City of Boston:

questioned why the definition of "emergency shelter" (576.3) includes a requirement that such facilities provide overnight sleeping accommodations. By doing so, the definition makes ineligible those facilities that provide temporary shelter only during the day, or that provide supportive services without providing shelter.

HUD agrees that the definition of "emergency shelter" is too restrictive, and the phrase "with overnight sleeping accommodations" is removed in this final rule. Emergency

¹⁸ 24 C.F.R. 576.53(a)(2) (1998).

¹⁹ According to the U.S. Conference of Mayors, these drop-in facilities provide a place where homeless persons may sit, use the bathroom and sometimes bathe. U.S. Conference of Mayors, A Status Report on Hunger and Homelessness in America's Cities: 1995, at 38 (1995).

shelter is now defined to mean "any facility, the primary purpose of which is to provide temporary or transitional shelter for the homeless in general or for specific populations of the homeless." As a result, *day centers and drop-in centers* are eligible to receive funds for all ESG eligible activities.²⁰

The site visits performed for this study revealed that overnight shelters and day shelters worked hand-in-hand. Most shelters visited for this study did not allow guests to stay in the shelter during the daytime hours. The time by which guests were required to vacate the shelter typically ranged from 6:30 to 7:30 in the morning. The institutions providing overnight sleeping accommodations, however, were well aware of the warming shelters that operated in close proximity. Guests were known to leave the overnight shelter and travel to the warming shelter for the day until the overnight shelter again opened its doors.²¹

Shelters with no Fixed Facility

A variety of programs providing emergency overnight housing do *not* involve established facilities. One common type of overnight shelter involves the revolving church program.²² Through such an initiative, churches rotate the use of their space on a regular periodic basis. While the physical facility is primarily used as a church, its homeless shelter functions may be provided on a weekly or monthly basis. The use of the church's facility may be donated, or may be compensated through public or private homeless programs.

Several observations flowing from HUD's definition of "emergency shelter" are relevant in this regard. First, for purposes of ESG funding, an emergency shelter must involve a "facility." Second, the *primary* (though not exclusive) purpose of the facility must be to provide housing for the homeless. Under these funding criteria, therefore, it would appear that the shelter programs where responsibilities revolve amongst churches would not qualify for federal ESG funding.²³

Mixed Use Facilities

Many homeless shelters are mixed use facilities. In fact, the homeless shelters visited for this study tended *not* to be stand-alone facilities in free-standing structures. The shelters visited for this study can be categorized based on whether they have: (1) more than one employer (or institution) operating in

²⁰ 54 Fed. Reg. 46794, 46795 (1989). (emphasis added).

²¹ In contrast to all of the above, whether facilities exclusively providing meals for the homeless (without more) are "shelters" is open to more reasonable debate.

²² Detroit and Baltimore *both* have programs such as these.

²³ This conclusion is not certain, however. The criteria were intended to exclude homeless "programs" that provide shelter through the grant of vouchers for persons to stay at motels and similar facilities.

the same facility; and (2) whether they have more than one program within any facility.²⁴ The results are summarized in Table 3. Since no site visit was made to a homeless shelter having more than one building, the table presented is limited to situations involving a single building.

Table 3
Homeless Shelter Types: Multiple Use

Shelter	No. of Employers or Institutions in Single Facility	No. of Programs in Single Facility
A	Multiple	Multiple
B	One	One
C	Multiple	Multiple
D	One	Multiple
E	One	One
F	One	Multiple
G	One	One
H	One	Multiple
I	One	Multiple

As can be seen, only three of the shelters visited (Shelters B, E and F) were stand-alone facilities used exclusively as a homeless shelter. The remaining six shelters involved multiple use facilities. In these shelters, the distinction between what is the homeless shelter and what is not is blurred at best and non-existent at worst. The different types of mixed uses are described below.

Type of Mixed Use Facilities

Multiple Programs by Single Occupant

One of the most common mixed uses is where the homeless shelter is one occupant in a multi-use building. Shelter H is perhaps the best example. Shelter H is one program of a larger organization. The organization operates out of a single building. Shelter H occupies floors five and six of that facility. Other floors house a variety of programs, including a nursery school for children age two and younger. While "the shelter," itself, is on two separate floors, it is by no means segregated from the rest of the facility. The dining room used by the shelter, for example, is on the third floor. Initial intake interviews

²⁴ The term "facility" is defined to mean any free standing structure.

are often performed in an open area cafeteria that is part of the first floor lobby. Additionally, Shelter H dedicated one of its two floors to homeless women with children. Shelter H requires, as a matter of policy, that all homeless mothers staying at the shelter meet their children *in the lobby* at the end of the day, whether the kids are coming home from school or from an off-site nursery (for pre-school children older than age two). Afterwards, the shelter residents get in the elevators and go back upstairs. Finally, all Shelter H staff, irrespective of what program(s) they are with, or what job duties they are assigned, share common elevators with homeless shelter residents.

Multiple Occupancy of a Single Building

A second type of "mixed use" involves a single building with multiple occupants, only one of which is a homeless shelter. Shelter A, for example, is a multi-use building that has two independent organizational occupants. Like Shelter H, the "homeless shelter," though physically located on a separate floor of the building, conducts its activities in space shared by other organizations. The homeless shelter's dining room is a shared space with other organizations in the building, as is the first floor common space and waiting area. In addition, the organizations that share the building with the homeless shelter have a common social service mission. The intermixing of non-shelter employees and shelter residents is thus not uncommon.

Multiple occupancy can occur, also, when an organization providing space in its facility for the operation of a homeless shelter continues to conduct its normal non-shelter operations in other parts of the same building. Shelter F, for example, is located in the basement of a local church. While, on the one hand, the shelter is segregated from the rest of the church --it even has a separate entrance-- on the other hand, church personnel do not consider the shelter to be a "non-church" portion of the building to be "left alone." Church personnel are frequently in "the shelter." The church and shelter do not have a traditional landlord/tenant relationship with locked doors and an exclusion of the landlord from the "rented" premises. Instead, according to church officials, Shelter F is simply another of the church's "missions," albeit one that is located in a city in the United States (rather than in a foreign country).

SECTION 3: CHARACTERISTICS

The application of OSHA's proposed TB standard to employers in the homeless shelter •industry• will be affected by characteristics of the homeless population, by characteristics of the shelters serving that population, and by characteristics of the workers serving that population.

Characteristics of the Homeless Population

Attempting to describe and characterize the homeless population runs the same risks as characterizing and describing the homeless shelters themselves. Several generalizations can be made not only about who homeless persons are, but perhaps even more importantly for this study, who they are *not*.

Homeless persons are not necessarily single men. While the popular stereotype of persons served by a homeless shelter is perhaps the derelict man living on the streets, fewer than half of all homeless persons today are homeless men.²⁵ As the cost of housing and utilities continues to increase, and as people lose their welfare benefits (or other public assistance), the number of homeless women, families (both one and two parents), and children is increasing.

Homeless persons are not necessarily "street people." The shelter administrators interviewed for this study observed that being "homeless" is not synonymous with living on the street. One shelter serves families who need a place to stay until they find a job and save the necessary funds to pay a rental deposit, the first and last month's rent, and a utility deposit. One shelter serves women who have a recent history of bouncing from friends to family before their temporary housing options finally run out.

Homeless persons are not totally without means. "Homeless" is not synonymous with "destitute." Many homeless persons have post-secondary education. Others have trade skills. Virtually every shelter visited for this study had flexible hours to accommodate work schedules of shelter guests. These shelters either: (a) provide early "wake-up calls" to allow guests to get to work, or (b) provide allowance for late evening arrival when job hours go past normal shelter "check-in" times.

Homeless is not synonymous with transient. One "story" repeatedly told by shelter administrators was how homeless shelter workers, even though providing overnight shelter, get to "know" their area's homeless population. Within the four overnight shelters visited,²⁶ the staff in three said that they "know" 80 percent or more of the guests that stay each night. This familiarity with the population comes despite the day-to-day nature of the shelter program.

²⁵ U.S. Department of Housing and Urban Development, A Report on the 1988 National Survey of Shelters for the Homeless, at 9 (March 1989).

²⁶ An "overnight shelter" is defined as a shelter that, by shelter policy, requires guests to check-in on a day-by-day basis.

Homelessness is not necessarily a long-term phenomenon. Of the nine shelters visited, four indicated that they did not know how long their guests had been homeless.²⁷ Of the three providing information, however, two indicated that a substantial majority of their guests had been homeless for fewer than three months. One of these two shelters was a large emergency overnight shelter for men, while the other was a longer-term program for women.²⁸

Guests of the homeless shelters visited for this study tend to reflect the prevalence of substance abuse (drug and alcohol) within the homeless population as a whole. According to the U.S. Department of Housing and Urban Development's (HUD) most recent periodic survey of the homeless population, from 25 to 33 percent of the homeless population suffer from drug and alcohol abuse. These figures are consistent with the data reported in this study.

The homeless shelters visited for this study do not track the immigration status of shelter guests.

Characteristics of the Homeless Shelters

Physical Characteristics of the Homeless Shelters

The homeless shelters visited for this study do not always serve as the first point of contact for shelter services to homeless persons, although their status in this regard differs depending on whether they provide emergency overnight shelter or longer-term shelter. Aside from the services offered as part of the program at the shelter, discussed in detail elsewhere, the overnight shelters visited tend to serve as more of a "first contact" for shelter services. All three overnight shelters providing information²⁹ reported that the *substantial* majority of their overnight guests were "drop-ins" to the shelter rather than being persons referred by other social service agencies. In contrast, the longer-term shelters tended to serve guests who had been referred to the shelter for its homeless shelter program. References came from other shelters, from social service providers, or from a centralized shelter agency.

Age of Shelters

All nine shelters were located in physical facilities which were more than 40 years old, some *substantially* older than 40 years. Five of these nine shelters showed significant signs of physical deterioration, with conditions including cracks in walls and/or ceilings (see Table 4). One shelter lacked windows in part of the building not used as living space. These older shelters did not have maintenance budgets or specific maintenance reserves.

²⁷ An additional two did not provide responses to this request for information.

²⁸ It would be difficult to generalize the length of time a person has been homeless. Outside those emergency overnight shelters, different programs may be *directed* by design (and funding source) toward the "new" homeless.

²⁹ One overnight shelter did not respond to this information request.

The condition of the shelter is illustrated, as well, through the contributions solicited by the shelter operators. While Shelter A and Shelter E, for example, both solicited contributions toward items such as toiletries, Shelter G and Shelter F both sought contributions to replace windows.

Not all shelters were in a state of disrepair, however. Shelter A operated in a newly renovated historic church building. Shelter H was in an old downtown building which showed no extraordinary physical deterioration to the untrained eye. Shelter E as well as Shelter D were old, but showed no outward signs of physical deterioration (again to the untrained eye).

Table 4
Number of Shelters by Physical Condition of Facility

Signs of Physical Deterioration	Old No Outward Physical Deterioration	New or Newly Renovated
5	3	1

Administrators at many shelters visited were concerned that OSHA's requirements might require structural work. The "simplest" jobs, shelter administrators feared, would require a complex and expensive effort, in large part because of the age of the facilities :

- o to meet local building code regulations. Updated code regulations from which the shelter was otherwise grandfathered would need to be met if work was performed on the structure. For shelters receiving Emergency Shelter Grant (ESG) funding, HUD regulations require that a shelter doing anything other than "minor or routine repairs" meet *currently applicable* local building codes and sanitation requirements prior to completion of the work.³⁰
- o to treat and take appropriate actions (from which shelters would otherwise be grandfathered) to protect shelter occupants from lead paint hazards "before final inspection and approval."³¹
- o to bring the facility into compliance with federal accessibility requirements under the Americans with Disabilities Act (ADA).³² This requirement would govern accessibility

³⁰ 24 C.F.R. 576.3 (1998).

³¹ 24 C.F.R. 576.57(c) (1998).

³² A homeless shelter, not owned by a religious entity, may well qualify as a social service agency and thus as a public accommodation under Title III of the ADA. Under these circumstances, if renovations are done, they must meet the Title III requirements. The renovated areas must be made accessible to the maximum extent feasible. If the renovations

to the building (e.g., addressing buildings whose entrance is not at ground level); accessibility to hallways, rooms and bathrooms (e.g., addressing the widths of the doors and halls, as well as the size of bathrooms and shower facilities); and accessibility to all floors (e.g., if the shelter operates on more than one floor, or has functions --e.g., eating, sleeping, chapel service-- that occur on a different floor).

Responding to these ADA concerns could well place homeless shelters in a financial quandary as well, according to the administrators. For example, do they use federal funds for the required physical changes, thus possibly bringing into play the need for accessibility under Section 504 of the Rehabilitation Act of 1973, or do they instead use private funds, which are likely to be both more limited and more restricted? Table 5 summarizes physical characteristics relating to accessibility.

Table 5
Selected Physical Characteristics Relating to Accessibility

Shelter	Characteristic #1	Characteristic #2
A	Second floor location	
B	No readily visible access problem /a/	
C	Operates on multiple floors	
D	Operates on multiple floors	
E	Operates on multiple floors	
F	Basement location	Operates on multiple floors
G	Operates on multiple floors	
H	Entrance not at street level	Operates on multiple floors
I	Entrance not at ground level	Operates on multiple floors
/a/	A detailed review of the shelter facilities was not performed to look for accessibility issues (e.g., doorways, restrooms, hallways, etc.).	

Ventilation

The homeless shelters visited generally had poorly operating ventilation systems (if they had such systems at all), serving the rooms in which shelter residents and workers interacted. Three of the nine

include work on what the law defines as a "primary function" area, then there must also be an accessible path of travel to the altered area, unless to create such a path would cost an amount disproportionate to the cost of the overall project.

shelters had no ventilation system at all other than windows (natural ventilation). Two more had mechanical ventilation systems serving their restrooms or shower facilities, with windows serving the remainder of the facility. Three facilities had a ventilation system to the outside; one, however, operated that system only once a day since the system "sucks heat out of the building" and the furnace "can't keep up." One facility had no outside ventilation, but had a central air conditioner on a closed loop system (circulating air within the facility).

Financial Characteristics

The purpose of the discussion below is not to provide a comprehensive overview of the finances of the homeless shelter industry, but rather to characterize some of the financial characteristics of the shelters included in the site visits.

Compliance with the proposed standard would impose new costs on homeless shelters. There are three responses a non-profit shelter could have to this (or any) cost increase.³³ One is for a shelter to somehow increase revenue so that the "new" costs are offset, dollar-for-dollar, with "new" revenue. A second response is for a shelter to reduce "old" costs so that even with the additional "new" costs, total costs remain at the original level. The third response is a combination of the first two, finding "new" revenue and reducing "old" costs so that the two actions together fully mitigate the impact of the "new" costs.

With this in mind, the financial characteristics of the homeless shelter industry were categorized into two broad areas for analysis, each of which is separately considered below: (1) revenues; and (2) expenses.

Revenues

The review of the revenue side of the equation was based on five specific factors: (1) financial viability; (2) cash flows; (3) revenue fungibility; (4) revenue available to defray administrative costs; and (5) capacity for revenue expansion. In addition, some generalized observations are offered based on the nine shelters visited. Of the nine shelters visited, detailed revenue information was provided for seven.

Financial Viability

While it is inaccurate to assert that the homeless shelter industry, as a whole, generally involves financially marginal institutions teetering on the brink of insolvency, a considerable number of financially marginal institutions were evident throughout the industry. Scheduling homeless shelter site visits, for example, was often difficult based upon lists provided by state and local government officials.

³³ In a for-profit organization, there is one other choice. The organization can elect to accept the erosion of its profit margin (revenue minus cost) and *not* offset the "new" costs by either reducing "old" costs or finding "new" revenue. This strategy, of course, can be combined with others to yield partial offsets to the impact of the "new" costs.

Lists provided even from the immediately preceding fiscal year frequently included the names of shelters that no longer existed and references to telephone numbers that had been disconnected. The discussion below should be read remembering that site visits were made with the "survivors." To that extent, the financial information discussed below may *overstate* the capacity of homeless shelters.

It was common for the homeless shelters visited for this project to operate at a deficit. Of the seven shelters providing financial data, only two reported that they had not run a deficit in at least one of the immediate past three years. In contrast, three of those seven shelters indicated that they had experienced a deficit in two or more of the past three years.

Looking behind the statistics, however, tells a somewhat bleaker story. One of the deficit-free shelters is Shelter B, which is operated by a parent organization. Shelter B officials said that because the parent organization operates multiple-programs, they had "some latitude" in allocating expenses and, as a result, could complete a fiscal year with no deficit. In that respect, Shelter B might appear to be one of the financially stronger shelters studied. That appearance is deceiving. Shelter B has a "capacity" of roughly 55 beds. Officials reported that they filled 100 percent of shelter beds, even though only 35 persons were staying at Shelter B on any given night. When asked to explain the difference, officials said that while the shelter had a "capacity" for 55 beds, it had only 35 beds in usable condition and no funds (at \$100 per bed) to replace the 20 beds that were worn out.

In contrast to Shelter B, the intersection between the Shelter H homeless shelter and the other programs of the institution of which Shelter H was a part, redounded to the detriment of the homeless shelter. As the parent institution experienced decreased funding for overall programming in recent years --programs previously operated out of the downtown facility, which helped to generate subsidies for other programs of the parent institution, were losing participation and thus funding-- the homeless shelter experienced funding reductions (along with staff cutbacks) along with every other component of the institution. The combined experience of these two shelters, therefore, would lead to the conclusion that while multiple programming might contribute to the long-term viability of a shelter, it does not insulate a shelter from financial strains.

It was common for the homeless shelters visited in this study to operate without reserves either for unforeseen operating contingencies or for either foreseen or unforeseen maintenance expenses. Six of the seven shelters reported having no operating reserve and *none* of the shelters had a reserve for operation and maintenance contingencies.

It is not fair to conclude, however, that the shelters are, as a group, without means. Shelter I had recently purchased a new building and was engaging in substantial renovation at the time of the site visit. The new building is intended to house a substantial expansion of programs. Shelter I operates more than the homeless shelter as part of its overall package of programs. Similarly, Shelter A operated in a newly purchased and renovated building. According to the shelter's *de facto* director -- Shelter A operated with entirely volunteer staff-- the community's churches contributed sufficient funds to comfortably operate the shelter each year.

Shelter D currently operates without serious financial difficulty as well. In the recent past, however, Shelter D was on the brink of insolvency. At that time, the shelter developed a financial relationship with Lutheran Social Services. This support contributes to the shelter's long-term financial viability. In addition, one solution Shelter D pursued to address its financial problems was a contractual agreement with the federal Bureau of Prisons to provide housing for women in the last months of their prison terms. In all respects, the distinction between this fee-for-service federal program and the "homeless shelter" is transparent. The federal prison fees are a major contributor to the shelter's financial viability.

Cash Flows

The shelters visited for this study report frequently operating with serious cash flow constraints. Of the seven shelters providing data, only one had pre-arranged access to commercial credit. Only two (including the one with pre-arranged access to credit) had ever previously used commercial credit (both times to cover the lag between a project start-up date and the receipt of project funds).

One shelter, in particular, demonstrates the cash flow problem. This shelter provides emergency overnight shelter during the "cold weather season." That season, shelter officials said, begins on December 1st and runs until April 30th or "until our money runs out." During the 1997 - 1998 season, the shelter closed two weeks early, with a deficit which the shelter hopes to eliminate by the beginning of the 1998 - 1999 cold weather season. At that time, the officials said, the cycle will begin anew. Despite these problems, it should be noted, this shelter has been in operation for ten years.

This study concludes that small increases in costs to homeless shelters cannot routinely be met by small increases in revenues. Cash flow considerations for the homeless shelters in this study differ from the traditional concept of cash flow thought of by most government and private sector institutions. The shelters visited repeatedly noted that they do not receive "streams" of revenue; they receive "chunks" of revenue. Moreover, they receive *annual* chunks of revenue. Because of this "chunkiness," shelters did not commonly experience incremental increases/decreases in funding, but rather substantial increases/decreases attributable to program expansion or contraction.

Financial Fungibility

Most of the nine homeless shelters visited for this study do not have significant fungibility of program dollars. Of the seven shelters providing detailed financial information, only two reported receiving unrestricted contributions, and only one other reported receiving a general operating grant. Overall, 80 percent of all homeless shelter funding was provided for restricted purposes. Three of the seven reported having either 99 percent or 100 percent of their funding restricted, while only one (a shelter using no government funds) reported having completely unrestricted funding. Table 6 shows the fungibility of funding for all shelters for which data were available.

Table 6
The Fungibility of Homeless Shelter Funding

Shelter	Dollars			Percent	
	Restricted	Unrestricted	Total	Restricted	Unrestricted
B	\$193,888	\$255,257	\$449,145	43%	57%
C	\$1,157,536	\$0	\$1,157,536	100%	0%
D	\$82,110	\$0	\$82,110	100%	0%
E	\$40,904	\$103,717	\$144,321	28%	72%
F	\$3,000	\$17,000	\$26,000	35%	65%
G	\$0	\$330,000	\$330,000	0%	100%
H	\$1,269,939	\$16,100	\$1,286,039	0%	100%

Funding for the shelters in this study tends to be tied to specific service offerings. If a shelter does not receive a particular block of revenue for a particular service in a particular year, the shelter does not offer that service that year. In that situation, the shelter determines what other types of programs or services can be offered, and then seeks funding to support *that* program or service. The financial planning, in other words, does not involve taking an expected stream of revenue and making choices about which competing alternative programs to provide with the revenue. Instead, a shelter decides which programs it wishes to provide and then seeks funding for those programs. If funding is not available for that programming, the programming is not provided. In that situation, the shelter develops different programs potentially funded through different funding sources.

Capacity for Funding Expansion

The homeless shelters studied here have a system of financial support which is heavily reliant on government funding to support the total institution. In those instances where government funds are not the major source of financial support, the shelter has made a specific policy decision to forego government funding altogether.

Overall, government funding is the single most substantial source of homeless shelter support. In those instances where government funds are accepted, public dollars represent 70 percent or more of a shelter's total budget (see Table 7).

Table 7
Source of Homeless Shelter Funding: Government vs. Non-Government

	Dollars	Percent
--	---------	---------

	Government	Non-Government	Total	Government	Non-Government
A	Specific figures not reported			0%	100%
B /a/	\$324,137	\$125,008	\$449,145	72%	28%
C	\$1,087,862	\$188,829	\$1,276,691	85%	15%
D /b/	\$596,289	\$98,210	\$694,499	86%	14%
E	\$128,431	\$15,800	\$144,231	89%	11%
F /c/	\$1,500	\$21,086	\$22,586	7%	93%
G	\$0	\$330,000	\$330,000	0%	100%
H /d/	\$970,117	\$315,022	\$1,285,139	75%	25%
I	No specific figures reported			0%	100%
NOTES:					
/a/ \$124,000 in non-government funding from United Way.					
/b/ \$62,000 in non-government funding from United Way.					
/c/ A minor amount of fuel assistance refund monies has been attributed to "government" funding.					
/d/ \$244,000 in non-government funding from United Way.					

Administrative Dollars

Even aside from total funding is the issue of funding for administrative operations. Of the seven shelters providing financial information, five receive funding through HUD's Emergency Shelter Grants (ESG) program. One important element of the ESG program is its limitation on administrative costs.³⁴ By statute, ESG recipients are limited to using not more than five percent of any annual grant received under the ESG program for administrative purposes.³⁵

Restrictions on Shelter Funding

Because of the many restrictions on homeless shelter funding, there may be questions concerning what funding source may be used for the purposes of compliance with an OSHA regulation. This study did not undertake to determine the extent to which various aspects of compliance with OSHA regulations might be considered programmatic expenditures. Nor did the study undertake to determine the extent to which such expenditures might be considered administrative expenditures for purposes of ESG

³⁴ 24 C.F.R. 576.3 (1998).

³⁵ 42 U.S.C.A. sec. 11378 (1998); 24 C.F.R. 585.135(b) (1998).

funding. Decisions on what limitations should be placed on administrative expenditures, as well as on what constitutes an "administrative" expenditure, are made independently by each funding entity.

Expenses

There are three ways in which a non-profit shelter could respond to any increase in its cost of operation. In review, to mitigate the occurrence of "new" costs, a shelter can either increase revenue, reduce "old" costs, or engage in some combination of the two. This section presents data regarding the feasibility of reducing "old" costs.

Expense data in the same form as required by the Internal Revenue Service on its Form 990 was requested from the nine homeless shelters visited. Five shelters responded and, of those, only three were deemed to supply data reliable enough to be included in this analysis. For purposes of this discussion the terms "cost" and "expense" are used interchangeably.

Identifying Variable Expenses

This study first identified the fixed and variable components of the total expenses reported by each shelter providing data. This analysis is relevant in that only "old" variable costs can be reduced to absorb the occurrence of "new" costs. By their nature, "old" fixed costs *cannot be reduced*.

Fixed expenses were defined to be those expenses associated with maintaining a staff and providing a physical facility. All other expenses were defined as variable.

Staff-related expenses include wages, salaries, payroll taxes and fringe benefits (including pension and retirement expenses). While staff-related expenses are not traditionally considered "fixed," for this analysis, they are considered fixed, i.e., it was assumed that each shelter was appropriately staffed to provide its existing level of service. If that level of service is fixed, then the staff-related expenses are also fixed. In other words, this analysis assumes that a shelter could not decrease staff without reducing its level of service.

Table 8 displays the results of this analysis. Staff related expense was the largest category of expense reported by each of the three shelters; accounting for 67% to 74% of each shelter's total costs. As the table shows, 81% to 89% of the expenses at the three shelters are fixed. These expenses cannot be reduced without reducing the core services of the shelter.

Setting aside fixed expenses, however, it should not be assumed that variable expenses can *a priori* be reduced. Even a reduction in variable expenses can have long run effects on the shelter. The variable costs remain the source for contingency expenses, development of new programs, and any investments necessary to maintain services.

Table 8
Total Fixed and Variable Expenses

		Shelter F		Shelter H /a/		Shelter E	
		Dollars	% of Total	Dollars	% of Total	Dollars	% of Total
1.	Staff related expenses	\$17,324	68%	\$3,391,459	67%	\$106,535	74%
2.	Facility expenses	\$3,375	13%	\$677,309	14%	\$21,117	15%
3.	Total "fixed" expenses /b/	\$20,699	81%	\$4,068,768	81%	\$127,652	89%
4.	Total variable expenses /c/	\$4,691	19%	\$959,393	19%	\$16,669	11%
5.	Total expenses	\$25,390	100%	\$5,028,161	100%	\$144,321	100%
NOTES:							
/a/ The expenses reported here involve total organization expenses for a multi-program operation, only one component of which is a homeless shelter.							
/b/ Line 1 + Line 2							
/c/ Line 5 - Line 3							

Extending the Analysis: Non-Program Variable Expenses

Unfortunately, even the above analysis may understate the economic burden to homeless shelters of "new" costs. In the previous discussion of revenues, this study determined that, based on seven shelters providing revenue data, 80% of all funding was provided for restricted purposes. Funding for these shelters tended to be tied to specific service offerings. The *expense* data collected in this study supports those conclusions. The three shelters reported that more than 85% of their total expenses are "program" expenses.³⁶ Program expenses are defined to be those expenses incurred in the delivery of a specific services, usually intrinsic to the organization's mission. An extension of the analysis presented in the last section yields this conclusion: "Program" expenses that are variable also cannot be reduced to fund new "costs" unless those "new" costs are themselves "program" costs. Only non-program variable expenses can be reduced to fund "new" non-program costs. Table 9 summarizes these distinctions.

Table 9
Can Be Reduced to Fund "New" Non-Program Costs

	Program Expenses	Non-Program Expenses

³⁶ The Internal Revenue Service requires that on its Form 990 (Return of Organization Exempt From Income Tax), homeless shelters report total expenses separated into three categories: (1) Program Services, (2) Administrative and General, and (3) Fundraising. This study requested expense data in the same form.

Fixed Expenses	No	No
Variable Expenses	No	Yes

Analysis was thus prepared to identify the non-program variable expense component of the total costs of each of the three shelters providing expense data. Table 10 displays the results of this analysis.

Table 10
Non-Program Fixed and Variable Expenses
(percentages are of *total* shelter expenses)

		Shelter E		Shelter H		Shelter E	
		Dollars	% of Total	Dollars	% of Total	Dollars	% of Total
1.	Non-program staff-related expenses	n/a	n/a	\$346,390	6.9%	\$14,915	10.3%
2.	Non-program facility expenses	n/a	n/a	\$78,102	1.6%	\$2,746	1.9%
3.	Total "fixed" non-program expenses /a/	n/a	n/a	\$424,492	8.5%	\$17,661	12.2%
4.	Total variable non-program expenses /b/	n/a	n/a	\$192,085	3.8%	\$1,371	0.9%
5.	Total non-program expenses	n/a	n/a	\$616,577	12.3%	\$19,032	13.1%
NOTES:							
/a/		Line 1 + Line 2					
/b/		Line 5 - Line 3					

As was the case with total expenses, Table 10 shows that staff-related expenses are also the largest single component of total non-program costs. Fixed non-program costs were 8.5% and 12.2% of total costs, respectively, for the two shelters providing data.³⁷ Variable non-program costs were 3.8% and 0.9% respectively of total costs.

Table 11 summarizes how the concepts of (1) fixed vs. variable costs, and (2) program vs. non-program costs interact for a specific shelter. This table combines the data from Tables 8 through 10 using Shelter H as the illustration. Table 11 shows that only 3.8% of total shelter expenses (i.e., variable non-program expenses) would be available to fund "new" non-program costs.

³⁷ Shelter F reported no non-program costs to the authors. This was probably due to the fact that this shelter is not a separate entity for tax purposes and the non-program expenses are incurred at the "mother" organization.

Table 11
 Illustration: Can Be Reduced to Fund "New" Non-Program Costs
 (Percentage of Total Costs for Shelter H)

	Total	Non-Program Expenses		Program Expenses	
		Percent	Usable to Fund New Non-Program Costs?	Percent	Usable to Fund New Non-Program Costs?
Fixed Expenses	81% /a/	8.5% /b/	No	72.5% /c/	No
Variable Expenses	19% /a/	3.8% /b/	Yes	15.2% /c/	No
NOTES:					
/a/ Table 8					
/b/ Table 10					
/c/ Total shelter expenses minus non-program expenses = program expenses.					

Characteristics of Homeless Shelter Workers

The staff of the nine homeless shelters visited tend to be low-paid, long-term full-time employees frequently supplemented with volunteer workers filling a variety of roles. This section discusses the variety of employment relations found in homeless shelters, wages and turnover among homeless shelter full-time staff, and occupational exposure to TB among homeless shelter fulltime staff.

Characteristics of Employer-Employee Relationships

The employment relationship between workers and shelter operators ranges from a "traditional" relationship, where an employer pays a wage and directly supervises the work of the employee, to a relationship where the compensation comes from different sources or in different forms than hourly wages paid by the shelter. (True volunteers are not included in this analysis.)

Six employment models that diverge from the exchange of supervised labor for the payment of hourly wages were identified in the nine shelters to which site visits were made. The six "exceptions" include:

1. **Stipend volunteers:** One shelter operates on the very edge of economic viability. As a result, the shelter does not hire "employees" and does not pay a wage. Instead, the shelter pays its regular workers a periodic "stipend." The workers are then responsible for paying their own taxes, unemployment contribution, and the like. There is no staff supervision, since no staff exists. The stipend volunteers are responsible to a volunteer board of directors. In law,³⁸ the stipend volunteers are "self-employed."

³⁸ The tax implications are set aside as beyond any relevance to this study.

2. **Part of rehabilitation program:** In one shelter, the workers in the shelter are participants in a substance abuse rehabilitation program operated out of the same building. Working in the shelter is considered to be part of the rehabilitation process that makes up the program. This is *not* the situation described in paragraph three (3) below, where there is an explicit exchange of a *quid pro quo* (shelter for work). Instead, the shelter work is part of the rehabilitation process itself. It is akin to a student intern whose work is considered part of the student's educational program, and not part of an employment relationship. Just as the student is not an "employee," it is likely that the rehabilitation program participant is not an "employee" either.
3. **Labor as a condition of stay:** In several shelters, the shelter residents are required to perform a range of chores/tasks as a precondition to their stay at the shelter. Without such labor from the shelter residents, the shelter would need to devote stafftime to that work. An employment relationship, of course, does not depend on the payment of "wages." Instead, an employment relationship exists whenever someone provides labor in exchange for something of value. If, for example, a person provides child care in exchange for room and board, that person is an "employee" despite the lack of wages. Accordingly, when a homeless shelter provides shelter in exchange for a resident's work, there has been an exchange of value and the provision of compensation.
4. **Shelter perquisites for labor:** In distinction to the provision of labor as a precondition of stay, some shelters rely on residents to provide labor in exchange for the shelter's grant of a range of perquisites of value. This compensation might include early entry into the shelter (e.g., when a shelter does not "open" until 6:00, the residents providing work are allowed to enter at 3:00); the right to stay in the shelter all day when the shelter is otherwise "closed" for the day; the guarantee of a bed on any given night (when otherwise limited beds are assigned on a first-come, first-served basis); the right to choose particular beds (e.g., beds with easy access or beds in quiet zones); and the like. One shelter had even given the group of residents working as quasi-staff a name ("The Crew") by which they identify themselves.
5. **Gratuitous employees:** The concept of "gratuitous employees" is discussed in detail in the section of this report considering volunteers. Many of the homeless shelters studied relied upon gratuitous employees for their routine operation. These unpaid workers were a significant line of defense against inadequate budgets to hire paid workers. The "gratuitous employees" were routinely coordinated by a specifically designated "volunteer coordinator,"³⁹ and the volunteers were "hired," assigned regular job duties, and supervised.

³⁹ The term "volunteer" here is used in a non-technical sense.

6. **Frequenters:** A final population of employees found in the shelters studied are those employees who under statutory and common law would be referred to as "frequenters" (as defined elsewhere in this report). These persons are persons who are not employees (or guests), and who do not have a formal connection with the shelter, but who nonetheless are routinely on the premises. One shelter, for example, was located in the basement of a church. The pastor of the church, even though not connected with the shelter in any formal sense, was routinely in the shelter doing "church business." One shelter shared occupancy with a building with another unrelated non-profit organization. Employees of that organization, even though not connected with the shelter in any formal sense, were routinely in the shelter. These workers were not in the shelter doing shelter business. They were not there at the invitation, or on behalf of, or for the benefit of the shelter. The workers' presence was largely due to sheer proximity (as well as commonality of mission).

The variety of employee types is illustrated below from one shelter:

Table 12
The Improvisational Nature of Homeless Shelter "Employees"
at One Homeless Shelter

Employee Class	Number in this Class	Notes
Stipend volunteers	4	Hired in lieu of shelter employees
Gratuitous employees	80	All organized volunteer efforts headed by the volunteer "executive director" and coordinated by a volunteer "volunteer coordinator"
True volunteers	unknown	For example, rotating church groups that prepare and serve food.
Guests	20 - 27 (capacity)	Are assigned maintenance and/or housekeeping "chores" as condition of stay and as condition of getting lunch.
"Crew"	Within "guests"	Assigned special tasks in exchange for early admission and guaranteed admission.
Frequenters	1	Pastor of church in which shelter is located.

Wages and Turnover for Fulltime Staff

The nine homeless shelters visited, with the exception of one with an all-volunteer worker base, tend to rely upon a full-time staff with few, if any, part-time supplements. Indeed, the part-time staff were generally in administrative roles. In addition, given the seven day a week operation of all but one of the nine shelters, part-time staff also filled line jobs on weekends. The overall story, however, is reliance on fulltime staff.

The staff at the shelters tend to be low paid. As shown in Table 13, average hourly wages for full-time staff members ranged from less than \$6.00 per hour to roughly \$10.00 per hour.⁴⁰ Average wages for part-time employees ranged from \$5 per hour to \$7 per hour. The highest and lowest wage did not generally vary substantially from the average. Six of the seven shelters with paid employees provided health insurance (though not fully paid health insurance), with four of those providing such insurance only to full-time employees. Disability insurance was not a common benefit.

Table 13
Homeless Shelter Employee Wages

	Fulltime			Parttime		
	Average	High	Low	Average	High	Low
A	All volunteer					
B	\$5.60	\$5.60	\$5.30	\$5.60	\$5.60	\$5.30
C	\$6.00	\$23.00	\$10.00	\$6.00	\$10.00	\$5.15
D	\$10.00	n/a	n/a	\$7.00	n/a	n/a
E	\$6.24	\$7.00	\$6.00	\$6.24	\$6.24	\$6.00
F	No wages paid: "stipend volunteers"					
G	\$6.00	\$7.50	\$6.00	\$6.24	\$6.24	\$6.00
H	\$8.39/\$6.19	\$10.08	\$6.10	\$6.19	\$10.08	\$6.10
I	No data reported					
NOTES:	Shelter H average wage varies based on employee classification.					

Despite the low wages, the staff at the nine homeless shelters was stable. Few shelters reported recently-hired employees, and almost all reported that not only most staff, but that a *substantial* majority of their staff, had been at their current job for two or more years. Only one emergency overnight shelter reported that its "monitor" positions were viewed as unskilled "minimum wages jobs",

⁴⁰ At one shelter, staff were also provided housing.

with a high turnover rate, by those persons who were hired. Staff turnover was measured by considering the tenure of existing staff. Four categories of staff tenure were created, consisting of staff being at their current job: (1) less than three months; (2) from three to twelve months; (3) from one to two years; and (4) two years or more.

Not only the majority of staff, but the substantial majority of staff at the homeless shelters visited, had been at their jobs for two years or more. The eight shelters collectively reported 114 fulltime and parttime employees. Fully three-quarters of these employees (85 of 114) had been at their jobs for two years or more. Nearly nine of ten (99 of 114) had been at their jobs for one or more years. In contrast, one four of the 114 employees had been at their job for three months or less. The prevalence of employees who had been on their jobs for two or more years was across-the-board. Only one shelter had as many employees with tenure of one year or less as it had employees with two or more years of tenure.

Past experience in the homeless shelter industry was not a driving factor in hiring employees. While one shelter required past experience in "human services," five of the remaining eight reported no systematic knowledge of a prior experience requirement. Three of the shelters, however, reported that they hired previously homeless persons, including guests of the shelter, as paid staff.⁴¹

There has not been substantial variation in employment in the nine shelters visited for this study. Five of the shelters reported no change in the number of employees over the past three fiscal years. Two other shelters indicated that they had added employees as they implemented new programs. Only one shelter indicated that its number of employees has declined in the past year.⁴²

Finally, the homeless shelters visited tend to have year-round staff. They do not have substantial seasonal variation in any type of worker class. Most of the shelters visited in these site visits operate at or close to capacity year-round. The shelters do not present a situation where a base of staff was complemented by a seasonal influx of volunteers or parttime employees during a winter "peak" season. To the extent that cold weather presents a marginal increase in the number of shelter guests, these shelters meet that increased load by realigning other work responsibilities.

In three of the shelters, paid staff were significantly supplemented with a large volunteer work force. These three shelters reported that volunteers were involved with virtually every aspect of the shelter's operations. A fourth shelter operated on a completely volunteer basis, with no paid staff at all. This shelter "assigned weeks" to various churches in the community on a rotating basis; it was up to the church to decide how best to meet its staffing obligations for that week. In contrast, two shelters reported few volunteers and assigned them relatively minor roles. Other shelters explained that while

⁴¹ In contrast, the use of ongoing shelter guests as employees is addressed elsewhere in this report.

⁴² This shelter administrator also noted that, as total institutional revenues declined --the homeless shelter was but one program of the overall institution-- the number of homeless shelter employees declined along with the rest of the overall staff.

volunteers might play a role in occasional tasks such as sorting clothes, they played a minor role in day-to-day operations. Three shelters reported no volunteer involvement at all.

Occupational Exposure to TB among Homeless Shelter Employees

The site visits found that homeless shelter workers were routinely exposed to potential TB hazards posed by homeless shelter guests, beginning with the check-in process. The check-in processes at overnight shelters tended to be an "all hands" endeavor, with every staff member having direct contact with guests staying at the shelter. In these shelters, there was no "first point of contact," i.e., a specified intake worker. Even apart from the check-in process, however, socialization with guests is a part of employees' job duties in many shelters. Shelter F workers (including volunteers), for example, have explicit directions to try to speak with each guest each night.

In the nine homeless shelters visited for this study, homeless shelter workers were exposed to infectious diseases through direct contact with homeless shelter guests. In most homeless shelters, employees supervise their guests. The "supervision" of residents in the nine shelters visited ranged from the supervision of meals, to the supervision of guests who take mandatory showers during the check-in process at the shelter. In this instance, the involved personnel have direct daily exposure to every person who enters the shelter.

Although not all shelters had an extensive facility in which homeless shelter services were provided, the problem of intra-facility transport does, in fact, play a role in the exposure of shelter employees. A common rule for emergency overnight shelters was that shelter guests were to be accompanied when they moved within the shelter. In these instances, the employee would have direct and close exposure to shelter guests.

In the nine shelters visited for this study, the occurrence of group activities routinely created such situations. A shelter orientation program, for example, was performed at one shelter on a group wide basis. Another shelter required an "all hands" meeting every night, involving not only all guests, but all workers present in the shelter at the time. A third shelter required that everyone present in the shelter each night (guest or worker) attend chapel.

The overnight shelters visited for this study usually involved a single common room, where all guest activities occurred. Each shelter offering a meals program had a common dining room where shelter workers and guests ate. One small shelter had a kitchen table, where coffee and conversation was encouraged between shelter workers and shelter guests until the time the shelter closed for the day. These congregate facilities in homeless shelters presented situations where persons were engaged in precisely the activities that produce droplet nuclei. Where the shelter provided meals, there was conversation. Where the shelter provided chapel services, there was singing. Where the shelter provided a common room for clients to watch television, play cards, or otherwise interact with each other, there was talking, sneezing and coughing. In each of these situations, not only were the individuals present in the room (both staff and other residents) exposed to potential TB infection, but

anyone who subsequently entered the room was exposed to the droplet nuclei in the air as well. In many shelters visited, a single common room served multiple purposes for the homeless shelter.

This study identified several instances where individual workers experienced occupational exposure, either through direct contact or through exposure to "shared air." Designated smoking areas were common in the shelters visited, since smoking was routinely not permitted within the shelter facility. Common passageways were present, leading to the exposure of anyone who "shared air" by walking through the hall, up the stairs, or into the foyer. Since separate restrooms were not commonly provided for staff and guests, all who used those facilities during the course of a day were exposed to shared air. Elevators, too, presented situations of shared air.

SECTION 4: OPERATIONAL CAPABILITIES

This section focuses on questions raised in the site visits related to existing operational capabilities of the homeless shelters to carry out the proposed rule's requirements to identify and transfer suspect TB cases, and to carry out recordkeeping and training requirements.

Operational Capabilities Related to Identifying and Transferring Suspect TB Cases

This analysis focuses on the identification and transfer of suspect TB cases as these activities might be implemented in homeless shelters and explores the operational issues that arise. The overall objective of this section is to present a realistic picture of day-to-day shelter operations and to analyze how the requirements of the proposed standard might affect these activities. Since shelters are not currently identifying and transferring TB cases, keeping records, or training their staff to recognize suspect TB cases, the first question that is addressed is whether day-to-day operations could be readily "adjusted" to enable full compliance.

Current Check-in Practices

A Shelter's Check-in Process Reflects Its Case Management Practices

One significant observation gleaned from the homeless shelter site visits is that a shelter's check-in process correlates directly with its case management practices. In this regard, there appear to be three types of shelters. The first type is when a shelter provides no case management of any kind. A second type is when a shelter provides case management and the initial case management interview is held with an individual *before* that individual is admitted to the shelter. The final type is when a shelter provides case management but the initial case management interview is not held with an individual until *after* that individual is admitted to the shelter. Each of the nine homeless shelters visited were assigned to one of the three categories, as shown in Table 14.

A "typical" or "composite" check-in process for each of these three shelter types has been developed based on the actual processes described and observed during the site visits. Each composite was designed to be representative and was not intended to match any one shelter's check-in process exactly. The three composite processes are described in the following paragraphs.

Table 14
Homeless Shelters Visited by Case Management Category

Category	Shelter
No case management	Shelter A
	Shelter B (men)
	Shelter F
	Shelter G
	Shelter I
Pre-Admission Interview	Shelter D
	Shelter H
Post-Admission Interview	Shelter B (women)
	Shelter C
	Shelter E

Case Management Is Not Provided

Shelters that provide no case management are typically "overnight" shelters, i.e., shelters where guests are "admitted" for the evening and then "discharged" the next morning. Shelter B (the men's program) and Shelter G are two examples of such shelters.

Check-in of guests at "no case management" shelters involves nothing more elaborate than recording an individual's name and the date and assigning a bed. At the "no case management" shelters visited, a guest was often asked to sign a roster list, as well as provide a social security number and an identification. Several shelters maintained an individual index card for each guest and recorded the date of each stay on that card. Shelter I used a simple PC database program.

The check-in process at "no case management" shelters is characterized by the speed with which guests are "processed." At Shelter B, the authors watched shelter staff check-in 30 men in 45 minutes. At Shelter G, one staff member told of a night where 100 men were checked-in within 30 minutes. At no

shelter of this category did the check-in process exceed a few minutes per person. In these situations, "check-in" is a rapid, simple, mass production process.

The check-in process at "no case management" shelters occurs *within* the shelter. At two of the shelters visited, guests checked-in at a desk in the very room where they would later sleep. At another shelter, check-in was done at a counter in the chapel (a room apart from the sleeping room). At yet another, check-in was done in the common TV room (again, a room separate from the sleeping room).

Another characteristic of "no case management" shelters is that the check-in process occurs *after* the decision has been made to admit an individual to the shelter. The typical process at the shelters visited was to station a staff member at the door to serve as a gatekeeper. That person's task was to screen out individuals the shelter did not want admitted (e.g., those drunk, disorderly or previously barred from the shelter). Once someone had passed by the gatekeeper, they were "in" even though every shelter reserved the right to eject someone who became unruly during the evening.

Finally, the check-in process at "no case management" shelters is an "all hands" operation. Often, only one staff member was responsible for the check-in paperwork, but generally all staff members on duty had some role in shepherding the flow of guests into the shelter for the night. As discussed earlier, that check-in "flow" involved a multi-step process: get people in the door, do the paper work, assign a bed, provide linens and toiletries, get to the shower, etc.

Case Management *IS* Provided

In contrast to the shelters just described, other homeless shelters do provide case management services and typically allow extended stays at the facility. Average stays of 30 days to six months were cited at the sites visited.

As described earlier, it is valuable to further subdivide this group of shelters based on whether the initial case management interview is held before or after an individual is admitted to the shelter.

Pre-Admission Case Management Interview

In "pre-admission interview" shelters, the case management interview is an integral part of the check-in process. In fact, this initial interview is the primary input into the admission decision itself. The similarities of this process with the process of applying for a job and gaining an interview were apparent at the "pre-admission interview" shelters visited. At Shelter D, the staff even referred to potential residents as "applicants."

In contrast to the fast-moving, assembly line check-in process of the "no case management" shelters, the check-in process at "pre-admission interview" shelters is slow and personalized. The initial interview is conducted one-on-one and lasts about 30 minutes. The interviewer is typically a specific staff person at the shelter in whom the admission decision is vested. At Shelter H, that staff position

was designated the "Intake Counselor"⁴³ and at Shelter D the staff member's title was "Intake Coordinator." The entire intake process in "pre-admission interview" shelters is extended. At one shelter visited, it stretched over three days and included additional interviews, counseling sessions and a medical examination.

Finally, at "pre-admission interview" shelters, the case management interview, the primary component of the check-in process, is conducted *outside* of the shelter proper. At Shelter H, for example, the pre-admission interview was conducted in the lobby of the building. An applicant was taken up to the shelter floors (the fifth and sixth floors) only after successfully "passing" the initial interview. At Shelter D, the pre-admission interview was conducted in the Intake Coordinator's cubicle within the administrative offices. Although in the same building, these offices were separate and removed from the living and sleeping areas of the shelter.

Post-Admission Case Management Interview

The third and final category consists of homeless shelters that provide case management services but conduct the initial case management interview with residents after they are admitted to the facility. The "post-admission interview" shelter is a hybrid of the two types of shelters previously discussed.

The check-in process for "post-admission interview" shelters is characterized by the fast-paced, assembly line registration process of the "no case management" shelters and a subsequent case management interview similar to the "pre-admission interview" shelters. These shelters are extended stay shelters, as were the "pre-admission interview" shelters.

In "post-admission interview" shelters, both the check-in process and the initial case management interview occur *after* the decision is made to admit an individual to the facility. At Shelter E, the initial interview was part of the intake process, albeit one of the later steps. At Shelter C, the initial interview was scheduled for the subsequent day as part of the intake process. At "post-admission interview" shelters, the case management interview is not used as input into the admission decision as is done in the "pre-admission interview" shelters.

Since these "post-admission interview" shelters are a hybrid, the durations of the check-in process and the case management interview follow the patterns discussed earlier. The registration process itself takes only minutes per client and the initial case management interview lasts about 30 minutes. The locations of these activities also follow the previous patterns. Both registration and the initial interview are conducted *within* the shelter.

Possible Use of Alternative Suspect TB Case Identification Procedures

⁴³ This position was vacant at the time of the site visit.

This section examines the three methods suggested by OSHA for screening suspect TB cases: pre admission medical diagnosis, use of a symptom questionnaire, and observation.

Pre-Admission Medical Diagnoses

Most homeless shelters do not rely on a pre-admission medical diagnosis to identify individuals with suspected or confirmed infectious TB. Only two facilities use a pre-admission interview process. However, these two facilities do provide a medical examination as part of the pre-admission interview process, and thus would be able to make use of a pre-admission medical diagnosis of TB with minimal change to existing procedures.

The vast majority of the "new" clients of a homeless shelters arrive at the shelter without notice. This is obviously true for the "no case management" shelters which provide only overnight accommodation. For these shelters, new clients are overwhelmingly drop-ins. But the lack of notice is also true for some "case management shelters" that provide longer-term accommodation. These shelters have a higher percentage of new clients referred to them, but these referrals tend to be "emergency" referrals. Referrals originate from other shelters, centralized referral centers (such as 1-800-AShelter in Detroit) or other social service agencies.

Use of a Medical History Questionnaire

The authors administered the proposed OSHA medical history questionnaire to approximately 30 residents at Shelter B. From the response obtained and the demeanor of the residents questioned, it was apparent that these individuals understood little of what was being asked. The questionnaire is not written in the language of the street or of the homeless. In addition, Shelter B does not deny shelter to individuals under the influence of drugs or alcohol as long as their behavior is non-violent. The authors encountered several individuals who were too intoxicated to comprehend even the simplest questions. Clients did not pass "correct answers" to others waiting in line to be questioned. However, due to the manner in which the questionnaire is constructed, "no" is the "right" answer to every question, and this rapidly became apparent to those being questioned.

Based on the experience at Shelter B, the authors revised the original medical history questionnaire. The intent was to simplify the language and remedy the problem of the questionnaire eliciting multiple consecutive "no" responses. The revised questionnaire is shown in Appendix A. To maximize the number of shelter guests to whom the revised questionnaire could be administered, the new questionnaire was then administered to individuals in homeless shelters in Boston and Minneapolis. The results from using the revised questionnaire were similar to the original results. Individuals did not behave as though they understood the questions and "no" continued to be a repetitive "right" answer.

These observations pertain to "no case management" shelters and "post-admission interview" shelters. In "pre-admission interview" shelters where the case management interview is an integral part of the admission decision, reliance on a medical history questionnaire may be more viable.

Use of Observation

The use of observation to identify suspect TB cases is likely to have limited value in the homeless shelter environment. The reasons for the ineffectiveness of observation in the homeless shelter environment are that:

- ∅ Many homeless shelter clients routinely have several of the symptoms or signs OSHA is considering (e.g., cough, fever (evidenced by flushed face, hot skin)) for reasons other than TB;
- ∅ Many of the symptoms or signs can only be identified if the client is observed by the same person over some period of time (e.g., weight loss, anorexia), which would be difficult in many shelters because the •check-in• person varies from one day to the next and the clientele has high turnover; and
- ∅ The identification of their symptoms or signs (bloody sputum, night sweats) depends on an observer picking up the sign or symptom when it occurs. To observe night sweats, for example, a shelter worker would have to observe the client changing clothes (or bedclothes at night).

Thus, this element of the proposed standard is not likely to achieve its purpose •the early identification of suspect cases• in homeless shelters.

Transfer in Homeless Shelters

Many persons with knowledge of homeless shelter operations expressed concern about the feasibility of implementing the "transfer" provision in the homeless shelter environment. It is clear that whenever a shelter identifies an individual as having suspected or confirmed infectious TB, it will be *after* that individual has been granted admission to the shelter. Consequently, the decision facing the shelter upon making the determination is not to either (1) admit, or (2) not admit. It is to rather (1) to evict, or (2) to not evict. Although evicting a client would not be difficult operationally for a shelter (all shelters have rules which, if broken, result in eviction), eviction would raise social, ethical, and, perhaps, legal issues.

Administrative Procedures in Homeless Shelters

A Model of Administrative Process Maturity

Background

Observation of shelter operations during the nine site visits undertaken for this study raised concerns about the maturity of the administrative processes at those shelters. A model was developed to objectively assess administrative process maturity and was used to evaluate the administrative

capability of the shelters visited. The model draws heavily from, and is a direct extension of, the Software Engineering Institute's (SEI) Capability Maturity Model (CMM). The model is described in detail in Appendix B.

Overview of The Administrative Process Maturity Model

The model defines process maturity as: "the extent to which a specific process is documented, practiced and coordinated and the manner in which it is managed."

The model demonstrates that there is a continuum of process maturity. In an organization's least mature state, its processes are *ad hoc*; the repeated performance of organizational practices are only sporadic. As an organization matures, its processes mature; they become well-defined and are consistently practiced. At full maturity, an organization's processes are fully adaptive; capable of introspection and continuous improvement.

To facilitate organizational assessment, the model breaks the process maturity continuum into five discrete levels of process maturity. The levels are labeled Ad Hoc, Repeatable, Standardized, Managed and Optimizing. The model then describes how each of the maturity factors (introduced in the definition of process maturity) would be characterized at each level. The two lower levels of process maturity are summarized in the following paragraphs.

If an organization or work group is at the Ad Hoc level of maturity, its processes are not documented. Sometimes, processes are not even defined. At best, processes at this level can be orally described, but nothing has been committed to paper. At this level of maturity, processes are only sporadically practiced as they are described. There is wide and frequent variation. The success of a specific process is dependent upon specific individuals and "heroic" effort is often required. At this lowest level of maturity, processes are not coordinated within the work group; every process is independent. Finally, at the Ad Hoc level, there are no active measures taken to control or manage processes. Processes may be initiated, turned "on," but there is no subsequent mechanism to control them, or to alter them if they prove ineffective.

At the Repeatable level of maturity, written documentation has been developed and the practice of the process has become consistent. It is becoming more common for tasks to be done the same way every time and the process knowledge has become somewhat disseminated within the work group. The interaction of processes within the work group has become recognized and coordinated. Process indicators are defined, monitored and used to maintain control of the process.

Application of the Process Maturity Model to Homeless Shelters

Shelter Administrative Processes

The nine shelters universally exhibited immature administrative processes and there was no indication that these shelters were unique within their industry.

Table 15 summarizes the authors' assessment of the administrative process maturity at each of the nine shelter sites visited. Seven of the nine shelters had achieved only Level 1, the Ad Hoc level of administrative process maturity. Shelters were assessed as achieving only Ad Hoc maturity because they exhibited the characteristics of that level *and* because they failed to exhibit characteristics of higher levels. One of the remaining shelters had achieved the second level of maturity, the Repeatable level and the last had achieved the third.

Table 15
Administrative Process Maturity of Shelters Visited

Process Maturity Level	Shelter
Level 1: Ad Hoc	Shelter G
	Shelter F
	Shelter I
	Shelter A
	Shelter C
	Shelter E
	Shelter B (men)
	Shelter B (women)
Level 2: Repeatable	Shelter D
Level 3: Standardized	Shelter H
Level 4: Managed	none

Documented: Some administrative processes are established and describable at each of the Ad Hoc shelters, but there is an absence of written procedures. If an Exposure Control Plan of the type required by the proposed TB standard is written at one of these shelters, it may well contain the first written procedures the shelter has ever had. Written process documentation is a characteristic of the

second level of maturity and these shelters have not progressed that far. There was more evidence of documentation at the shelters assessed as Repeatable and Standardized. For example, at Shelter H (the Level 3, Standardized shelter), the shelter director commented: "The [shelter] has a form for everything" and "the shelter operations manual is *this* thick."

Practiced: The most conspicuous characteristic of the administrative processes at the Ad Hoc shelters is that process knowledge resides in *one* person. The success of the process relies upon that one person. This situation is an indicator that the shelter's processes are not consistently practiced and that the shelter has not progressed beyond the first level of maturity.

An example of this phenomenon is the check-in process for men at Shelter B. That check-in process is embodied in "John," the head of security. Questions posed by the authors regarding shelter operations, "how things are done," were not answered by the shelter director, but were referred to John. A similar situation was encountered at Shelter G. In this case, the check-in process is embodied in "Hal." Questions asked of the shelter's Assistant Director regarding shelter operations were often answered: "I don't know, but Hal could tell you." The opposite phenomenon was observed at the Level 2 and Level 3 shelters. A process could be performed by various people. At Shelter D, for example, the initial case management interview was usually done by the Intake Coordinator. It could be done, however, by the Shelter Director.

Coordinated: The authors found no evidence that administrative processes were coordinated within the seven shelters assessed as Ad Hoc shelters. At the remaining two shelters, the most visible sign of process coordination was the integration of the initial case management interview into the shelter's check-in process. At Shelter D and Shelter H, the "needs" of the check-in process as well as the "needs" of the case management process were both met during the initial case management interview. Shelter H exhibited the additional characteristic of processes integrated across an organization. The parent institution of Shelter H operates three facilities: one in the city and the other two in the outlying county. Administrative processes were standardized across the three locations.

Managed: No evidence was found at any of the shelter sites visited that processes were actively controlled. There was no evidence that processes were monitored and adjusted if found ineffective.

Shelter Training Processes

Most homeless shelters do not have existing processes for providing training to employees. One shelter provides its workers with no training whatsoever. The Assistant Director of that shelter commented when asked about staff training: "None of our staff are skilled workers; they're labor." Other shelters provide no training but allow staff to attend the occasional outside seminar. Shelter C and Shelter I are examples of this training "process." Training in shelter rules and operations is somewhat more common, but is usually limited to initial training. At Shelter F, informal training is conducted during weekly staff meetings by the staff member most knowledgeable about a topic. At

Shelter B, new employees are given an orientation to the Shelter's rules and regulations and then required to spend three shifts with an experienced worker to learn the ropes.

The two shelters assessed as having achieved the Repeatable level of process maturity had the most mature training processes. Shelter D has an orientation for new employees lasting from two to three days, and conducts a formal "in-service" training program in conjunction with the last staff meeting of each month. The management of Shelter H does not provide training for its staff internally, but systematically ensures that staff attend external training sessions.

Based on the evidence collected during the nine site visits, this study concludes that many homeless shelters *do not* have an existing training process in place through which the training required by the proposed rule could be provided.

Shelter Record Keeping Processes

In contrast to the above discussion of training processes, the issue regarding shelter recordkeeping is not whether the processes exist or not. The issue is rather the maturity of the recordkeeping processes. Recordkeeping consists of two distinct elements: record creation and record retention. Each of those elements is examined in turn.

Record creation is an immature process at most of the shelter sites visited. The immaturity of these processes is most evident in the shelters' creation of client records. Although many of the sites visited use templates or pre-printed forms to collect client records, no shelter has written procedures for using those forms. When the authors examined client records at various sites, data was often missing or recorded inconsistently. At one shelter, the authors attempted to "reconstruct" or "verify" a summary of client data (the number of bed-nights provided in a week) from the source client records and were unable to do so due to illegible and missing data in the source records. The use of computer database programs at two shelters did not improve the consistency of the client record creation at those shelters; as before, there are not procedures on how to complete the input screens. At Shelter I, for example, the authors were told that a resident's medical condition was sometimes recorded in the free form "comments" field of a client's record, but not always.

The most vivid image of immature client recordkeeping taken by the authors from the site visits was of a desk drawer filled with yellow legal pads. The legal pads were covered, page after page, with names and dates and numbers that purported to represent client stays during this calendar year.

These observations regarding client recordkeeping are important because, for the shelters visited, client recordkeeping is one of the highest priority administrative processes. Client records are almost universally the basis of some remuneration. In Detroit, client records are directly the basis of the per-bed-night reimbursement funded by the State of Michigan. At Shelter F, client records form the basis of statistics reported to grantors and other funding sources. At Shelter I, client records are the basis of collecting nightly fees from the residents themselves. It is unreasonable to expect that the

recordkeeping required by the proposed rule will be more mature than client recordkeeping at these shelters.

The second element of recordkeeping is record retention. Two of the shelter sites visited exhibited a higher level of maturity in both record creation and record retention. The pastor at Shelter A commented that he had time records for all of the volunteers who had worked at his shelter "back to 1993." The shelter director of Shelter H described how her staff boxed client records by fiscal year and then "kept them forever." Such comments are evidence of more mature recordkeeping processes.

Based on the maturity of the client recordkeeping processes observed, this study concludes that the recordkeeping processes of many homeless shelter are not capable of fulfilling the proposed rule's recordkeeping requirements. Those processes have not achieved the required level of process maturity.

SECTION 5: EXISTING MEDICAL SCREENING PRACTICES AND PAST TB EXPERIENCE

The past experience of homeless shelters with TB was examined for this project from three perspectives. First, past shelter experiences with TB identification programs were reviewed. The intent was to discover aspects of a program that were more or less burdensome, as well as more or less effective from the perspective of the shelter. Second, past shelter experience with persons having active infectious TB, or with persons manifesting the signs and symptoms of active infectious TB, were examined. The purpose was to gain insight into the extent to which, if at all, shelters have historically been able to identify actual or suspected cases of active infectious TB. Finally, existing shelter medical screening practices that might constitute compliance with the proposed OSHA TB standard, or some component(s) thereof, were identified. The more that shelters currently do that represent compliance, the fewer changes that would be needed in response to a new OSHA standard.

Past Shelter Experience with TB

Even though research has found the incidence of TB to be disproportionately high in the homeless population, the routine testing or screening for TB among homeless shelter guests ranged from the mandatory to the non-existent. As has been found generally throughout this report, however, distinctions must be drawn between "case management" and "non-case management" shelters as described above.

This study found that neither case management nor non-case management shelters routinely, periodically or systematically screen for the clinical signs and symptoms of TB outside of including TB as part of a more generalized medical screening process. As a result, the nine site visits performed for this study revealed that: (1) shelters had no specific experience with identified active infectious TB amongst either workers or guests; and (2) shelters had no recollection, and certainly no records, of shelter guests who may have had any *one* clinical sign or symptom of active infectious TB let alone some combination of signs or symptoms.

Past Experience with TB Identification Programs

The past experience with TB testing programs was divided into programs that test for TB within the worker population and programs that test for TB within the homeless population. Each will be examined separately.

Testing in the Homeless Population

Testing for TB in the homeless population is more prevalent and more systematic within shelters that provide case management than within shelters that do not. This report has previously found that the no case management shelters are overnight shelters.

Non-Case Management Shelters

The overnight shelters visited for this study did not provide routine, systematic screening of shelter guests for TB. This finding is consistent with the discussion elsewhere in this report about the role of "observation" in screening for TB in overnight (non-case-management) shelters.

One shelter administrator described why the workers at that shelter do not screen for TB on a night-to-night basis. According to this administrator, guests were in the shelter for a *maximum* of only 12 hours per stay. During that time period, the shelter guests spent from seven to eight hours sleeping with the lights out. The nature of the shelter, the administrator said, thus did not lend itself to observing guests for the clinical signs and symptoms of TB.

A second shelter director spoke, as well, of the lack of opportunity to observe shelter guests. In this shelter, guests were not provided free or unstructured time before "lights out." According to the shelter administrator, the shelter's activities provide "no opportunity for observation except during chapel and dining." Even then, the administrator said, the shelter workers do not have training in how, or what, to watch for with respect to the clinical signs of TB.

The same was true for yet a third shelter. In this shelter, shelter doors were opened for admission beginning at roughly 6:00 in the evening. The intake process involved a few moments with a separate person respectively staffing the intake desk, assignment to a bed, and a required shower. After the shower, guests were expected to return to their beds. The shelter had a 10:00 p.m. "lights out" policy.

In light of this inability to provide systematic screening, overnight shelters have implemented *ad hoc* "screening" systems. One shelter administrator said that shelter workers rely on other shelter guests for medical observations. Perhaps contrary to popular stereotype, he said, the persons using the shelter are part of a "community" of sorts. "If someone is *really* sick," he said, "someone else in the community will speak up" and ask that medical attention be provided. Another shelter records the medications that a shelter resident is taking. Medications directed toward treatment of TB will be evident, she said.

This study concludes that systematic screening for TB is virtually non-existent at present in overnight shelters.

Case Management Shelters

Among the nine shelters visited for this study, case management shelters presented more extensive, though still extremely limited, TB testing experience within the homeless population. Shelter H was the only shelter that had prior experience with a specific *stand-alone* TB testing program for their homeless population. According to shelter officials, Shelter H had an operating arrangement with a local hospital for routine testing of shelter guests.⁴⁴

⁴⁴ Shelter H is a long-term shelter facility. Guests stay for up to 12 weeks.

Despite the lack of operational problems, that TB testing program was discontinued. Three reasons were cited for the lapse of the program. First, the testing had been provided by a local hospital under specific grant funding received *by the hospital* for that purpose. When the hospital's funding source disappeared, the hospital was unwilling to continue providing such services.⁴⁵ Second, the program was further jeopardized by the loss of staff at the shelter's *parent* institution. The parent institution faced a situation where it changed both its Executive Director and its Director of Residential Services (who oversees all of the parent institution's homeless shelters in the metropolitan area) at the same time. Given that staff change, according to shelter administrators, Shelter H simply did not have the administrative capacity to maintain the TB testing program. Finally, at the same time the first two disruptions were occurring, the parent institution was downsizing its entire operations to eliminate non-solvent (non-shelter) programs. This process of restructuring the institution as a whole did not allow the internal time and resources to be devoted to maintaining the TB testing program.

Shelter H presents circumstances that, at least amongst the nine shelters visited for this study, were the most ideal for implementing a TB screening program for shelter guests. The parent institution of Shelter H is a recognized major local institution capable of negotiating with local health care providers. It has a dedicated administrative staff whose job might include arranging and maintaining external relationships. Shelter H is a long-term shelter facility, where the time exists in a guest's period of stay to work with those guests to address their needs by arranging and monitoring services that are more holistic than simply providing a roof for the night. Moreover, Shelter H operates a medical screening program as a condition of stay for its shelter guests.

Despite these positive circumstances, the experience of Shelter H provides important lessons with respect to TB testing programs directed toward homeless shelter residents. First, despite an extended stay at Shelter H, and despite the presence of multiple "counselors" with a high counselor-to-guest ratio, Shelter H decided it was best for the TB testing to be at a medical facility. This decision was not driven by the lack of time or personnel, but rather by the expertise available at a medical facility not available on staff.

Second, even in these best of administrative circumstances,⁴⁶ the viability of the Shelter H TB screening program was contingent upon factors outside of the shelter's control. The loss of funding which led to the discontinuance of the program was not the loss of shelter funding, but the loss of funding *by the hospital providing the screening*. In addition, a TB screening program within a homeless shelter that is but one program within an institution offering multiple programs is affected by the exigencies of the

⁴⁵ It should be noted that the disappearance of TB prevention services offered by local hospitals and health care facilities is a common concern expressed about increasing health care competition and increasing health care mergers promote cost-cutting efficiencies. See generally, Jerome Kassirer, "Our Ailing Public Hospitals--Cure Them or Lose Them?," *New England Journal of Medicine* 333:1348-1349 (November 16, 1995), citing, Chris Burch, et al., eds, *Preserving Access in the Era of Reform: America's Urban Health Safety Net*, National Association of Public Hospitals: Washington D.C. (1994).

⁴⁶ Again, these circumstances are relative to other shelters visited.

larger institution. The loss of the TB screening program at Shelter H was attributable, in part, to funding losses and administrative restructuring in the non-shelter aspects of the agency.⁴⁷

In the absence of the stand-alone TB testing program through the local hospital, Shelter H retains a more limited TB control strategy. The Shelter H policy states: "Residents who exhibit symptoms [of active TB] will be referred to a medical facility for TB testing. If positive, Shelter staff will follow directions of the health department in terms of treatment and continued residence at the shelter."

In contrast to the abandoned stand-alone TB testing program at Shelter H, Shelter D tests every resident for TB. Shelter D requires guests, as part of the check-in process, to receive a comprehensive medical examination at a local hospital. In addition, Shelter D requires a release from the guest to receive prior medical information about the guest. This initial medical examination tests for TB, with the results reported to the shelter (both positive tests for TB infection (said to be "not uncommon") and the discovery of active infectious TB (which has never happened). The shelter participates in the treatment process if a person is provided medication in response to a positive test.

Shelter E's TB screening is not as formalized. At Shelter E, an outside nurse visits the shelter twice a week to provide a "mini-health screening" to shelter guests. This health screening includes a screening for TB using the Center for Disease Control (CDC) screening criteria. Shelter officials stated that while participating in the mini-health screening was "voluntary" on the part of shelter guests, guests were "expected" to do so. They reported that "all or most" of their guests receive a TB screening in this fashion.

The mini-health screening provided to Shelter E is done through a local program funded by the United Way. That program operates with donated medical (doctor and nursing) care and donated drugs. The program provides free medical screening to homeless persons. Shelter officials indicated, for example, that the same nurse who visits the shelter twice a week also visits the local soup kitchen twice a week to provide mini-health screening through the same program. If a significant medical problem is discovered through the mini-health screen, persons are treated at the local public hospital. The shelter is uninvolved with that treatment.

Finally, Shelter C does not screen residents for suspected TB. If shelter staff learn a resident has a TB infection, however, they will participate in the treatment by helping the resident stay on the required medications. Indeed, a resident's refusal or failure to take necessary medications or treatment, the shelter administrators said, would be grounds for eviction.

Non-Shelter Screening

⁴⁷ Though not said explicitly, the message provided by Shelter H administrators was that the local hospital lost its funding to provide the TB screening program to Shelter H residents and the shelter lacked the funding and administrative capacity to develop alternatives responding to this loss, given the other needs of the overall institution at the same time.

One common attribute of medical screening programs at the homeless shelters visited was their tie into community health programs that provide periodic, albeit infrequent, on-site health screenings (including TB screenings). Shelter H, for example, reported an association with Health Care for the Homeless (HCH) and the Visiting Nurses Association.

Similarly, Shelter G provides an annual "medical fair" at the shelter. At that fair, a volunteer doctor provides a medical examination to all shelter residents, including "all sorts of tests." The shelter administrator, however, could not say specifically *which* tests were given. The fair has been held at the shelter for three consecutive years.

Similarly, Shelter I reported that it has a working relationship with the local Health Care for the Homeless program. If HCH finds in its program service delivery that a homeless person has active infectious TB, it will contact Shelter I. In that situation, the shelter will isolate the shelter guest in an unused area of the shelter and contact emergency service personnel through 911. Shelter A also relies on this third party notice. This shelter has a pharmacy operating on the first floor of the building in which the shelter operates. According to the shelter worker, if a shelter resident fills a prescription for TB medication, the shelter will be informed of that fact.

Table 16
TB Screening Procedures for Homeless Shelter Guests

Shelter	Shelter Type	Screening Procedure
1	Case management	None
2	Overnight	None
3	Overnight	None
4	Case management	None
5	Case management	None
6	Case management	Mandatory medical examination
7	Case management	Voluntary, but "expected" general medical screening
8	Overnight	None
9	Overnight	None

Testing in the Worker Population

TB testing in the worker population among the nine site shelters visited for this study was considered from two perspectives: (1) whether shelters routinely tested for TB as a condition of employment; and (2) whether shelters routinely provided (or required) periodic TB tests during the period of employment.

The most sophisticated employee TB testing program found within the nine homeless shelters visited had been implemented by Shelter H. Shelter H has adopted a specific "tuberculosis prevention plan" as part of its employee manual.⁴⁸ This Plan explicitly commits Shelter H to "comply with federal, state and local guidelines for preventing the transmission of TB." The Plan commits Shelter H to designating "a staff person at each shelter as TB Coordinator for the facility." This coordinator "is responsible for implementation of the TB Prevention Plan, including: training, testing and maintenance of reports for the [State] Occupational Safety and Health Administration."

Shelter H has adopted an employee testing program. The TB Prevention Plan states unequivocally that:

the testing of [Shelter] staff is a condition of employment. Applicants declining to be tested will not be hired. Current staff will be informed that annual testing is a condition of employment and that anyone declining to be tested will be suspended without pay until the test is done.

The Shelter H plan provides that staff members found to have "confirmed TB" will be put on leave immediately while being given treatment and allowed to return to work only when it is deemed safe by the health department.⁴⁹

Shelter F, too, has a requirement that its paid workers have a pre-employment TB screen as well as an annual screen before every season.⁵⁰ Unlike Shelter H, however, Shelter F simply "expects" its workers to have such a test at the nearby public hospital (the shelter does not provide private health insurance allowing for a private medical facility to perform the TB test). The policy, shelter workers concede, is observed in the breach. No enforcement mechanism is in place. Shelter F does not require tests of volunteers and does not ask whether volunteers have received a TB test.

Toward the other end of the continuum is Shelter C. According to the shelter director, while not required by shelter policy, the small staff all take free public TB screening tests each year. While the

⁴⁸ The TB Prevention Plan at Shelter H was part of the agency's more comprehensive Health and Safety Plan, which addresses all aspects of institutional operation.

⁴⁹ Leave includes all paid and unpaid leave up to the limits of the federal Family Medical Leave Act. Additional unpaid leave *may* be provided at the discretion of the shelter's Director of Residential Services, with the approval of the parent institution's Executive Director.

⁵⁰ Shelter F is only open during the winter season.

Health Department will notify the shelter of the presence of active TB disease (which has never happened), it does not inform the shelter of positive tests. Similarly, Shelter E does not require periodic TB tests for its employees. When a new employee is hired, the employee is encouraged to have a TB screen through a public health program.

Table 17
TB Screening Procedures for Homeless Shelter Employees

Shelter	Required Pre-Employment Test	Required Periodic Test
A	No employees: all volunteers	
B	Yes (by parent organization)	Yes (by parent organization)
C	No	No
D	Yes	3 years
E	Yes	6 months
F	Yes, but observed in breach	Yes, but observed in breach
G	No	No
H	Yes	Annual
I	No	No

Past Experience with Identifying the Signs and Symptoms of TB

This study specifically and explicitly considered the extent to which homeless shelters identify shelter guests as being suspected of having active infectious TB. This inquiry was designed to consider actual, *existing* shelter practices, rather than to determine the operational feasibility of the proposed OSHA standard. The intent behind the inquiry, also, was to develop some estimate of the number of homeless shelter guests having any one, or particular combinations of, the clinical signs and symptoms of active infectious TB. Shelters were told:

The overall objective of the following questions is to develop a picture of the prevalence of past occupational exposure to TB within homeless shelters. The purpose of the section is to obtain insights into the extent of the risk, the source of the risk, and the workers placed at risk. The section will also . . . elicit data on the extent to which homeless shelter residents would be identified as "suspect cases" through application of the clinical symptoms included in the proposed OSHA standard.

The inquiry was basically two-fold: (1) do you, formally or informally, screen shelter workers for designated signs and symptoms of active infectious TB; and (2) if so, what is the prevalence of these specific signs and symptoms.

Specifically, shelters were asked whether they screened for any one or more of the following symptoms: (1) persistent cough; (2) bloody sputum; (3) night sweats; (4) loss of appetite / skip meals; (5) weight loss; and (6) fever.

Seven of the nine shelters indicated that they did not screen for such symptoms and did not have records or recollections of the prevalence of such symptoms. (One shelter noted, however, that cough drops was one of the most common "toiletries" provided to shelter guests.) Eight of the nine shelters indicated that they did not screen for any combination of symptoms and had no records or recollection of their prevalence. The shelter indicating that it screened for symptoms was described in detail above, with a volunteer nurse visiting the shelter twice a week through a United Way-funded program to provide "mini-health screens" including screens for CDC TB symptoms.

Despite this lack of screening, shelters did not report a substantial experience with active infectious TB within their workers. No shelter reported having had a staffperson develop active infectious TB. Four shelters reported having at least one staffperson experience a positive TB skin test; two, however, reported those tests as occurring at the time of hiring. One shelter relies entirely upon volunteers and did not report data.

The reported experience with TB among shelter guests was similarly limited. Six of the eight shelters with paid employees said that they had no knowledge of the incidence of positive TB skin tests within their shelter population. Another reported, however, that positive skin tests were "not uncommon." Four of the eight shelters also reported that they had no knowledge of the incidence of active infectious TB within their homeless population. Three others reported a zero incidence. One other recounted a case "several years ago." The shelter which requires guests to take medical examinations reported that, while the guest had responded "no" to questions designed to solicit information about whether she might have TB, a medical examination confirmed that she had the active disease. That guest was referred to a local medical clinic and the shelter had no further contact with her.

This study concludes that existing homeless shelter procedures do not exist to screen guests for the signs and symptoms for active infectious TB. Because of the lack of shelter data, accompanied by the inability to generate reliable data through a medical questionnaire, it is not possible to reach conclusions about the prevalence of active infectious TB within homeless shelters or the signs and symptoms that are most accurate to signal the disease. The study further concludes that, while, as always, it is not possible to generalize based on only nine site visits, it is significant the shelter that reported homeless shelter guests with positive skin tests as being "not uncommon" was the shelter requiring mandatory medical examinations as part of the intake process. Moreover, the shelter that identified a guest as having active infectious TB despite the guest's negative responses to questions designed to elicit such information was the shelter which provides regular systematic medical screens to its guests and

workers. The shelter that identified a guest as having active infectious TB several years ago is the shelter which, at the time, engaged in an active TB identification program with a local public hospital.

Existing Exposure Control Plans

None of the nine shelters visited for this study had a formal TB exposure control plan. Nor had these shelters engaged in any of the component activities which would comprise such an exposure control plan under the proposed OSHA standard. Recordkeeping and staff training activities are discussed in the Section above discussing administrative and support processes.

For example, shelters were asked the following questions about current practices that could be considered complete or partial compliance with the proposed OSHA standard, with the following responses:

1. Has your shelter identified the day-to-day tasks where your workers might have a high risk of exposure to tuberculosis? Eight shelter answered "no," with the others not responding or responding that they didn't know.
2. Has your shelter identified specific workers who might be exposed to tuberculosis in the performance of their tasks? Eight shelters answered "no," with the other not responding or responding that they didn't know.
3. Have you installed any new equipment, rearranged any rooms, made any capital improvements or made any other physical change? Seven shelters answered "no," with two not responding or responding that they didn't know.
4. Does your shelter have a formal written procedure to identify clients with suspected tuberculosis as part of its intake process? Six shelters answered "no," with one not responding or responding that they didn't know. (The process of one shelter, testing for TB as part of an initial comprehensive medical examination required during the intake process, was described in detail above.)
5. Have you identified a place in your shelter's facility to isolate persons who have either suspected or confirmed tuberculosis? Five shelters responded "no" with three not responding. One shelter identified a place in the shelter where persons with suspected active infectious TB could be isolated.
6. Has your shelter committed to writing the steps it takes to control the exposure of its workers to tuberculosis? Eight shelters responded "no," with one not responding or responding that they didn't know.

Non-TB Medical Emergency Procedures

Apart from TB screening or treatment in particular, shelters were asked about their policies regarding the management of emergency medical situations for guests. While nearly universally, the nine shelters visited did not have established procedures for dealing with medical emergencies at the shelter, most articulated an informal policy. Only one of the shelters had a pre-established arrangement with a health care facility to provide emergency medical care. Shelter E had an arrangement with two local hospitals --not public hospitals-- that had specifically agreed to provide emergency care to indigent persons, including residents of the shelter. Shelter E would provide transportation in one of three ways: (1) by providing cab fare or a bus token; or (2) by calling 911; or (3) by transporting the shelter guest in an employee's or volunteer's automobile. Shelter management emphasized, however, that while not *a priori* ruled out, the option of using private transportation through an employee or volunteer was discouraged due to concerns over safety.

Two shelters had a specific policy *disallowing* the use of shelter employees or volunteers for transportation in emergency medical situations. Shelter H will call and pay for a taxi, but does not allow private transportation. Shelter C will call 911, but by policy, will not allow workers to transport shelter guests in medical emergencies. The majority of the nine shelters simply did not have a policy addressing medical emergencies. Shelters A, B and D indicated that they would send shelter guests to nearby public hospitals using shelter workers as the means of transportation. Shelters F, G and I indicated that they would send medical emergencies to local public hospitals. They either did not specify the means of transportation, if any, or they indicated that they would simply call 911.

All nine shelters affirmatively indicated that they had no role in arranging for payment of emergency transportation (other than an occasional cab or bus fare) and no role in paying for (or in arranging payment for) the emergency medical care.

SECTION 6: VOLUNTEERS

Overview

In connection with the proposed occupational exposure to tuberculosis and its application in homeless shelters, OSHA asked that this study evaluate the impact of its standard on volunteers. OSHA estimates that more than five million U.S. workers are exposed to TB in the course of their work. The risk confronting these workers as a result of their contact with TB-infected individuals may be as high as ten times the risk to the general population. The Centers for Disease Control estimate the prevalence of TB within homeless shelters, in particular, to be 150 to 300 times the nationwide prevalence rate.

OSHA is interested in the extent to which "volunteers" working in homeless shelters are extended protections against occupational exposure to TB. The federal OSHA statute applies only to "employees." Since one necessary element of being an "employee" under the federal OSHA statute is the receipt of wages, the OSHA regulations do not protect uncompensated workers. Accordingly, this analysis examines the extent to which *state* law extends occupational health and safety protections to volunteers.

This analysis begins with the observation that state occupational health and safety protections can extend protections to volunteers in any one of three ways: (1) by explicitly extending occupational safety standards to volunteers by operation of state statute; (2) by explicitly extending occupational safety standards to volunteers by operation of state agency regulation; or (3) by extending occupational safety standards to volunteers by operation of judicial or regulatory case law.

Adoption by Reference and Extension by State Statute or Regulation.

The easiest way to determine whether states explicitly extend occupational health and safety protections to volunteers by state statute or agency regulation is to inquire of state occupational health and safety administrators.⁵¹ The authors inquired of each state OSHA administrator⁵² whether his or her jurisdiction extends occupational health and safety protections to "volunteers." If so, administrators were asked whether such extension was accomplished by state statute or by state agency regulation.

The results are presented in Table 18. As this table shows, few states explicitly extend occupational safety standards to volunteers.⁵³ Of the 45 states that responded to a request for information, only

⁵¹ Enforcement, of course, is the key. Irrespective of what state statute and regulations say, whether the state agency charged with administering the statutory scheme either does or does not enforce protections for volunteers drives the extent to which volunteers derive protection.

⁵² Throughout this discussion, the term "state" is defined to include the District of Columbia.

⁵³ For purposes here, "volunteers" were defined to exclude volunteer firefighters and ambulance/emergency medical services volunteers, who are frequently extended special protections.

eleven replied that volunteers were entitled to workplace safety protections. Blanks represent a failure of the state to provide information.

State Law Protection of "Volunteers" Independent of Federal OSHA Standards.

Many states extend occupational health and safety protections to "volunteers" without any explicit reference to federal OSHA standards. In this sense, the term "volunteers" should be used with care. In the workplace safety arena, the term is not always used in its popular meaning. While some states hold simply that "volunteers" should be extended the same occupational safety protections as paid employees, other states hold that while occupational safety standards do not cover "volunteers," the term "volunteer" does not cover all unpaid workers. In some states, an individual who is working without compensation may be deemed a "gratuitous employee." In other states, such a worker might be classified as a "frequenter." In yet other states, workplace safety protections are extended to "business invitees." In each of these instances, work place safety protections may apply. The various results are discussed below.

Table 19 provides a state-by-state analysis of whether uncompensated workers are provided occupational health and safety protections and, if so, under what theory. A blank for any given state should not be construed to mean that volunteers are not covered. It may mean instead that the law is either not settled or could not be determined. Where the law specifically denies occupational safety protections to volunteers, that is specifically stated.

Table 18
Does State Explicitly Extend Federal OSHA Standards
to Volunteers by State Statute or Regulation?⁵⁴

Does State Explicitly Extend Federal OSHA Standards to Volunteers by State Statute or Regulation?	
State	Cover Volunteers
Alabama	No
Alaska	No
Arizona	Yes
Arkansas	No
California	No
Colorado	Yes
Connecticut	
Delaware	
D.C.	
Florida	
Georgia	No
Hawaii	Yes

⁵⁴ Excludes volunteer firefighters and emergency medical personnel.

Does State Explicitly Extend Federal OSHA Standards to Volunteers by State Statute or Regulation?	
State	Cover Volunteers
Idaho	No
Illinois	Yes
Indiana	No
Iowa	
Kansas	Yes
Kentucky	
Louisiana	No
Maine	
Maryland	No
Massachusetts	No
Michigan	Yes
Minnesota	No
Mississippi	No
Missouri	No
Montana	No
Nebraska	Yes

Does State Explicitly Extend Federal OSHA Standards to Volunteers by State Statute or Regulation?	
State	Cover Volunteers
Nevada	Yes
New Hampshire	No
New Jersey	No
New Mexico	No
New York	Limited
North Carolina	No
North Dakota	No
Ohio	No
Oklahoma	No
Oregon	No
Pennsylvania	
Rhode Island	No
South Carolina	Yes in some cases
South Dakota	No
Tennessee	
Texas	No

Does State Explicitly Extend Federal OSHA Standards to Volunteers by State Statute or Regulation?	
State	Cover Volunteers
Utah	
Vermont	No
Virginia	No
Washington	Mixed
West Virginia	No
Wisconsin	No
Wyoming	No

Table 19
Does Duty to Provide Safe Place to Work Extend to Uncompensated Worker
Pursuant to State Case Law

Does Duty to Provide Safe Place to Work Extend to Uncompensated Worker Pursuant to State Case Law		
State	Cover Volunteers	Reason/Theory
Alabama		
Alaska		
Arizona	Yes	Gratuitous employee
Arkansas		
California	Yes	Gratuitous employee.
Colorado	Yes	Gratuitous employee.
Connecticut	Yes	Business invitee.
Delaware	Yes	At a minimum, a "volunteer" is a "business invitee" (implicitly recognizes status of "gratuitous employee" as well).
D.C.		
Florida		
Georgia	Yes	Without using the "business invitee" terminology, this state adopts reasoning similar to that of a "business invitee."
Hawaii		
Idaho		

Does Duty to Provide Safe Place to Work Extend to Uncompensated Worker Pursuant to State Case Law		
State	Cover Volunteers	Reason/Theory
Illinois	Probably	Business invitee.
Indiana		
Iowa	Probably	Although not in work place safety case, court recognized "gratuitous employee" concept.
Kansas	Probably	Although not in work place safety case, court recognized "gratuitous employee" concept.
Kentucky	Perhaps	Held in related situation that uncompensated worker is not a "volunteer" if working at something in which he/she has an interest.
Louisiana		
Maine	Yes	Gratuitous employee
Maryland		
Massachusetts	Yes	Workplace protections extend to all volunteers.
Michigan	Yes	Person who has interest in work not a "volunteer." In addition, statutory definition of "employee" does not require payment of wages.
Minnesota	Yes	
Mississippi		
Missouri	Probably	Fact that uncompensated worker is working at request of employer takes case out of rule that "volunteer" not entitled to workplace protection.
Montana	Probably	Recognizes category of "gratuitous employee" in non-work place safety case.

Does Duty to Provide Safe Place to Work Extend to Uncompensated Worker
Pursuant to State Case Law

State	Cover Volunteers	Reason/Theory
Nebraska	Yes	Refused to recognize "gratuitous employee." However, has concept in nature of "frequenter" concept.
Nevada	Yes	Sounds like "business invitee," but does not explicitly rely on "business invitee."
New Hampshire		
New Jersey		
New Mexico		
New York	No	State "frequenter" statute does not extend to volunteers.
North Carolina		
North Dakota	Yes	Gratuitous employee.
Ohio		
Oklahoma		
Oregon	Yes	Sounding in gratuitous employee reasoning, though not using that term.
Pennsylvania		
Rhode Island		
South Carolina	Yes	Gratuitous servant.
South Dakota	Yes	Gratuitous employee.

Does Duty to Provide Safe Place to Work Extend to Uncompensated Worker
Pursuant to State Case Law

State	Cover Volunteers	Reason/Theory
Tennessee		
Texas	Probably	Agency law (which underlies gratuitous employee concept-ms) calls for safe work place.
Utah		
Vermont		
Virginia		
Washington	Yes	Business invitee.
West Virginia	Yes	Frequenter statute; In addition, recognizes a doctrine of "employment without compensation."
Wisconsin	Yes	Frequenter statute.
Wyoming		

Overview

In assessing the safe work place obligations of employers toward unpaid workers, it is necessary first to recognize that the term "volunteer" is not a label, but a conclusion. It is generally recognized that "no definition of a volunteer can be given without qualification, since each case must be decided on its own merits."⁵⁵ The rule is stated that under the various definitions of "volunteer" adopted by the courts, "a person who, although not obliged to do an act, yet has an interest in doing it, is not necessarily a volunteer."⁵⁶

The specific application of this general rule to workplace safety protections is described further below.

Gratuitous Employees

Unpaid workers who are not "volunteers" but "gratuitous employees" are entitled to workplace health and safety protections in many states. The rule is stated:

The duties required by law of an employer with respect to its employees are generally not owed by the employer to a person whom the employer has not authorized to render services as an employee. . .[However] one who performs services gratuitously may be deemed not a volunteer, but rather a gratuitous employee, where he submits himself to the direction and control of the one for whom the services are performed; the primary purpose of the acts undertaken is to serve another; and the person performing the work has some interest therein.⁵⁷

An example helps to illustrate the difference between a "volunteer" and a "gratuitous employee." If a parishioner agrees, without pay, to come to the church on a Sunday afternoon to help cut down a tree, he or she is a "volunteer." If, in contrast, the parishioner agrees, without pay, to come to the church four days a week from 10:00 to 2:00 to help do office work, he or she is a "gratuitous employee."⁵⁸

Arizona case law recognizes an employment status of "gratuitous employee." Under this doctrine, a person may have the status of an employee even though he performs

⁵⁵ 92 Corpus Juris Secundum, at 1032 ("volunteer") (citations omitted) (1955).

⁵⁶ 92 Corpus Juris Secundum, at 1032 ("volunteer") (citations omitted) (1955).

⁵⁷ 27 Am.Jur.2d, Employment Relationship, sec. 282 ("Generally; volunteers and gratuitous employees"). (1996).

⁵⁸ Compare, Cottram v. First Baptist Church, 756 F.Supp. 1453 (D.C. Colo.), aff'd without opinion, 962 F.2d 17 (10th Cir. 1992) with Vickers v. Gercke, 86 Ariz. 75, 78, 340 P.2d 987, 990 (1959). See generally, Christenson, "The Legal Definition of a 'Volunteer'," Voluntary Action Leadership, at 17-18 (Fall 1982) (distinguishing between a "pure volunteer"--one who assists in work in which she has no interest and from which she expects no reward--and a "gratuitous employee"--one who serves on an ongoing basis without pay).

services without compensation. The status is achieved when the employee submits himself to the direction and control of the person for whom service is performed and when the employee's acts are done primarily for the purpose of serving the person exercising control.⁵⁹

One legal encyclopedia reports that "whether a gratuitous undertaking is part of a master and servant relationship is determined by two key elements: has the actor submitted himself to the direction and control of the one for whom the service is done, and was the primary purpose underlying the act to serve another."⁶⁰

It has been said that the right to control the person's conduct is the key element in the determination of whether there is an employment relationship. Another factor to be considered is the right of the "employer" to select (or to dismiss) the worker.⁶¹ For example, though nominally a "volunteer," a minister was covered by fair wage laws as an "employee" of a religious organization where the organization supervised, could terminate, set compensation for, and provided insurance for the minister.⁶² Other key factors that are considered involve the right to replace the volunteer as well as a determination of whether the volunteer is doing work that, but for the volunteer, would be performed by a paid employee.⁶³

⁵⁹ W. John Thomas, "Preventing Non-Profit Profiteering: Regulating Religious Cult Employment Practices," 23 Arizona Law Review 1003, 1004 (1981). This law towards "volunteers" is neither recent nor revolutionary. See generally, William Prosser, "Business Visitors and Invitees," 26 Minnesota L.Rev. 573 (1942).

"If the benefit is given (by an unpaid worker) without such expectation (of a return) induced, as in the case of volunteer assistance, it is held very generally that the volunteer is not entitled to protection. It is only where such assistance is rendered under such circumstances which indicate that the plaintiff is accepted on the footing of a gratuitous servant, and so implied assured that he will be protected, or where he has some other reason to expect protection in return, that he is regarded as more than a licensee." Prosser, *supra*, at 607.

⁶⁰ 30 Corpus Juris Secundum, Sec. 192(c) ("Employer-employee, When relationship exists in general, payment for services") (1992).

⁶¹ 27 Am.Jur.2d sec. 1 ("Employment and employment relationship") (1996).

⁶² McClure v. Salvation Army, 460 F.2d 553 (5th Circ. 1972), cert. denied, 409 U.S. 896 (1972); see also, Malloy v. Fong, 37 Cal.2d 356, 232 P.2d 241 (1951) (a volunteer minister, whose automobile caused an accident, to be a subagent of the general charitable organization, making that charity liable under respondeat superior, where the volunteer had been appointed to his position by a paid minister of a branch church of the charity, and where the paid minister closely supervised the volunteer's work. In so holding, the court stated that all that was needed to indicate a proper agency relationship, so as to justify liability, was acceptance of the relation between the volunteer and the paid agent of the charity, where the one performing the volunteer work for the other accepted that work, and where the work was performed under his direction).

⁶³ See e.g., Cottam v. First Baptist Church of Boulder, 756 F.Supp. 1433, 1438 (D.C. Colo. 1991) ("This Court agreed with the court in Davis, 109 S.E.2d at 149-50, regarding the elements to consider in determining whether a master/servant relationship exists. These elements are: (1) the selection and engagement of the servant, (2) the payment of wages, (3) the power of dismissal, and (4) the power of control of the servant's actions. Where all these elements co-exist, a person is

In other circumstances, a "gratuitous employee" was defined simply as "a person who performs services without consideration at the express or implied request of another."⁶⁴

The determination of whether a person is a "volunteer" or a "gratuitous employee" is significant from the perspective of providing safe work places. The general rule is that "a person who voluntarily assumes to act as the servant of another cannot recover for personal injuries as a servant, but the rule is otherwise where he acts as a 'gratuitous employee' rather than a mere volunteer."⁶⁵

As explained above, the jurisdictions extending workplace safety protections to "gratuitous employees" are noted in Table 19.

"Frequentener" Statutes

In contrast to "gratuitous employee" jurisdictions, some states extend work place safety protections to "frequenters." The term "frequentener," for example, is defined in Section 101.01(2)(e) of Wisconsin statutes as "every person, other than an employee, who may go in or be in a place of employment or public building under circumstances which render such person other than a trespasser."

The West Virginia "frequentener" statute closely tracks the Wisconsin law in many respects:

The statutorily-imposed duties *to furnish a safe place of employment to employees and frequenters* have not yet been the subject of employer liability in the context of the employment of drug-impaired employees. However, the potential application of such statutes was recently made apparent in a federal district court opinion.⁶⁶ In its decision, the court found that an employer's disclosure of an employee's mental condition was justified, in part, by the fact that *the employe(e) presented a dangerous condition in its work place within the meaning of West Virginia's safe-place statute.*⁶⁷ (emphasis added).

a servant and the person who engaged his services is a master. This Court agreed that the power of control is the most significant of these elements.").

⁶⁴ 30 Corpus Juris Secundum, sec. 3(b) ("Employer-employee, employer and employee, definition") (1992), citing *Milbank Mutual Insurance Company v. Dairyland Insurance Company*, 373 N.W.2d 888 (N.D. 1985).

⁶⁵ 30 Corpus Juris Secundum, sec. 16 ("Employers' liability: volunteers") (1992).

⁶⁶ West Virginia's "safe-place" statute, W.Va. Code, sec. 21-3-1, (1985) is identical in relevant part to Wis. Stat., sec. 101.11(1) (1983-84). But see, *Korenak v. Curative Workshop Adult Rehabilitation Center*, 71 Wis. 2d 77, 237 N.W.2d 43 (1976); *Gross v. Dennon*, 61 Wis. 2d 40, 212 N.W.2d 2 (1973) (Wis. Stat., sec. 101.11(1) applies only to unsafe physical conditions).

⁶⁷ Jennifer Adams, "At Work While 'Under the Influence': The Employer's Response to a Hazardous Condition," 70 *Marquette L.Rev.* 88, 116 (1986). (some citations omitted).

One distinction that is drawn in "frequenter" statutes, however, is between providing a "safe *place of employment*" and providing "safe employment." According to Wisconsin courts:

[T]his court [has] said: "It is apparent that 'safe employment' is broader in scope than a safe "place of employment." . . ." It is the employer's duty to supply his Employees with both a safe place of employment and with safe employment. However, the duty to furnish safe employment does not extend to frequenters.⁶⁸

The Ohio "frequenter" statute is somewhat broader. In Ohio, the duty owed to frequenters is set forth in sections 4101.11 and 4101.12 of Ohio's Revised Code. Section 4101.11 provides as follows:

Every employer shall furnish employment which is safe for the employees engaged therein, shall furnish a place of employment which shall be safe for the employees therein and for frequenters thereof, shall furnish and use safety devices and safeguards, shall adopt and use methods and processes, follow and obey orders, and prescribe hours of labor reasonably adequate to render such employment and places of employment safe, and shall do every other thing reasonably necessary to protect the life, health, safety, and welfare of such employees and frequenters.⁶⁹

In addition, 4101.12 provides that:

No employer shall require, permit, or suffer any employee to go or be in any employment or place of employment which is not safe, and no such employer shall fail to furnish, provide, and use safety devices and safeguards, or fail to obey and follow orders or to adopt and use methods and processes reasonably adequate to render such employment and place of employment safe. No employer shall fail to do every other thing reasonably necessary to protect the life, health, safety, and welfare of such employees or frequenters. No such employer or other person shall construct, occupy, or maintain any place of employment that is not safe.⁷⁰

As can be seen, uncompensated workers who work in homeless shelters may be considered "frequenters" in states that have frequenter statutes. While not employees, neither are these volunteers "trespassers."⁷¹ As a result, they are entitled to a "safe place of employment" and the shelter is required to do all that is reasonably necessary to protect their life, health, safety, and welfare.

⁶⁸ *Leitner v. Milwaukee County*, 94 Wis.2d 186, 287 N.W.2d 803, 806 (Wis. 1980) (citations omitted).

⁶⁹ Oh. Rev. Code sec. 4101.11 (1994 and 1997 supp.).

⁷⁰ Oh. Rev. Code sec. 4101.12 (1994 and 1997 supp.).

⁷¹ No discussion has been found that addresses the overlap between the concepts of "gratuitous employee" and that of "frequenter."

The jurisdictions that extend safe workplace standards to "frequenters" are noted in Table 19.

"Business Invitees"

Both the law of "gratuitous employees" and the law of "frequenters" seem to spring from the common law concept of "business invitees." Even before statutory protections were extended to non-employees, owners of work places owed a common law duty of reasonable care to these uncompensated workers. Hence, some states exist which, while not having specifically extended their law to "gratuitous employees" or to "frequenters," have nonetheless extended their protections to unpaid workers as "business invitees."

A business invitee is a person who has been solicited to come onto (or into) a workplace setting for the business benefit of the owner.⁷² Uncompensated workers have been held to be business invitees to whom a business owner owes a duty of reasonable care to protect from harm. In this sense, however, it is indeed relevant whether the worker is a "pure volunteer" or a person who, in other states, might be called a "gratuitous employee." If the individual's presence is merely permitted or borne by sufferance (rather than invited or solicited), fewer workplace safety obligations will attach.

The concept of "business invitee" is extended to uncompensated employees through operation of agency law. If the volunteer is under the direct supervision of the employer, and subject to the employer's orders, workplace safety protections will apply. Consider, for example, the Texas case of *Exxon v. Tidwell*.⁷³ While that case did not involve an unpaid worker, the reasoning of the decision closely tracks the reasoning which extends workplace safety protections to uncompensated workers. In *Tidwell*, an employee at a gasoline service station was injured while on the job. In granting the opportunity for the employee to potentially recover against the *oil company*, the Texas court began its analysis by noting that "under the principles of *agency law*, employers are responsible for providing a safe workplace to their own employees."⁷⁴ The person seeking damages in *Tidwell* was an employee of the service station, but not of the oil company.

The court noted that if the oil company undertook direct supervision and control ("to direct the details by which the results were to be accomplished"), a "master-servant" relationship would exist subject to workplace safety protections, even if no employer-employee relationship existed. A later court explained the holding of *Tidwell*, stating that:

⁷² The purpose of this analysis is not to explore the intricacies of tort distinctions between a "licensee," a "trespasser," and an "invitee." Several elements go into classifying someone as a "business invitee."

⁷³ 867 S.W.2d 19 (TX. 1993).

⁷⁴ 867 S.W.2d at 21. (emphasis added).

The [state] supreme court [in *Tidwell*] noted that relationships between oil companies and individual service station dealers typically are something more than landlord-tenant but *do not reach the level of employer-employee*, and that the relationships determine the extent of the oil companies' duty toward service station employees.

* * *

. . .the supreme court concluded that, *no matter what the relationship was between the oil company and the employee*, the true test to determine whether the oil company has a duty to maintain a safe workplace is whether the oil company reserves a right of control or exercised actual control specifically over the safety and security of the workplace.⁷⁵

Thus, the Texas courts have effectively extended workplace safety protections to persons who are not "employees" by operation of agency law, in much the same manner as protections have been extended to "gratuitous employees" in other states.⁷⁶ Unpaid workers who are invited into the workplace, and who are subject to the direction and control of the employer, will likely have workplace safety protections under agency law.⁷⁷

The states which extend workplace safety protections to unpaid workers as "business invitees" are presented in Table 19.

Protecting Volunteers as Volunteers

In some states, occupational health and safety protections do not turn on whether a "volunteer" is a mere volunteer or whether the worker falls into some other categorization. In these states, workplace protections are extended to all workers, whether compensated or otherwise. In Massachusetts, for example, the state courts have long held simply that: "Doubtless a master owes as high a duty to one who accepts without compensation or contract the position of a servant, as to an employee."⁷⁸

⁷⁵ *Brooks v. National Convenience Stores*, 897 S.W.2d 898, 902 (Tex.App. 1995), citing, *Tidwell*, supra. (emphasis added).

⁷⁶ "Gratuitous employees" are recognized under Restatement of Agency, Sec. 225, which states, "one who volunteers services without an agreement for or expectation of reward may be a servant of the one accepting such services." The comments to this section of the Restatement further qualify the general rule, indicating that the service does not need to be continuing, and that consent of the master, or manifestation of such consent, is requisite for the relationship to exist.

⁷⁷ See also, *Baxter v Morningside, Inc.*, 10 Wash. App. 893, 521 P.2d 946 (1974), 82 A.L.R.3d 1206 (the state court, while including in its test the Restatement standard, stated that where one agrees to do something for another's benefit, or submits himself to another's control, with or without expectation of reward, if the party for whom services are rendered consents to those services being performed under his direction and control, the services may be rendered within the scope of the master and servant relationship).

⁷⁸ *Lakube v. Cohen*, 304 Mass. 156, 23 N.E.2d 144, 146 (Mass. 1939). (citations omitted).

The Practical Implications of Extending Safety Protections to Volunteers.

The discussion above focuses on the question of whether states extend, by operation of law, workplace safety protections to "volunteers" either by expressly adopting OSHA standards through state statute or regulation, or by extending the requirement of a "safe work place" (or "safe work environment") to all workers, paid or unpaid. An additional operational question with which homeless shelters must grapple is, given the identification of the dangers of the occupational transmission of tuberculosis, how must those shelters act to protect volunteers irrespective of the workplace safety standards imposed by law for employees. This question differs from the question of legal occupational safety and health protections. This section addresses the issue of whether, even if the OSHA standard does *not* apply to volunteers by operation of law, homeless shelters would be likely, as a practical matter, to implement the same protections that are extended to employees.

Homeless shelters would be likely to extend workplace safety protections to volunteers for two reasons. The first involves a "management" observation. According to shelter administrators interviewed for this study, from a management perspective, it would be impossible to have two people working next to each other, maybe even doing the same task, and have one protected (because he or she is an employee) and one not (because he or she is a volunteer). If, after consulting with each other, the two decided that the protection *was* necessary, the volunteer may become alarmed and refuse to continue working without protection. If, in contrast, the two decided that the protection was *not* necessary, the employee may become careless and lax in his or her compliance with protection procedures. Either scenario is sufficiently unacceptable to an institution that the causal condition (i.e., the disparate protection) would be eliminated. A management decision would dictate that both the employee *and* the volunteer would require equal protection.

The second reason why homeless shelters would be likely to extend worker protections to volunteers is grounded in legal liability. A homeless shelter (or other institution) is likely to be held legally liable if a volunteer is infected with tuberculosis after being left unprotected in an environment known to have that hazard. The presence of the OSHA standard, while establishing no direct legal "duty" on the part of the shelter, could (and likely would) certainly be used as evidence of the standard of care that should have been offered.⁷⁹

⁷⁹ John P. Ludington, "OSHA Violation by Employer of Third Party as Providing Cause of Action for Employee," 35 A.L.R. Fed. 461 (1977); John P. Ludington, "Violation of OSHA Regulation as Affecting Tort Liability," 79 A.L.R.3d 962 (1978) ("Personal injury lawyers have been more successful in getting OSHA violations before the jury as evidence of negligence or, as sometimes stated, as evidence of the duty of care which the violator owed to a person in the plaintiff's position. This theory has been accepted by two state courts and by one Federal District Court, although it has been rejected by another Federal District Court in the same circuit"); Daniel Feld, "Admissibility in Evidence, on Issue of Negligence, of Codes or Standards of Safety Issued or Sponsored by Governmental Body or by Voluntary Association," 58 A.L.R.3d 148 (1975).

Related to the second reason, but somewhat different, is the question of the impact of insurance requirements. Under this reasoning, the issue is not "what is a shelter's liability exposure?", but rather "what does the shelter's insurance carrier *think* the liability exposure is?". The parallel is this: why do most visitors to a construction site wear hardhats? It's not because they have "occupational exposure" to the hazard of falling debris. Visitors wear hardhats on the construction site because the liability insurance carriers require it. It is reasonable to expect liability insurance carriers to require shelters to provide volunteers with the same protection from hazard as employees are provided.

In sum, whether or not "volunteers" are required to be extended workplace safety protections imposed by statute, it is reasonable to conclude that, as a practical matter, the protections required for employees will be extended to volunteers either as a managerial decision, as a response to an insurance carrier directive, or as a protection against future legal liability.

Summary and Conclusions

In sum, few states explicitly extend workplace safety protections to "volunteers" by state statute or state regulation. Of the 45 states that responded to requests for information about the coverage of volunteers, only eleven indicated that such protections applied under state law.

This explicit extension of protections, however, does not end the analysis. The term "volunteer" is conclusory in nature. When one examines the case law that applies safe workplace requirements, it becomes evident that the unpaid worker is frequently extended these requirements. The requirements may not extend to "volunteers" in these states, but "volunteer" has a specified technical meaning. Even when "volunteers" are *not* covered by safe workplace statutes, "gratuitous employees" may well be. Even when "volunteers" are not covered, "frequenters" may well be. In some instances, workplace safety protections have been extended to unpaid workers under principles of agency law.

APPENDIX A: REVISED MEDICAL SCREENING QUESTIONNAIRE

TB History (answers can be yes/no/don't know).

1. Have you ever had a TB skin test?
 - a. Have you ever had a positive skin test?
2. Have you ever had a chest x-ray?
 - a. Were you ever told the ex-ray was abnormal?
 - b. When was that x-ray taken?
3. Have you ever had mucous you cough up tested for TB?
 - a. Were you ever told a test was positive?
 - b. When was that test done?
4. Have you ever been told you have Infectious Tuberculosis?
 - a. When was that?
5. Have you ever been treated with medication for Infectious TB?
 - a. Are you still taking that medication?
 - b. Did you take all the TB medicine until the doctor said you were finished?
6. Have you ever been in close contact with someone diagnosed with TB? (for example, a roommate, close friend, or relative?)
 - a. When was that?

Current Symptoms (answers can be yes/no/don't know).

1. Do you have a cough or hack that won't go away?
 - a. How long have you had it?
2. Do you ever cough up blood or mucous in the morning?
 - a. During the day?
3. Have you lost weight in the past two months?
 - a. More than ten pounds?
 - b. Without trying to?
4. Do you have night sweats (need to change sheets or clothes because they are so wet)?

APPENDIX B: ASSESSING THE MATURITY LEVEL OF MANAGEMENT AND SUPPORT PROCESSES

This Appendix examines the attributes inherent in organizational processes that enable some organizations to be highly effective in today's ever-changing environment. It proposes a *process maturity model* that can be used to evaluate an organization's management and support processes.

Different Kinds of Processes

The American Heritage Dictionary⁸⁰ defines a process as "a series of actions, changes, or functions bringing about a result." Every organizational endeavor consists of processes. That is, a "result," or outcome (whether it is planned or unplanned; *ad hoc* or systematic; good or bad) is always a consequence of its process.

Said another way, by definition, an antecedent precedes its consequence. A process precedes its outcome. Thus, processes (antecedents) must be managed to effect a desired change to an outcome (consequence). Before a process can be managed, however, it must be identified. In 1991, a team of business professionals and the American Productivity and Quality Center developed a generic, organizational process classification scheme. The Process Classification Framework⁸¹ serves as a high-level enterprise model that encourages businesses and other organizations to see their activities from a cross-industry, process viewpoint instead of from a narrow functional standpoint. The International Benchmarking Clearinghouse has endorsed the approach as an industry standard.

Operating Processes

The Process Classification Framework includes 13 business processes that apply to virtually any business. The first seven are *operating processes*.⁸² An organization's operating processes are those used to get the product or service to the customer. These processes include understanding markets and customers, designing products and services, and marketing and selling.

Management and Support Processes

The last six processes are management and support processes,⁸³ i.e., the processes that make it possible for the company to perform its operating processes effectively. Management and support processes

⁸⁰ The American Heritage Dictionary of the English Language, (3d ed. 1992).

⁸¹ "International Benchmarking Clearinghouse: Process Classification Framework," Houston, Texas: American Productivity Quality Center (1995).

⁸² Operating processes are often referred to as primary processes.

⁸³ Management and support processes are often referred to as administrative, or secondary processes.

typically bridge across many operational, or primary, processes. These processes include human resource management, information systems management, and finance and accounting.

The discussion below proposes a process maturity model that can be used to evaluate an organization's management and support processes. The model draws heavily from, and is a direct extension of, the Software Engineering Institute's⁸⁴ (SEI) Capability Maturity Model (CMM).⁸⁵ The purpose of the discussion is to lay the framework for evaluating the maturity of management and support processes of homeless shelters within the context of OSHA's proposed standard to control occupational exposure to tuberculosis.

Process Maturity Models

Process maturity models are not new. The software industry has been refining process maturity models for several years. A "black-magic" aura has long plagued the industry. As software became increasingly complex, and software development programs become more critical to a number of industries (including aerospace & defense, commercial aviation, and international finance), its quality and reliability was decreasing. Thus spawned some of the better known operational process maturity models, including the: (1) Software Engineering Institute's Software Capability Maturity Model; (2) Software Productivity Research, Inc.'s Software Assessment Model;⁸⁶ and (3) MicroFrame Technologies, Inc.'s Project Management Maturity Model.⁸⁷

These three models share a similar assessment scale, identifying five progressive stages of process maturity. Table A-1 presents the continuum from worst to best for each of these models.

⁸⁴ The Software Engineering Institute (SEI) is a federally funded research and development center sponsored by the U.S. Department of Defense through the Office of the Under Secretary of Defense for Acquisition and Technology [OUSD (A&T)]. The SEI contract was competitively awarded to Carnegie Mellon University in December 1984. It is staffed by technical and administrative professionals from government, industry, and academia. The U.S. Department of Defense established the Software Engineering Institute to advance the practice of software engineering because quality software that is produced on schedule and within budget is a critical component of U.S. defense systems. The SEI mission is to provide leadership in advancing the state of the practice of software engineering to improve the quality of systems that depend on software. The SEI accomplishes this mission by promoting the evolution of software engineering from an ad hoc, labor-intensive activity to a discipline that is well managed and supported by technology.

⁸⁵ Mark C. Paulk, et al., "Capability Maturity Model for Software, Version 1.1," Pittsburgh, Pennsylvania: Carnegie Mellon University, Software Engineering Institute, Working Paper CMU/SEI-93-TR-24 (February 1993).

⁸⁶ Capers Jones, *Assessment and Control of Software Risks*, Prentice Hall (1994).

⁸⁷ The process of Project Planning, Tracking & Oversight, a.k.a. Project Management, is itself the subject of yet another process maturity model developed by Microframe Technologies & Project Management Technologies, Inc. This model provides a "phased set of maturity descriptions, improvement criteria, operating metrics, and questions that can be used to assess the current level of maturity and develop a focused plan for improving the effectiveness of project and functional management."

Table A-1
A Comparison of Process Maturity Models

	Process Assessment Rankings				
	Worst ==> ==> ==> to ==> ==> ==> Best				
SEI Capability Model	Initial	Repeatable	Defined	Managed	Optimizing
SPR Process Assessment	Poor	Below Avg.	Average	Above Avg.	Excellent
Project Mgt Maturity	Ad hoc	Abbreviated	Organized	Managed	Adaptive

The SEI Capability Maturity Model, for example, describes an immature organization (Level 1, Initial) as having software processes that are generally improvised by practitioners and their management. An immature organization is reactionary, with managers typically focused on firefighting. It is quite normal for schedules and budgets to be exceeded because they were not based on realistic estimates in the first place. Processes are not predictable, quality is not predictable, and success is dependent upon the capability of individual performers.

A highly mature (Level 5, Optimizing) organization, on the other hand, exhibits processes that are highly repeatable and predictable. Estimates are realistic and variations from expectations are known and managed. The entire organization is focused on continuous process improvement. Information on the effectiveness of the process is used to propose, prioritize and implement process change.

A Management and Support Process Maturity Model

The three maturity models identified above all focus on *operational* process maturity. The fundamental concepts gleaned from the models, however, are equally applicable to *management and support* processes. This Management & Support Process Maturity Model (M&S PMM), therefore, is a logical extension of those models, applied generically to management and support processes.

Fundamental Concepts of Process Maturity

Process maturity is the extent to which a specific process is explicitly documented, practiced, coordinated and managed. Maturity represents a growth toward "full development or maximum excellence."⁸⁸ Therefore, a fundamental premise underlying the maturity framework is that gradations of growth, i.e., maturity levels, exist and are identifiable. As an organization gains maturity, it gains greater capability (see Table A-2).

Four Criteria for Process Maturity

⁸⁸ The American Heritage Dictionary of the English Language, (3d ed. 1992).

Table A-2, "Five Levels of Process Maturity," depicts the critical attributes of each process criteria associated with its corresponding level of process maturity. For example, the intersecting cell represented by Level 2 "Repeatable" and Criteria B "Practiced" indicates that the key attribute required to achieve a maturity level "Repeatable," for the criteria "Practiced," is "Coordination within the specific workgroup."

Criterion 1: Documented

The "documented" criteria address the extent to which an organization's processes are documented. The least mature state of documentation maturity is one in which processes typically are *ad hoc*, perhaps even chaotic. De facto processes may be in existence, but they likely have not been systematically designed. Due to their de facto nature, the processes may be describable by individuals performing the work; they are not officially documented.

Alternatively, in the most mature state, written documentation is consistent throughout the organization.

Criterion 2: Practiced

The "practiced" criteria address the consistency of process performance. In the least mature state, processes are practiced in an *ad hoc* or, at best, intermittent manner.

In contrast, a mature organization is one whose processes are practiced in a consistent manner throughout the organization.

Criterion 3: Coordinated

The "coordinated" criteria address the extent of process coordination among workgroups and throughout the organization. "Coordination" refers to the harmonious interaction among workers in a common process. In the least mature state, processes are not coordinated to any significant extent.

On the other hand, a mature organization is one whose processes are coordinated both within workgroups and across the organization.

Criterion 4: Managed

The "managed" criteria address the extent that process management techniques are employed. In the least mature state, process management techniques are not employed to any significant degree.

In contrast, a highly mature organization is one that exploits process management techniques in a proactive and systematic manner to continuously improve and adapt processes.

Five Levels of Process Maturity

An organization may progress in stages along an evolutionary path, from *ad hoc* (Level 1) to optimized (Level 5). According to the SEI, "maturity implies a potential for growth in capability and indicates both the richness of an organization's processes and the consistency with which they are applied throughout the organization."⁸⁹ Process capability, as defined by SEI, "describes the range of expected results that can be achieved by following" a particular process. The process capability of an organization "provides one means of predicting the most likely outcomes to be expected" from the process. (See Table A-2).

Examples from a finance and accounting department (part of an operating unit in a large, high-tech corporation in the Midwest) will be used to illustrate aspects of the different maturity levels. The experiences of that finance department were described in a series of articles published in 1995.⁹⁰

Level 1: Ad-hoc

Level 1 processes are best characterized as *ad hoc*, perhaps even chaotic. Few processes are documented. Processes that are identified are practiced intermittently at best. There is little coordination of process flow among workgroups. The success of the process is dependent upon specific individuals and "heroic" effort is often required. Crisis management is the norm, and process outcomes tend to be unpredictable.

Level 2: Repeatable

The primary objective at Level 2, the Repeatable level "is to instill a process discipline in the environment that ensures that the basic practices needed to stabilize the environment are performed on a regular and repeatable basis."⁹¹ Processes are established and describable; written documentation exists. Processes and activities are practiced and consistent within a specific workgroup. Unlike Level 1, a process that is "Repeatable" is not dependent upon heroic efforts of single individuals. Rather, process knowledge is in place to ensure fundamental repeatability.

A finance and accounting department (mentioned above) needed first to address the overall mission of their department, followed by an identification of essential processes used to achieve their desired outcomes. A critical business sub-process for this group

⁸⁹ Mark C. Paulk, et al., "Capability Maturity Model for Software, Version 1.1," Pittsburgh, Pennsylvania: Carnegie Mellon University, Software Engineering Institute, Working Paper CMU/SEI-93-TR-24 (February 1993).

⁹⁰ Peter Lenhardt; "It's the Process!" and "It's the Process, Part 2," and "Take a Chance! Establish an Effective Reinforcement Process"; in, Cost Management Insider's Report, ed. B. Brinker and L. Soloway, New York: Warren, Gorham & Lamont (Feb. 1995, March 1995 & May 1995).

⁹¹ Mark C. Paulk, et al., "Capability Maturity Model for Software, Version 1.1," Pittsburgh, Pennsylvania: Carnegie Mellon University, Software Engineering Institute, Working Paper CMU/SEI-93-TR-24 (February 1993).

was "Close the Books." This team, to exhibit Level 2 maturity, needed to identify the various activities, performed by different functional groups, that were necessary to achieve a minimal definition for the "Close the Books" process. This was required to achieve a process capable of being "repeatable and systematic." As one former manager of the group used to say, "We've got to make the 'routine' routine."

It is important to understand and establish Level 2 maturity before trying to achieve Level 3. The discipline captured in Level 2 is the foundation for achieving Level 3 and higher.

Level 3: Standardized

Having established an ability to perform a process in a repeatable manner, the organization can focus on transferring its best practices *across the organization*. Although successful practices are executed in a repeatable manner at the "Repeatable" maturity level, they may be performed quite differently by different people or in different groups. Some ways of performing these practices will prove more effective than other ways. Thus, *the primary focus of Level 3 is to insert the practices from Level 2 throughout the organization*. You can think of it as integrating many "pockets" of unique (albeit repeatable) practices into a set of integrated, and organizationally consistent, practices. Everyone in the organization is reading from the same page of the same book. The organizational⁹² process language and practices are *defined* and standardized. Training activities are planned and executed based upon identified skills and knowledge required for process execution.

Successful execution of "Close the Books" became a repeatable routine. However, the effectiveness of the process needed improvement. Understanding and capitalizing on processes that work best is the heart of the Standardized level (Level 3). To improve the consistency (and thus the effectiveness), the finance department queried themselves and the internal customers about the requirements of the "Close the Books" process. This resulted in a clear understanding of the criteria of a "quality close." Armed with this knowledge, they began a concerted effort at documenting the process and identifying other functions whose actions affected the closing process. Inputs and outputs of key activities within the "Close the books" process were identified and coordinated with the respective workgroups. The group began training others, thereby ensuring organizational effectiveness of the process. This created a common reference for performing their work. They did not have to try to reinvent the methodology each month.

Level 4: Managed

⁹² In the context of this explanation, the term "organization" can be interpreted both globally (i.e., the entire entity, including all of its functional components) and locally (one specific function within the global entity, such as the "Controller's Department").

Once the organization can execute its standard processes consistently, it can use process data *to eliminate systematically the causes of wide variations in its performance*. The objective of the Managed level (Level 4) is to set *quantitative* performance and quality targets, and *reduce the variation* in the process to stabilize the organization's capability in achieving these targets. Measurements are used to establish quantitative foundation for evaluating processes and products. Process productivity goals are measured across the discipline. Data is collected and analyzed. Defect detection is pursued. Process control is achieved by narrowing variation in process performance boundaries. Variations in process performance are understood. Process is predictable because the process is measured, and it operates within measurable limits. Process output is of predictable, high quality.

Having clarified the expectations, the finance and accounting group determined the leading causes that prevented them from achieving their defined quality and time goals each time the "Close the books" process was performed. That is, the question of "What makes our closing process go "smooth" one month, and have unexpected perturbations the next?" was evaluated. . .A baseline of "major cost driver occurrences" was created. By identifying, measuring and minimizing those adverse drivers (i.e., defects) of the "Close the Books" process, they dramatically reduced the variation in the process and stabilized their ability to perform consistently within currently defined and acceptable variation. Further, quantitative performance and quality targets were set. A visual measurement program was established, and a complementary reinforcement plan was established to enable meeting the aggressive targets.

Level 5: Optimized

At the Optimizing level (Level 5), the organization continues on its improvement path with a *focus on continuous process improvement*. Unlike Level 4, which is focused primarily on managing the current process within acceptable variations, the organization begins in Level 5 to identify process innovations that *can continually improve* the process performance and therefore favorably affect the organization's competitive posture. In addition to identifying and minimizing process variation (Level 4), the organization is "raising the height of the bar" itself. In other words, a new (improved) process is introduced, which will itself be managed and monitored. The organization focuses on continuous improvement of any factor that affects the achievement of its business goals. It is continuing to optimize and adapt its work processes. Continuous process improvement is enabled by quantitative feedback from the process and from piloting innovative ideas and technologies. The entire organization is focused on continuous improvement. Defect prevention activities are *planned*. The organization can identify weaknesses and strengthen the process *proactively*, with the goal of preventing occurrence of defects. Best practices are exploited.

The finance and accounting department story concludes with the organization pursuing continuous process improvement while transitioning to a self-managed team.

Conclusion

Organization endeavors consist of both operational and support processes to produce the desired outcomes. Outcomes can only be managed by managing the processes that produce them. A level of process maturity must exist to manage processes. Process maturity can be identified and managed. Five levels of process maturity have been identified in this discussion. These five levels are applied to evaluate homeless shelter processes in the text of the report.

Table A-2
Five Levels of Process Maturity

		<i>PROCESS MATURITY LEVELS</i>				
		LOW				HIGH
		1	2	3	4	5
<i>CRITERIA</i>		AD-HOC	REPEATABLE	STANDARDIZED	MANAGED	OPTIMIZED
A	DOCUMENTED	Established & describable, but not documented.	Established, describable and written documentation exists.	Written documents are consistent across the organization	Documented processes and outputs are directly linked to achievement of the organizational mission.	
B	PRACTICED	Intermittent.	Consistent within specific workgroup	Consistent across the organization.		
C	COORDINATED	Not coordinated	Coordinated within specific workgroup	Integrated among workgroups; internal outcome requirements understood and defined.		
D	MANAGED	Process management techniques not employed	Process flow is integrated within the workgroup. Training is employed to address process issues within the workgroup.	Process flow is integrated across the organization. Training activities are planned and executed based upon identified skills and knowledge required for process execution.	Process control parameters are used to quantitatively and systematically reduce process variation across organization	Process output parameters are used proactively to systematically improve and adapt processes. The "zone" of process control moves.
	<i>CAPABILITY ACQUIRED</i>		Disciplined processes.	Standard and consistent processes.	Predictable processes.	Continuously improving processes.