Designation: E 1528 – 00

Standard Practice for Environmental Site Assessments: Transaction Screen Process[1]

This standard is issued under the fixed designation E 1528; the number immediately following the designation indicates the year of original adoption or, in the case of revision, the year of last revision. A number in parentheses indicates the year of last reapproval. A superscript epsilon (ε) indicates an editorial change since the last revision or reapproval.

1. Scope

1.1 *Purpose*—The purpose of this practice, as well as Practice E 1527, is to define good commercial and customary practice in the United States of America for conducting an *environmental site assessment*[2] of a parcel of *commercial real estate* with respect to the range of contaminants within the scope of the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) and *petroleum products*. As such, this practice is intended to permit a user to satisfy one of the requirements to qualify for the *innocent landowner defense* to CERCLA liability: that is, the practices that constitute "all appropriate inquiry into the previous ownership and uses of the property consistent with good commercial or customary practice" as defined in 42 USC § 9601(35)(B). (See Appendix X1 for an outline of CERCLA's liability and defense provisions.) An evaluation of *business environmental risk* associated with a parcel of commercial real estate may necessitate investigation beyond that identified in this practice (see Sections 1.3 and 11).

1.1.1 *Recognized Environmental Conditions*—In defining a standard of good commercial and customary practice for conducting an *environmental site assessment* of a parcel of *property*, the goal of the processes established by this practice is to identify *recognized environmental conditions*. The term *recognized environmental conditions* means the presence or likely presence of any *hazardous substances* or *petroleum products* on a *property* under conditions that indicate an existing release, a past release, or a material threat of a release of any *hazardous substances* or *petroleum products* into structures on the *property* or into the ground, ground water, or surface water of the *property*. The term includes *hazardous substances* or *petroleum products* even under conditions in compliance with laws. The term is not intended to include *de minimis* conditions that generally do not present a material risk of harm to public health or the environment and that generally would not be the subject of an enforcement action if brought to the attention of appropriate governmental agencies. Conditions determined to be *de minimis* are not *recognized environmental conditions*.

1.1.2 *Two Related Practices*—This practice is closely related to Practice E 1527, a *Phase I Environmental Site Assessment*. Both are *environmental site assessments* for *commercial real estate*. See 4.3.

1.1.3 *Petroleum Products—Petroleum products* are included within the scope of both practices because they are of concern on many parcels of *commercial real estate* and current custom and usage is to include an inquiry into the presence of *petroleum products* when doing an *environmental site assessment* of *commercial real estate*. Inclusion of *petroleum products* within the scope of this practice is not based upon the applicability, if any, of CERCLA to *petroleum products*.

1.1.4 *CERCLA Requirements Other Than Appropriate Inquiry*—This practice does not address whether requirements in addition to *appropriate inquiry* have been met in order to qualify for CERCLA's *innocent landowner defense* (for example, the duties specified in 42 USC § 9607(b)(3)(a) and (b) and cited in Appendix X1).

1.1.5 *Other Federal, State, and Local Environmental Laws*—This practice does not address requirements of any state or local laws or of any federal laws other than the appropriate inquiry provisions of CERCLA's *innocent landowner defense*. Users are cautioned that federal, state, and local laws may impose environmental assessment obligations that are beyond the scope of this practice. *Users* should also be aware that there are likely to be other legal obligations with regard to *hazardous substances* or *petroleum products* discovered on *property* that are not addressed in this practice and may pose risks of civil and/or criminal sanctions for noncompliance.

1.2 *Objectives*—Objectives guiding the development of this practice and Practice E 1527 are (1) to synthesize and put in writing good commercial and customary practice for *environmental site assessments* for *commercial real estate*, (2) to facilitate highquality, standardized *environmental site assessments*, (3) to ensure that the standard of *appropriate inquiry* is practical and reasonable, and (4) to clarify an industry standard

[1] This practice is under the jurisdiction of ASTM Committee E50 on Environmental Assessment and is the direct responsibility of Subcommittee E50.02 on Commercial Real Estate Transactions.

Current edition approved May 10, 2000. Published July 2000. Originally published as E 1528 – 93. Last previous edition E 1528 – 96.

[2] All definitions, descriptions of terms, and acronyms are defined in Section 3 of Practice E 1527. Whenever terms defined in 3.2 or described in 3.3 are used in this practice, they are in *italics*.

for *appropriate inquiry* in an effort to guide legal interpretation of CERCLA's *innocent landowner defense*.

1.3 *Considerations Beyond the Scope*—The use of this practice is strictly limited to the scope set forth in this section. Section 11 of this practice identifies, for informational purposes, certain environmental conditions (not an all-inclusive list) that may exist on a *property* that are beyond the scope of this practice but may warrant consideration by parties to a *commercial real estate* transaction. The need to include an investigation of any such conditions in the scope of services should be evaluated based upon, among other factors, the nature of the property and the reasons for performing the assessment (for example, a more comprehensive evaluation of *business environmental risk*) and should be agreed upon as additional services beyond the scope of this practice prior to initiation of the *Environmental Site Assessment* process.

1.4 *Organization of This Practice*—This practice has several parts and two appendixes. Section 1 is the Scope. Section 2 refers to other ASTM standards in the Referenced Documents. Section 3, Terminology, has definitions of terms not unique to this practice, descriptions of terms unique to this practice, and acronyms. Section 4 is Significance and Use of this practice. Section 5 is the Introduction to the Transaction Screen Questionnaire. Section 6 sets forth the Transaction Screen Questionnaire itself. Sections 7-10 contain the Guide to the Transaction Screen Questionnaire and its various parts. Section 11 provides additional information regarding non-scope considerations (see 1.3). The appendixes are included for information and are not part of the procedures prescribed in either Practice E 1527 or this practice. Appendix X1 and Practice E 1527 explain the liability and defense provisions of CERCLA that will assist the user in understanding the user's responsibilities under CERCLA; it also contains other important information regarding CERCLA and this practice. Appendix X2 provides information referred to in the guide to the transaction screen questionnaire.

1.5 *This standard does not purport to address all of the safety concerns, if any, associated with its use. It is the responsibility of the user of this standard to establish appropriate safety and health practices and determine the applicability of regulatory limitations prior to use.*

2. Referenced Documents

2.1 *ASTM Standards:*

E 1527 Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process[3]

3. Terminology

3.1 *Scope*—This section provides definitions, descriptions of terms, and a list of acronyms for many of the words used in this practice and Practice E 1527. The terms are an integral part of both practices and are critical to an understanding of the written practices and their use.

3.2 *Definitions:*

3.2.1 *activity and use limitations*—legal or physical restrictions or limitations on the use of, or access to, a site or facility: *(1)* to reduce or eliminate potential exposure to hazardous substances in the soil or ground water on the property, or *(2)* to prevent activities that could interfere with the effectiveness of a response action, in order to ensure maintenance of a condition of no significant risk to public health or the environment. These legal or physical restrictions, which may include institutional and/or engineering controls, are intended to prevent adverse impacts to individuals or populations that may be exposed to hazardous substances in the soil or ground water on the property.

3.2.2 *Comprehensive Environmental Response, Compensation and Liability Information System (CERCLIS)*—the list of sites compiled by EPA that EPA has investigated or is currently investigating for potential hazardous substance contamination for possible inclusion on the National Priorities list.

3.2.3 *construction debris*—concrete, brick, asphalt, and other such building materials discarded in the construction of a building or other improvement to property.

3.2.4 *contaminated public wells*—public wells used for drinking water that have been designated by a government entity as contaminated by toxic substances, (for example, chlorinated solvents), or as having water unsafe to drink without treatment.

3.2.5 *CORRACTS list*—list of hazardous waste treatment, storage or disposal facilities and other RCRIS facilities (due to past interim status or storage of hazardous waste beyond 90 days) who have been notified by the U.S. Environmental Protection Agency to undertake corrective action under RCRA.

3.2.6 *demolition debris*—concrete, brick, asphalt, and other such building materials discarded in the demolition of a building or other improvement to property.

3.2.7 *drum*—a container (typically, but not necessarily, holding 55 gal (208 L) of liquid) that may be used to store *hazardous substances* or *petroleum products*.

3.2.8 *dry wells*—underground areas where soil has been removed and replaced with pea gravel, coarse sand, or large rocks. Dry wells are used for drainage, to control storm runoff, for the collection of spilled liquids (intentional and non-intentional) and wastewater disposal (often illegal).

3.2.9 *dwelling*—structure or portion thereof used for residential habitation.

3.2.10 *engineering controls*—physical modifications to a site or facility (for example, capping, slurry walls, or point of use water treatment) to reduce or eliminate the potential for exposure to hazardous substances in the soil or ground water on the property.

3.2.11 *environmental lien*—a charge, security, or encumbrance upon title to a *property* to secure the payment of a cost, damage, debt, obligation, or duty arising out of response actions, cleanup, or other remediation of *hazardous substances* or *petroleum products* upon a *property*, including (but not limited to) liens imposed pursuant to CERCLA 42 USC § 9607(1) and similar state or local laws.

3.2.12 *ERNS list*—EPA's Emergency Response Notification System list of reported CERCLA hazardous substance releases or spills in quantities greater than the reportable quantity, as

[3] *Annual Book of ASTM Standards*, Vol 11.04.

maintained at the National Response Center. Notification requirements for such releases or spills are codified in 40 CFR Parts 302 and 355.

3.2.13 *Federal Register (FR)*—publication of the United States government published daily (except for federal holidays and weekends) containing all proposed and final regulations and some other activities of the federal government. When regulations become final, they are included in the Code of Federal Regulations (CFR), as well as published in the Federal Register.

3.2.14 *fire insurance maps*—maps produced for private fire insurance map companies that indicate uses of properties at specified dates and that encompass the property. These maps are often available at local libraries, historical societies, private resellers, or from the map companies who produced them. See Question 2310.3.1.3 of the transaction screen process in this practice and 7.3.4.2 of Practice E 1527.

3.2.15 *hazardous substance*—a substance defined as a hazardous substance pursuant to CERCLA 42 USC § 9601(14), as interpreted by EPA regulations and the courts: "(A) any substance designated pursuant to Section 1321(b)(2)(A) of Title 33, (B) any element, compound, mixture, solution, or substance designated pursuant to Section 9602 of this title, (C) any hazardous waste having the characteristics identified under or listed pursuant to Section 3001 of the Solid Waste Disposal Act (42 USC § 6921) (but not including any waste the regulation of which under the Solid Waste Disposal Act (42 USC § 6901 *et seq*.) has been suspended by Act of Congress), (D) any toxic pollutant listed under Section 1317(a) of Title 33, (E) any hazardous air pollutant listed under Section 112 of the Clean Air Act (42 USC § 7412), and (F) any imminently hazardous chemical substance or mixture with respect to which the administrator (of EPA) has taken action pursuant to Section 2606 of Title 15. The term does not include petroleum, including crude oil or any fraction thereof which is not otherwise specifically listed or designated as a hazardous substance under Subparagraphs (A) through (F) of this paragraph, and the term does not include natural gas, natural gas liquids, liquefied natural gas, or synthetic gas usable for fuel (or mixtures of natural gas and such synthetic gas)," (See Appendix X1.)

3.2.16 *hazardous waste*—any hazardous waste having the characteristics identified under or listed pursuant to Section 3001 of the Solid Waste Disposal Act (42 USC § 6921) (but not including any waste the regulation of which under the Solid Waste Disposal Act (42 USC § 6901 *et seq*.) has been suspended by Act of Congress). The Solid Waste Disposal Act of 1980 amended RCRA. The RCRA defines a hazardous waste, in 42 USC § 6903, as:

"a solid waste, or combination of solid wastes, which because of its quantity, concentration, or physical, chemical, or infectious characteristics may—(A) cause, or significantly contribute to an increase in mortality or an increase in serious irreversible, or incapacitating reversible, illness; or (B) pose a substantial present or potential hazard to human health or the environment when improperly treated, stored, transported, or disposed of, or otherwise managed."

3.2.17 *institutional controls*—a legal or administrative restriction (for example, deed restriction, restrictive zoning) on the use of, or access to, a site or facility to reduce or eliminate potential exposure to hazardous substances in the soil or ground water on the property.

3.2.18 *landfill*—a place, location, tract of land, area, or premises used for the disposal of solid wastes as defined by state solid waste regulations. The term is synonymous with the term *solid waste disposal site* and is also known as a garbage dump, trash dump, or similar term.

3.2.19 *local street directories*—directories published by private (or sometimes government) sources that show ownership, occupancy, use of sites and/or by reference to street addresses. Often local street directories are available at libraries of local governments, colleges or universities, or historical societies. See 7.3.4.6 of the Records Review Section of Practice E 1527.

3.2.20 *material safety data sheet (MSDS)*—written or printed material concerning a *hazardous substance* which is prepared by chemical manufacturers, importers, and employers for hazardous chemicals pursuant to OSHA's Hazard Communication Standard, 29 CFR 1910.1200(g).

3.2.21 *National Contingency Plan (NCP)*—the National Oil and Hazardous Substances Pollution Contingency Plan, found at 40 CFR § 300, that is the EPA's blueprint on how hazardous substances are to be cleaned up pursuant to CERCLA.

3.2.22 *National Priorities List (NPL)*—list compiled by EPA pursuant to CERCLA 42 USC § 9605(a)(8)(B) of properties with the highest priority for cleanup pursuant to EPA's hazard ranking system. See 40 CFR Part 300.

3.2.23 *occupants*—those tenants, subtenants, or other persons or entities using the *property* or a portion of the *property*.

3.2.24 *owner*—generally the fee owner of record of the *property*.

3.2.25 *petroleum exclusion*—the exclusion from CERCLA liability provided in 42 USC § 9601(14), as interpreted by the courts and EPA: "The term (hazardous substance) does not include petroleum, including crude oil or any fraction thereof which is not otherwise specifically listed or designated as a hazardous substance under Subparagraphs (A) through (F) of this paragraph, and the term does not include natural gas, natural gas liquids, liquefied natural gas, or synthetic gas usable for fuel (or mixtures of natural gas and such synthetic gas)."

3.2.26 *petroleum products*—those substances included within the meaning of the terms within the *petroleum exclusion* to CERCLA, 42 USC § 9601(14), as interpreted by the courts and EPA, that is: petroleum, including crude oil or any fraction thereof that is not otherwise specifically listed or designated as a *hazardous substance* under Subparagraphs (A) through (F) of 42 USC § 9601(14), natural gas, natural gas liquids, liquefied natural gas, and synthetic gas usable for fuel (or mixtures of natural gas and such synthetic gas). (The word fraction refers

to certain distillates of crude oil, including gasoline, kerosene, diesel oil, jet fuels, and fuel oil, pursuant to *Standard Definitions of Petroleum Statistics*.[4]

3.2.27 *Phase I Environmental Site Assessment*— the process described in Practice E 1527.

3.2.28 *pits, ponds, or lagoons*—man-made or natural depressions in a ground surface that are likely to hold liquids or sludge containing *hazardous substances* or *petroleum products*. The likelihood of such liquids or sludge being present is determined by evidence of factors associated with the pit, pond, or lagoon, including, but not limited to, discolored water, distressed vegetation, or the presence of an obvious wastewater discharge.

3.2.29 *property*—the real property that is the subject of the environmental site assessment described in this practice. Real property includes buildings and other fixtures and improvements located on the property and affixed to the land.

3.2.30 *property tax files*—the files kept for property tax purposes by the local jurisdiction where the property is located and includes records of past ownership, appraisals, maps, sketches, photos, or other information that is reasonably ascertainable and pertaining to the property. See 7.3.4.3 of the Records Review Section of Practice E 1527.

3.2.31 *RCRA generators*—those persons or entities which generate *hazardous wastes*, as defined and regulated by RCRA.

3.2.32 *RCRA generators list*—list kept by EPA of those persons or entities that generate *hazardous wastes* as defined and regulated by RCRA.

3.2.33 *RCRA TSD facilities*—those facilities on which treatment, storage, and/or disposal of *hazardous wastes* takes place, as defined and regulated by RCRA.

3.2.34 *RCRA TSD facilities list*—list kept by EPA of those facilities on which treatment, storage, and/or disposal of *hazardous wastes* takes place, as defined and regulated by RCRA.

3.2.35 *recorded land title records*—records of fee ownership, leases, land contracts, easements, liens, and other encumbrances on or of the *property* recorded in the place where land title records are, by law or custom, recorded for the local jurisdiction in which the property is located. (Often such records are kept by a municipal or county recorder or clerk.) Such records may be obtained from title companies or directly from the local government agency. Information about the title to the *property* that is recorded in a U.S. district court or any place other than where land title records are, by law or custom, recorded for the local jurisdiction in which the property is located, are not considered part of recorded land title records. See 7.3.4.4 of the Records Review Section of Practice E 1527.

3.2.36 *records of emergency release notifications (SARA § 304)*—Section 304 of EPCRA or Title III of SARA requires operators of facilities to notify their local emergency planning committee (as defined in EPCRA) and State Emergency Response Commission (as defined in EPCRA) of any release beyond the facility's boundary of any reportable quantity of any extremely *hazardous substance*. Often the local fire department is the local emergency planning committee. Records of such notifications are" Records of Emergency Release Notifications" (SARA §304).

3.2.37 *report*—the written record of a transaction screen process as required by Practice E 1527 or the written report prepared by the environmental professional and constituting part of a *Phase I Environmental Site Assessment*, as required by Practice E 1527.

3.2.38 *solid waste disposal site*—a place, location, tract of land, area, or premises used for the landfill disposal of solid wastes as defined by state solid waste regulations. The term is synonymous with the term *landfill* and is also known as a garbage dump, trash dump, or similar term.

3.2.39 *solvent*—a chemical compound that is capable of dissolving another substance and may itself be a *hazardous substance* used in a number of manufacturing/industrial processes including, but not limited to, the manufacture of paints and coatings for industrial and household purposes, equipment clean-up, and surface degreasing in metal fabricating industries.

3.2.40 *state registered USTs*—state lists of underground storage tanks required to be registered under Subtitle I, Section 9002 of RCRA.

3.2.41 *sump*—a pit, cistern, cesspool, or similar receptacle where liquids drain, collect, or are stored.

3.2.42 *TSD Facility*—treatment, storage, or disposal facility (see definition of *RCRA TSD facilities*).

3.2.43 *underground storage tank (UST)*—any tank, including underground piping connected to the tank, that is or has been used to contain *hazardous substances* or *petroleum products* and the volume of which is 10 % or more beneath the surface of the ground.

3.2.44 *USGS 7.5 Minute Topographic Map*—the map (if any) available from or produced by the United States Geological Survey, entitled "USGS 7.5 Minute Topographic Map," and showing the *property*. See 7.3.4.5 of Practice E 1527.

3.2.45 *wastewater*—water that is or has been used in an industrial or manufacturing process, conveys or has conveyed sewage, or is directly related to manufacturing, processing, or raw materials storage areas at an industrial plant. Wastewater does not include water originating on or passing through or adjacent to a site, such as stormwater flows, that has not been used in industrial or manufacturing processes, has not been combined with sewage, or is not directly related to manufacturing, processing, or raw materials storage areas at an industrial plant.

3.2.46 *zoning/land use records*—those records of the local government in which the *property* is located indicating the uses permitted by the local government in particular zones within its jurisdiction. The records may consist of maps and/or written records. They are often located in the planning department of a municipality or county. See 7.3.4.8 of the Records Review Section of Practice E 1527.

[4] *Standard Definitions of Petroleum Statistics*, American Petroleum Institute, Fourth Edition, 1988.

3.3 *Definitions of Terms Specific to This Standard:*

3.3.1 *actual knowledge*—the knowledge actually possessed by an individual who is a real person, rather than an entity. Actual knowledge is to be distinguished from constructive knowledge, that is, knowledge imputed to an individual or entity. (See 5.5.3.)

3.3.2 *adjoining properties*—any real property or properties the border of which is contiguous or partially contiguous with that of the property, or that would be contiguous or partially contiguous with that of the property but for a street, road, or other public thoroughfare separating them.

3.3.3 *aerial photographs*—photographs taken from an airplane or helicopter of areas encompassing the property. Aerial photographs are often available from government agencies or private collections unique to a local area. See 7.3.4.1 of Practice E 1527.

3.3.4 *appropriate inquiry*—that inquiry constituting "all appropriate inquiry into the previous ownership and uses of the property consistent with good commercial or customary practice" as defined in CERCLA, 42 USC § 9601(35)(B), that will give a party to a *commercial real estate* transaction the *innocent landowner defense* to CERCLA liability (42 USC § 9601(A) and (B) and 9607(b)(3)), assuming compliance with other elements of the defense. See Appendix X1 and Practice E 1527.

3.3.5 *approximate minimum search distance*—the area for which records must be obtained and reviewed pursuant to the Records Review Section of Practice E 1527, subject to the limitations provided in that section. The term *approximate minimum search distance* may include areas outside the *property* and shall be measured from the nearest *property* boundary. The term *approximate minimum search distance* is used instead of radius to include irregularly shaped properties.

3.3.6 *building department records*—those records of the local government in which the property is located indicating permission of the local government to construct, alter, or demolish improvements on the property. Often building department records are located in the building department of a municipality or county. See 7.3.4.7 of Practice E 1527.

3.3.7 *business environmental risk*—a risk which can have a material environmental or environmentally-driven impact on the business associated with the current or planned use of a parcel of commercial real estate, not necessarily limited to those environmental issues required to be investigated in this practice. Consideration of *business environmental risk* issues may involve addressing one or more non-scope considerations, some of which are identified in Section 11.

3.3.8 *commercial real estate*—any real property except a dwelling or property with no more than four dwelling units exclusively for residential use (except that a dwelling or property with no more than four dwelling units exclusively for residential use is included in the term commercial real estate when it has a commercial function, as in the building of such dwellings for profit). The term *commercial real estate* includes but is not limited to undeveloped real property and real property used for industrial, retail, office, agricultural, other commercial, medical, or educational purposes; *property* used for residential purposes that has more than four residential dwelling units; and *property* with no more than four dwelling units for residential use when it has a commercial function, as in the building of such dwellings for profit.

3.3.9 *commercial real estate transaction*—a transfer of title to or possession of real property or receipt of a security interest in real property, except that it does not include transfer of title to or possession of real property or the receipt of a security interest in real property with respect to an individual dwelling or building containing fewer than five dwelling units, nor does it include the purchase of a lot or lots to construct a dwelling for occupancy by a purchaser, but a commercial real estate transaction does include real property purchased or leased by persons or entities in the business of building or developing dwelling units.

3.3.10 *due diligence*—the process of inquiring into the environmental characteristics of a parcel of *commercial real estate* or other conditions, usually in connection with a commercial real estate transaction. The degree and kind of due diligence vary for different properties and differing purposes. See Appendix X1 and Practice E 1527.

3.3.11 *environmental audit*—the investigative process to determine if the operations of an existing facility are in compliance with applicable environmental laws and regulations. The term *environmental audit* should not be used to describe this practice or Practice E 1527 although an environmental audit may include an *environmental site assessment* or, if prior audits are available, may be part of an environmental site assessment. See Appendix X1 and Practice E 1527.

3.3.12 *environmental professional*—a person possessing sufficient training and experience necessary to conduct a *site reconnaissance*, *interviews*, and other activities in accordance with Practice E 1527, and from the information generated by such activities, having the ability to develop opinions and conclusions regarding *recognized environmental conditions* in connection with the *property* in question. An individual's status as an environmental professional may be limited to the type of assessment to be performed or to specific segments of the assessment for which the professional is responsible. The person may be an independent contractor or an employee of the *user*.

3.3.13 *environmental site assessment (ESA)*—the process by which a person or entity seeks to determine if a particular parcel of real *property* (including improvements) is subject to *recognized environmental conditions*. At the option of the user, an environmental site assessment may include more inquiry than that constituting *appropriate inquiry* or, if the user is not concerned about qualifying for the *innocent landowner defense*, less inquiry than that constituting *appropriate inquiry*. See Appendix X1 and Practice E 1527. An environmental site assessment is both different from and less rigorous than an *environmental audit*.

3.3.14 *fill dirt*—dirt, soil, sand, or other earth, that is obtained off-site, that is used to fill holes or depressions, create mounds, or otherwise artificially change the grade or elevation of real property. It does not include material that is used in limited quantities for normal landscaping activities.

3.3.15 *hazardous waste/contaminated sites*—sites on which a release has occurred, or is suspected to have occurred, of any

hazardous substance, *hazardous waste*, or *petroleum products*, and on which release or suspected release has been reported to a government entity.

3.3.16 *historical recognized environmental condition*—environmental condition which in the past would have been considered a *recognized environmental condition*, but which may or may not be considered a *recognized environmental condition* currently. The final decision will be influenced by the current impact of the *historical recognized environmental condition* on the property.

3.3.17 *innocent landowner defense*—that defense to CERCLA liability provided in 42 USC § 9601(35) and § 9607(b)(3). One of the requirements to qualify for this defense is that the party make "all appropriate inquiry into the previous ownership and uses of the property consistent with good commercial or customary practice." There are additional requirements to qualify for this defense. See discussion in Appendix X1 and Practice E 1527.

3.3.18 *interviews*—those portions of the *Phase I Environmental Site Assessment* in Practice E 1527 that are contained in Sections 9 and 10 thereof and addresses questions to be asked of *owners* and *occupants* of the *property* and questions to be asked of local government officials.

3.3.19 *key site manager*—the *key site manager* is the person identified by the *owner* of a *property* as having good knowledge of the uses and physical characteristics of the property. See 9.5.1 of Practice E 1527.

3.3.20 *local government agencies*—those agencies of municipal or county government having jurisdiction over the *property*. Municipal and county government agencies include but are not limited to cities, parishes, townships, and similar entities.

3.3.21 *LUST sites*—state lists of leaking underground storage tank sites. Section 9003 (h) of Subtitle I of RCRA gives EPA and states, under cooperative agreements with EPA, authority to clean up releases from UST systems or require owners and operators to do so.

3.3.22 *major occupants*—those tenants, subtenants, or other persons or entities each of which uses at least 40 % of the leasable area of the *property* or any anchor tenant when the *property* is a shopping center.

3.3.23 *material threat*—a physically observable or obvious threat which is reasonably likely to lead to a release that, in the opinion of the *environmental professional*, is threatening and might result in impact to public health or the environment. An example might include an aboveground storage tank that contains a hazardous substance and which shows evidence of damage. The damage would represent a material threat if it is deemed serious enough that it may cause or contribute to tank integrity failure with a release of contents to the environment.

3.3.24 *obvious*—that which is plain or evident; a condition or fact which could not be ignored or overlooked by a reasonable observer while *visually or physically observing* the *property*.

3.3.25 *other historical sources*—any source or sources other than those designated in 7.3.4.1 through 7.3.4.8 of Practice E 1527 that are credible to a reasonable person and that identify past uses or occupancies of the *property*. The term includes records in the files, and/or personal knowledge of the *property owner* and/or *occupants*. See 7.3.4.9 of the Records Review Section of Practice E 1527.

3.3.26 *physical setting sources*—sources that provide information about the geologic, hydrogeologic, hydrologic, or topographic characteristics of a *property*. See 7.2.3 of Practice E 1527.

3.3.27 *practically reviewable*—information that is practically reviewable means that the information is provided by the source in a manner and in a form that, upon examination, yields information relevant to the *property* without the need for extraordinary analysis of irrelevant data. The form of the information shall be such that the user can review the records for a limited geographic area. Records that cannot be feasibly retrieved by reference to the location of the *property* or a geographic area in which the *property* is located are not generally *practically reviewable*. Listings in publicly available records that do not have adequate address information to be located geographically are not generally considered *practically reviewable*. Most databases of public records are *practically reviewable* if they can be obtained from the source agency by the county, city, zip code, or other geographic area of the facilities listed in the record system. Records that are sorted, filed, organized, or maintained by the source agency only chronologically are not generally practically reviewable. For large databases with numerous facility records (such as RCRA hazardous waste generators and registered underground storage tanks), the records are not *practically reviewable* unless they can be obtained from the source agency in the smaller geographic area of zip codes. Even when information is provided by zip code for some large databases, it is common for an unmanageable number of sites to be identified within a given zip code. In these cases, it is not necessary to review the impact of all of the sites that are likely to be listed in any given zip code because that information would not be practically reviewable. In other words, when so much data is generated that it cannot be feasibly reviewed for its impact on the property, it is not *practically reviewable*.

3.3.28 *preparer*—the person preparing the *transaction screen questionnaire* pursuant to this practice, who may be either the *user* or the person to whom the *user* has delegated the preparation.

3.3.29 *publicly available*—information that is publicly available means that the source of the information allows access to the information by anyone upon request.

3.3.30 *reasonably ascertainable*—for purposes of both this practice and Practice E 1527 information that is *publicly available*, obtainable from its source within reasonable time and cost constraints, and *practically reviewable*.

3.3.31 *recognized environmental conditions*—the presence or likely presence of any *hazardous substances* or *petroleum products* on a *property* under conditions that indicate an existing release, a past release, or a material threat of a release of any *hazardous substances* or *petroleum products* into structures on the *property* or into the ground, ground water, or surface water of the *property*. The term includes *hazardous substances* or *petroleum products* even under conditions in compliance with laws. The term is not intended to include *de*

minimis conditions that generally do not present a material risk of harm to public health or the environment and that generally would not be the subject of an enforcement action if brought to the attention of appropriate governmental agencies. Conditions determined to be *de minimis* are not *recognized environmental conditions.*

3.3.32 *records review*—that part of the *Phase I Environmental Site Assessment* in Practice E 1527 that is contained in Section 7 thereof and addresses which records shall or may be reviewed.

3.3.33 *site reconnaissance*—that part of the *Phase I Environmental Site Assessment* in Practice E 1527 that is contained in Section 8 thereof and addresses what should be done in connection with the *site visit*. The site reconnaissance includes, but is not limited to, the *site visit* done in connection with such as *Phase I Environmental Site Assessment*.

3.3.34 *site visit*—the visit to the property during which observations are made constituting the *site reconnaissance* section of the *Phase I Environmental Site Assessment* in Practice E 1527 and the *site visit* requirement of the transaction screen process in this practice.

3.3.35 *standard environmental record sources*— those records specified in 7.2.1.1 of the Records Review Section of the *Phase I Environmental Site Assessment* of Practice E 1527.

3.3.36 *standard historical sources*—those sources of information about the history of uses of property specified in 7.3.4 of the Records Review Section of the *Phase I Environmental Site Assessment* of Practice E 1527.

3.3.37 *standard physical setting source*—a current USGS 7.5 minute topographic map (if any) showing the area on which the property is located. See 7.2.3 of Practice E 1527.

3.3.38 *standard practice(s)*—the activities set forth in either this practice or Practice E 1527, or both, for the conduct of environmental site assessments.

3.3.39 *standard sources*—sources of environmental, physical setting, or historical records specified in the Records Review Section (Section 7) of the *Phase I Environmental Site Assessment* of Practice E 1527.

3.3.40 *transaction screen questionnaire*—the questionnaire provided in Section 6 of Practice E 1527.

3.3.41 *transaction screen process*—the process described in Practice E 1527.

3.3.42 *user*—the party seeking to use the transaction screen process of this practice or the *Phase I Environmental Site Assessment* of Practices E 1527 or E 1528 to perform an *environmental assessment* of the *property*. A *user* may include, without limitation, a purchaser of *property*, a potential tenant of *property*, an *owner* of *property*, a lender, or a property manager.

3.3.43 *visually and/or physically observed*—during a *site visit* pursuant to the *transaction screen process* of this practice or pursuant to a *Phase I Environmental Site Assessment* of Practice E 1527, the term *visually and physically observed* means observations made by vision upon walking through a *property* and the structures located on it and observations made by the sense of smell, particularly observations of noxious or foul odors. The term *walking through* is not meant to imply that disabled persons who cannot physically walk may not conduct a *site visit*; they may do so by the means at their disposal for moving through the *property* and the structures located on it.

3.4 *Acronyms:Acronyms:*

3.4.1 *CERCLA*—Comprehensive Environmental Response, Compensation and Liability of 1980 Act (as amended, 42 USC § 9601 *et seq*.).

3.4.2 *CERCLIS*—Comprehensive Environmental Response, Compensation and Liability Information System maintained by EPA.

3.4.3 *CFR*—Code of Federal Regulations.

3.4.4 *CORRACTS*—facilities subject to Corrective Action under RCRA.

3.4.5 *EPA*—United States Environmental Protection Agency.

3.4.6 *EPCRA*—Emergency Planning and Community Right to Know Act (also known as SARA Title III), (42 USC § 11001 *et seq*.).

3.4.7 *ERNS*—Emergency Response Notification System.

3.4.8 *ESA*—environmental site assessment (different than an environmental audit; see 3.3.13).

3.4.9 *FOIA*—U.S. Freedom of Information Act (5 USC § 552 *et seq*.).

3.4.10 *FR*—Federal Register.

3.4.11 *LUST*—leaking underground storage tank.

3.4.12 *MSDS*—material safety data sheet.

3.4.13 *NCP*—National Contingency Plan.

3.4.14 *NFRAP*—former CERCLIS sites where no further remedial action is planned under CERCLA.

3.4.15 *NPDES*—National Pollutant Discharge Elimination System.

3.4.16 *NPL*—National Priorities List.

3.4.17 *PCBs*—polychlorinated biphenyls.

3.4.18 *PRP*—potentially responsible party (pursuant to CERCLA 42 USC § 9607(a).

3.4.19 *RCRA*—Resource Conservation and Recovery Act (as amended, 42 USC§ 6901 *et seq*.).

3.4.20 *SARA*—Superfund Amendments and Reauthorization Act of 1986 (amendment to CERCLA).

3.4.21 *TSDF*—hazardous waste treatment, storage or disposal facility.

3.4.22 *USC*—United States Code.

3.4.23 *USGS*—United States Geological Survey.

3.4.24 *UST*—underground storage tank.

4. Significance and Use

4.1 *Uses*—This practice is intended for use on a voluntary basis by parties who wish to assess the environmental condition of *commercial real estate*. While use of this practice is intended to constitute *appropriate inquiry* for purposes of CERCLA's *innocent landowner defense*, it is not intended that its use be limited to that purpose. This practice is intended primarily as an approach to conducting an inquiry designed to identify *recognized environmental conditions* in connection with a *property*, and *environmental site assessments* that are both more and less comprehensive than this practice (including, in some instances, no *environmental site assessment*) may be appropriate in some circumstances. Further, no implication is intended that a person must use this practice in order to be deemed to have conducted inquiry in a commercially prudent

or reasonable manner in any particular transaction. Nevertheless, this practice is intended to reflect a commercially prudent and reasonable inquiry.

4.2 *Clarifications on Use*:

4.2.1 *Use Not Limited to CERCLA*—This practice and Practice E 1527 are designed to assist the *user* in developing information about the environmental condition of a *property* and as such has utility for a wide range of persons, including those who may have no actual or potential CERCLA liability and/or may not be seeking the *innocent landowner defense*.

4.2.2 *Residential Tenants/Purchasers and Others*—No implication is intended that it is currently customary practice for residential tenants of multifamily residential buildings, tenants of single-family homes or other residential real estate, or purchasers of dwellings for residential use, to conduct an *environmental site assessment* in connection with these transactions. Thus, these transactions are not included in the term commercial real estate transactions, and it is not intended to imply that such persons are obligated to conduct an *environmental site assessment* in connection with these transactions for purposes of *appropriate inquiry* or for any other purpose. In addition, no implication is intended that it is currently customary practice for *environmental site assessments* to be conducted in other unenumerated instances (including but not limited to many commercial leasing transactions, many acquisitions of easements, and many loan transactions in which the lender has multiple remedies). On the other hand, anyone who elects to do an *environmental site assessment* of any *property* or portion of a property may, in such person's judgment, use either this practice or Practice E 1527.

4.2.3 *Site-Specific*— This practice is site-specific in that it relates to assessment of environmental conditions on a specific parcel of *commercial real estate*. Consequently, this practice does not address many additional issues raised in transactions such as purchases of business entities, or interests therein, or of their assets, that may well involve environmental liabilities pertaining to properties previously owned or operated or other off-site environmental liabilities.

4.3 *Two Related Practices*—This practice sets forth one procedure for an environmental site assessment for purposes of appropriate inquiry necessary to qualify for CERCLA's *innocent landowner defense*, known as a "transaction screen process" or a transaction screen." This practice is a companion to Practice E 1527 that is called the "Phase I Environmental Site Assessment Process" or a "Phase I ESA" or simply a "Phase I." These practices are each intended to meet the standard of *appropriate inquiry* necessary to qualify for the *innocent landowner defense* of CERCLA. It is essential to consider that these two practices, taken together, provide for two alternative practices of appropriate inquiry: the *transaction screen process* described in this practice and the *Phase I Environmental Site Assessment* described in Practice E 1527.

4.3.1 *Election to Commence With Either Practice*—The *user* may commence inquiry to identify recognized *environmental conditions* in connection with a *property* by performing either the *transaction screen process* or the *Phase I Environmental Site Assessment*.

4.3.2 *Who May Conduct*— The *transaction screen process* may be conducted either by the *user* (including an agent, independent contractor or employee of the *user*) or wholly or partially by an *environmental professional*. The *transaction screen process* does not require the judgment of an *environmental professional*. Whenever a *Phase I Environmental Site Assessment* is conducted, it must be performed by an *environmental professional* to the extent specified in 6.5.1 through 6.5.2.1 of Practice E 1527. Further, at the *Phase I Environmental Site Assessment* level, no practical standard should be designed to eliminate the role of judgment and the value and need for experience in the party performing the inquiry. The professional judgment of an *environmental professional* is, consequently, vital to the performance of appropriate inquiry at the *Phase I Environmental Site Assessment* level.

4.3.3 *Completion of Transaction Screen Process*—Performance of the *transaction screen process* may allow the *user* to conclude that no further inquiry is needed to assess the potential for identifying any *recognized environmental condition* at the property and hence that performance of the *transaction screen process* constitutes *appropriate inquiry* without undertaking the *Phase I Environmental Site Assessment*. Upon completion of the *transaction screen process*, the *user* should conclude either (1) no further inquiry into recognized environmental conditions at the property is needed for purposes of *appropriate inquiry*, or (2) further inquiry is needed to assess *recognized environmental conditions* appropriately for purposes of *appropriate inquiry*. If no further inquiry is needed, the *user* has completed his or her *appropriate inquiry* of the *property*.

4.3.4 *Inquiry Beyond the Transaction Screen Process*—If further inquiry is needed after performance of the *transaction screen process* (as described in 4.3.3), the *user* must determine, in the exercise of the *user's* reasonable business judgment, whether further inquiry may be limited to those specific issues identified as of concern or should proceed to a full *Phase I Environmental Site Assessment*.

4.4 *Additional Services*—As set forth in 11.9 of Practice E 1527, additional services may be contracted for between the *user* and the *environmental professional(s)*.

4.5 *Principles*—The following principles are an integral part of this practice and are intended to be referred to in resolving any ambiguity or exercising such discretion as is accorded the *user* or *environmental professional* in performing an *environmental site assessment* or in judging whether a *user* or *environmental professional* has conducted *appropriate inquiry* or has otherwise conducted an adequate *environmental site assessment*.

4.5.1 No *environmental site assessment* can wholly eliminate uncertainty regarding the potential for *recognized environmental conditions* in connection with a *property.* Performance of either this practice or Practice E 1527 is intended to reduce but not eliminate uncertainty regarding the existence of *recognized environmental conditions* in connection with a property, and both practices recognize reasonable limits of time and cost.

4.5.2 *Appropriate inquiry* does not mean an exhaustive assessment of a clean *property*. There is a point at which the

cost of information obtained or the time required to gather it outweighs the usefulness of the information and, in fact, may be a material detriment to the orderly completion of transactions. One of the purposes of this practice is to identify a balance between the competing goals of limiting the costs and time demands inherent in performing an *environmental site assessment* and the reduction of uncertainty about unknown conditions resulting from additional information.

4.5.3 Not every *property* will warrant the same level of assessment. Consistent with good commercial or customary practice, the appropriate level of *environmental site assessment* will be guided by the type of property subject to assessment, the expertise and risk tolerance of the *user*, and the information developed in the course of the inquiry.

4.5.4 It should not be concluded or assumed that an inquiry was not an *appropriate inquiry* merely because the inquiry did not identify *recognized environmental conditions* in connection with a *property. Environmental site assessments* must be evaluated based on the reasonableness of judgments made at the time and under the circumstances in which they were made. Subsequent *environmental site assessments* should not be considered valid standards to judge the appropriateness of any prior assessment based on hindsight, new information, use of developing technology or analytical techniques, or other factors.

4.6 *Continued Viability of Environmental Site Assessment*—An *environmental site assessment* meeting or exceeding either this practice or Practice E 1527 and completed less than 180 days previously is presumed to be valid. An *environmental site assessment* meeting or exceeding either practice and completed more than 180 days previously may be used to the extent allowed by 4.7 through 4.7.5.

4.7 *Prior Assessment Usage*—Both this practice and Practice E 1527 recognize that *environmental site assessments* performed in accordance with these practices will include information which *users* or subsequent users may want to use to avoid undertaking duplicative assessment procedures. Therefore, the practices describe procedures to be followed to assist users in determining the appropriateness of using information in *environmental site assessments* performed previously. The system of prior assessment usage is based on the following principles that should be adhered to in addition to the specific procedures set forth elsewhere in these practices:

4.7.1 Subject to 4.7.4, *users* and *environmental professionals* may use information in prior *environmental site assessments* provided such information was generated as a result of procedures that meet or exceed the requirements of this practice or Practice E 1527 and then only provided that the specific procedures set forth in each practice are met.

4.7.2 Subject to 4.7.4, a prior *environmental site assessment* may be used in its entirety, without regard to the specific procedures set forth in these practices, if, in the reasonable judgment of the *user*: the prior *environmental site assessment* meets or exceeds the requirements of this practice or Practice E 1527, and the conditions at the *property* likely to affect *recognized environmental conditions* in connection with the *property* are not likely to have changed materially since the prior *environmental site assessment* was conducted. In making this judgment, the *user* should consider the type of *property* assessed and the conditions in the area surrounding the *property*.

4.7.3 Except as provided in 4.7.2 and 4.7.2 of Practice E 1527, prior *environmental site assessments* should not be used without current investigation of conditions likely to affect *recognized environmental conditions* in connection with the *property* that may have changed materially since the prior *environmental site assessment* was conducted. At a minimum, for a *transaction screen process* consistent with this practice, a new *site visit* should be performed.

4.7.4 If the *user* or *environmental professional(s)* conducting an *environmental site assessment* has *actual knowledge* that the information being used from a prior *environmental site assessment* is not accurate or if it is *obvious*, based on other information obtained by means of the *environmental site assessment* or known to the person conducting the *environmental site assessment*, that the information being used is not accurate, such information from a prior *environmental site assessment* may not be used.

4.7.5 The contractual and legal obligations between prior and subsequent *users* of *environmental site assessments* or between *environmental professionals* who conducted prior *environmental site assessments* and those who would like to use such prior *environmental site assessments* are beyond the scope of this practice.

4.8 The contractual and legal obligations between an *environmental professional* and a *user* (and other parties, if any) are beyond the scope of this practice. No specific legal relationship between the *environmental professional* and the *user* is necessary for the *user* to meet the requirements of this practice.

4.9 If the *user* is aware of any specialized knowledge or experience that is material to *recognized environmental conditions* in connection with the *property*, and the *preparer* is not the *user*, it is the *user*'s responsibility to communicate any information based on such specialized knowledge or experience to the *preparer*. The *user* should do so before the preparer makes the site visit.

4.10 In a transaction involving the purchase of a parcel of *commercial real estate*, if a *user* has *actual knowledge* that the purchase price of the property is significantly less than the purchase price of comparable properties, the *user* should try to identify an explanation for the lower price and to make a written record of such explanation. Among the factors to consider will be the information that becomes known to the *user* pursuant to the *transaction screen environmental site assessment*.

5. Introduction to Transaction Screen Questionnaire

5.1 *Process*—The *transaction screen process* consists of asking questions contained within the *transaction screen questionnaire* of *owners* and *occupants* of the *property*, observing site conditions at the *property* with direction provided by the *transaction screen questionnaire*, and, to the extent *reasonably ascertainable*, conducting limited research regarding certain *government records* and certain *standard historical sources*. The questions asked of *owners* are the same questions as those asked of *occupants*.

5.2 *Guide*—The *transaction screen questionnaire* is followed by a guide designed to assist the person completing the *transaction screen questionnaire*. The guide to the *transaction screen questionnaire* is set out in Sections 7-10 of this practice. The guide is divided into three sections: Guide for Owner/Occupant Inquiry, Guide to Site Visit, and Guide to Government Records/Historical Sources Inquiry.

5.2.1 To assist the *user*, its employee or agent, or the *environmental professional* in preparing a report, the guide repeats each of the questions set out in the *transaction screen questionnaire* in both the guide for *owner/occupant inquiry* and the guide to *site visit*. The questions regarding *government records/historical sources inquiry* are also repeated in the guide to that section.

5.2.2 The guide also describes the procedures to be followed to determine if reliance upon the information in a prior *environmental site assessment* is appropriate under this practice.

5.2.3 A *user*, his employee or agent, or *environmental professional* conducting the *transaction screen process* should not use the *transaction screen questionnaire* without reference to, or familiarity from prior usage with, the guide.

5.3 *User and Preparer*—The *user* conducting the *transaction screen process* is the party seeking to perform *appropriate inquiry* with respect to the *property*. The *user* may delegate the preparation of the *transaction screen questionnaire* to an employee or agent of the *user* or may contract with a third party to prepare the questionnaire on behalf of the *user*. The person preparing the questionnaire is the *preparer*, who may be either the *user* or the person to whom the *user* has delegated the preparation of the *transaction screen questionnaire*.

5.4 *Exercise of Care*— The *preparer* conducting the transaction screen process should use good faith efforts in determining answers to the questions set forth in the transaction screen questionnaire. The *user* should take time and care to check whatever records are in the user's possession. The *preparer* should ask all persons to whom questions are directed to give answers to the best of the respondent's knowledge. As required by Section 9601(35)(B) of CERCLA, the *user* or *preparer* should discuss with a responsible person in authority in the user's organization (if any) any specialized knowledge or experience relating to *hazardous substances* on the *property* and the *preparer* should understand such information.

5.5 *Knowledge*—The owner or occupant of the *property* to which portions of the transaction screen questionnaire are directed should have sufficient knowledge and experience with respect to the property or in the owner's or occupant's particular business to understand the purpose and use of the transaction screen questionnaire. All answers should be given to the best of the owner's or occupant's actual knowledge.

5.5.1 While the person conducting the *transaction screen process* has an obligation to ask the questions set forth in the *transaction screen questionnaire*, in many instances the parties to whom the questions are addressed will have no obligation to answer them. The *user* is only required to obtain information to the extent it is *reasonably ascertainable*.

5.5.2 If the preparer asks the questions set forth in the *transaction screen questionnaire*, but does not receive any response or receives partial responses, the questions will be deemed to have been answered provided the questions have been asked, or were attempted to be asked, in person or by telephone and written records have been kept of the person to whom the questions were addressed and their responses, or the questions have been asked in writing sent by certified or registered mail, return receipt requested, postage prepaid, or by private, commercial overnight carrier and no responses have been obtained after at least two follow-up telephone calls were made or written request was sent again asking for responses.

5.5.3 The *transaction screen questionnaire* and the *transaction screen guide* sometimes include the phrase "to the best of your knowledge." Use of this phrase shall not be interpreted as imposing a constructive knowledge standard when it is not included or as imposing anything other than an *actual knowledge* standard for the person answering the questions, regardless of whether it is used. It is sometimes included as an assurance to the person being questioned that he or she is not obligated to search out information he or she does not currently have in order to answer the particular question.

5.6 *Conclusions Regarding Affirmative or Unknown Answers*—If any of the questions set forth in the transaction screen questionnaire are answered in the affirmative, the user must document the reason for the affirmative answer. If any of the questions are not answered or the answer is unknown, the user should document such nonresponse or answer of unknown and evaluate it in light of the other information obtained in the transaction screen process, including, in particular, the *site visit* and the government records/historical sources inquiry. If the *user* decides no further inquiry is warranted after receiving no response, an answer of unknown or an affirmative answer, the *user* must document the reasons for any such conclusion.

5.6.1 Upon obtaining an affirmative answer, an answer of unknown or no response, the *user* should first refer to the guide. The guide may provide sufficient explanation to allow a *user* to conclude that no further inquiry is appropriate with respect to the particular question.

5.6.2 If the guide to a particular question does not, in itself, permit a *user* to conclude that no further inquiry is appropriate, then the *user* should consider other information obtained from the *transaction screen process* relating to this question. For example, while on the site performing a *site visit*, a person may find a storage tank on the *property* and therefore answer Question 10 of the *transaction screen questionnaire* in the affirmative. However, during or subsequent to the *owner/occupant inquiry*, the *owner* may produce evidence that substances now or historically contained in the tank (for example, water) are not likely to cause contamination.

5.6.3 If either the guide to the question or other information obtained during the *transaction screen process* does not permit a *user* to conclude no further inquiry is appropriate with respect to such question, then the user must determine, in the exercise of the *user's* reasonable business judgment, based upon the totality of unresolved affirmative answers or answers of unknown received during the *transaction screen process*, whether further inquiry may be limited to those specific issues identified as of concern or should proceed with a full *Phase I Environmental Site Assessment*.

5.7 *Presumption*— A presumption exists that further inquiry is necessary if an affirmative answer is given to a question or because the answer was unknown or no response was given. In rebutting this presumption, the *user* should evaluate information obtained from each component of the transaction screen process and consider whether sufficient information has been obtained to conclude that no further inquiry is necessary. The user must determine, in the exercise of the user's reasonable business judgment, the scope of such further inquiry: whether to proceed with a *Phase I Environmental Site Assessment* prepared in accordance with Practice E 1527 or a lesser inquiry directed at specific issues raised by the questionnaire.

5.8 *Further Inquiry Under Practice E 1527*—Upon completing the *transaction screen questionnaire*, if the *user* concludes that a *Phase I Environmental Site Assessment* is needed, the *user* should proceed with such inquiry with the advice and guidance of an *environmental professional*. Such further inquiry should be undertaken in accordance with Practice E 1527.

5.9 *Signature*—The *user* and the *preparer* of the *transaction screen questionnaire* must complete and sign the questionnaire as provided at the end of the questionnaire.

6. Transaction Screen Questionnaire

6.1 *Persons to Be Questioned*—The following questions should be asked of (*1*) the current *owner* of the *property*, (*2*) any major *occupant* of the *property* or, if the *property* does not have any major *occupants*, at least 10 % of the *occupants* of the *property*, and (*3*) in addition to the current *owner* and the *occupants* identified in (*2*), any *occupant* likely to be using, treating, generating, storing, or disposing of *hazardous substances* or *petroleum products* on or from the *property*. A major *occupant* is any *occupant* using at least 40 % of the leasable area of the property or any anchor tenant when the *property* is a shopping center. In a multifamily property containing both residential and commercial uses, the *preparer* does not need to ask questions of the residential *occupants*. The preparer should ask each person to answer all questions to the best of the respondent's *actual knowledge* and in good faith. When completing the *site visit* column, the *preparer* should be sure to observe the *property* and any buildings and other structures on the *property*. The guide provides further details on the appropriate use of this questionnaire.[5]

[5] Unk = "unknown" or "no response."

Description of Site: Address:

Question	Owner[7]			Occupants (if applicable)			Observed During Site Visit	
1a. Is the *property* used for an industrial use?	Yes	No	Unk	Yes	No	Unk	Yes	No
1b. Is any *adjoining property* used for an industrial use?	Yes	No	Unk	Yes	No	Unk	Yes	No
2a. Did you observe evidence or do you have any prior knowledge that the *property* has been used for an industrial use in the past?	Yes	No	Unk	Yes	No	Unk	Yes	No
2b. Did you observe evidence or do you have any prior knowledge that any *adjoining property* has been used for an industrial use in the past?	Yes	No	Unk	Yes	No	Unk	Yes	No
3a. Is the *property* used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?	Yes	No	Unk	Yes	No	Unk	Yes	No
3b. Is any *adjoining property* used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?	Yes	No	Unk	Yes	No	Unk	Yes	No
4a. Did you observe evidence or do you have any prior knowledge that the *property* has been used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?	Yes	No	Unk	Yes	No	Unk	Yes	No
4b. Did you observe evidence or do you have any prior knowledge that any *adjoining property* has been used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?	Yes	No	Unk	Yes	No	Unk	Yes	No
5a. Are there currently any damaged or discarded automotive or industrial batteries, pesticides, paints, or other chemicals in individual containers of >5 gal (19 L) in volume or 50 gal (190 L) in the aggregate, stored on or used at the *property* or at the facility?	Yes	No	Unk	Yes	No	Unk	Yes	No

Question	Owner[7]			Occupants (if applicable)			Observed During Site Visit	
5b. Did you observe evidence or do you have any prior knowledge that there have been previously any damaged or discarded automotive or industrial batteries, or pesticides, paints, or other chemicals in individual containers of >5 gal (19 L) in volume or 50 gal (190 L) in the aggregate, stored on or used at the *property* or at the facility?	Yes	No	Unk	Yes	No	Unk	Yes	No
6a. Are there currently any industrial *drums* (typically 55 gal (208 L)) or sacks of chemicals located on the property or at the facility?	Yes	No	Unk	Yes	No	Unk	Yes	No
6b. Did you observe evidence or do you have any prior knowledge that there have been previously any industrial *drums* (typically 55 gal (208 L)) or sacks of chemicals located on the property or at the facility?	Yes	No	Unk	Yes	No	Unk	Yes	No
7a. Did you observe evidence or do you have any prior knowledge that *fill dirt* has been brought onto the property that originated from a contaminated site?	Yes	No	Unk	Yes	No	Unk	Yes	No
7b. Did you observe evidence or do you have any prior knowledge that *fill dirt* has been brought onto the property that is of an unknown origin?	Yes	No	Unk	Yes	No	Unk	Yes	No
8a. Are there currently any *pits, ponds*, or *lagoons* located on the *property* in connection with waste treatment or waste disposal?	Yes	No	Unk	Yes	No	Unk	Yes	No
8b. Did you observe evidence or do you have any prior knowledge that there have been previously, any *pits, ponds*, or *lagoons* located on the *property* in connection with waste treatment or waste disposal?	Yes	No	Unk	Yes	No	Unk	Yes	No
9a. Is there currently any stained soil on the *property*?	Yes	No	Unk	Yes	No	Unk	Yes	No
9b. Did you observe evidence or do you have any prior knowledge that there has been previously, any stained soil on the *property*?	Yes	No	Unk	Yes	No	Unk	Yes	No
10a. Are there currently any registered or unregistered storage tanks (above or underground) located on the *property*?	Yes	No	Unk	Yes	No	Unk	Yes	No
10b. Did you observe evidence or do you have any prior knowledge that there have been previously, any registered or unregistered storage tanks (above or underground) located on the *property*?	Yes	No	Unk	Yes	No	Unk	Yes	No
11a. Are there currently any vent pipes, fill pipes, or access ways indicating a fill pipe protruding from the ground on the *property* or adjacent to any structure located on the *property*?	Yes	No	Unk	Yes	No	Unk	Yes	No
11b. Did you observe evidence or do you have any prior knowledge that there have been previously, any vent pipes, fill pipes, or access ways indicating a fill pipe protruding from the ground on the *property* or adjacent to any structure located on the *property*?	Yes	No	Unk	Yes	No	Unk	Yes	No
12a. Is there currently evidence of leaks, spills or staining by substances other than water, or foul odors, associated with any flooring, drains, walls, ceilings, or exposed grounds on the property?	Yes	No	Unk	Yes	No	Unk	Yes	No

Question	Owner[7]			Occupants (if applicable)			Observed During Site Visit	
12b. Did you observe evidence or do you have any prior knowledge that there have been previously any leaks, spills, or staining by substances other than water, or foul odors, associated with any flooring drains, walls, ceilings or exposed grounds on the property?	Yes	No	Unk	Yes	No	Unk	Yes	No
13a. If the property is served by a private well or non-public water system, is there evidence or do you have prior knowledge that contaminants have been identified in the well or system that exceed guidelines applicable to the water system?	Yes	No	Unk	Yes	No	Unk	Yes	No
13b. If the property is served by a private well or non-public water system, is there evidence or do you have prior knowledge that the well has been designated as contaminated by any government environmental/health agency?	Yes	No	Unk	Yes	No	Unk	Yes	No
14. Does the *owner* or *occupant* of the *property* have any knowledge of *environmental liens* or governmental notification relating to past or recurrent violations of environmental laws with respect to the *property* or any facility located on the *property*?	Yes	No	Unk	Yes	No	Unk		
15a. Has the *owner* or *occupant* of the *property* been informed of the past existence of *hazardous substances* or *petroleum products* with respect to the *property* or any facility located on the *property*?	Yes	No	Unk	Yes	No	Unk		
15b. Has the *owner* or *occupant* of the *property* been informed of the current existence of *hazardous substances* or *petroleum products* with respect to the *property* or any facility located on the *property*?	Yes	No	Unk	Yes	No	Unk		
15c. Has the *owner* or *occupant* of the *property* been informed of the past existence of environmental violations with respect to the *property* or any facility located on the *property*?	Yes	No	Unk	Yes	No	Unk		
15d. Has the *owner* or *occupant* of the *property* been informed of the current existence of environmental violations with respect to the *property* or any facility located on the *property*?	Yes	No	Unk	Yes	No	Unk		
16. Does the *owner* or *occupant* of the *property* have any knowledge of any *environmental site assessment* of the *property* or facility that indicated the presence of *hazardous substances* or *petroleum products* on, or contamination of, the *property* or recommended further assessment of the *property*?	Yes	No	Unk	Yes	No	Unk		
17. Does the *owner* or *occupant* of the *property* know of any past, threatened, or pending lawsuits or administrative proceedings concerning a release or threatened release of any *hazardous substance* or *petroleum products* involving the *property* by any owner or occupant of the *property*?	Yes	No	Unk	Yes	No	Unk		
18a. Does the *property* discharge waste water (not including sanitary waste or storm water) onto or adjacent to the *property* and/or into a storm water system?	Yes	No	Unk	Yes	No	Unk	Yes	No

Question	Owner[7]			Occupants (if applicable)			Observed During Site Visit	
18b. Does the *property* discharge waste water (not including sanitary waste or storm water) onto or adjacent to the *property* and/or into a sanitary sewer system?	Yes	No	Unk	Yes	No	Unk	Yes	No
19. Did you observe evidence or do you have any prior knowledge that any *hazardous substances* or *petroleum products*, unidentified waste materials, tires, automotive or industrial batteries, or any other waste materials have been dumped above grade, buried and/or burned on the *property*?	Yes	No	Unk	Yes	No	Unk	Yes	No
20. Is there a transformer, capacitor, or any hydraulic equipment for which there are any records indicating the presence of PCBs?	Yes	No	Unk	Yes	No	Unk	Yes	No

Government Records/Historical Sources Inquiry

(See guide, Section 10)

21. Do any of the following Federal government record systems list the property or any property within the search distance noted below:

	Approximate Minimum Search Distance, miles (kilometers)		
Federal NPL site list	1.0 (1.6)	Yes	No
Federal CERCLIS list	0.5 (0.8)	Yes	No
Federal CERCLIS NFRAP site list	property and adjoining properties	Yes	No
Federal RCRA CORRACTS facilities list	1.0 (1.6)	Yes	No
Federal RCRA non-CORRACTS TSD facilities list	0.5 (0.8)	Yes	No
Federal RCRA generators list	property and adjoining properties	Yes	No
Federal ERNS list	property only	Yes	No

22. Do any of the following state record systems list the property or any property within the search distance noted below:

	Approximate Minimum Search Distance, miles (kilometers)		
State lists of hazardous waste sites identified for Investigation or remediation:			
State — Equivalent NPL	1.0 (1.6)	Yes	No
State — Equivalent CERCLIS	0.5 (0.8)	Yes	No
State landfill and/or solid waste disposal site lists	0.5 (0.8)	Yes	No
State leaking UST lists	0.5 (0.8)	Yes	No
State registered UST lists	property and adjoining properties	Yes	No

23. Based upon a review of *fire insurance maps* 10.3.1.3 or consultation with the local fire department serving the *property*, all as specified in the guide, are any buildings or other improvements on the *property* or on an *adjoining property* identified as having been used for an industrial use or uses likely to lead to contamination of the *property*? Yes No

The *preparer* of the *transaction screen questionnaire* must complete and sign the following. (For definition of “preparer” and “user,” see 5.3 or 3.3.28.)

The *Owner* questionnaire was completed by:

Name
Title
Firm
Address

Phone number
Date
Preparer's relationship to site
Preparer's relationship to user (for example, principal, employee, agent, consultant)

The *Occupant* questionnaire was completed by:

Name
Title
Firm
Address

Phone number
Date
Preparer's relationship to site
Preparer's relationship to user (for example, principal, employee, agent, consultant)

The *Site Visit* questionnaire was completed by:

Name
Title
Firm
Address

Phone number
Date
Preparer's relationship to site
Preparer's relationship to user (for example, principal, employee, agent, consultant)

The *Government Records* and *Historical Sources Inquiry* questionnaire was completed by:

Name
Title
Firm
Address

Phone number
Date
Preparer's relationship to site
Preparer's relationship to user (for example, principal, employee, agent, consultant)

User's relationship to the site (for example, owner, prospective purchaser, lender, etc.)

If the preparer(s) is different from the user, complete the following:

Name of User
User's address

User's phone number

Copies of the completed questionnaires have been filed at:

Copies of the completed questionnaires have been mailed or delivered to:

Preparer represents that to the best of the preparer's knowledge the above statements and facts are true and correct and to the best of the preparer's actual knowledge no material facts have been suppressed or misstated.

Signature _____ Date_____
Signature _____ Date_____
Signature _____ Date_____

7. Guide to Transaction Screen Questionnaire

7.1 The following sets forth the guide to the *transaction screen questionnaire*. The guide accompanies the *transaction screen questionnaire* to assist the *preparer* in completing the questionnaire. Questions found in the *transaction screen questionnaire* are repeated in the guide.

7.2 If the *preparer* completing the *transaction screen questionnaire* is familiar with the guide from prior usage, the questionnaire may be completed without reference to the guide.

7.3 The *site visit* portion of the guide considers most of the same questions set forth in the guide to *owner/occupant inquiry* because the *transaction screen process* requires both questions of *owners* and *occupants* of the *property* and observations of the *property* by the *preparer*.

7.4 Prior *environmental site assessment* usage procedures are contained in the guide to *owner/occupant inquiry* and the guide to *government records/historical sources inquiry*. The information supplied in connection with the *site visit* portion of a prior *environmental site assessment* may be used for guidance, but may not be relied upon without determining through a new *site visit* whether any conditions that are material to recognized environmental conditions in connection with the *property* have changed since the prior *environmental site assessment*. Therefore, the guide to the *site visit* does not contain any prior assessment procedures.

7.5 In performing the *site visit* portion of the *transaction screen process*, the *preparer* should *visually and physically observe* the *property* and any structure located on the *property* to the extent not obstructed by bodies of water, cliffs, adjacent buildings, or other impassable obstacles.

7.5.1 The periphery of the *property* should be *visually and physically observed*, as well as the periphery of all structures on the *property*, and the *property* should be viewed from all adjacent public thoroughfares. Any overgrown areas should be inspected, including roads or paths with no apparent outlet that should be *visually and physically* observed to their ends.

7.5.2 On the interior of structures on the *property*, accessible common areas expected to be used by building *occupants* or the public (such as lobbies, hallways, utility rooms, and recreation areas), a representative sample of *owner* and *occupant* spaces, and maintenance and repair areas, including boiler rooms, should be *visually and physically* observed. It is not necessary to look under floors, above ceilings, or behind walls.

7.5.3 After completing the *site visit*, the *preparer* of the *transaction screen questionnaire* may obtain "yes" answers that require the *preparer* once again to ask questions of the *owner* of the *property* or *occupants* of the *property* to satisfy the *user* that no further inquiry is necessary.

7.6 In addition to asking questions of the *owner* of the *property* and *occupants* of the *property* (Section 8) and *visually and physically* observing the *property* (Section 9), the *user* completing the *transaction screen process* should determine, either from governmental agencies or through commercial services providing government environmental records, whether certain known or suspected contaminated sites or activities involving the release of *hazardous substances* or *petroleum products* occur on or near the *property*. See Section 10.

7.6.1 These records may be obtained either directly from the government agencies or from commercial services that provide the records for a fee. Because of the numerous sources that must be searched and the response time of government agencies, commercial services are available that provide a single source for federal and state records. These services may provide a quicker response than the government agencies but fees will be charged for the information.

7.6.2 If government information is obtained from a commercial service, the firm should provide assurances that its records stay current with the government agency record sources. Government information obtained from non-government sources may be considered current if the source updates the information at least every 90 days, or, for information that is updated less frequently than quarterly by the government agency, within 90 days of the date the government agency makes the updated information available to the public.

7.6.3 The identity of firms providing this type of government information may be obtained through local telephone directories or through an inquiry of environmental professionals in the area of the preparer completing the transaction screen questionnaire.

8. Guide for Owner/Occupant Inquiry

8.1 Is the property used for an industrial use?

___Yes ___No ___Unknown

8.1.1 Is any adjoining property used for an industrial use?

___Yes ___No ___Unknown

	Land Use
Property:	_____
Adjoining properties north:	_____
Adjoining properties south:	_____
Adjoining properties east:	_____
Adjoining properties west:	_____

8.1.2 *Guide*:

8.1.2.1 It is recommended that the *preparer* describe the use of the *property* and *adjoining properties*.

8.1.2.2 Certain industrial uses on the *property* may raise concerns regarding the possibility of contamination affecting the *property*. For purposes of the *transaction screen questionnaire*, an industrial use is an activity requiring the application of labor and capital for the production or distribution of a product or article, including, without limitation, manufacturing, processing, extraction, refining, warehousing, transportation, and utilities. Manufacturing is defined as a process or operation of producing by hand, machinery, or other means a finished product or article from raw material. Industrial uses may be categorized as light or heavy industrial uses, depending upon the scale of the operations and the impact upon surrounding property in terms of smoke, fumes, and noise. Regardless of such categorization, the concern for purposes of the transaction screen process is whether the use involves the processing, storage, manufacture, or transportation of *hazardous substances* or *petroleum products*. For example, further inquiry would be necessary if the industrial use concerned the manufacture of paints, oils, solvents, and other chemical products but not if the use concerned the storage of inert goods in containers.

8.1.2.3 The term *adjoining properties* means any real property or properties the border of which is contiguous or partially

contiguous with that of the property, or that would be contiguous or partially contiguous with that of the property but for a street, road, or other public thoroughfare separating them. *Adjoining properties* means the *property* and include *properties* across the street or any right of way from the property.

8.1.2.4 To use the information supplied in response to this question in a prior *environmental site assessment*, the *preparer* must determine if there were changes in the use of the *property* or any *adjoining property* since the prior *environmental site assessment* that are material to *recognized environmental conditions* in connection with the *property*. If not, using information in the prior *environmental site assessment* is appropriate. If so, the information requested must be supplied for each *property* for which the use has so changed.

8.2 Did you observe evidence or do you have any prior knowledge that the *property* has been used for an industrial use in the past?

___Yes ___No ___Unknown

8.2.1 Did you observe evidence or do you have any prior knowledge that any *adjoining property* has been used for an industrial use in the past?

___Yes ___No ___Unknown

8.2.2 *Guide*—See guide for question 8.1.

	Owner	Use	Dates
Previous use of property			
Previous use of properties to north			
Previous use of properties to south			
Previous use of properties to east			
Previous use of properties to west			

8.3 Is the *property* used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard, or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?

___Yes ___No ___Unknown

8.3.1 Is any *adjoining property* used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?

___Yes ___No ___Unknown

	Land Use
Property:	
Adjoining properties north:	
Adjoining properties south:	
Adjoining properties east:	
Adjoining properties west:	

8.3.2 *Guide*:

8.3.2.1 It is recommended that the *preparer* describe the uses of the *property* and *adjoining properties*.

8.3.2.2 Gasoline stations, motor vehicle repair facilities (with or without supplying gas for the motor vehicles), dry cleaners, photo developing laboratories, commercial printing facilities, junkyards or landfills, and waste treatment, storage, disposal, processing, or recycling facilities all involve the use of *hazardous substances* or *petroleum products* and therefore require further inquiry concerning the possible release of such substances.

8.3.2.3 The term *adjoining properties* means any real property or properties the border of which is contiguous or partially contiguous with that of the *property*, or that would be contiguous or partially contiguous with that of the *property* but for a street, road, or other public thoroughfare separating them.

8.3.2.4 To rely on the information supplied in response to this question in a prior *environmental site assessment*, the *preparer* must determine if there were changes in the use of the property or any *adjoining property* since the prior *environmental site assessment* that are material to *recognized environmental conditions* in connection with the *property*. If not, then use of information in the prior *environmental site assessment* is appropriate. If so, the information requested must be supplied for each *property* for which the use has so changed.

8.4 Did you observe evidence or do you have any prior knowledge that the *property* has been used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?

___Yes ___No ___Unknown

8.4.1 Did you observe evidence or do you have any prior knowledge that any *adjoining property* has been used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recyling facility (if applicable, identify which)?

___Yes ___No ___Unknown

8.4.2 *Guide*—See guide for question 8.3.

	Owner	Use	Dates
Previous use of property			
Previous use of properties to north			
Previous use of properties to south			
Previous use of properties to east			
Previous use of properties to west			

LAND ISSUES

8.5 Are there currently any damaged or discarded automotive or industrial batteries, pesticides, paints, or other chemicals in individual containers of >5 gal (19 L) in volume or 50 gal (190 L) in the aggregate, stored on or used at the property or at the facility?

___Yes ___No ___Unknown

8.5.1 Did you observe evidence or do you have any prior knowledge that there have been previously any damaged or discarded automotive or industrial batteries, or pesticides, paints, or other chemicals in individual containers of >5 gal (19

L) in volume or 50 gal (190 L) in the aggregate, stored on or used at the *property* or at the facility?

___Yes ___No ___Unknown

8.5.2 *Guide*:

8.5.2.1 Are there any containers on the site that may contain any of these items? Is there any reason to suspect that chemicals or *hazardous substances* in such quantities may be stored on the site? Sheltered areas, cartons, sacks, storage bins, large canisters, sheds, or cellars of existing improvements are examples of containers and areas where chemicals or *hazardous substances* may be stored. If the answer to this question is "yes," list the items and the location(s) where they are stored. If unfamiliar with the contents of any container located on the site, the question must be answered "yes" until the materials are identified.

8.5.2.2 *Hazardous substances* may often be unmarked. The *preparer* should never open any containers that are unmarked because they may contain explosive materials or acids.

8.5.2.3 Consumer products in undamaged containers used for routine office maintenance or business, such as copy toner, should not create a need for further inquiry unless the quantity of such products is in excess of what would be customary for such use. The Environmental Protection Agency has published a guidance document that identifies hazardous substances that must be reported under Sections 311 and 312 of the Emergency Planning and Community Right to Know Act ("EPCRA").[6] This document lists in tabular form the CERCLA Section 103 chemicals. If a preparer has a question regarding whether the substance is a hazardous substance under CERCLA, the preparer may refer to the list of lists or 40 CFR Part 302. In addition, the Environmental Protection Agency has also published a guidance document.[7] This document sets forth the *hazardous substances* found in many common consumer products listed by trade name.

8.5.2.4 A *preparer* should not rely exclusively upon a prior *environmental site assessment* in supplying this information.

8.6 Are there currently any industrial drums (typically, 55 gal (208 L)) or sacks of chemicals located on the property or at the facility?

___Yes ___No ___Unknown

8.6.1 Did you observe evidence or do you have any prior knowledge that there have been previously any industrial *drums* (typically 55 gal (208 L)) or sacks of chemicals located on the property or at the facility?

___Yes ___No ___Unknown

8.6.2 *Guide*:

8.6.2.1 Chemicals are frequently stored in large 55-gal (208–L) drums and dry chemicals are often stored in 20 lb (9 kg) sacks. See Appendix X2 for examples of 55-gal (208–L) drums and for surface staining resulting from improper drum storage.

8.6.2.2 A *preparer* should not rely exclusively upon a prior *environmental site assessment* in supplying this information.

8.7 Did you observe evidence or do you have any prior knowledge that *fill dirt* has been brought onto the property that originated from a contaminated site?

___Yes ___No ___Unknown

8.7.1 Did you observe evidence or do you have any prior knowledge that *fill dirt* has been brought onto the property that is of an unknown origin?

___Yes ___No ___Unknown

8.7.2 *Guide*:

8.7.2.1 The origin of *fill dirt* brought onto the *property* should be investigated to determine whether such dirt originated from a contaminated site. The term *fill dirt* is defined in the definitions and the *preparer* should refer to the definitions if the *preparer* has any question concerning the meaning of the term.

8.7.2.2 If any structures have been demolished on the property, the *preparer* should investigate whether the structures were demolished in place and *fill dirt* compacted over them because such demolition debris may contain asbestos or *hazardous substances*.

8.7.2.3 To use the information supplied in response to this question in a prior *environmental site assessment*, the *preparer* must determine if there has been any filling at the site since the prior *environmental site assessment*. If not, then using information in the prior *environmental site assessment* is appropriate. If so, the information requested must be supplied for any *fill dirt* brought on the property since the prior *environmental site assessment*.

8.8 Are there currently any *pits, ponds, or lagoons* located on the *property* in connection with waste treatment or waste disposal?

___Yes ___No ___Unknown

8.8.1 Did you observe evidence or do you have any prior knowledge that there have been previously, any *pits, ponds*, or *lagoons* located on the *property* in connection with waste treatment or waste disposal?

___Yes ___No ___Unknown

8.8.2 *Guide*:

8.8.2.1 The presence of *pits, ponds, or lagoons*, together with waste treatment or waste disposal may indicate contaminated property. See the definitions with respect to the definition of *pits, ponds, or lagoons* in 3.2.28.

8.8.2.2 A *preparer* should not rely exclusively upon a prior *environmental site assessment* in supplying this information.

8.9 Is there currently any stained soil on the *property*?

___Yes ___No ___Unknown

8.9.1 Did you observe evidence or do you have any prior knowledge that there has been previously, any stained soil on the *property*?

___Yes ___No ___Unknown

8.9.2 *Guide*:

8.9.2.1 Stained soils are frequently associated with contamination and often are an indication of either current or previous leakage associated with piping and liquid storage containers. Soils that are stained show a marked discoloration as compared to other soils in the immediate vicinity.

[6] "Title III List of Lists, Consolidated List of Chemicals Subject to Reporting Under Title III of the Superfund Amendments and Reauthorization Act (SARA) of 1986," U.S. EPA, Office of Toxic Substances, January 1989.

[7] "Common Synonyms for Chemicals Listed Under Section 313 of the Emergency Planning and Community Right to Know Act" Office of Toxic Substances, U.S. EPA, January 1988.

8.9.2.2 A *preparer* should not rely exclusively upon a prior *environmental site assessment* in supplying this information.

8.10 Are there currently any registered or unregistered storage tanks (above or underground) located on the *property*?

___Yes ___No ___Unknown

8.10.1 Did you observe evidence or do you have any prior knowledge that there have been previously, any registered or unregistered storage tanks (above or underground) located on the *property*?

___Yes ___No ___Unknown

8.10.2 *Guide*:

8.10.2.1 Tanks are often used to store heating fuels, chemicals, and petroleum products; while tanks may be associated with the storage of chemicals, they are most often associated with liquid fuel heating systems (for example, oil furnaces).

8.10.2.2 To use the information supplied in response to this question in a prior *environmental site assessment*, the *user* must determine if there were storage tanks installed on the site since the prior *environmental site assessment*. If not, then using information in the prior *environmental site assessment* is appropriate. If so, the information requested must be supplied on all storage tanks installed on the site since the prior *environmental site assessment*.

8.11 Are there currently any vent pipes, fill pipes, or access ways indicating a fill pipe protruding from the ground on the *property* or adjacent to any structure located on the *property*?

___Yes ___No ___Unknown

8.11.1 Did you observe evidence or do you have any prior knowledge that there have been previously, any vent pipes, fill pipes, or access ways indicating a fill pipe protruding from the ground on the *property* or adjacent to any structure located on the *property*?

___Yes ___No ___Unknown

8.11.2 *Guide*:

8.11.2.1 Vent or fill pipes often signal the current or previous existence of underground storage tanks.

8.11.2.2 Additionally, in answering this question the owner and occupant should consider any asphalt or concrete patching that would indicate the possibility of previous underground storage tank removal. Examples of vent and fill pipes are illustrated in Appendix X2.

8.11.2.3 A *preparer* should not rely exclusively upon a prior *environmental site assessment* in supplying this information.

STRUCTURE ISSUES

8.12 Is there currently evidence of leaks, spills or staining by substances other than water, or foul odors, associated with any flooring, drains, walls, ceilings or exposed grounds on the property?

___Yes ___No ___Unknown

8.12.1 Did you observe evidence or do you have any prior knowledge that there have been previously any leaks, spills or staining by substances other than water, or foul odors, associated with any flooring, drains, walls, ceilings or exposed grounds on the property?

___Yes ___No ___Unknown

8.12.2 *Guide*:

8.12.2.1 Stains (other than water stains) or foul odors may indicate leaks or spills of hazardous substances of contaminants. Floor drains located within a building adjacent to hazardous substance storage areas or connected to an on-site disposal system (for example, septic system) present a potential source of subsurface discharge of contaminants.

8.12.2.2 A *preparer* should not rely exclusively upon a prior *environmental site assessment* in supplying this information.

OTHER ISSUES

8.13 If the *property* is served by a private well or non-public water system, is there evidence or do you have prior knowledge that contaminants have been identified in the well or system that exceed guidelines applicable to the water system?

___Yes ___No ___Unknown

8.13.1 If the property is served by a private well or non-public water system, is there evidence or do you have prior knowledge that the well has been designated as contaminated by any government environmental/health agency?

___Yes ___No ___Unknown

8.13.2 *Guide*:

8.13.2.1 Private wells and non-public water systems are not monitored daily for water quality as municipal systems are monitored. If the system is private, it probably has been tested for contamination or evidence that it is free from contamination, and the results of any such tests should be produced by the *owner* or *occupant* of the well. The *preparer* is not required to test the water system to conduct the *transaction screen*.

8.13.2.2 A *preparer* should not rely exclusively upon a prior *environmental site assessment* in supplying this information.

8.14 Does the *owner* or *occupant* of the property have any knowledge of *environmental liens* or governmental notification relating to past or recurrent violations of environmental laws with respect to the *property* or any facility located on the property?

___Yes ___No ___Unknown

8.14.1 *Guide*:

8.14.1.1 In most cases, the federal or state government will notify the property owner prior to filing a lien on the *property*. Sections 302, 311, 312, and 313 of The Emergency Planning and Community Right-to-Know Act and other provisions of federal and state environmental laws establish reporting requirements with respect to businesses storing or using *hazardous substances* in excess of certain quantities. These businesses should be making periodic reports to a federal, state, or local environmental department, agency, or bureau. The government may periodically inspect such facilities to ensure compliance with environmental laws. In the event of a release of a reportable quantity within a 24-h period (as defined in CERCLA and the regulations promulgated pursuant to CERCLA), the person in charge of the facility is obligated to notify the U.S. EPA of the release. Any notification or response by any governmental entity will be in writing.

8.14.1.2 The information supplied in response to this question in a prior *environmental site assessment* may be used provided it is updated to the present time.

8.15 Has the *owner* or *occupant* of the *property* been informed of the past existence of *hazardous substances* or *petroleum products* with respect to the *property* or any facility located on the *property*?

___Yes ___No ___Unknown

8.15.1 Has the *owner* or *occupant* of the *property* been informed of the current existence of *hazardous substances* or *petroleum products* with respect to the *property* or any facility located on the *property*?

___Yes ___No ___Unknown

8.15.2 Has the *owner* or *occupant* of the *property* been informed of the past existence of environmental violations with respect to the *property* or any facility located on the *property*?

___Yes ___No ___Unknown

8.15.3 Has the *owner* or *occupant* of the *property* been informed of the current existence of environmental violations with respect to the *property* or any facility located on the *property*?

___Yes ___No ___Unknown

8.15.4 *Guide*:

8.15.4.1 Consider whether any *environmental professionals* familiar with *hazardous substances* or *petroleum products* have observed or determined that contamination existed on the property. *Hazardous substances* or *petroleum products* from the *property* may have affected soils, air quality, water quality, or otherwise affected structures located on the *property*.

8.15.4.2 The information supplied in response to this question in a prior *environmental site assessment* may be used provided it is updated to the present time.

8.16 Does the *owner* or *occupant* of the *property* have any knowledge of any *environmental site assessment* of the *property* or facility that indicated the presence of *hazardous substances* or *petroleum products* on, or contamination of, the *property* or recommended further assessment of the *property*?

___Yes ___No ___Unknown

8.16.1 *Guide*:

8.16.1.1 Copies of *reasonably ascertainable* prior *environmental site assessments* of the *property* or any portion thereof should be obtained and examined to determine whether further action or inquiry is necessary in connection with any environmental problems raised by a prior *environmental site assessment*.

8.16.1.2 The information supplied in response to this question in a prior *environmental site assessment* may be used provided it is updated to the present time.

8.17 Does the *owner* or *occupant* of the *property* know of any past, threatened, or pending lawsuits or administrative proceedings concerning a release or threatened release of any *hazardous substance* or *petroleum products* involving the *property* by any owner or occupant of the *property*?

___Yes ___No ___Unknown

8.17.1 *Guide*:

8.17.1.1 The *user* is not required to make an independent investigation or search of records on file with a court or public agency in answering this question; this question is to be answered by the *owner* or *occupant* based upon their respective *actual knowledge* and review of *reasonably ascertainable* records in their possession.

8.17.1.2 The information supplied in response to this question in a prior *environmental site assessment* may be used provided it is updated to the present time.

8.18 Does the *property* discharge wastewater (not including sanitary waste or storm water) onto or adjacent to the property and/or into a storm water system?

___Yes ___No ___Unknown

8.18.1 Does the property discharge wastewater (not including sanitary waste or storm water) onto or adjacent to the property and/or into a sanitary sewer system?

___Yes ___No ___Unknown

8.18.2 *Guide*:

8.18.2.1 The *owner* and each *occupant* should be asked where drain traps lead and the purpose of drainage pipes at the facility. Domestic sewage is not a CERCLA issue and the reference to *wastewater* does not include domestic sewage.

8.18.2.2 To use the information supplied in response to this question in a prior *environmental site assessment*, the *preparer* must determine if there was any change in discharge practices at the facility since the prior *environmental site assessment*. If not, using information in the prior *environmental site assessment* is appropriate. If so, the information requested must be supplied for all new or changed discharge practices.

8.18.2.3 Some jurisdictions require facilities with large roof or paved areas and construction sites to collect and divert runoff through a treatment process prior to discharging the stormwater runoff to municipal, separate storm sewer systems, or the waters of the United States. Such units are often called stormwater treatment systems. Oil-water separators are most often found outside a building under a manhole and require routine servicing to remove oil. Oil-water separators are usually in restaurants, repair garages, and service stations. An example of an oil-water separator is shown in Appendix X2. If any such oil-water separators or treatment systems have been installed at the *property* since a prior *environmental site assessment*, the requested information must be supplied for each new installation.

8.19 Did you observe evidence or do you have any prior knowledge that any *hazardous substances* or *petroleum products*, unidentified waste materials, tires, automotive or industrial batteries, or any other waste materials have been dumped above grade, buried and/or burned on the *property*?

___Yes ___No ___Unknown

8.19.1 *Guide*:

8.19.1.1 Past waste disposal practices should be examined because these may have resulted in *hazardous substances* or *petroleum products* being released on the *property*. Does the *property* evidence any mounds or depressions that suggest a disposal site?

8.19.1.2 To use the information supplied in response to this question in a prior *environmental site assessment*, the *preparer* must determine if there was any dumping, burying, or burning of such materials at the site since the prior *environmental site assessment*. If not, then using information in the prior *environmental site assessment* is appropriate. If so, the information requested must be supplied for all such events since the prior *environmental site assessment*.

8.20 Is there a transformer, capacitor, or any hydraulic equipment for which there are any records indicating the presence of PCBs?

___Yes ___No ___Unknown

8.20.1 *Guide*:

8.20.1.1 The PCBs are regulated by the Toxic Substances Control Act 15 USC. Section 2601 *et seq*. and, in the absence of a release, are not regulated by CERCLA. The provisions of CERCLA do apply if there is a release of PCBs. Accordingly, if an affirmative answer is obtained to this question, the further focus should be on whether there have been any instances of insulating oil leakage and, if so, whether these are suspected of being PCB or PCB-contaminated.

8.20.1.2 Transformers containing PCBs may have many different sizes and shapes. Some of the more commonly used transformers are set forth in Appendix X2. Transformers are to be registered pursuant to 40 CFR § 761.30.

8.20.1.3 Elevators and auto lifts are often run by hydraulically controlled systems containing PCBs. If inspection or maintenance records for the elevator, capacitor, or other hydraulic equipment indicate no release has occurred or that regular, scheduled maintenance has taken place and the machinery does not appear to be damaged or leaking, no further inquiry is required.

8.20.1.4 To use the information supplied in response to this question in a prior *environmental site assessment*, the *preparer* must determine if there were any transformers installed at the site since the prior *environmental site assessment* that are not owned by a utility, cooperative, or association. If not, then using information in the prior *environmental site assessment* is appropriate, except that for any transformer identified in the prior *environmental site assessment*, the PCB status should be updated. If new transformers have been installed, their PCB status should also be verified.

9. Guide to Site Visit

9.1 Is the *property* used for an industrial use?

___Yes ___No

9.1.1 Is any *adjoining property* used for an industrial use?

___Yes ___No

	Land Use
Property:	
Adjoining properties north:	
Adjoining properties south:	
Adjoining properties east:	
Adjoining properties west:	

9.1.2 *Guide*:

9.1.2.1 It is recommended that the *preparer* describe the uses of the *property* and *adjoining properties*.

9.1.2.2 Certain industrial uses on the *property* may raise concerns regarding the possibility of contamination affecting the *property*. For purposes of the *transaction screen questionnaire*, an industrial use is an activity requiring the application of labor and capital for the production or distribution of a product or article, including, without limitation, manufacturing, processing, extraction, refining, warehousing, transportation, and utilities. Manufacturing is defined as a process or operation of producing by hand, machinery, or other means, a finished product or article from raw material. Industrial uses may be categorized as light or heavy industrial uses, depending upon the scale of the operations and the impact upon surrounding property in terms of smoke, fumes, and noise. Regardless of such categorization, the concern for purposes of the transaction screen process is whether the use involves the processing, storage, manufacture, or transportation of *hazardous substances* or *petroleum products*. For example, further inquiry would be necessary if the industrial use concerned the manufacture of paints, oils, solvents, and other chemical products but not if the use concerned the storage of inert goods in containers.

9.1.2.3 The term *adjoining properties* means any real property or properties the border of which is contiguous or partially contiguous with that of the *property*, or that would be contiguous or partially contiguous with that of the *property* but for a street, road, or other public thoroughfare separating them.

9.2 Did you observe evidence or do you have any prior knowledge that the *property* has been used for an industrial use in the past?

___Yes ___No

9.2.1 Did you observe evidence or do you have any prior knowledge that any *adjoining property* has been used for an industrial use in the past?

___Yes ___No

9.2.2 *Guide:*

9.2.2.1 The *user* should inspect for any indications present on the *property* that would cause the *user* to suspect an industrial facility may once have existed on the site. Old buildings, pipes, containers, or other debris are indicators of previous industrial use of the site.

9.2.2.2 See guide for 9.1.

	Owner	Use	Dates
Previous use of property			
Previous use of properties to north			
Previous use of properties to south			
Previous use of properties to east			
Previous use of properties to west			

9.3 Is the property used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?

___Yes ___No

9.3.1 Is any *adjoining property* used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?

___Yes ___No

	Land Use
Property:	
Adjoining properties north:	
Adjoining properties south:	

Adjoining properties east: _____

Adjoining properties west: _____

9.3.2 *Guide*:

9.3.2.1 It is recommended that the *preparer* describe the uses of the *property* and *adjoining properties*.

9.3.2.2 Gasoline stations, motor vehicle repair facilities (with or without supplying gas for the motor vehicles), dry cleaners, photo developing laboratories, commercial printing facilities, junkyards or landfills, and waste treatment, storage, disposal, processing, or recycling facilities all involve the use of *hazardous substances* or *petroleum products* and therefore require further inquiry concerning the possible release of such substances.

9.3.2.3 The term *adjoining properties* means any real property or properties the border of which is contiguous or partially contiguous with that of the *property*, or that would be contiguous or partially contiguous with that of the *property* but for a street, road, or other public thoroughfare separating them. Adjoining properties include those that border the property and include properties across the street or any right of way from the property.

9.4 Did you observe evidence or do you have any knowledge that the *property* has been used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recycling facility (if applicable, identify which)?

___Yes ___No

9.4.1 Did you observe evidence or do you have any prior knowledge that any *adjoining property* has been used as a gasoline station, motor repair facility, commercial printing facility, dry cleaners, photo developing laboratory, junkyard or landfill, or as a waste treatment, storage, disposal, processing, or recyling facility (if applicable, identify which)?

___Yes ___No

9.4.2 *Guide*—See guide for 9.2 and 9.3.

	Owner	Use	Dates
Previous use of property			
Previous use of properties to north			
Previous use of properties to south			
Previous use of properties to east			
Previous use of properties to west			

LAND ISSUES

9.5 Are there currently any damaged or discarded automotive or industrial batteries, pesticides, paints, or other chemicals in individual containers of >5 gal (19 L) in volume or 50 gal (190 L) in the aggregate, stored on or used at the property or at the facility?

___Yes ___No

9.5.1 Did you observe evidence or do you have any prior knowledge that there have been previously any damaged or discarded automotive or industrial batteries, or pesticides, paints, or other chemicals in individual containers of >5 gal (19 L) in volume or 50 gal (190 L) in the aggregate, stored on or used at the *property* or at the facility?

___Yes ___No

9.5.2 *Guide*:

9.5.2.1 Are there any containers on the site that may contain any one of these items? Is there any reason to suspect that chemicals or *hazardous substances* or *petroleum products* in such quantities may be stored on the site? Sheltered areas, cartons, sacks, storage bins, large canisters, sheds, or cellars of existing improvements should be investigated because these are areas where chemicals or *hazardous substances* or *petroleum products* may be stored. If the answer to this question is "yes," list the items and the location(s) where they are stored. If you are unfamiliar with the contents of any container located on the site, the question must be answered "yes" until the materials are identified. The existence of any damaged or opened containers identified as containing *hazardous substances* or *petroleum products* requires further investigation.

9.5.2.2 *Hazardous substances* or *petroleum products* may often be unmarked. The *preparer* should never open any unmarked containers at the facility because they may contain explosive materials or acids.

9.5.2.3 Consumer products in undamaged containers used for routine office maintenance or business, such as copy toner, should not create a need for further inquiry unless the quantity of such products is in excess of what would be customary for such use. The Environmental Protection Agency has published a guidance document that identifies hazardous substances or petroleum products that must be reported under Section 311 and 312 of EPCRA.[6] This document lists in tabular form the CERCLA Section 103 chemicals. If a preparer has a question regarding whether the substance is a hazardous substance under CERCLA, the preparer may refer to the list of lists or 40 CFR Part 302. In addition, the Environmental Protection Agency has also published a guidance document.[7] This document sets forth the hazardous substances or petroleum products found in many common consumer products listed by trade name.

9.6 Are there currently any industrial *drums* (typically, 55 gal (208 L)) or sacks of chemicals located on the *property* or at the facility?

___Yes ___No

9.6.1 Did you observe evidence or do you have any prior knowledge that there have been previously any industrial *drums* (typically 55 gal (208 L)) or sacks of chemicals located on the property or at the facility?

___Yes ___No

9.6.2 *Guide*—If found, they will require further examination with respect to any *hazardous substance* associated with them.

9.7 Did you observe evidence or do you have any prior knowledge that *fill dirt* has been brought onto the *property* that originated from a contaminated site?

___Yes ___No

9.7.1 Did you observe evidence or do you have any prior knowledge that *fill dirt* has been brought onto the property that is of an unknown origin?

___Yes ___No

9.7.2 *Guide*— *Fill dirt* brought onto the *property* may appear as mounds or depressions that do not appear to be naturally occurring. *Fill dirt* may be added in construction of a facility. The term *fill dirt* is defined in the definitions, and the *preparer* should refer to the definitions if the *preparer* has any question concerning the meaning of the term.

9.8 Are there currently any *pits, ponds, or lagoons* located on the *property* in connection with waste treatment or waste disposal?

___Yes ___No

9.8.1 Did you observe evidence or do you have any prior knowledge that there have been previously, any *pits, ponds*, or *lagoons* located on the *property* in connection with waste treatment or waste disposal?

___Yes ___No

9.8.2 *Guide*—The presence of *pits, ponds, or lagoons*, together with waste treatment or waste disposal may indicate contaminated property. See the definitions with respect to the definition of *pits, ponds, or lagoons* in 3.2.28.

9.9 Is there currently any stained soil on the *property*?

___Yes ___No

9.9.1 Did you observe evidence or do you have any prior knowledge that there has been previously, any stained soil on the *property*?

___Yes ___No

9.9.2 *Guide*—Stained soils are frequently associated with contamination and often are an indication of either current or previous leakage associated with piping and liquid storage containers. Soils that are stained show a marked discoloration as compared to other soils in the immediate vicinity.

9.10 Are there currently any registered or unregistered storage tanks (above or underground) located on the *prop*erty?

___Yes ___No

9.10.1 Did you observe evidence or do you have any prior knowledge that there have been previously, any registered or unregistered storage tanks (above or underground) located on the *property*?

___Yes ___No

9.10.2 *Guide*—Tanks are often used to store heating fuels, chemicals, and *petroleum products*; while tanks may be associated with storage of chemicals, they are most often associated with liquid fuel heating systems (that is, oil furnaces). Examples of tanks are illustrated in Appendix X2.

9.11 Are there currently any vent pipes, fill pipes, or access ways indicating a fill pipe protruding from the ground on the property or adjacent to any structure located on the *property*?

___Yes ___No

9.11.1 Did you observe evidence or do you have any prior knowledge that there have been previously, any vent pipes, fill pipes, or access ways indicating a fill pipe protruding from the ground on the *property* or adjacent to any structure located on the *property*?

___Yes ___No

9.11.2 *Guide*—Vent or fill pipes often signal the current or previous existence of underground storage tanks. Additionally, observations should be made regarding any asphalt or concrete patching that would indicate the possibility of previous underground storage tank removal. Examples of vent and fill pipes are illustrated in Appendix X2.

STRUCTURE ISSUES

9.12 Is there currently evidence of leaks, spills or staining by substances other than water, or foul odors, associated with any flooring, drains, walls, ceilings or exposed grounds on the property?

___Yes ___No

9.12.1 Did you observe evidence or do you have any prior knowledge that there have been previously any leaks, spills, or staining by substances other than water, or foul odors, associated with any flooring, drains, walls, ceilings or exposed grounds on the property?

___Yes ___No

9.12.2 *Guide*—Stains (other than water stains) or foul odors may indicate leaks of *hazardous substances* or *petroleum products* or contaminants. Floor drains located within a building adjacent to *hazardous substance* storage areas or connected to an on-site disposal system (for example, septic system) present a potential source of subsurface discharge of contaminants.

OTHER ISSUES

9.13 If the *property* is served by a private well or non-public water system, is there evidence or do you have prior knowledge that contaminants have been identified in the well or system that exceed guidelines applicable to the water system?

___Yes ___No

9.13.1 If the property is served by a private well or non-public water system, is there evidence or do you have prior knowledge that the well has been designated as contaminated by any government environmental/health agency?

___Yes ___No

9.13.2 *Guide*—Evidence of well water generally consists of a 4- to 12-in. (102- to 305-mm) diameter low level pipe protruding from the ground that is capped, as illustrated in Appendix X2.

9.14 Does the *property* discharge *wastewater* (not including sanitary waste or storm water) onto or adjacent to the property and/or into a storm water system?

___Yes ___No

9.14.1 Does the *property* discharge *wastewater* (not including sanitary waste or storm water) onto or adjacent to the property and/or into a sanitary sewer system?

___Yes ___No

9.14.2 *Guide*:

9.14.2.1 All drain traps and pipes should be examined and their end points should be determined. Any ditches or streams on or adjacent to the site should be *visually and physically observed* for *wastewater* flow.

9.14.2.2 Some jurisdictions require facilities with large roof or paved areas and construction sites to collect and divert such runoff through a treatment process prior to discharging the stormwater runoff to municipal, separate storm sewer systems,

or the waters of the United States. Such units are often called stormwater treatment systems. Oil-water separators are most often found outside a building under a manhole and require routine servicing to remove oil. Oil-water separators are usually in restaurants, repair garages, and service stations. An example of an oil-water separator is shown in Appendix X2.

9.15 Did you observe evidence or do you have any prior knowledge that any *hazardous substances* or *petroleum products*, unidentified waste materials, tires, automotive or industrial batteries, or any other waste materials have been dumped above grade, buried and/or burned, on the *property*?

___Yes ___No

9.15.1 *Guide*—Past waste disposal practices should be examined because these may have resulted in *hazardous substances* being released on the *property*. Does the site evidence any mounds or depressions that suggest a disposal site?

9.16 Is there a transformer, capacitor, or any hydraulic equipment for which there are any records indicating the presence of PCBs?

___Yes ___No

9.16.1 *Guide*:

9.16.1.1 The PCBs are regulated by the Toxic Substances Control Act 15 USC Section 2601 *et seq*. and, in the absence of a release, are not regulated by CERCLA. The provisions of CERCLA do apply if there is a release of PCBs. Accordingly, if an affirmative answer is obtained to this question, the further focus should be on whether there have been any instances of insulating oil leakage and, if so, whether these are suspected of being PCB or PCB-contaminated.

9.16.1.2 Elevators and auto lifts are often operated by hydraulically controlled systems containing PCBs. If inspection or maintenance records for the elevator, capacitor, or other hydraulic equipment indicate no release has occurred and the machinery does not appear to be damaged or leaking, no further inquiry is required.

9.16.1.3 Transformers containing PCBs may have many different sizes and shapes. Some of the more commonly used transformers are set forth on Appendix X2. Transformers are to be registered pursuant to 40 CFR § 761.30.

10. Guide to Government Records/Historical Sources Inquiry

10.1 Do any of the following federal government record systems list the *property* or any *property* within the search distance noted below:

National Priorities List—within 1.0 mile (1.6 Km)?	___Yes	___No
CERCLIS List—within 0.5 mile (0.8 Km)?	___Yes	___No
RCRA CORRACTS Facilities—within 1.0 mile (1.6 Km)?	___Yes	___No
RCRA non-CORRACTS TSD Facilities—within 0.5 mile (0.8 Km)?	___Yes	___No

10.1.1 *Guide*:

10.1.1.1 The NPL or National Priorities List is a list compiled by EPA pursuant to CERCLA 42 USC § 9605(a)(8)(B) of properties with the highest priority for cleanup pursuant to EPA's Hazard Ranking System. See 40 CFR Part 300.

10.1.1.2 The Comprehensive Environmental Response Compensation and Liability Information System (CERCLIS) is the list of sites compiled by EPA that EPA has investigated or is currently investigating for potential hazardous substance contamination for possible inclusion on the national Priorities List.

10.1.1.3 RCRA CORRACTS Facilities are those facilities which treat, store and/or dispose of hazardous wastes on-site and at which corrective remedial action is underway, as defined and regulated by RCRA. The RCRA non-CORRACTS TSD Facilities List are those facilities on which treatment, storage, and/or disposal of hazardous wastes takes place and at which corrective remedial action has not been required by EPA, as defined and regulated by RCRA.

10.1.1.4 If the preparer elects to obtain the records directly from government agencies, those records typically must be obtained through a formal written request to the office within each agency that is responsible for maintaining the records or for responding to public requests for records. At the federal level, these requests are governed by the Freedom of Information Act (FOIA). FOIA requires a written request and the request should identify the records the preparer requires and should identify the site and geographic area for which the preparer needs the records (for example, the address of the site and the appropriate city, county, or zip code to be searched). The request should be directed to the FOIA officer for the regional EPA office responsible for the region in which the site is located. A list of the FOIA offices for each of the EPA regions may be obtained from the federal government or local library. From the federal EPA offices, the *preparer* should anticipate a response no sooner than four to eight weeks.

10.1.1.5 If government information is obtained from a commercial service, the firm should provide ensurances that its records stay current with the government agency record sources. Government information obtained from commercial sources may be considered current if the source updates the information at least every 90 days, or for information that is updated less frequently than quarterly by the government agency, within 90 days of the date the government agency makes the updated information available to the public.

10.1.1.6 The information supplied in response to this question in a prior *environmental site assessment* may be used provided it is updated to the present time.

10.2 Do any of the following state record systems list the *property* or any *property* within the search distance noted below:

List maintained by state environmental agency of hazardous waste sites identified for investigation or remediation that is the state agency equivalent to NPL—within 1.0 mile (1.6 Km)?

___Yes ___No

List maintained by state environmental agency of sites identified for investigation or remediation that is the state equivalent to CERCLIS—within 0.5 mile (0.8 Km)?

___Yes ___No

Leaking Underground Storage Tank (LUST) List—within 0.5 mile (0.8 Km)?

___Yes ___No

Solid Waste/Landfill Facilities—within 0.5 mile (0.8 Km)?

___Yes ___No

10.2.1 *Guide*:

10.2.1.1 The LUST list is a list of sites containing one or more underground storage tanks that have been identified as having leaked or are potentially leaking their contents into the ground or ground water; these sites may be involved in a state cleanup program.

10.2.1.2 The solid waste/landfill facilities list is a list of sites that currently accept, or have accepted in the past, waste of any kind for disposal on site. Solid waste/landfill facilities lists typically are obtained through a state office of solid waste management that is often a division of the primary state environmental agency.

10.2.1.3 Although many states do not have specific Freedom of Information laws, if the preparer elects to obtain the records directly from government agencies, a similar written request for state records should be made to the primary state agency responsible for environmental regulation in that state. Typically, the office responsible for maintaining the records and for responding to requests for records are the same. Once again, the written request should identify the specific records requested and identify the site and geographic area for which the preparer needs the records. The state agency response will vary from state to state and agency to agency, but the *preparer* should anticipate a minimum of four weeks for a response.

10.2.1.4 In some cases, the request should be directed to a specific state office. For example, leaking underground storage tank requests should be made through either the state agency's ground water management division, the state Fire Marshall's office, or the state Emergency Planning and Management Agency.

10.2.1.5 The identity of the state office to which the request should be made can be obtained by contacting the primary state environmental agency. Also, there are publications listing agency sources for each state. The local public library may contain these publications.

10.3 Based upon a review of *fire insurance maps* or consultation with the local fire department serving the property all as specified in the guide, are any buildings or other improvements on the property or on an adjoining property identified as having been used for an industrial use or uses likely to lead to contamination of the property.

___Yes ___No ___Not Applicable

10.3.1 *Guide*:

10.3.1.1 The focus of this research is to determine whether any past use of the *property* would suggest the presence of contamination associated with the *property*. If *reasonably ascertainable*, one of two sources of data should be examined in the following order of preference: *fire insurance maps* showing the *property* or the local fire department serving the property. However, if the user has first-hand knowledge of the use of the *property* from the present back to 1940 or if the *preparer* interviewed disinterested people with such knowledge, then the *preparer* may eliminate this research and answer "not applicable" to the questions above. In addition, the preparer may eliminate this research and answer "not applicable" to the question if the *preparer* is unable to find appropriate sources of *fire insurance maps* or individuals at the local fire department for the property with knowledge of the property's past use, after making a reasonable effort in good faith to locate such information or if the information is otherwise not *reasonably ascertainable*.

10.3.1.2 Subject to the previous paragraph, the *preparer* should obtain *fire insurance maps* from the period(s) not covered by the first-hand knowledge of the *user* or of those interviewed, beginning with when the maps are first available for the area or when the area was first thought to be developed. At least two maps should be ordered at points in time separated by at least ten years.

10.3.1.3 *Fire insurance maps* are defined in 3.2.14 and may be available for review from public libraries, colleges, and local historical societies, or from commercial services.

10.3.1.4 In examining a *fire insurance map*, the *user* is only required to review those areas shown in the given source. For example, if the *property* is at the edge of a map sheet, the user need not order the adjoining sheet. If a source covers a large area, the *user* need only review the area within approximately ⅛ mile (200 m) of the *property*.

10.3.1.5 *Fire insurance maps* reviewed as part of a prior *environmental site assessment* do not need to be searched for or reviewed again, but the *preparer* should make a reasonable effort to determine the uses of the *property* since the last use identified in a prior *environmental site assessment*.

11. Non-Scope Considerations

11.1 *General*:

11.1.1 There may be environmental issues or conditions at a *property* that parties may wish to assess in connection with *commercial real estate* that are outside the scope of this practice (the non-scope considerations). As noted by the legal analysis in Appendix X1 of this practice, some substances may be present on a property in quantities and under conditions that may lead to contamination of the property or of nearby properties but are not included in CERCLA's definition of *hazardous substances* (42 USC 9601(14)) or do not otherwise present potential CERCLA liability. In any case, they are beyond the scope of this practice.

11.1.2 Whether or not a *user* elects to inquire into non-scope considerations in connection with this practice or any other *environmental site assessment*, no assessment of such non-scope considerations is required for appropriate inquiry as defined by this practice.

11.1.3 There may be standards or protocols for assessment of potential hazards and conditions associated with non-scope conditions developed by governmental entities, professional organizations, or other private entities.

11.1.4 Following are several non-scope considerations that persons may want to assess in connection with commercial real estate. No implication is intended as the relative importance of inquiry into such non-scope considerations, and this list of non-scope considerations is not intended to be all-inclusive:

11.1.4.1 Asbestos-containing materials,

11.1.4.2 Radon,

11.1.4.3 Lead-based paint,

11.1.4.4 Lead in drinking water,

11.1.4.5 Wetlands,

11.1.4.6 Regulatory compliance,

11.1.4.7 Cultural and historic resources,

11.1.4.8 Industrial hygiene,

11.1.4.9 Health and safety,
11.1.4.10 Ecological resources,
11.1.4.11 Endangered species,
11.1.4.12 Indoor air quality, and
11.1.4.13 High voltage powerlines.

APPENDIXES

(Nonmandatory Information)

X1. LEGAL BACKGROUND TO FEDERAL LAW AND THE PRACTICES ON ENVIRONMENTAL ASSESSMENTS IN COMMERCIAL REAL ESTATE TRANSACTIONS

INTRODUCTION

The legal section of Subcommittee E.50.02 on Environmental Assessments in Commercial Real Estate Transactions provides the following background to the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), as amended including amended by the Superfund Amendments and Reauthorization Act (SARA), 42 USC §§ 9601 *et seq*. The background to CERCLA, commonly known as the Superfund Law, outlines the potential liability for the cleanup of hazardous substances, available defenses to such liability, appropriate inquiry under Superfund, statutory definition of hazardous substances, petroleum products and petroleum exclusion to CERCLA, and reasons why certain environmental hazards are excluded from the scope of Superfund and this practice and Practice E 1527.

There are several elements of Superfund liability and the commonly termed "innocent purchaser" defense, that arises out of the statutory third-party defense, that may impact on the development and understanding of this practice and Practice E 1527.

X1.1 *Superfund Liability:*

X1.1.1 All of the following elements of liability under Superfund must be established by a plaintiff before a defendant will be held liable under Superfund for a *government's* response costs:[8]

X1.1.1.1 The site is a facility, as defined as § 9601(9),

X1.1.1.2 A release or threatened release of a hazardous substance from the site occurred (release is defined at § 9601(22) as *any* amount of any hazardous substance; "hazardous substance" is defined at § 9601(14) (see statutory definition of hazardous substance below),

X1.1.1.3 A release or threatened release caused the plaintiff to incur response costs. Response costs are defined at § 9601(25) to mean costs related to both removal actions (§ 9601(23)) and remedial actions (§ 9601(24)), and

X1.1.1.4 Defendants fall within at least one of the four classes of responsible parties.[9]

X1.1.2 In order to recover response costs, a government plaintiff must prove that the costs were not inconsistent with the National Oil and Hazardous Substances Pollution Contingency Plan (commonly referred to as the National Contingency Plan or NCP), 40 CFR § 300.[10] A private plaintiff must prove

[8] USC § 9607(a). (All statutory references are to Title 42 of the United States Code, unless otherwise specified.) See *United States versus Aceto Agricultural Chemicals Corp*., 872 F.2d 1373 (8th Cir. 1989). Private plaintiffs, as well as the government, may seek response costs under Superfund from defendants. While many users of these practices or other private parties may think in terms of how to defend against Superfund liability, they should recognize that they may decide to conduct cleanup actions and seek response costs from other parties.

[9] The four classes of potentially responsible parties (PRPs) are listed at § 9607(a) as follows:
(1) Owner and operator of a facility (see § 9601 (20)(A): the term "owner or operator" does not include a person, who, without participating in the management of a facility, holds indicia of ownership primarily to protect his security interest in the facility. In *re: Bergsoe Metal Corporation*, 910 F.2d 668 (9th Cir. Aug. 9, 1990); *Guidice versus BFG Electroplating and Manufacturing Co*., 732 F. Supp. 556 (W.D. Pa. 1989); *United States versus Mirabile*, 23 ERC 1511 (E.D. Pa. 1985). But see *United States versus Fleet Factors Corp*., 901 F.2d 1550 (11th Cir. 1990); *United States versus Maryland Bank and Trust Co*., 632 F. Supp. 573 (D. Md. 1986). For clarification of the security interest exclusion, see EPA's rule on lender liability under CERCLA, 57 Federal Register 18344 (April 29, 1992);
(2) Any person who at the time of disposal of any hazardous substance owned or operated any facility at which such hazardous substances were disposed of;
(3) Any person who by contract, agreement, or otherwise arranged for disposal or treatment or transport of hazardous substances; and
(4) Any person who accepts hazardous substances for transport to a facility selected by such person.

[10] The National Contingency Plan is the federal government's blueprint on how hazardous substances are to be cleaned up pursuant to CERCLA.

its costs were necessary costs of response and that the response action was consistent with the NCP 42 USC§ 9607 (a).[11]

X1.1.3 If there is a release or threatened release of hazardous substances on a site, private parties, even if they are not PRPs, may decide to incur response costs and seek recovery from other private parties. The PRPs may seek contribution from other PRPs.

X1.1.4 There is an important difference between the government's burden to show that its response costs are "not inconsistent with the NCP" and the burden a private party bears to show that its response costs are "consistent with the NCP." See § 9607 (a)(4)(A) and (B). Courts have interpreted this statutory difference to give the government a rebuttable presumption that its response costs are consistent with the NCP, whereas a private party who undertakes response costs and seeks recovery from responsible parties bears the burden of proving its response was consistent with the NCP.[12] The EPA takes the position that a private party who undertakes a response action must be only in "substantial compliance," rather than strict technical compliance, with the NCP, as long as a CERCLA-quality cleanup is achieved. The NCP requirements for a private party response-action are set forth at 40 CFR § 300.700.

X1.2 *Defenses to Liability:*

X1.2.1 Assuming all the elements of liability exist, a party may avoid liability only by meeting one of the defenses listed in§ 9607(b). These listed defenses are exclusive of all others.[13] Section 9607(b) states (*emphasis added*):

"There shall be no liability under subsection (a) for a person otherwise liable who can establish by a preponderance of the evidence (the lowest evidentiary standard available, meaning more probable than not) that the release or threat of release of a hazardous substance and the damages resulting therefrom were *caused solely by—*

1) an act of God;

2) an act of war;

3) *an act or omission of a third party other* than an employee or agent of the defendant, or *than one whose act or omission occurs in connection with a contractual relationship* (see the definition of "contractual relationship" below), existing directly or indirectly, with the defendant ..., if the defendant establishes by a preponderance of the evidence that (a) he exercised due care with respect to the hazardous substance concerned ..., and (b) he took precautions against foreseeable acts or omissions of any such third party and the consequences that could foreseeably result from such actions or omissions."

X1.2.2 Under § 9601(35)(A), a contractual relationship "includes, but is not limited to, land contracts, deeds, or other instruments transferring title or possession ...". These contractual relationships with third parties eliminate the defense to liability unless the defendant is an innocent purchaser. Or as stated by the status of § 9601(35)(A) (*emphasis added*), a contractual relationship with the third party defeats the defense "unless the real property on which the facility is located was acquired by the defendant after disposal or placement of the hazardous substance ... and one or more of the following circumstances is also established by the defendant by a preponderance of the evidence:

(i) At the time the defendant acquired the facility the defendant did not know and had no reason to know that any hazardous substance which is the subject of the release or threatened release was disposed of on, in, or at the facility.

(ii) The defendant is the government ...

(iii) The defendant acquired the facility by inheritance or bequest."

X1.2.3 Therefore, the so-called innocent purchaser defense arises out of the third party defense of § 9607(b)(3). Restated, this defense to Superfund liability is available only if the defendant shows the following:

X1.2.3.1 The release or threat of release was caused solely by a third party,

X1.2.3.2 The third part is not an employee or agent of the defendant,

X1.2.3.3 The acts or omissions of the third party did not occur in connection with a direct or indirect contractual relationship to the defendant, or if there was a contractual relationship, the defendant acquired the property after disposal or placement of the hazardous substance, and at the time the defendant acquired the facility the defendant *did not know and had no reason to know* that any hazardous substance which is the subject of the release or threatened release was disposed of on, in, or at the facility, and

X1.2.3.4 The defendant exercised due care with respect to the hazardous substances and took precautions against foreseeable acts or omissions of the third party.

X1.2.4 The statute then states at § 9601(35)(B)(*emphasis added*):

"To establish that the defendant had no reason to know, as provided (above), *the defendant must have undertaken, at the time of acquisition, all appropriate inquiry into the previous ownership and uses of the property consistent with good commercial or customary practice* in an effort to minimize liability... . [T]he court shall take into account any specialized knowledge or experience on the part of the defendant, the relationship of the purchase price to the value of the property if uncontaminated, commonly known or reasonably ascertainable information about the property, the obviousness of the presence or likely presence of contamination at the property, and the ability to detect such contamination by appropriate inspection."

X1.3 *Appropriate Inquiry in Commercial Real Estate Transactions:*

[11] See *Dedham Water Co. versus Cumberland Farms Dairy, Inc*., 889 F.2d 1146 (1st Cir. 1989); other cases cited at ABA, *National Resources, Energy, and Environmental Law: 1989 The Year In Review*, p. 215, Note 155.

[12] *Amland Properties Corp. versus Aluminum Co. of America*, 711 F. Supp. 784, 794 (D. N.J. 1989); *Artesian Water Co. versus New Castle County*, 659 F. Supp. 1269, 1291 (D. Del. 1987); *United States versus Northeastern Pharmaceutical Chemical Co*., 579 F. Supp. 823 (W.D. Mo. 1984), *aff'd in part, rev'd on other grounds*, 810 F.2d 726 (8th Cir. 1986).

[13] *United States versus Aceto Agricultural Chemicals Corp*., 872 F.2d 1373 (8th Cir. 1989). But see *United States versus Marisol, Inc*., 725 F. Supp. 833 (M.D. Pa. 1989) (equitable defenses under CERCLA may be available after the development of a factual record).

X1.3.1 One of the major questions that parties to commercial real estate transactions face when considering their potential Superfund liability is, "What level of inquiry into the previous ownership and uses of the property is appropriate to establish the innocent purchaser defense to Superfund liability?" These practices are structured to articulate the level of inquiry under Superfund that is appropriate for different situations.

X1.3.2 *The Appropriate Level of Inquiry*:

X1.3.2.1 The level of environmental inquiry that is appropriate under Superfund cannot be the same for every property or every party to a real estate transaction. The level of inquiry, in fact, will change depending on the particular property or party involved in a transaction. The statutory language, Congressional history, and common sense support this conclusion.

X1.3.2.2 First, it must be noted that little case law exists to serve as guidance about the minimum level of inquiry that will be deemed appropriate for the innocent purchaser defense. See, for example, *United States versus Serafini*, 706 F. Supp. 346 (M.D. Pa. 1988), and 1990 U.S. Dist. LEXIS 18466 (M.D. Pa. 1990) (By entertaining disputed facts as to the custom and practice of viewing land prior to purchase, the court implied that appropriate inquiry necessarily varies on a site-by-site basis); *United States versus Pacific Hide and Fur Depot, Inc*., 716 F. Supp. 1341 (D. Idaho 1989) (No inquiry was required by those who received an ownership interest in property by means of corporate stock transfer and warranty deed under the facts of this case.); *International Clinical Laboratories, Inc. versus Stevens*, 30 ERC 2066, 20 ELR 20,560 (E.D.N.Y. 1990) (Despite a long history of toxic wastewater disposal and presence of the site on the state's hazardous waste disposal site list, the purchaser established the innocent purchaser defense since there were no visible environmental problems at the site, the defendant had no knowledge of environmental problems at the site, and the purchase price did not reflect a reduction on account of the problem.)

X1.3.2.3 While the statute does not specifically distinguish certain types of properties and uses from others, or certain types of parties from others, it does list certain factors courts should consider in determining whether one's inquiry under the circumstances is appropriate. The statute, as explained above in X1.2 requires a court to consider a party's specialized knowledge or experience. The statute further mandates a court to consider what is "*reasonably* ascertainable information about the property," what contamination is *obviously* present, and the *party's "ability* to detect such contamination". The very use of terms such as" appropriate" and "reasonably", and the use of "specialized knowledge and experience" and "ability" in conjunction with the specific person attempting to utilize the defense signifies that Congress did not intend the appropriateness of the inquiry be judged by a bright line standard. If it is so intended, Congress would have stated, but did not, that the same inquiry should be made in every case.

X1.3.2.4 What is reasonable and obvious to one party may not be so to other parties, and ability, by necessity, varies among all parties. The statute, therefore, recognizes that different properties and parties must be treated differently. That is, different parties may conduct different levels of inquiry appropriate to their circumstances.

X1.3.2.5 The statutory standard of "appropriate inquiry" suggests the level of inquiry will depend on the circumstances and the underlying facts. Since the facts are almost always different, the level of inquiry must change with them. The legislative history on this particular issue demonstrates that Congress intended that the level of inquiry changes with the type of property and party.[14]

The duty to inquire under this provision shall be judged as of the time of acquisition. Defendants shall be held to a higher standard as public awareness of the hazards associated with hazardous releases has grown, as reflected by this Act, the 1980 Act [CERCLA] and other Federal and State statutes.

Moreover, good commercial or customary practice with respect to inquiry in an effort to minimize liability shall mean that a reasonable inquiry must have been made in all circumstances, in light of best business and land transfer principles.

Those engaged in commercial transactions should, however, be held to a higher standard than those who are engaged in private residential transactions.

X1.3.2.6 Because few cases address the standard of inquiry in the innocent purchaser defense and the legislative history describing Congressional intent is sparse, common sense is a useful guide in interpreting statutory language. If CERCLA mandated that the level of inquiry be the same for every property or potential defendant, then a lay consumer (renter or buyer) of a home, a purchaser of a small environmentally benign business, and a multinational corporate buyer of an industrial complex would have to conduct the same environmental site assessment (ESA) of the different properties in question. Additionally, the statute makes no mention of a Phase I ESA or any other specific type of inquiry one is to conduct in order for the inquiry to be deemed appropriate. If all inquiries had to be at the same level to be "appropriate," it would be illogical to stop at a Phase I ESA since some commercial or industrial properties routinely undergo, in the exercise of good commercial and customary practices, intrusive sampling (typically a Phase II ESA activity). Therefore, since routinely some properties undergo sampling, an inflexible standard would require sampling of all properties no matter what its use. This could not have been the intended result of SARA.

X1.3.3 *The Minimum Inquiries to Satisfy All Appropriate Inquiry*:

X1.3.3.1 Recognizing that inquiry changes with the underlying circumstances, the next question concerns that level of inquiry, if any, that Superfund requires to utilize the innocent landowner defense.

X1.3.3.2 As noted above, in some real estate transactions a Phase II ESA is routinely conducted. A Phase I ESA is conducted in these transactions only as a necessary prerequisite to outline the scope of the Phase II ESA. A Phase II ESA typically involves taking soil, water, and air samples to determine their contaminant content or verify that no contaminants are present or likely present. Note, however, that this

[14] H.R. Rep. No. 962, 99th Cong., 2d Sess. 187 (1986), *reprint at* 1986 U.S. Code Cong. and Admin. News 3276, 3280.

simplistic outline of the Phase II ESA is misleading since the party can always dig down one foot deeper, take one more sample, or conduct one more test. The problem of how much inquiry is conducted, or at what level a party should begin, involves proving a negative—that is, that no contamination is present.[15] Since, according to the statute, inquiries should be judged by the circumstances existing at the time of acquisition, then there could be some properties and parties to real estate transactions where it may be appropriate to begin the inquiry with an intrusive Phase II ESA in order to invoke the innocent purchaser defense to liability.

X1.3.3.3 At the other extreme, the minimum level of inquiry that a party would be expected to conduct is found by looking at the least environmentally obtrusive class of property and party from a CERCLA perspective. This transaction likely involves the lay buyer of a home or the renter of an apartment. Assuming these parties meet the other prerequisites for the innocent purchaser defense, what level of environmental inquiry must they conduct to avoid Superfund liability? While there are no recorded court cases on this issue, the answer is probably none, unless a particular residential purchaser or renter has some specialized knowledge about or experience with the property in question that would lead a court to conclude that some questions should have been asked. Beyond these rare situations, it is highly unlikely that Congress intended to saddle housing consumers with the burden of investigating or cleaning up contaminated sites. In fact, EPA has issued a statement of enforcement policy to the effect that it will not generally pursue owners of single family residences pursuant to CERCLA.[16] Therefore, for some properties and parties to real estate transactions, it is appropriate to conduct no environmental inquiry in order to meet the innocent purchaser defense to liability.

X1.3.3.4 The minimum level of appropriate inquiry under Superfund, therefore, ranges from no specialized inquiry to conducting an intrusive Phase II ESA. In order to satisfy the practices, to do no specialized inquiry, such as the transaction screen or Phase I ESA, is not enough for commercial real estate transactions. Under current commercial and customary practice and in light of best business and land transfer principles, however, no environmental site assessments are conducted in many real estate transactions, particularly those involving smaller properties, vacant land, or transactions of low monetary value. This practice and Practice E 1527 and the minimum level of inquiry under these practices, actually raises the average level of inquiry that should be performed where the parties want to come within the protection of the innocent landowner defense.

X1.3.3.5 The burden of proof is on the defendant to sustain by a preponderance of the evidence, the innocent purchaser defense. This is the least onerous burden of proof available to a party in litigation. The defendant must show only that the evidence offered to support the level of inquiry that was taken at the time of acquisition is of greater weight or more convincing than the evidence offered in opposition to it. In other words, the evidence on the inquiry issue taken as a whole shows that the fact sought to be proved is more probable than not. There may be technical or business judgments on whether the inquiry conducted or any other fact in a particular case is sufficient to meet the needs or concerns of a party to the real estate transaction. The bottom line, however, is that the judgment on whether the specific facts of a case, in light of statutory language, are sufficient to produce liability or a viable defense to liability is a legal one and such judgments constitute the practice of law.

X1.3.3.6 This practice is designed as the minimum level of inquiry to satisfy the practice from which a party to a commercial real estate transaction should proceed, recognizing that some parties to some commercial real estate transactions may wish to proceed by beginning with a Phase I or a Phase II ESA.

X1.4 *Statutory Definition of Hazardous Substance:*

X1.4.1 The statute at 42 USC § 9601(14)(A–F) defines hazardous substance by referring to five other statutes as well as to Superfund's own § 9602. The following is a description of the relevant portions of the other statutes and § 9602 of Superfund:

42 U.S.C. § 9601(14)(A): "[A]ny substance designated pursuant to section 1321(b)(2)(A) of Title 33." Title 33 USC § 1321 lies within the Clean Water Act and refers to, among other things, hazardous substance liability. 33 USC§ 1321(b)(2)(A) states that the EPA shall develop, "as may be appropriate, regulations designating as hazardous substances, other than oil as defined in this section, such elements and compounds which, when discharged in any quantity into" the navigable waters of the United States ..., present an imminent and substantial danger to the public ... health or welfare, including, but not limited to, fish, shellfish, wildlife, shorelines, and beaches."

42 U.S.C.§ 9601(14)(B): "[A]ny element, compound, mixture, solution, or substance designated pursuant to section 9602 of this title." Section 9602 gives EPA the authority to designate as a hazardous substance "such elements, compounds, mixtures, solutions, and substances which, when released into the environment may present substantial danger to the public health or welfare or the environment ..."

42 U.S.C.§ 9601(14)(C): "[A]ny hazardous waste having the characteristics identified under or listed pursuant to section 3001 of the Solid Waste Disposal Act [42 USCA § 6921](but not including any waste the regulation of which under the Solid Waste Disposal Act [42 USCA § 6901 et seq.] has been suspended by Act of Congress)." The Solid Waste Disposal Act of 1980 amended the Resource Conservation and Recovery Act

[15] The inability to prove a negative creates a dilemma for the potential defendant. If the party's inquiry discovers contamination, then under the statute the party will not be able to avail itself of the innocent purchaser defense. If the inquiry does not discover contamination, EPA or another private party can argue in a response action that the inquiry was not "appropriate" and, therefore, the defendant can have no defense. The dilemma is explicitly recognized by Subcommittee E50.02 as beyond any reasonable interpretation of Congressional intent. The scope of these practices resolves the party's dilemma in the only reasonable way by stating: "It should not be concluded or assumed that the inquiry was not appropriate inquiry merely because the inquiry did not identify existing recognized environmental conditions in connection with a property. Environmental site assessments must be evaluated based on the reasonableness of the judgments made at the time and under the circumstances in which they were made". See 4.5.4.

[16] EPA, *Policy Towards Owners of Residential Property at Superfund Sites*, OSWER Directive No. 9834.6, July 3, 1991.

(RCRA). 42 USCA § 6921 of RCRA provides authority to the EPA to develop criteria for identifying characteristics of hazardous waste and for listing particular hazardous wastes within the meaning of 42 USCA § 6903(5) of RCRA. RCRA, § 6903(5), defines hazardous waste to mean

"a solid waste, or combination of solid wastes, which because of its quantity, concentration, or physical, chemical, or infectious characteristics may—

(A) cause, or significantly contribute to an increase in mortality or an increase in serious irreversible, or incapacitating reversible, illness; or

(B) pose a substantial present or potential hazard to human health or the environment when improperly treated, stored, transported, or disposed of, or otherwise managed."

For the identification and listing of hazardous wastes under RCRA, see 40 CFR. §§ 261.1 *et seq*.

42 USC § 9601(14)(D): "[A]ny toxic pollutant listed under section 1317(a) of Title 33." Section 1317(a) of Title 33 refers to toxic and pretreatment effluent standards under the Clean Water Act. The EPA is charged in this section with publishing and revising from time to time a list of toxic pollutants, taking "into account toxicity of the pollutant, its persistence, degradability, the usual or potential presence of the affected organisms in any waters, the importance of the affected organisms, and the nature and extent of the effect of the toxic pollutant on such organisms." Each toxic pollutant listed according to this section shall be subject to effluent limitations. For toxic pollutant effluent standards, see 40 CFR§§ 129.1 *et seq*.

42 USC § 9601(14)(E): "[A]ny hazardous air pollutant listed under section 112 of the Clean Air Act [42 USCA§ 7412]." Section 7412 of the Title 42 deals with national emission standards for hazardous air pollutants. The EPA is charged here with publishing and revising from time to time "a list which includes each hazardous air pollutant for which [it] intends to establish an emission standard under this section." The term "hazardous air pollutant" means an air pollutant that in EPA's judgment "causes, or contributes to, air pollution which may reasonably be anticipated to result in an increase in mortality or an increase in serious irreversible, or incapacitating reversible, illness." For emission standards for hazardous pollutants, see 40 CFR§ 61.01 *et seq*.

42 USC § 9601(14)(F):"[A]ny imminently hazardous chemical substance or mixture with respect to which the [EPA] has taken action pursuant to section 2606 of Title 15." Section 2606 of Title 15 deals with imminent hazards under the Toxic Substances Control Act (TSCA). The EPA is authorized under 15 USC § 2606 to seize an imminently hazardous chemical substance or mixture or seek other relief, such as requiring notice to users of the chemical substance or public notice of the risk associated with the substance or mixture. The term "'imminently hazardous chemical substance or mixture' means a chemical substance or mixture which presents an imminent and unreasonable risk of serious or widespread injury to health or the environment."

X1.4.2 After Subsections A through F, the Superfund definition of "hazardous substance" in § 9601(14) then goes on to state:

"The term does not include petroleum, including crude oil or any fraction thereof which is not otherwise specifically listed or designated as a hazardous substance under Subparagraphs (A) through (F) of this paragraph, and the term does not include natural gas, natural gas liquids, liquefied natural gas, or synthetic gas usable for fuel (or mixtures of natural gas and such synthetic gas)."

X1.4.3 The EPA has collected a list of "those substances in the statutes referred to in section 101(14) of the Act [42 USC § 9601(14)]." 40 CFR § 302.1 (1989) ("List of Hazardous Substances and Reportable Quantities," 40 CFR Part 302). This list changes with notices in the Federal Register. Also, any time a new hazardous waste is listed, the waste automatically becomes a hazardous substance.

X1.5 *Petroleum Products:*

X1.5.1 Under the petroleum exclusion of CERCLA (42 USC§ 9601(14)), petroleum and crude oil have been explicitly excluded from the definition of hazardous substances under CERCLA. Nevertheless, petroleum products are included within the scope of both practices because such they are of concern in many commercial real estate transactions and current custom and usage is to include an inquiry into the presence of petroleum products in an environmental site assessment. Inclusion of petroleum products within the scope of the practices is not based upon the applicability, if any, of CERCLA to petroleum products.

X1.5.2 One reason to include petroleum products within the scope of the practice is because to do so reflects custom and usage: when environmental assessments are conducted in connection with commercial real estate transactions, they customarily include an assessment of the presence or likely presence of petroleum products under conditions that may lead to contamination. For example, environmental assessments ordinarily seek to assess whether there may be underground or above-ground storage tanks that may be leaking, whether those tanks contain petroleum products or some other product.

X1.5.3 In addition, although CERCLA may exclude petroleum products, other laws require cleanup of releases or spills of petroleum products. For example, petroleum products sometimes (for example, when they cannot be reclaimed from soil) become hazardous wastes subject to RCRA Subtitle C (42 USC § 6921 *et seq*.), must be cleaned up if released from underground storage tanks pursuant to RCRA Subtitle I (42 USC § 6991 *et seq*.), must be cleaned up pursuant to the Oil Pollution Act of 1990 (33 USC § 1321 *et seq*.), and must be cleaned up if released into the navigable waters of the United States pursuant to the Clean Water Act (33 USC § 1251 *et seq*.).

X1.5.4 Moreover, case law and EPA interpretations of the petroleum exclusion require an analysis of the facts of each case to determine whether a particular petroleum product is included in CERCLA's petroleum exclusion. The exclusion has been broadly interpreted to exclude gasoline and leaded gasoline from CERCLA's definition of hazardous substances regardless of the fact that gasoline and leaded gasoline contain certain indigenous components and additives which have

themselves been designated as hazardous pursuant to CERCLA. See *Wilshire Westwood Associates versus Atlantic Richfield Corporation*, 881 F.2d 801 (9th Cir. 1989). The interpretation was narrowed when a judicial distinction was made between petroleum fractions produced by distillation processes and waste products resulting from contaminated tank scale. *United States versus Western Processing Co*., 761 F. Supp. 713 (W.D. Wash. 1991). Another decision narrowly interpreted CERCLA's petroleum exclusion to be inapplicable to oil-related wastes containing hazardous substances because the primary purpose of the exclusion is to remove "spills or other releases strictly of oil" from the scope of CERCLA response and liability (not releases of hazardous substances mixed with oil). See *City of New York versus Exxon Corporation*, 744 F. Supp. 474 (S.D. N.Y. 1990). For additional discussion, see EPA memorandum entitled "The Petroleum Exclusion under the Comprehensive Environmental Response Compensation and Liability Act," issued by EPA's General Counsel, July 31, 1987.

X1.6 *Exclusion of Certain Hazards from Superfund:*

X1.6.1 The information that follows is provided to explain why these potential environmental hazards are not covered by Superfund's appropriate inquiry responsibilities.

X1.6.2 As a preliminary matter, it should be noted that an environmental site assessment that does not address substances excluded from CERCLA (whether those substance are excluded because they are petroleum products or by virtue of other characteristics) but that otherwise constitutes" all appropriate inquiry into the previous ownership and uses of the property consistent with good commercial or customary practice" should nevertheless entitle the user to the innocent purchaser defense, assuming that other requirements of the defense are met.

X1.6.3 *Radon*:

X1.6.3.1 A case discussing Superfund and radon is *Amoco Oil Company versus Borden, Inc.* This case dealt with a private cost recovery action by the buyer of a site against the seller for response costs relating to radiation from phosphogypsum wastes left on the site. Radon emanated from these radioactive wastes. The case points out that the "EPA has designated radionuclides as hazardous substances under§ 9602(a) of CERCLA... . Additionally, the ... EPA under§ 112 of the Clean Air Act ... list radionuclides as a hazardous air pollutant." "Radon and its daughter products are considered radionuclides, which are defined as 'any nuclide that emits radiation.'" Therefore, radon is a CERCLA hazardous substance. Also, when discussing what constitutes a release of a hazardous substance under the statute, the statute is plain that there is no quantitative requirement and that a release, broadly defined at 42 USC § 9601(22), of *any* amount constitutes a CERCLA release.

X1.6.3.2 Liability under Superfund depends on several factors, as noted in X1.1. Only one of four factors is the release or threatened release of a hazardous substance. The other three factors are the site is a facility, the defendant falls within at least one of four classes of potentially responsible parties (PRPs), and the release or threatened release *caused* the plaintiff (which can be the government or another private party) to incur response costs. Further, response costs must not be inconsistent with the National Contingency Plan (NCP), *and must not be limited by § 9604(a)(3)*. And, of course, there is no need to raise the innocent purchaser defense and its appropriate inquiry requirements unless the elements of liability will be met.

X1.6.3.3 Where radon from any source occurs in a building, three of the liability elements under CERCLA are met. There is a release of a hazardous substance, the building is a facility, and we can assume the defendant is a PRP. However, under 42 USC § 9604(a)(3)(A), "[r]emedial actions taken in response to hazardous substances as they occur naturally are specifically excluded from the NCP and are therefore not recoverable." A case discussing superfund and radon is *Amoco Oil Company versus Borden, Inc*., 889 F.2d 664 (5th Cir. 1989). The statute is plain (42 USC § 9604(a)(3) and (4)(*emphasis added*):

"(3) Limitations on response

The President shall not provide for a removal or remedial action under this section in response to a release or threat of release—

(A) *of a naturally occurring substance in its unaltered form, or altered solely through naturally occurring processes or phenomena, from a location where it is naturally found;*

(B) from products which are part of the structure of, and result in exposure within, residential buildings or business or community structures;[17] or

(C) into public or private drinking water supplies due to deterioration of the system through ordinary use.[18]

(4) Exception to limitations

Notwithstanding Paragraph (3) of this subsection, to the extent authorized by this section, the President may respond to any release or threat of release if in the President's direction, it constitutes a public health or environmental emergency and no other person with the authority and capability to respond to the emergency will do so in a timely manner."

X1.6.3.4 Therefore, no liability under CERCLA attaches for naturally occurring radon. If a party to a real estate transaction wants to look for radon within a building, no amount of radon investigation will have any bearing on one's innocent purchaser defense under Superfund. Investigation of naturally occurring radon would be included, if at all, in the portion of the practice that deals with non-scope issues.

X1.6.4 *Asbestos*:

X1.6.4.1 The analysis of asbestos is similar to that involving radon. Before considering appropriate inquiry responsibilities, the four elements of CERCLA liability must be satisfied. Once again, as with radon, they are not met.

X1.6.4.2 Section 9604(a)(3)(B) of CERCLA prohibits response actions involving a release or threat of release "from products which are part of the structure of, and result in exposure within, residential buildings or business or community structures." There are a number of cases dealing with asbestos that interpret this statutory language. One such case is

[17] This provision has implications for asbestos and lead-based paint. See X1.6.4.

[18] This provision has implications for lead from lead pipes and solder. See X1.6.5.

First United Methodist Church of Hyattsville versus United States Gypsum Co.,[19] that cites to other relevant cases.

X1.6.4.3 In *First United* the church brought a private cost recovery action against the manufacturer of asbestos-containing acoustical plaster. In holding that the action was barred by a state statute of repose (a certain time allowed by statute for bringing litigation) and that CERCLA did not preempt the state statute of repose, the court stated that § 9604(a)(3)(B) of CERCLA "represents much more than a procedural limitation on the President's authority; it is a substantive limitation of the breadth of CERCLA itself.[20] Therefore, the limitations of § 9604(a)(3) apply to private parties as well.

X1.6.4.4 Citing to the legislative history, the *First United* court concluded, "[i]n view of this clear expression of Congressional intent, we will not expand CERCLA to encompass asbestos-removal actions." The court further explained:[20]

"In closing, we note that this interpretation of CERCLA fully comports with the most fundamental guide to statutory construction—common sense. To extend CERCLA's strict liability scheme to all past and present owners of buildings containing asbestos as well as to all persons who manufactured, transported, and installed asbestos products into buildings, would be to shift literally billions of dollars of removal cost liability based on nothing more than an improvident interpretation of a statute that Congress never intended to apply in this context. [FN12] ... Certainly, if Congress had intended for CERCLA to address the monumental asbestos problem, it would have said so more directly when it passed SARA... .

FN12—It is for this reason, that Congress simply did not intend for CERCLA to remedy the asbestos-removal problem, that we decline to follow the reasoning of *Prudential*, *Knox* and *Covalt* in rejecting First United's preemption argument. Instead of recognizing the fact that CERCLA is out of context in this situation, these courts rejected similar attempts to invoke the statute by construing CERCLA's key terms in a way to exclude asbestos-removal actions. *Covalt*, 860 F.2d [1434] at 1438-39 (defining "environment" to exclude the interior of a workplace); *Knox*, 690 F. Supp at 756-57 (defining "release" in terms of "spills" or "disposal"); *Prudential*, [711 F. Supp 1244] at 1254-55 (defining "disposal" to exclude the sale of a product for consumer use). We find this analysis unsatisfactory because it runs the risk of unnecessarily restricting the scope of CERCLA merely to dispose of claims that the statute was never intended to encompass in the first place. It is far better to simply acknowledge the inapplicability of CERCLA to asbestos-removal claims than to restrict its operative terms."

X1.6.4.5 Since asbestos that is a part of the structure of, and results in exposure within, residential buildings or business or community structures is excluded from CERCLA liability, it should not be investigated pursuant to a party's innocent purchaser appropriate inquiry requirements. Like naturally occurring radon, investigation of asbestos-containing materials that are part of the structure of buildings should be included, if at all, in the portion of the practice that deals with non-scope issues. Note, however, if asbestos is disposed of on a site and, therefore, is no longer part of the structure of a building, the cleanup of the disposed asbestos is subject to Superfund response actions. Likewise, if a building is sold with the knowledge that it will be demolished, one court ruled that the sale constitutes a disposal falling under CERCLA's liability provisions.[21]

X1.6.5 *Lead in Drinking Water and Lead-Based Paint*—These hazards can be evaluated in terms of the exclusions of 42 USC § 9604(a)(3)(B) and (C), in an analysis similar to the analysis applied above to radon and asbestos. While there is no reported case law on these environmental issues as they relate to Superfund, the statutory language seems clear that these environmental hazards are not encompassed by Superfund's appropriate inquiry responsibilities. Note, however, like asbestos, where there is a disposal of these substances on the site or in a facility, CERCLA liability may arise.

[19] One such case is *First United Methodist Church of Hyattsville versus United States Gypsum Co.*, 882 F.2d 862 (4th Cir. 1989), that cites to other relevant cases.

[20] See also *3550 Stevens Creek Associates versus Barclays Bank of California*, 915 F.2d 1355 (9th Cir. 1990).

[21] *CP Holdings, Inc. versus Goldberg-Zoino and Associates, Inc.*, 769 F. Supp. 432 (D.N.H. 1991).

X2. SUPPLEMENTAL INFORMATION FOR USE IN CONNECTION WITH THE GUIDE ON ENVIRONMENTAL SITE ASSESSMENTS OF COMMERCIAL REAL ESTATE

FIG. X2.1 Chemical Storage in 55-gal (208-L) Steel Drums

FIG. X2.2 Chemical Storage in 55-gal (208-L) Plastic Drums

FIG. X2.3 Typical Pole-Mounted Transformer

NOTE 1—Oil-water separators are often located under manholes outside repair garages, or at any location where it is necessary to separate oil from water prior to discharge.

FIG. X2.4 Manhole Cover Outside Repair Garage

NOTE 1—Floor drains come in various shapes and sizes. Shown here is one type of floor drain. It is important to know the point of discharge of any floor drain.

FIG. X2.5 Example of Floor Drain

NOTE 1—Floor drains come in various shapes and sizes. Shown here is one type of floor drain. It is important to know the point of discharge of any floor drain.

FIG. X2.6 Example of Floor Drain

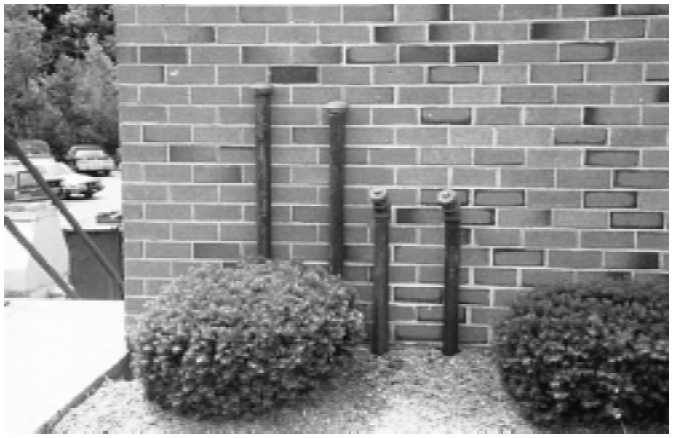

FIG. X2.7 Two Fill and Vent Pipes Leading to Two Underground Storage Tanks

FIG. X2.8 Single Tall Vent Pipe (Arrow) for Underground Storage Tank on Side of Building

NOTE 1—Approximately 2½-in. (64-mm) diameter with screw cap.

FIG. X2.9 Fill Pipe for Residential Underground Fuel Oil Storage Tank

NOTE 1—Approximately 8-in. (203-mm) diameter.

FIG. X2.10 Water Supply Well for Residential Property

NOTE 1—Approximately 8-in. (203-mm) diameter

FIG. X2.11 Water Supply Well for Residential Property

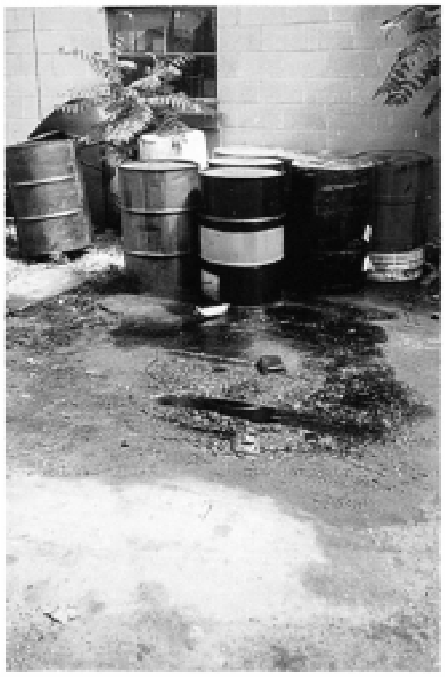

FIG. X2.12 Surface Staining from Improper Drum Storage