THE ZOMBIE SURVIVAL GUIDE

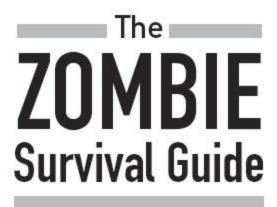
Complete Protection from the Living Dead

Max Brooks



THE ZOMBIE SURVIVAL GUIDE

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Complete Protection from the Living Dead

Max Brooks

Illustrations by Max Werner



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For Mom and Dad. And for Michelle, who makes life worth fighting for.

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INTRODUCTION

The dead walk among us. Zombies, ghouls—no matter what their label—these somnambulists are the greatest threat to humanity, other than humanity itself. To call them predators and us prey would be inaccurate. They are a plague, and the human race their host. The lucky victims are devoured, their bones scraped clean, their flesh consumed. Those not so fortunate join the ranks of their attackers, transformed into putrid, carnivorous monsters. Conventional warfare is useless against these creatures, as is conventional thought. The science of ending life, developed and perfected since the beginning of our existence, cannot protect us from an enemy that has no "life" to end. Does this mean the living dead are invincible? No. Can these creatures be stopped? Yes. Ignorance is the undead's strongest ally, knowledge their deadliest enemy. That is why this book was written: to provide the knowledge necessary for survival against these subhuman beasts.

Survival is the key word to remember—not victory, not conquest, just survival. This book will not teach you to become a professional zombie hunter. Anyone wishing to devote their life to such a profession must seek training elsewhere. This book was not written for the police, military, or any government agency. These organizations, if they choose to recognize and prepare for the threat, will have access to resources far beyond those of private citizens. It is for them that this

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survival guide was written—private citizens, people with limited time and resources who nonetheless have refused to be victimized.

Naturally, many other skills—wilderness survival, leadership, even basic first aid—will be necessary in any encounter with the living dead. These were not included in this work, as they can be found in conventional texts. Common sense will dictate what else should be studied to complement this manual. Subsequently, all subjects not directly related to the living dead have been omitted.

From this book, you will learn to recognize your enemy, to choose the right weapons, about killing techniques, and about preparation and improvisation when on the defense, on the run, or on the attack. It will also discuss the possibility of a doomsday scenario, in which the living dead have replaced humanity as the planet's dominant species.

Do not discount any section of this book as hypothetical drama. Every ounce of knowledge was accumulated by hard-won research and experience. Historical data, laboratory experiments, field research, and eyewitness accounts (including those of the author) have all served to create this work. Even the doomsday scenario is an extrapolation of true-life events. Many actual occurrences are chronicled in the chapter of recorded outbreaks. Studying them will prove that every lesson in this book is rooted in historical fact.

That said, knowledge is only part of the fight for survival. The rest must come from you. Personal choice, the will to live, must be paramount when the dead begin to rise. Without it, nothing will protect you. On the last page of this book, ask yourself one question: What will you do—end your existence in passive acceptance, or stand up and shout, "I will not be their victim! I will survive!" The choice is yours.

THE ZOMBIE SURVIVAL GUIDE

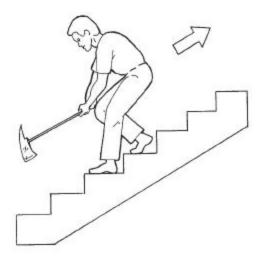
ON THE DEFENSE

The story of Yahya Bey, a Turkish immigrant to the United Kingdom, describes an attack on his home village of Oltu. According to Bey, a swarm of zombies descended from the surrounding hills in the dead of night. Those who were not devoured fled either to their homes, the town mosque, or the local police station. Several were crushed in the panic to enter this last location while an accidental fire killed everyone inside. Many people, lacking the time and materials to barricade all their doors and windows, were overrun by the undead. Many, suffering from bites, sought shelter in the home of the town doctor. As he attempted to treat his patients, they expired, then reanimated. Bey, a six-year-old boy, managed to climb onto the roof of his house, remained there for most of the night, then took off at first light, jumping from roof to roof until he reached open ground. Although no one in the nearby villages believed his story, a search party was sent to look for human marauders. This group found Oltu in shambles, all buildings burned, smashed, or otherwise destroyed. Half-eaten corpses littered the deserted streets. Dragging footprints, enough to suggest a sizable group, followed a track of fewer, faster tracks into the mountains. Neither group was ever discovered.

What is the perfect protection from the undead? Truthfully, there isn't one. Defense isn't as simple as physical safety. Supposing you manage to find, build, or modify a structure to keep the external threats at bay then what? Zombies will not just go away, and there's no telling how long it will take for rescue. How will you survive? Hunger, thirst, disease, and many other factors have claimed as many lives as the walking dead. Siege warfare, the type our ancestors faced when their castles or villages were surrounded by enemies, is what you will be facing when the dead walk again. Physical safety is only one part of the equation. To be fully prepared, you must have a working knowledge of stationary survival. In an interdependent world, this art has long since been forgotten. Look around your home. How many items have been manufactured within ten, fifty, even a hundred miles of it? Our way of life, particularly as members of the richest industrialized nation on earth, requires a delicate network of transportation and communication to exist. Remove that network, and we are reduced to a standard of living reminiscent of medieval Europe. Those who comprehend this and plan for such an existence stand a much greater chance of survival. This section shows both how to create a stronghold and how to live within its boundaries.

THE PRIVATE RESIDENCE (DEFENDING YOUR HOME)

For Class 1 conflicts, most people's homes will provide adequate shelter. There is no need to flee the city or town as soon as you hear that the dead are walking. In fact, this is highly discouraged. In the first hours of a zombie attack, most of the population will try desperately to escape. Roads will become a mass of stationary vehicles and panicked people, a situation that is rife with the potential for violence. Until the living destroy the dead, or the dead overrun the living, trying to flee would only add more bodies to the anarchy. So load your weapons, prepare for a fight, but stay put, stay safe, stay alert. And what better place to do so than in the comfort of your own home?



1. PREPARATION PART I: THE HOME

Before the dead rise, before the chaos and carnage begin, certain homeowners will find that they are safer than their neighbors. Although no house was ever constructed for the purpose of zombie defense, several designs have proved remarkably secure. If your house itself is not structurally ready for a zombie attack, various measures can be employed to fortify it.

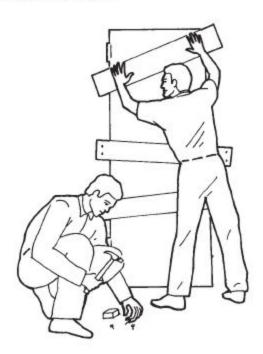
A. Exceptions

Stilted homes, as seen on beaches and along rivers and other high watermark areas, were built mainly to avoid being overrun by floods. Their height already makes conventional attacks impossible. Doors and windows could even remain open and unboarded. The only entrance and one or two outside staircases could either be barricaded or destroyed once the alarm is sounded. Secure on this raised platform, survival time would be determined only by the amount of provisions a homeowner had stockpiled.

There is another highly protective dwelling that was built to combat a force just as prevalent, and just as deadly, as an undead army: Tornado-proof "safe houses," now being constructed in the American heartland, are designed to resist mild to moderate twisters. Their layout consists of concrete walls, steel-reinforced doors, and steel shutters neatly concealed behind everyday curtains. On their own, these domiciles could withstand both a Class 1 and Class 2 outbreak.

B. Modifications to Houses

Securing a house against the undead is similar to securing it from the living. One difference is the common burglar alarm. Many of us sleep securely at night only because our alarms are "armed" and working. But what do these devices really do, other than send a signal to a private security or police force? What if these forces don't come? What if they are occupied with other battles? What if they are ordered to protect areas deemed "more important"? What if they have ceased to exist, disappeared into the stomachs of ghouls? In any of these cases, direct means of defense are called for.



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Security bars on doors and windows will stop a group of zombies for a limited amount of time. Experience has shown that as few as three walking dead can tear them down in less than twentyfour hours.

Tempered safety glass prevents entry by smashing but can be forced right out of its pane. This can easily be fixed by installing concrete or steel frames. However, the money it would take to replace each window in an average house



could and should be spent instead on purchasing or building one of the two house types discussed above: stilted or tornado-proof domiciles.

A good ten-foot chain-link fence can hold dozens of zombies for weeks, even months, provided their numbers remain at Class 1. A ten-foot cinder-block wall, reinforced with steel rods and filled with concrete, is the safest barrier in both Class 1 and Class 2 outbreaks. Zoning laws may prohibit a wall this high, but don't dismiss it. (Check with your local zoning board.) Although zombies have been known (on rare occasions) to hoist themselves over obstacles as high as six feet, this has never occurred en masse. Several people, well-armed and with good communication, can maintain a six-foot wall, not easily but safely, for as long as the stamina of this group holds out.

A gate should be steel or wrought-iron, solid if possible. It should slide to one side, not swing in or out. Reinforcement is as simple as parking your car up against it. Electric motors make opening easier but will leave you trapped in a power outage or breakdown.

As stated earlier, a ten-foot concrete wall will only provide adequate protection in a Class 1 or Class 2 outbreak. In a Class 3 outbreak, enough zombies can, and will, climb on top of each other until they form an undead ramp right over your wall.

C. Apartments

Apartments and apartment buildings vary in size and layout and, therefore, in defensibility. However, from the squat two-story buildings of Los Angeles to the concrete and glass towers of New York, certain basic rules apply.

First-floor apartments present the highest risk simply because of their accessibility. Tenants living above the ground floor are almost always safer than those in any type of house. Destroying the staircase effectively isolates the rest of the building. With the elevator turned off and the fire escape too high for a zombie to reach (strict limits are imposed by law), any apartment house can become an instant haven from the walking dead.

Another advantage of the apartment complex is its large population. Whereas a private homeowner may be forced to hold the residence by himself, an apartment building can be defended by all of its tenants. This also increases the chances of having multiple skilled experts such as carpenters, electricians, paramedics, and Army reservists (not always the case, but still a possibility). Of course, with additional people comes the challenge of additional social conflicts. This potential problem, however, should never be a deterrent when choosing between a house and an apartment. Given the choice, always pick the latter.

IMPORTANT NOTE: DISCOUNT HOME-DEFENSE MANUALS!

Although almost every other section in this book encourages the use of conventional texts (on weapons use, military tactics, survival skills, and so on), those written to protect a domicile are not recommended. Home-defense books are designed to counter a human adversary with human skills and human intelligence. Many of the tactics and strategies featured in these books, such as employing elaborate alarm systems, booby traps, and painful, but nonlethal devices such as Mace canisters or nail heads in the carpet, would be useless against an undead intruder.

2. PREPARATION PART II: SUPPLIES

Once the private residence is secure, stockpiling for a siege must be undertaken. There is no telling how long it will take for help to arrive. There is no telling if help ever will. Always be prepared for a long siege. Never assume a quick rescue.

A. Weapons

Whereas in the field you must travel light to maintain mobility, in your home you have the luxury of storing and maintaining a plethora of weapons. This does not mean filling your home with any capricious instrument of destruction. Each home arsenal should include:



- Rifle, 500 rounds
- Shotgun, twelve-gauge, 250 shells
- · Pistol, .45 caliber, 250 rounds
- · Silencer (rifle)
- · Silencer (pistol)
- · Heavy crossbow (in lieu of silencers), 150 bolts
- Telescopic sight (rifle)
- · Night-vision scope (rifle)
- · Laser sight (rifle)
- Laser sight (pistol)
- Katana sword
- Wakizashi or other short-bladed sword
- · Two knives with smooth, six- to eight-inch blades
- Hand hatchet

(NOTE: This list applies to a single individual. Numbers should be adjusted depending on the number of people in the group.)



B. Equipment

Now that all weapons have been chosen, consider what equipment is necessary for your maintenance and perhaps even survival. In the short run, standard disaster-survival kits will suffice. Any longer, and the material below will be necessary. Common household items such as clothing, toilet paper, etc., are assumed to be kept on hand in reasonable quantities.

- · Water, three quarts per day, for cooking and washing
- · Hand-pumped water filter
- Four replacement filters
- · Cistern for collecting rainwater
- Iodine and/or purification tablets
- Canned food, three cans per day (preferable to dried goods in that they contain some water)
- · Two portable electric stoves
- Advanced medical kit (must include field-surgery implements and antibiotics)
- · Bicycle-powered electric generator
- · Gasoline generator (to be used only in emergencies)
- · Twenty gallons of gasoline
- · Rechargeable, battery-powered shortwave radio
- · Two battery-powered flashlights
- · Two rechargeable, battery-powered electric lamps
- · Two rechargeable, battery-powered and/or solar-powered radios
- Appropriate reinforcement materials, including lumber, bricks, mortar, etc.
- · Extensive tool kit, including sledgehammer, ax, handsaw, etc.
- Lime and/or bleaching powder in sufficient supply to maintain latrine
- One high-powered telescope (80X-100X), with spare lenses and cleaning equipment
- · Fifteen emergency flares
- Thirty-five chemical light sticks

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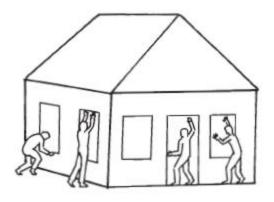
- · Five fire extinguishers
- Two sets of earplugs
- · Spare parts for all aforementioned machinery and user's manuals
- · Extensive library of manuals, including a general disaster manual

(NOTE: As with weapons, personal items such as food, water, and medicine must be multiplied for the number of people in your group.)

3. SURVIVING AN ATTACK

The siege has commenced. Zombies swarm around your home, incessantly attacking but unable to enter. At this point, your worries are far from over. Waiting out a siege does not mean sitting idle. Many tasks will have to be accomplished and repeated for survival in a confined space.

- A. Designate one corner of your backyard to serve as a latrine. Most survival manuals will explain the finer points of construction and disposal.
- B. If soil and rain permits, dig a vegetable garden. This ready source of food should be consumed first, saving the canned food for an emergency. Keep it as far away from the latrines as possible, to



avoid infection not by waste but by the residual effects that lime or bleach will have on the soil.

- C. For electricity, always resort to the manual (bicycle-powered) generator. Not only is the gasoline model loud and potentially dangerous—its fuel is finite. Use it only in extreme circumstances, such as a night attack, when manual power is unfeasible or impossible to generate.
- D. Patrol the wall constantly. If you're in a group, run patrols on a twenty-four-hour basis. Always be vigilant for an unlikely but possible infiltration. If you are alone, limit your patrols to daylight hours. At night, make sure all doors are secure (windows should already be barred). Sleep with a flashlight and weapon nearby. Sleep lightly.
- E. Maintain a low profile. If you have a basement, do your cooking there, along with power generation and any equipment maintenance. When you monitor the radio, something that should be done every day, use headphones. Keep blackout curtains on all windows, especially at night.
- F. Dispose of all bodies. Be it zombie or human, a corpse is still a corpse. The bacteria in rotting flesh can be a serious health hazard. All bodies within your perimeter should be burned or buried. All bodies outside of your wall should be burned. To do this, simply stand on a ladder on your side of the wall, pour gasoline on the freshly slain ghoul, light a match and let it fall. Although this may attract more undead to your dwelling, it is a necessary risk to remove an already-present hazard.
- G. Exercise daily. Use of the stationary bicycle, along with basic calisthenics and dynamic tension, will keep your body fit and strong enough for any combat situation. Again, make sure your regimen

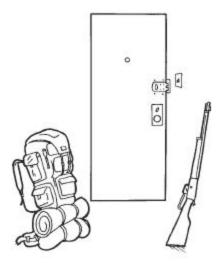
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is quiet. If a basement is not available, use a room in the center of the house. Basic soundproofing such as mattresses and blankets against the walls will help to muffle any sounds.

- H. Remain entertained. Despite the need for vigilance, recreation is a must. Make sure a large cache of books, games, and other forms of amusement are available (electronic games are too noisy and energy-inefficient to be considered). In a long and seemingly interminable siege, boredom can lead to paranoia, delusion, and hopelessness. It is as important to keep your mind in good shape as it is your body.
- I. Keep your earplugs handy, and use them often. The constant, collective moan of the undead, a sound that will persist at all hours for as long as the siege continues, can be a deadly form of psychological warfare. People with well-protected, well-supplied homes have been known to either kill one another or go insane simply from the incessant moan.



J. Make sure your escape route is planned and your gear ready to go. In the uncertainty of battle, it may be necessary to abandon your home. Perhaps the wall has been breached, perhaps a fire has



started, perhaps rescue has arrived but is not close enough. For whatever reason, it's time to go. Keep your survival pack and weapon in a readily accessible area, packed, loaded, and ready for action.

4. IMMEDIATE DEFENSE

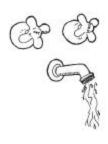
The dead have risen. You smell the smoke, hear the sirens. Screams and shots fill the air. You have been unable or unwilling to properly



prepare your home—what now? Although the situation looks grim, it by no means signals your demise. If you take the right actions at the right time, you can save yourself and your family from joining the ranks of the undead.

A. Strategies for Two-Story Homes

- Lock all your doors and windows. Although a pane of glass may not stop a zombie, the sound of its shattering will be the best warning you can get.
- Run upstairs and turn on the bathtub. Although this sounds foolish, there is no way of knowing when the water will be cut. After a few days, thirst will become your greatest enemy.



- Find the best weapons possible. (See previous chapter.) They should be light and, if possible, attachable to your body so you will have the full use of your hands. Those will be busy for the next hour.
- 4. Begin stockpiling the second story. Use the list on pages 71–72 as your guide. Most households have at least 50 percent of the items listed. Do a quick inventory to see what you have. Don't take everything, just the bare essentials: one or two weapons, some food (you already have a bathtub full of water), a flashlight, and a battery-powered radio. And since most families keep their medical chests upstairs, you won't need anything more. Remember: Time could be short, so don't spend it all gathering supplies when the most important job is still ahead.
- 5. Demolish the staircase! As zombies are unable to climb, this method guarantees your safety. Many have argued that an easier solution would be to board up all the windows and doors. This method is self-defeating because it would take only a few zombies to break through any homemade barricade. No doubt destroying your staircase will take time and energy, but it must be done. Your life depends on it. Do not, under any circumstances, try to burn your stairs away with the hope of controlling the fire. Several people

- have attempted to save time in this way; their efforts have ended in either death by fire or the total destruction of their home.
- If you have a ladder, use it to continue to stock your upstairs refuge. If not, catalog what you do have, fill all sinks and other receptacles with water, and prepare for a long wait.
- 7. Stay out of sight. If you listen to the radio, do it at a minimum volume. When the skies darken, do not turn on the lights. Do not go near the windows. Try to make it seem as if the house has been abandoned. This may not stop a random zombie intrusion, but it will help to discourage a mass congregation from descending upon your home.
- 8. Do not use the phone. As in all disasters, the lines will probably be tied up. One more call only contributes to clogging the system. Keep the ringer on the lowest setting. If a call does come through, by all means answer it, but do so quietly.
- 9. Plan an alternate escape. You may be safe from zombies but not from fire. If a gas line bursts, or some fool down the street goes crazy with a Molotov, you may have to abandon your home. Find a bag or other means of carrying essentials (see "On the Run," pages 94–123), and keep it at the ready.

B. Strategies for Single-Story Homes

If you do not live in a two-story house, the attic will be a less comfortable but equally secure substitute. Most can be secured by simply



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raising the retractable staircase or removing the temporary ladder. Zombies lack the cognitive ability to build a ladder of their own. If you stay quiet, they will not even know that an attic exists.

Never use a basement as a shelter. Popular horror flicks have shown that, in a crunch, this subterranean chamber can protect the living from the dead. This is a dangerous fallacy. Burning, suffocating, or simply starving to death in basements have claimed hundreds of lives over the years.

If you find yourself in a one-story home with no attic, grab whatever supplies you can, take hold of a weapon, and climb onto the roof. If the ladder is kicked away, and there is no direct access (a window or trapdoor), the undead will not be able to reach you. Keep still and keep silent to avoid attracting the undead. Zombies in the area will break into the house below you, search it for prey, then wander off. Remain on the roof for as long as you can, until supplies are exhausted or a rescue patrol arrives. It may not be comfortable, but it is your best chance for survival. Eventually, it will become inevitable to abandon this refuge. (See "On the Run," pages 94–123, for details.)

PUBLIC SPACES

As with private homes, safety can be found in public or nonresidential buildings. In some cases, their size and layout may afford more protection than the most secure domiciles. In other cases, the exact opposite is true. Because arming and equipping these structures should be done in the same manner as in private homes, albeit on a grander scale, this section focuses on the best and worst public sanctuaries.

1. OFFICE BUILDINGS

Many of the same rules regarding apartment houses can be applied to office buildings. Once the first floor has been abandoned, the staircases destroyed, and the elevators shut down, an office building can be a tower of safety.

2. SCHOOLS

As there is no generic layout, deciding whether a public school is a good place to hole up can be tricky. Keep in mind the general rules of defense (see "General Rules," pages 86–87). Unfortunately for our society but fortunately for a zombie siege, inner-city schools have taken on a fortress-like atmosphere. Not only are the buildings themselves built to withstand a riot, but chain-link fences surrounding them make these halls of education look more like military compounds. Food and medical supplies should be readily available from the cafeteria, the nurse's station, or the physical-education office. Often, a school is your best bet—perhaps not for education but certainly for protection from an undead attack.

3. HOSPITALS

What would seem to be the safest, most logical place to flee to during an outbreak is actually one of the worst. Yes, hospitals may be stocked with food, medical supplies, and an expert staff. Yes, the structures themselves could be secured, as with any office or apartment building. Yes, they may have security, even a regular police presence. In any other disaster, a hospital should be first on your list of havens. Not so when the dead rise. Even with growing awareness about zombies, Solanum infections are still misdiagnosed. Humans with bites or newly murdered corpses are always brought to hospitals. The majority of first-wave zombies (in some cases 90 percent) consist of medical staff or those involved with the treatment of cadavers. Chronological maps of zombie outbreaks show them literally radiating from these buildings.

4. POLICE STATIONS

Unlike with hospitals, the reason for avoiding police stations has less to do with zombies than with humans. In all probability, the people living in your city or town will flock to the local police station, creating a nexus of chaos, bodies, and eventual blood. Imagine a packed, writhing crowd of frightened people, too many to control, all trying to

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force their way into the building they think best represents safety. One does not need to be bitten by zombies when beatings, stabbings, accidental shootings, and even tramplings are just as likely. So when the dead rise, locate your local police station—and head the other way.

5. RETAIL STORES

For Class 1 uprisings, many types of retail stores will provide adequate shelter. Those with roll-down gates, solid or otherwise, can stop up to ten zombies for several days. If the siege lasts any longer or if more zombies arrive, the situation may change dramatically. Enough rotting fists, enough heaving forms smashing against the gate will eventually break it down. Always have an alternate escape route planned, so that if the barricade is breached, you can quickly move on. If you can't formulate a solid Plan B, do not consider this place a refuge. Stores without gates should not be considered. Their display windows will do nothing more than advertise you to the zombies.

6. SUPERMARKETS

Although they have enough food to sustain your group for years, supermarkets are also dangerous. Their huge glass doors, even when locked and gated, provide little protection. Reinforcement of these entrances would be difficult. Basically, the exterior of a supermarket is a giant display window, meant to show the fresh, delicious food within. With humans on the inside and zombies on the outside, that is exactly what it will do.

Not all food stores are deathtraps, however. The smaller, familyowned markets and bodegas of the inner city can serve quite well as temporary havens. To protect against theft and, more recently, riot, all have strong steel gates, some even solid roll-down shutters. As with stores, these small markets can provide adequate protection for shortterm, low-intensity attacks. If you find yourself in one, remember to eat perishables first and be ready to dispose of the rest if (when) the electricity is cut.

7. SHOPPING MALLS

A practically indefensible structure. Large shopping centers are always targets for both humans and zombies. It is always the case with social disturbance: At the first sign of trouble, these concentrations of wealth swarm with private security, police, even overzealous shop owners. If the crisis occurs suddenly, a large number of shoppers may become trapped within the mall, creating problems of overcrowding, trampling, and suffocation, as well as attracting the dead. In an outbreak of any class, heading for a shopping mall would mean heading for a center of chaos.



8. Churches

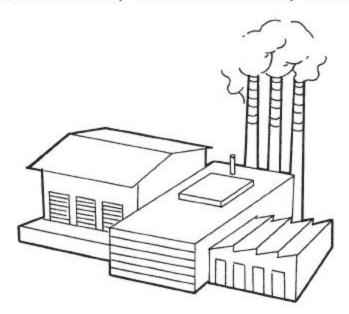
Forgive the expression, but places of worship are a mixed blessing. The main advantage of most churches, synagogues, mosques, and other houses of worship is that they are built to withstand forced entry. Most have heavy wood or metal doors. Windows tend to be high off the ground. A majority possess wrought-iron fences that, despite their aesthetic intent, can serve as added protection. When compared to many secular structures of equal size, your typical place of worship is sur-

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prisingly secure. However, the protection they offer during an outbreak will never be enough against the horde of zombies that are sure to come. The inevitable onslaught has, of course, nothing to do with the supernatural. Satan's soldiers are not out to invade God's house. Ultimate evil is not doing battle with ultimate good. The walking dead attack churches for one good reason: It's where the food is. Despite their education, technical savvy, and professed disinterest in the spiritual world, urban Americans run, screaming to their gods, at the first sight of zombies. These places of worship, crammed with people loudly praying for their souls, have always served as beacons for the undead. Aerial photographs have shown zombies migrating, slowly, steadily, and with increasing numbers, toward their future slaughterhouse: the nearest church.

9. Warehouses

Given their lack of windows, easily secured entrances, and generally spacious layouts, warehouses can be an ideal refuge for an extended period of time. Many warehouses have a security office, usually



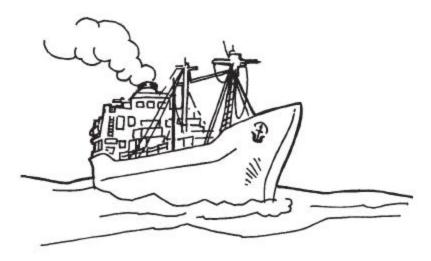
equipped with bathroom facilities and therefore an immediate source of water. If the merchandise that is stored there is both heavy and kept in large, durable crates, consider yourself lucky. These boxes can be used to reinforce doorways, create private rooms, or even, as many of us did when we were children, be used to build a secondary line of defense or "fort" within the main area. There is the possibility, however unlikely, that whatever goods are stored could be helpful to your survival. For all these reasons, rank warehouses among your most attractive hideouts. One caveat concerning location: 50 percent of the time, these buildings are close to shipyards, factories, or other industrial sites. If this is the case, be cautious, observant, and always ready to flee. Also, beware of refrigerated warehouses storing perishable goods. Once electricity is lost, their quick decomposition can become a severe health hazard.

10. PIERS AND DOCKS

With some modifications, adequate supplies, and the right location, any dock or pier can be made practically unreachable. Because zombies can neither swim nor climb, their only access would be from land. Destroying that one access point would leave you on an artificial island.

11. SHIPYARDS

Despite the fact that they frequently are the storage site for industrial waste and hazardous materials, shipyards do present undeniable possibilities for refuge. Like warehouses, their containers can be transformed into barriers or, in some cases, even weapons. (See "Mar. 1994 A.D., San Pedro, California," pages 240–41.) The ships themselves become ready havens once the gangway has been secured. But before boarding, make sure you check these waterborne fortresses for infected crew, particularly in smaller, recreational marinas. In the first stages of an outbreak, citizens will no doubt flock to the shoreline, hoping to use (or steal) any available cabin cruiser. Because many marinas are built in relatively shallow water, they are not deep enough



to keep zombies completely submerged. More than once, an unwary, amateur sailor has climbed aboard his boat to find several ravenous, waterlogged zombies waiting for him.

12. BANKS

What could be safer than a stronghold already built to house the most valuable commodity on Earth? Wouldn't a bank be a logical place to prepare a defense? Wouldn't its security measures be more than enough to repel a horde of walking dead? Not in the least. Even the most cursory examination of banks reveals that a majority of their so-called "security" features require the deployment of police and/or outside security. With the police and all other special forces otherwise engaged during an outbreak, silent alarms, surveillance cameras, and waist-high locked gates will be useless when the dead smash through the plateglass windows, hungry for human flesh. Of course, there is safety in the vault. These titanic constructions would stop even zombies armed with rocket launchers. (No, zombies do not know how to operate rocket launchers.) However, once inside the vault, what next? Given that there is no food, no water, and precious little oxygen, seeking refuge in a

vault does little more than give you enough time to place a gun to your head, make peace with your god, and pull the trigger.

13. CEMETERIES

Ironically, and despite many popular myths, cemeteries are not the most dangerous place to be when the dead rise. In fact, they can be a place of temporary rest. As previously stated, infected bodies are more likely to end up in hospitals or morgues, reanimating long before they can be taken to cemeteries for conventional burials. And if by some miracle, a corpse did come to life inside its coffin, would it really "rise from the grave"? To answer this question, one must ask another: how? How would a body with normal human strength claw its way out of a coffin, possibly made of steel, possibly encased in a hermetically sealed box, six feet underground? If one looks at the preservation methods involved in standard American burials, the fact is obvious that any person, undead or otherwise, could not possibly scrape, scratch, and crawl his or her way to the surface. But what if the casket is not made of steel? Even a plain pine box would be prison enough to entomb the most tenacious zombie. What if the wooden casket has rotted? In that case, the body has been lying buried so long that its brain



has rotted away as well. Remember: Bodies that reanimate have to be fresh, reasonably intact, and infected with the virus. Does this describe a long-dead corpse? Although it's seen as an iconic vision of the living dead, like vampires drinking blood or werewolves howling at the full moon, the fact remains that zombies have not and never will rise from the grave.

14. CAPITOLS AND CITY HALLS

Apply the same principles regarding police stations, hospitals, and houses of worship to state, municipal, and federal government buildings. Most will be the focus of concentrated human activity, making them centers of chaos and zombie congregation. Avoid all government buildings if possible.

GENERAL RULES:

Buildings in poorer, inner-city neighborhoods tend to be more secure than others. Their reliance on high fences, razor wire, barred windows, and other anti-crime features make them readily defensible. Buildings in middle- or high-income areas tend to emphasize aesthetics. What rich city council wants an eyesore in its neighborhood? Instead of ugly, even tacky, safety features, these affluent people rely more heavily on law enforcement and private security (forces of proven unreliability). For these reasons, and if the situation permits, head away from the sub-urbs and toward the inner city.

Avoid "accidents waiting to happen." Many industrial structures of the sort commonly found in inner-city or "downtown" areas house explosive or flammable materials. They also may contain complicated machinery such as power generators and environmental regulators, mechanisms that require constant supervision. Put those two together, and disaster is guaranteed. The Khotan nuclear power plant is only one extreme example. More numerous if less dramatic incidents usually occur with all Class 2 and 3 outbreaks. Do not seek refuge in or near industrial sites, fuel-storage facilities, airports, or any other place identified as high-risk.

When choosing a refuge, consider these questions carefully:

- 1. Is there a wall, fence, or other physical perimeter?
- 2. How many potential entrances/exits are there?
- 3. Can the people in your party simultaneously defend each fence and exit?
- 4. Is there a secondary defensive position, multiple floors, or an attic?
- 5. Can the building be secured?
- 6. Is there a potential escape route?
- 7. What is the supply situation?
- 8. Is there a water line?
- 9. If needed, are weapons or tools available?
- 10. Are materials available to reinforce the entrances?
- 11. What about means of communication: phone, radio, Internet, etc.?
- 12. Given all these factors, how long could you or your group survive an extended siege?

Make sure to consider all these questions when choosing where to make your stand. Resist the urge to dash into the nearest building. Remember, no matter how desperate the situation seems, time spent thinking clearly is never time wasted.

THE FORTRESS

In Class 3 outbreaks, private homes and even public structures prove insufficient to support human life. Eventually, the people inside will have either suffered the eventual degradation of their defenses, or simply run out of supplies. What is needed in a severe outbreak is a nearly impregnable structure with all the facilities of a self-sustaining biosphere. What is needed is a fortress. This does not mean you must search one out immediately. The first days, even weeks, of a Class 3

infestation will be marked by utter bedlam, an orgy of panicked violence that will make travel risky. When things have "quieted down," humans in the area will have been organized, evacuated, or completely devoured. Only then should you begin your search for a fortress.

1. MILITARY COMPLEXES

Army, Marine, or even Air Force bases should be your top priority when searching for a fortress. Many are located in sparsely populated and therefore less infested areas. Almost all have elaborate security fences around their perimeters. Some have secondary, even tertiary defensive positions. Most are equipped with fully stocked, fully functional fallout shelters, some with the capabilities of a small city. Because they have multiple means of communication, they will undoubtedly be the last of all global facilities to lose contact with one another. What is most important, however, is not the physical fortifications but the men and women within them. As has been noted, well-trained, well-armed, welldisciplined people are always the best defense. Even with some desertions, a small cadre of soldiers would be enough to hold the perimeter indefinitely. To enter a military base in times of crisis, you would find a self-contained world of trained specialists, most probably with their dependents (families) on base, all ready to defend their new home. The best example of this was Fort Louis Philippe in French North Africa (see pages 211-13), where in 1893 a unit of French Foreign Legionnaires successfully survived a zombie siege for an amazing three years! One expected problem of military bases is that their obvious advantages make them prone to overcrowding during an outbreak, which creates the additional dangers of acute supply consumption and security degradation.

2. Prisons

Although designed from the ground up to keep the living in, correctional institutions can also be more than efficient in keeping the dead out. Behind their formidable walls, each cell block, corridor, and room is a fortress unto itself.

Problems, of course, do arise when considering prisons as a refuge.

Ironically modern penitentiaries are less defensible than older models because of the way they were designed. High concrete walls are a classic trademark of the pre-1965 prison. Their design is a product of the industrial age, when sheer size was valued as a means of intimidation and respect. Although this psychological aspect may be lost on the dead, anyone seeking refuge could not ask for a better, time-honored barrier than the ones that kept our ancestors safe from society's criminal element. In an age of bottom lines and frugal budgeting, available technology has replaced heavy and expensive construction. Surveillance cameras and motion sensors leave only a double fence of razor wire as the physical deterrents to escape. A dozen zombies would be stopped in their tracks. Hundreds could maybe cause some damage. Several thousand, however, crawling over each other in a writhing, growing mound, would eventually rise high enough to topple the first fence, then the second, then come swarming into the compound. Against this onslaught, who wouldn't trade all the high-tech machinery in the world for twenty feet of old-fashioned concrete?

And what about the inmates? Considering that within a prison's walls are the most dangerous members of our society, wouldn't it be wiser to confront the undead? Most of the time, the answer is yes. Anyone with common sense knows it's safer to take on ten zombies than one hardened criminal. However, in the event of a large-scale, long-term infestation, prisoners will no doubt be released. Some may decide to stay and fight for their safety (see "1960 A.D., Byelgoransk, Soviet Union," pages 226–27), or risk the dangers of the outside for freedom, even a chance to raid the surrounding countryside. Be careful when approaching a prison. Make sure the inmates have not taken over. Use caution if internal leadership consists of a prisoner-guard coalition. In other words, unless the penitentiary is abandoned or populated by civilians and guards, always be on your toes.

Once inside the gates, several major steps must be taken to transform this correctional facility into a self-contained village. The following is a Checklist for Survival should you find the penitentiary abandoned.

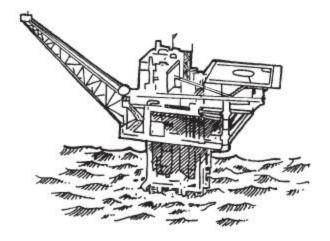
- A. Locate and catalog all supplies within the walls: weapons, food, tools, blankets, medicine, and other useful items. Prisons will not be high on a looter's list. You may find almost everything you need.
- B. Establish a renewable source of water. Exploratory wells and a variety of rain catchers can be used when the lines go dry. Before this happens, make sure that all large containers are filled and covered. Water will not only be important for drinking and cleanliness—it will be vital for agriculture.
- C. Plant vegetable and, if possible, grain gardens such as wheat or rye. A long-term emergency could last entire seasons, long enough to harvest and consume several crops. You probably won't find seeds on the premises, so count on raiding the surrounding areas. This is dangerous but necessary, as agriculture will be the only long-term means of sustenance.
- D. Harness a source of power. When the grid goes, you may have enough fuel to run the emergency generators for days, even weeks. Muscle-operated dynamos can be easily modified from the existing generators. Operating these machines will also eliminate the need for an exercise regimen. Your generator may not provide the amount of electricity you had while connected to the grid, but it should provide more than enough for a small to medium-sized group.
- E. Plan for a breach. What if the gates should suddenly topple? What if a crack should widen somewhere in the wall? What if for some unforeseen reason, the undead come flooding through the compound? No matter how strong your perimeter may seem, always have a backup defense. Plan which cellblock will be your fallback point. Reinforce, arm, and maintain it constantly. This should also be your primary living area, capable of housing your group until the compound can be retaken or an escape can be executed.

- F. Remain entertained! As with the private home defense, keeping a positive mental attitude is essential. Find the natural entertainer in your group and encourage him or her to develop a routine of shows. Encourage talent nights and competitions among the others. Music, dance, storytelling, comedy—whatever people can do, no matter how bad it may be. This may seem silly, even ridiculous: Who's going to plan a talent show when hundreds of zombies are scraping at the gates? Someone who knows the importance of morale in any time of crises. Someone who knows the psychological damage a siege can cause. Someone who knows that a group of rattled, angry, frustrated people are just as dangerous as the hundreds of zombies scraping at the gates.
- G. Learn! Almost every prison in the United States has its own library. Use your free time (and there will be plenty of it) to read every useful text. Subjects like medicine, mechanics, construction, horticulture, and psychoanalysis—there are so many skills waiting to be learned. Make each member of your group an expert in something. Organize classes to teach one another. You never know when an expert may be lost and another designated to replace him. Knowledge from the prison library will help with every task on this list.

3. OFFSHORE OIL RIGS

When choosing a fortress purely for its safety, nothing on earth holds a candle to these artificial islands. Completely isolated from shore, with living and work spaces towering far above the waterline, even a bloated, floating zombie could never climb aboard. This makes security almost a non-issue, allowing you and your group to concentrate fully on the task of survival.

Offshore platforms also excel in self-containment, especially in the short term. As with ships, they carry their own living and medical facilities. Many are equipped to supply all their crew's needs for up to six months. All have their own distilleries, so fresh water will never be a



problem. Since all are equipped to mine either oil or natural gas, power will be unlimited.

Food is also plentiful, as the ocean provides a nutritious (and, some would argue, superior) diet of fish, kelp, and if possible, seaborne mammals. Unless the rig is extremely close to land, there is no danger of industrial pollution. People can, and do, live entirely, indefinitely from the riches of the sea.

This complete isolation, as attractive as it sounds, also presents its own brand of difficulties.

Anyone living near the beach will tell you what a killer salt air can be. Corrosion will be your number one enemy, eventually winning out against all preventative measures. Essential machines can be repaired. Cruder distilleries of steel pots and copper tubing work just as well as high-tech desalinizers. Wind- or tidal-powered dynamos could provide more than half the power of the fossil-fuel generators. Sensitive electronic gear, however, such as computers, radios, and medical machinery, will be the first to go and the hardest to replace. Eventually, the entire complex will deteriorate, from a cutting-edge industrial wonder to a crude and rusty albeit still serviceable hulk.

Unlike prisons and military bases, offshore oil rigs will be the first places abandoned. Within the first few days of an outbreak, workers will no doubt demand to get to their families, leaving the rig without a trained staff. If none of your group knows how to operate the machinery, learning might be difficult. Unlike prisons, there may not be a library with how-to books on every shelf. This may require a little creative improvisation, making do with what you can operate instead of, or until you can master, all the technology that can be found on most sophisticated rigs.

Industrial accidents—explosions of stored oil and gas—are bad enough on land. In the middle of the ocean, they have materialized into some of the worst disasters in history. Even with all the firefighting and rescue facilities of a living, functional world, entire crews have been killed when their rigs went up in flames. What would happen if a fire occurred and there was no one to cry to for help? This does not mean that oil rigs are sea-based bombs waiting to go off; it does not mean they should be avoided by all but the most foolhardy. What is recommended, however, is to shut down the drill. This may rob you of new petroleum but will work wonders for your life expectancy. Use already-stored fuel for the generator. As stated above, it will not give you the same amperage as the primary generator, but with the drill off and all industrial facilities closed, what will you need it for?

The ocean can be a source of life, but also a merciless killer. Storms, striking with a ferocity rarely seen on land, can smash even the sturdiest platforms. News tapes of North Sea rigs literally turning over, disintegrating to rubble, then sinking beneath the waves are enough to make anyone think twice about leaving shore. This is, unfortunately, a problem that cannot be remedied by humanity. Nothing in this or any other book can save you from nature when she decides to remove this hunk of steel from her ocean.

ON THE RUN

The 1965 "Lawson Film," as it is now commonly called, is an 8mm home movie of five people attempting to escape the infestation of Lawson, Montana. Its shaky, soundless footage shows the group racing to a school bus, starting the engine, and attempting to drive out of town. After only two blocks, they accidentally rammed several wrecked cars, backed up into a building, and cracked the rear axle. Two members of the group smashed the windshield and tried to make it out on foot. The camera operator filmed one of them being grabbed and mauled by six zombies. The other ran for her life, disappearing around a corner. Moments later, seven zombies surrounded the bus. Fortunately, they were unable to turn the vehicle over or smash the glass of the side door. As the film ran out after only a few minutes, little is known of what happened to the survivors. The bus was eventually found with its door caved in. Dried blood covered the inside.

During the course of an outbreak, you may find it necessary to flee the area. Your fortress may be overrun. You may run out of supplies. You may become critically injured or ill, in need of professional medical attention. Fire, chemicals, or even radiation may be rapidly approaching. Crossing an infested area is generally the most dangerous thing

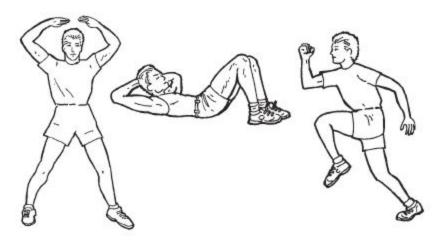
you can do. You will never be safe, never be secure. Always exposed, in hostile territory, you will know what it means to be prey.

GENERAL RULES:

- 1. ONE GOAL: Too often, people who have been holed up in fortified dwellings are seduced by the distractions of their initial freedom. Most of these people never make it to safety. Do not become one of these unnecessary statistics. Your mission is to escape—nothing more, nothing less. Do not look for abandoned valuables. Do not hunt the occasional zombie. Do not investigate any strange noises or lights in the distance. Just get out. Every side trip, every pause in the journey, increases the odds of being found and devoured. If by some chance you come across humans that need assistance, by all means stop to help. (Sometimes logic must give way to humanity.) Otherwise, keep going!
- 2. ESTABLISH A DESTINATION: Where exactly are you headed? Too often, people have abandoned their fortifications to wander aimlessly and hopelessly across an area swarming with ghouls. Without a fixed destination in mind, the chances of surviving the journey are slim. Use your radio to discover the nearest haven. If possible, try to communicate with the outside world to confirm that this destination is indeed safe. Always have a backup destination, in case the first is overrun. Unless other humans are waiting, and unless constant communication is maintained, you may arrive to find a gathering of zombies waiting hungrily at the finish line.
- 3. GATHER INTELLIGENCE AND PLAN YOUR JOURNEY: How many zombies (approximately) stand between you and your destination? Where are the natural boundaries? Have there been hazardous accidents such as fires or chemical spills? What are the

safest routes to take? What are the most dangerous? Which have been blocked since the outbreak began? Will weather be a problem? Are there any assets along the way? Are you sure they're still there? Can you think of any information you'd like to have before setting out? Obviously, once you are holed up in your fortress, gathering intelligence will be difficult. It may be impossible to know how many zombies are out there, if a bridge is down, or if all the boats at the marina are gone. So know your terrain. At least that factor will not change with an outbreak. Consider where you will be at the end of each day. Make sure, at least from the map, that it's relatively defensible, with good concealment and several escape routes. Specific gear will also have to be considered, depending on the chosen path. Will rope be required for climbing? What about extra water if there's no natural source?

Once all these factors are calculated, consider the unknown variables and formulate backup plans around them. What will you do if a fire or chemical spill blocks your path? Where will you go if the zombie threat turns out to be greater than anticipated? What if a team member is injured? Consider all the possibilities, and do your best to plan for them. If someone says to you, "Hey, let's just get going and deal with whatever's out there," hand him a pistol with one bullet and tell him that it's an easier way of committing suicide.



- 4. GET IN SHAPE: If the previous instructions have been followed to the letter, your body should already be conditioned for a long journey. If this is not the case, begin a strict cardiovascular regimen. If there is no time, make sure the path you have chosen is within your physical abilities.
- 5. AVOID LARGE GROUPS: When on the defense, the advantage lies in numbers. But when traveling through zombie territory, the opposite holds true. Large groups increase the chances of detection. Even with strict discipline, accidents happen. Larger groups also impede mobility, because the slowest members have to struggle to keep pace with the fastest, and vice versa. Of course, traveling solo has its problems as well. Security, reconnaissance, and, naturally, sleep would all be hampered if someone tried to "go it alone." For ideal performance, keep your team at three members. Four to ten is still manageable. Anything above that is asking for trouble. Three members allow mutual protection in hand-to-hand fighting, dispersion of guard duty at night, and the ability of two members to carry an injured third for short periods of time.
- 6. TRAIN YOUR GROUP: Take stock of your team's individual skills, and use them accordingly. Who can carry the most gear? Who's the fastest runner? Who's the quietest in hand-to-hand combat? Designate individual jobs in both combat and everyday survival. When your team hits the road, everyone should know what's expected of him or her. Working together should also be top priority. Practice mock survival techniques as well as combat drills. For example, time how long it will take to pack up all your gear and move out in a sudden zombie attack. Obviously, time may be critical in your departure. In an ideal situation, your group should move as one, act as one, kill as one.
- REMAIN MOBILE: Once discovered, zombies will converge on you from every direction. Mobility, not firepower, is your best

defense. Be prepared to run at a moment's notice. Never pack more than you can run with. Never unpack all your gear at once. Never remove your shoes unless immediate security is assured! Pace yourself. Undertake high-speed dashes only when necessary, as they squander large amounts of precious energy. Take frequent, short breaks. Do not allow yourself to become too comfortable. Remember to stretch during each break. Never take unnecessary risks. Jumping, climbing, and anything that could cause injury should be avoided if possible. In ghoul-infested territory, the last thing you need is a sprained ankle.

8. REMAIN INVISIBLE: Other than speed, your next closest ally will be stealth. Like a mouse trying to crawl through a nest of snakes, you must do everything possible to avoid detection. Turn off any hand-held radios or electronic equipment. If you wear a digital watch, make sure the alarm is deactivated. Tie down all your gear, making sure nothing clanks when you walk. If possible, keep your canteen full (to avoid a "sloshing" sound). If in a group, refrain from talking. Whisper or use visual signals to communicate. Stick to areas with good cover. Travel through open areas only when necessary. At night, refrain from using fires, flashlights, or any other sources of light. This will restrict your mobility to daylight hours and your diet to cold rations, but these sacrifices must be made. Studies have shown that zombies with intact eyes can spot a glowing cigarette ember from over half a mile away. (It is not known whether this causes them to investigate, but why take the chance?)

Fight only when you have to. Delays brought on by battle will serve only to draw more zombies. People have been known to finish off one zombie only to find themselves surrounded by dozens more. If combat proves inevitable, use firearms only in the most desperate of circumstances. Firing a shot is no different than sending up a flare. Its report may attract zombies for miles around. Unless you have a reliable and very speedy means of escape, or unless your firearm is silenced, use a secondary hand weapon. If not, have an escape route planned and ready to use once your shots are fired.

- 9. LOOK AND LISTEN: In addition to staying hidden, you must try to spot potential threats. Watch for any movement. Don't ignore shadows or distant humanoid forms. During breaks and while on the march, pause to listen to your surroundings. Do you hear footsteps or scraping sounds? Are the undead moaning, or is it just the wind? Of course, it is easy to become paranoid, to believe zombies are around every corner. Is that bad? In this instance, no. It's one thing to believe everyone's out to get you, quite another when it's actually true.
- 10. SLEEP!: You or your group are all alone, trying to be silent, trying to be alert. Zombies could be anywhere, hiding, hunting. Dozens could appear at any moment, and help is miles away. So how in heaven's name are you supposed to get any sleep!?! It sounds crazy, it sounds impossible, but it is essential if you're going to make it through this ordeal alive. Without rest, muscles deteriorate, senses dull, and each passing hour reduces your ability to operate. Many a foolhardy human, believing he could load his body with caffeine and "power through" his trek, has realized too late the consequences of such stupidity. One advantage of having to travel by day is that, like it or not, you're not going anywhere for at least several hours. Instead of cursing the darkness, use it. Traveling in small groups, as opposed to solo, allows for more secure sleep because individual members can take shifts standing watch. Of course, even with someone watching over you, dropping off will not be easy. Resist the temptation of sleeping pills. Their effects could leave you unable to function if zombies attack during the night. Other than meditation or other mental exercises, there is no quick fix for getting to sleep in the middle of an infestation.

- 11. REFRAIN FROM OVERT SIGNALS: The first sight of a plane might cause you to try to attract the pilot's attention, firing your weapon, sending up a flare, lighting a signal fire, or by some other dramatic means. This could get the pilot's attention, who could radio for a helicopter or ground rescue team to head for your position. This act will also attract nearby zombies. Unless the helicopter is only minutes away, the zombies will undoubtedly reach you first. Unless the aircraft you see has the potential to land right then and there, do not attempt to signal it with anything other than a radio or mirror. If these are not available, keep going.
- 12. AVOID URBAN AREAS: No matter what your chances for survival are during an infestation, they will undoubtedly drop by 50 if not 75 percent when traversing an urban area. The simple fact is that a place inhabited by more living will have more dead. The more buildings present, the more places to be ambushed. These buildings also decrease your field of vision. Hard cement surfaces, unlike soft ground, do nothing to muffle footsteps. Add to that the chances of simply knocking something over, tripping over debris, or crunching over broken glass, and you have a recipe for a very noisy trip.

Also, as has been and will be stressed again in this chapter, the possibility of being trapped, cornered, or otherwise surrounded in an urban area is infinitely greater than it is in any wilderness setting. Forget for a moment that your problem even comes from the living dead. What about friendly fire, other humans hiding in buildings, or armed bands of hunters that mistake you for a zombie? What about fire, either accidental or intentionally started by hunters? What about chemical spills, poisonous smoke, or other hazardous by-products of urban warfare? What about disease? Remember that bodies of both dead humans and dispatched zombies might be left unattended for weeks. The deadly microorganisms they carry that are spread by the wind will be as potent a health hazard as any other found on city streets. Unless you have

some legitimate reason (a rescue attempt or impassable obstacles on either side, not a quick chance to loot), stay away from cities at all costs!

EQUIPMENT

Traveling light is essential to your journey. Before packing anything, ask yourself, "Do I really need this?" Once you've compiled your gear, go down the list and ask that question again. Once you've done that, do it again. Of course, traveling light does not mean just holstering a .45, grabbing some beef jerky and a water bottle, and heading down the road. Equipment will be vital, more so than in any other scenario where you are holed up in a place—a prison, a school, your own home—where supplies are in abundance. The equipment you take with you may be all you have. You will carry your hospital, storeroom, and armory on your back. The following is a list of standard equipment you will need for a successful journey. Specific gear such as alpine skis, sunblock, or mosquito netting should be added according to your environment.

- Backpack
- · Dependable hiking boots (already broken in)
- · Two pairs of socks
- · Wide-mouthed, quart-sized water bottle
- Water-purification tablets*
- · Wind- and waterproof matches
- Bandanna
- Map**
- Compass**
- · Small flashlight (AAA battery) with coated lens
- Poncho
- Small signaling mirror
- Bedroll or sleeping bag (both will be too cumbersome)



- Sunglasses (polarized lenses)
- Palm-sized first-aid kit*
- · Swiss Army knife or multi-tool
- Hand-held radio with earpiece**
- Knife
- Binoculars**
- Primary firearm (preferably, a semiautomatic carbine)
- · Fifty rounds (if in a group, thirty per person)
- · Cleaning kit**
- Secondary firearm (preferably a .22 rimfire pistol)*
- · Twenty-five rounds*
- · Hand weapon (preferably, a machete)
- Signal flares**
 - *not necessary in groups
- **need be carried by only one person if in a group

In addition, all groups should carry:

- · Silent ballistic weapon (preferably a silenced firearm or crossbow)
- Extra ammunition for fifteen kills (if weapon differs from standard firearm)
- · Telescopic sight
- · Medium-sized medical kit
- Two-way radio with headphones
- Crowbar (in lieu of hand weapon)
- · Water-purification pump

Once you have chosen your gear, make sure everything works. Try it all, over and over again. Wear your backpack for an entire day. If the weight is too much in the comfort of your fortress, imagine how it will feel after a daylong hike. Some of these problems can be solved by choosing objects that combine various tools (some portable radios come equipped with flashlights, survival knives carry compasses, etc.).



Apply this space-saving philosophy when choosing weapons as well. A silencer for an existing weapon requires less space than a whole new weapon, such as a crossbow and extra bolts. Wearing your pack for a day will also give you an idea where the chafe points are, where the harness needs adjusting, and how best to secure the gear.

VEHICLES

Why walk when you could ride? Americans have always been obsessed with the idea of labor-saving machinery. In all walks of life, industry struggles in an endless race to invent and perfect machines that make the chores of everyday life faster, easier, and more efficient. And what could be a greater deity of American techno-religion than the automobile? No matter what our age, gender, race, economic status, or geographic location, we are taught that this omnipotent machine, in all of its wondrous forms, is the answer to our prayers. Why wouldn't this be true during a zombie outbreak? Wouldn't it make sense to just race across hostile ground? Travel time would be reduced from days to mere hours. Equipment storage would no longer be a problem. And what danger would zombies present when you could simply run them over? These are powerful advantages, to be sure, but with them come a host of equally powerful problems.

Consider fuel consumption. Gas stations may be few and far between. Chances are those you do find will have been drained long ago. Determining the exact mileage of your vehicle, packing it with extra fuel, even planning the exact route may get you only so far.

How will you know which path will lead to safety? Post-infestation studies, particularly in North America, have shown that most roads quickly become blocked by abandoned vehicles. Additional obstacles may include destroyed bridges, piles of debris, and barricades abandoned by last-ditch defenders. Off-roading presents an equal if not greater challenge. (See "Terrain Types," pages 109–17) Driving through

the countryside, searching for an open path to freedom, is the best way to run out of gas. More than one vehicle has been found alone in the wilderness, tank dry, blood-smeared cabin empty.

Imagine a breakdown. Most Westerners transporting their vehicles to Third World countries usually pack a full set of replacement parts. The reasoning behind this is simple: The automobile is one of the most complicated machines on earth. On bad roads, without the convenient auto garage, this machine can quickly become a pile of useless junk.

And then there is noise. Roaring through an infestation may seem attractive when things are going well. But any powered engine, no matter how good the muffler, generates more noise than the loudest human footstep. If you find yourself in a vehicle that for whatever reason cannot go another foot, grab your gear and run! Until this moment, you have been announcing your presence to every ghoul in the area. Now, with your mechanized mobility gone, good luck in avoiding them.

Despite these warnings, the lure of motorized transport can seem irresistible. The following is a short list of typical vehicles and their advantages and disadvantages.



1. THE SEDAN

What is otherwise known as your basic "car" has thousands of variations. This makes it difficult to generalize about their advantages and disadvantages. When choosing, look for gas mileage, equipment storage space, and durability. If sedans have one major drawback, it is their lack of all-terrain capability. As stated before, most roads will be blocked, jammed, or destroyed. If you own a sedan, imagine how it would perform crossing a field. Now add snow, mud, rocks, tree stumps, ditches, streambeds, and a variety of rusting, forgotten junk. Chances are that your sedan would not get very far. Too often, the land around an infested area has been littered with broken-down and/or stuck sedans.

2. THE SUV

With a booming economy coupled with an abundance of cheap gasoline, the 1990s saw an explosion of these types of vehicles—road monsters harkening back to the automotive golden age of the 1950s, when bigger was always better. At first glance, they appear to be the ideal means of escape. With the off-road capability of a military vehicle and the comfort and reliability of a sedan, what could be better for fleeing the undead? The answer is: a lot. Despite their appearance, not all SUVs are equipped for all-terrain driving. Many were produced for a consumer who never even contemplated taking his SUV beyond his own neighborhood. But what about safety? Shouldn't the sheer mass of such large vehicles offer more protection? The answer is, again, no. Repeated consumer studies have shown that many SUVs possess safety standards well below that of many mid-sized sedans. That said, some of these vehicles are truly what they appear to be: rugged, dependable workhorses that can handle unforgiving conditions. Research your options carefully so you can tell these genuine models from the gas-guzzling, aesthetically engineered, irresponsibly marketed vanity pieces.

3. THE TRUCK

This class refers to any mid-sized cargo vehicles, from vans to delivery trucks to recreational vehicles. With poor gas mileage, limited offroad capability (depending on the model), and massive, ungainly bulk, these vehicles could be considered the worst choice in transportation. In many cases, trucks have become stuck in both urban and wilderness settings, transforming their occupants into canned food.

4. THE BUS

As with the previous class, these large road monsters can present as much a danger to their drivers as to the living dead. Forget speed, forget maneuverability, forget fuel efficiency, off-road



capability, stealth, or any other feature you will need to escape an infested area. A bus has none of these. Ironically, if a bus has any "advantage," it is as a means not of escape but of defense. Twice, hunting groups have driven police buses into infested areas and used their vehicles as mobile fortresses. Unless you plan to use a bus in this way, steer clear of them.

5. THE ARMORED CAR

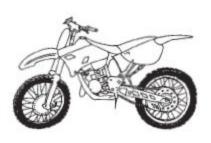
These civilian tanks are rare, to say the least. Unless you work for a private security company or have a vast personal fortune, it is unlikely you will have access to one. Despite their poor mileage and lack of all-terrain capability, armored cars present a number of advantages for people on the run.



Their massive armor gives the driver virtual invulnerability. Even in a breakdown, those inside could survive as long as their provisions held out. A zombie horde of any size and strength would be incapable of penetrating the reinforced steel.

6. THE MOTORCYCLE

Definitely the best choice for fleeing an infested area. The motorcycle—specifically the dirt bike—can reach places inaccessible to fourwheeled vehicles. Their speed and maneuverability allows them to be ridden right through a crowd of zombies. Their light weight allows them to be pushed for miles. Of course, there are drawbacks. Motorcycles have small gas tanks, and offer no protection whatsoever. The statistics show, however, that these are small dis-



advantages. When compared to other motorists attempting to escape a zombie outbreak, dirt-bike riders have a 23-to-1 survival rate. Sadly, 31 percent of motorcycle fatalities come from ordinary accidents. Reckless and/or arrogant riders could find themselves killed just as easily by a crash as by the jaws of walking dead.

7. Additional Motor-Vehicle Equipment

- Tire-patching gear
- Pump
- Extra fuel (as much as can be carried and stored outside of the cabin)
- · Extra parts (within size limits)
- C.B. radio
- · Instruction manual
- · Repair kit (jumper cables, jack, etc.)

8. ALTERNATE ROAD TRANSPORTATION

A. The Horse

No one can dispute the obvious advantage of an escape on horseback. Fueling from a gas station becomes irrelevant. Extra supplies are reduced to feed, blanket, and some additional medicine. Terrain options increase, as four hooves don't need a road. Before the luxury of automobiles, people traveled quite efficiently on these fast, sturdy animals. Before saddling up and hitting the trail, however, keep in mind these simple warnings. As anyone who's even ridden a pony as



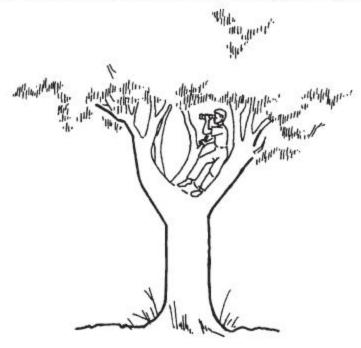
a child will agree, horseback riding requires skill. Forget how easy it looks in Westerns. The skills needed to ride and care for horses are difficult to master. Unless you already know how, don't think you can learn on the go. Another drawback, specific to dealing with zombies, is that horses are notoriously spooked by the undead. Even the scent of a zombie, carried by the wind and maybe miles from the source, will be enough to send most horses into hysterics. This could be an advantageous early-warning system to an extremely experienced rider, one who knows how to control his animal. For most, however, the end result could be a catapult toss to the ground, injuries and all. The horse, at that moment, would not only leave its hapless rider stranded, but its frantic neighing would also serve to alert nearby zombies.

B. The Bicycle

In a class by itself, this vehicle offers the best of both worlds. The common bicycle is fast, quiet, muscle-powered, and easy to maintain. Add to this the additional advantage that it is the only vehicle you can pick up and carry if the terrain gets too rough. People using bicycles to escape from infested areas have almost always fared better than those on foot. For optimum performance, use a mountain bike, as opposed to the racing or recreational model. Don't let your speed and mobility go to your head, however. Wear standard safety gear, and choose caution over speed. The last thing you want is to end up in a ditch, legs broken, bike trashed, with the shuffling of undead feet growing louder with each step.

TERRAIN TYPES

Much of our species' evolution has been a struggle to master our environment. Some would say we've gone too far. This may or may not be true. What cannot be argued, especially in the case of industrialized, First World countries, is that it is possible to assert complete control



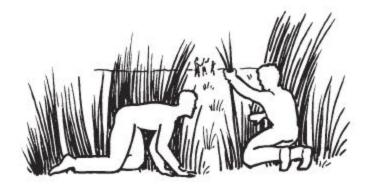
over the forces of nature. In the comforts of your own home, you control the elements. You decide when it should be hot or cold, wet or dry. You decide to erase the day by pulling the shades, or purge the night by simply turning on a lamp. Even the smells and, in some cases, the sounds of the outside world can be expunged by the walls and closed windows of the artificial bubble you call home. In that bubble, the environment takes orders from you; out in the world, on the run from a mob of ferocious zombies, the exact opposite is true. You will be at nature's mercy, unable to change even the slightest aspect of the environment that you previously took for granted. Here, adaptation will be the key to survival, and the first step to that adaptation is to know your terrain. Every environment you encounter will have its own set of rules. These rules must be studied and respected at all times. This respect will determine whether that terrain becomes your ally or enemy.

1. Forest (Temperate/Tropical)

The density of many high trees enhances concealment. Animal noises, or lack thereof, can provide warning of approaching danger. Soft earth will serve to muffle your footsteps. Occasional sources of natural food (nuts, berries, fish, game, etc.) will supplement and extend your packed rations. Sleeping in the branches of a large tree may permit you a safe night's rest. One irritating disadvantage comes from the canopy above. If you hear a helicopter overhead, you will not be able to signal it quickly. Even if the crew does spot you, they'd need a large clearing to land. This may be frustrating as you hear but are unable to see possible salvation flying right above your head.

2. PLAINS

Wide open spaces allow zombies to spot you at great distances. If possible, avoid them. If not, keep a sharp lookout for the undead. Make sure you see them before they see you. Drop to the ground immediately. Wait for them to pass. If motion is necessary, crawl. Stay down until you've cleared the danger zone.



3. FIELDS

For concealment, nothing works better than tall crops. The question is: Will this work to your advantage or to a lurking ghoul's? Noise will be a critical factor. Traipsing through dry crops will create enough din to attract zombies from far and wide. Even at their wettest, travel through fields slowly, listen carefully, and be ready for close combat at any time.

4. HILLS

Traveling through rolling terrain will limit your visibility. If possible, avoid high ground. Stick to valleys. Keep an eye on the surrounding hilltops in case the unexpected zombie should spot you. High ground can be useful for getting your bearings, confirming your route, and confirming zombie locations within the area. Approach high ground with extreme caution. Travel low, on your stomach, with eyes primed for a slouching figure and ears alert for that distinctive moan.

5. SWAMP

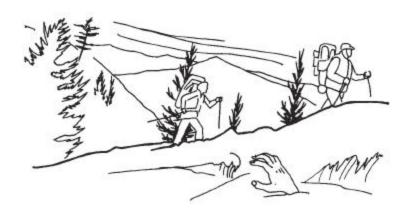
If possible, avoid wetlands altogether. The noise of splashing through water prevents any chance of stealth. Poisonous and predatory wildlife are as much a threat as the undead. Soft mud will impede your advance, especially with a heavy pack. Always stick to firm, dry ground. If necessary, wade through only the shallowest water. Watch



for ripples or any subsurface motion. A zombie might have sunk through the soft mud and be trapped just below the waterline. Look for tracks and animal carcasses. As in forests, listen to the wildlife. Their physical presence will also act as an early-warning mechanism. Hundreds of different animal and bird species live in this ecosystem. Only the threat of large predators would be enough to silence them. If you find yourself in the middle of a swamp and suddenly hear absolutely nothing, you will know the undead are close.

6. TUNDRA

This subarctic environment is the most human-friendly on earth. Long winter nights are safe for travel, as the extremely low temperatures



freeze zombies in their tracks. The long summer days put sightdependent humans on equal parity with their omnisensed, undead pursuers. This allows for more time spent on the go. Ironically, this subarctic twilight has also proven to aid in deeper, more relaxed sleep. Escapees bedding down for the "night" have consistently reported the ability to truly rest without the fear of a putrid mob rushing at them from out of the darkness.

7. Desert

Apart from urban areas, hot, arid zones can be the most dangerous environments on earth. Even without the threat of zombies, dehydration and/or heatstroke can kill a healthy human in several hours. The best way to avoid these lethal conditions is, obviously, to travel by night. Unfortunately, this will be impossible, as night movement is highly discouraged during an outbreak. Traveling should take place for three hours after dawn and three hours before dusk. The brightest, hottest part of the day should be spent immobile and shaded. Use hours of total darkness for rest. This will slow your journey but greatly



reduce the risks of attack. More than in any other terrain, make sure you either have enough water for the trek or know exactly where to obtain it. If possible, avoid deserts altogether. Never forget that this environment can kill you just as easily as any walking dead.

8. URBAN

As stated before, areas of high population density should be avoided at all costs when on the run. Within their boundaries will be a maelstrom of unspeakable chaos. Imagine a large number of people—say, half a million—left to their own devices in a city without running water, electricity, phones, food delivery, medical attention, garbage collection, fire control, or law enforcement? Now add thousands of carnivorous humanoid creatures prowling the bloodstained streets. Imagine half a million human beings—frightened, frantic, frustrated, fighting for their lives. No conventional battlefield, no riot, no "normal" breakdown in social order can possibly prepare you for the nightmare that is a city besieged by the living dead. If you must ignore all common sense and travel through an urban area, the following rules will improve (if by no means guarantee) your chances of survival:

A. Know the Area!

This rule begs repeating, because nowhere is it more vital than in urban areas. How large is the city you are entering? How wide are its roads? Where are the choke points, such as bridges or tunnels? Where are the blind alleys or dead-end streets? Are there factories, chemical plants, or other places that store hazardous materials? Where are the construction sites that might present obstacles? Are there flat, open areas such as playing fields and parks that would cut your travel time? Where are the hospitals, police stations, churches, and any other buildings where zombies might be attracted to hiding humans? One city map would be essential, an additional guidebook even better, but first-hand knowledge is the best.

B. Never Use Four-Wheeled Vehicles

The chances of finding a continuously open street from one end of a city to the other are practically nil. Unless you have a constant stream of up-to-the-second information about such a route, don't even think of attempting to find one with your car, truck, or SUV. A motorbike will allow you to skirt blocked roads. Its noise, however, cancels this advantage. By traveling on foot or bicycle, you have the advantage of speed, stealth, and versatility in this concrete maze.

C. Use Freeways

If the outbreak has moved from active battle to full infestation, the safest route will be by freeway. Since the 1950s, freeways have been built through every large and medium-sized city in the United States. Their layouts are generally straight, decreasing travel time. Long sections are lined with tall fences or are suspended above ground, which makes it almost impossible for ghouls to reach you. If they do find an on-ramp or breach the fences, you will still have the speed to either ride away (on your bike or motorcycle) or simply run. Four-wheeled vehicles are, again, not an option, as every freeway will undoubtedly be jammed by static vehicles. Many will contain zombies-bitten humans who attempted to flee the city, succumbed to their wounds, and reanimated while still belted into their seats. Examine each vehicle before approaching, and watch for those with open or broken windows. Keep your machete handy for the sudden grasping hand. Be extremely cautious when using firearms, silenced or otherwise. Remember you are walking among a minefield of full or partially filled fuel tanks. One stray bullet or a single spark, and the living dead will be the least of your problems.

D. Remain Above Ground

Storm drains, subways, sewers, and other types of underground structures can shield you from the hordes above. However, as on freeways, you run the risk of being cornered by zombies already lurking in the

area. Unlike freeways, you do not have the luxury of hopping over a wall or jumping from an overpass. If confronted, there may be no place to run. Traveling below ground also ensures permanent darkness, already one strike against you. The acoustics of most tunnels are far better than what you find above ground. While this may not allow zombies to get a fix on your position, it will set off a chain reaction throughout your subterranean passage. Unless you have expert knowledge of the system—unless you helped design, build, or maintain it—don't go anywhere near it.

E. Watch for Friendly Fire

Even if a city or section of it has been declared "overrun" (completely taken by zombies), there may still be pockets of humanity. These survivors will undoubtedly shoot first and identify their attackers later. To avoid friendly fire, be on the lookout for gatherings of zombies. This could indicate a still-raging battle. Also, look for piles of dead bodies. They could mark the kill zone of a sniper from a nearby stronghold. Listen for gunfire, try to determine its location, and give it a wide berth. Look and listen for other signs such as smoke, lights in windows, human voices, or the sound of machinery. Again, watch for the bodies. Mounds of corpses, especially those facing one direction, denote a concerted attempt by the undead to reach an objective. The fact that they fell in the same place could mean that a well-trained sniper picked them off from a fixed range. If you feel yourself close to humans, do not attempt to contact them. Making recognizable noises or shouting, "Don't shoot!" along the way will only attract the undead.

F. Enter by Dawn, Leave by Dusk

Unless the city is too large to traverse by daylight, never stop and rest within its limits. As has been said before, the perils suffered by rural nocturnal travel multiply a hundredfold in an urban setting. If you find yourself entering a city with only several hours of daylight remaining, retreat back into the countryside for the night. If you find yourself near a city's limits with only minutes to sundown, keep going until you are

well clear before stopping to make camp. This is the one time when traveling by night is acceptable. The countryside in darkness is always safer (relatively) than the city in broad daylight.

G. Sleep with an Escape

Some cities may be logistically impossible to cross in one day. Especially now, with urban sprawl and "in-fill" (the development of land between two urban centers), it is becoming more difficult to define a city's limits. In these cases, it will be necessary to find a suitable place to sleep or, at least, rest for the following day. Look for buildings, preferably no more than four stories, situated close to (but not touching) each other. A building with a flat roof and only one entrance is your best temporary shelter. First, ensure that you can jump safely from one roof to another. Second, seal the door to your roof. If that proves impossible, barricade it with items that will make the greatest possible noise if broken. Third, always have a long-term escape plan as well as a short-term one. If zombies do stumble onto the roof, waking you in time to jump to the next roof, possibly the next one, and finally making it to the street, what then? Without a long-term escape plan, all you will have done is jumped into the proverbial fire.

ALTERNATE MEANS OF TRANSPORTATION

1. By Air

Statistics have shown that flying is the safest way to travel. When escaping an infested area, this could not be more true. Time en route compresses to minutes. Terrain and other physical barriers become insignificant. The need for food, supplies, practically every lesson of this chapter, fades as you soar well above the heads of teeming ghouls. However, traveling by air does have its disadvantages. Depending on the type of aircraft and the conditions in question, these disadvantages could cancel any perk of taking to the air.

A. Fixed-Wing Aircraft

For speed and availability, nothing beats the standard airplane, assuming at least one person in your group knows how to fly one. Fuel will literally be a matter of life and death. If your journey requires a refueling stop, make sure you know its exact location and can be assured of a safe arrival. In the first stages of outbreaks, many private citizens have taken off in their private planes with no knowledge of their destination. Many crashed, while others tried to refuel at infested areas. In one case, a former stunt pilot flew his plane out of the danger zone, ran out of fuel, and attempted to parachute to safety. By the time he touched down, every zombie within a ten-mile radius had seen his plane crash and were slowly approaching his position. (The result was reported by another pilot.) Pontoon aircraft negates this potential hazard (provided you remain over water). However, ditching in the middle of a lake or ocean may leave you safe from ghouls but not from nature. Read accounts of World War II pilots who spent weeks in life rafts after being shot down, and you may want to think twice before climbing into your amphibious bird.



B. Helicopter

The ability to land on any structure, at any time, presents a giant leap above fixed-wing aviation. Running out of fuel is not a death sentence,

as you do not need an airstrip to land. But what if you come down in a hostile environment? The noise alone will announce your presence. Apply the same rules of fixed-wing aircraft concerning refueling.

C. Balloon

One of the most primitive flying machines is actually one of the most efficient. A balloon, either hot-air or helium, can remain aloft for weeks. The disadvantage, however, is a lack of propulsion. Balloons depend largely on wind and thermal currents to carry them. Unless you have extensive experience, heading off in a balloon may do little more than leave you hanging helplessly above hostile ground.



D. Airship

They may look ridiculous, they may be almost impossible to find, but if you're looking to travel by air, nothing is better than a helium-filled dirigible. These blimps, perfected during World War I and well on their way to replacing airplanes, were almost abandoned after the Hindenburg disaster of 1937. Today they exist as little more than floating billboards or airborne cameras for sporting events. During an infestation, however, they combine the longevity of a balloon with the mobility and all-terrain landing ability of a helicopter. Airships have been used four times during zombie outbreaks—once for escape, once for study, and twice for search-and-destroy missions. All were resounding successes.

2. By WATER

Boats, in almost any form, have been found to be the safest form of transport during an attack. As stated previously, although zombies do

not use their lungs and can travel underwater, they lack the coordination to swim. For this reason, traveling by boat has many of the same advantages as flying. Many times, people escaping across some body of water have looked down to see ghouls looking up at them from the bottom. Even if the keel of their boat is less than an inch out of the zombie's reach, the humans inside have nothing to fear. Studies have shown that over-water escapes have a survival ratio five times that of land. Because most of the United States is riddled with rivers and canals, transport is theoretically possible for hundreds of miles. In some cases, humans using boats as artificial islands on lakes or ponds have existed for weeks while the shores swarmed with living dead.

A. Types of Propulsion

- 1. Motor: Fossil fuel allows not only greater speed but unmatched control in any type of waterway. The obvious drawback, however, is its finite supply. Again, either make sure you have enough fuel for the entire voyage or know exactly where safe, plentiful stocks are kept. Another problem is, as can be expected, noise. Traveling at slower speeds will conserve fuel but also alert every zombie within earshot of the bank (a slow engine makes as much noise as a fast one). Fossilfueled engines do have their place. In a pinch, they can provide an extra burst of power. Use them only when necessary, and always be careful.
- 2. Sail: Wind is a consistent source of energy. Harnessing it will allow you to travel without the worry of rationing fuel. Other than the flapping of loose sails, wind-powered craft have the noise signature of floating kelp—almost zero. Unfortunately, wind is also highly unpredictable. A calm day could leave you stranded; a strong gale could cause you to capsize. Nine times out of ten, the wind will not be blowing in the right direction. Even if it is, slowing or stopping won't be as easy as turning off the engine. Any novice can pilot a motorboat like a Boston whaler, but sailing requires skill, patience, intelligence, and



years of practice. Remember this before you run to the nearest day sailor, hoist the jib, and find the wind blowing directly toward the living dead.

3. Muscle: What could be simpler than rowing? With a little practice, anyone can propel, and maneuver, his own craft. Here the greatest disadvantage is as simple as humanity: We tire. This should be taken into account when planning your seaborne journey. How far do you have to go? How many people are traveling with you? Even with taking turns at the oars, can you reach your destination before everyone is exhausted? Unless you have a backup motor or sail, be careful when planning journeys that are entirely dependent on human muscle. Remember, humans require rest; zombies do not. Why put yourself in a situation that pits our greatest weakness against their greatest strength?



GENERAL RULES:

The worst thing you can do when stepping into a boat is believe that the danger is over. This false sense of security has caused the death of hundreds of people, victims who could have easily been survivors if they had kept their guard up and their minds working. Escaping by water is no different than by air or land. Warnings must be heeded, rules must be followed, and lessons must be learned inside and out for a safe and successful voyage.

- KNOW YOUR WATERWAY: Are there any locks? What about dams, bridges, rapids, or waterfalls? As on land, detailed knowledge of the waterways you will encounter is essential before starting your journey.
- 2. STAY IN DEEP WATER: Preferably deeper than twelve feet. Any shallower, and a zombie may be able to reach up to your boat. Many escapees have been lost over the side to subsurface ghouls, particularly in murky water. Others have lost parts of their propellers or a section of a rudder by hitting submerged zombies.
- DON'T SKIMP ON SUPPLIES: Many people believe that traveling down a river or canal removes the need for packed rations. After

all, why not just fish and drink the water right below you? Sadly, the days of *Huckleberry Finn*, when rivers were clean and bountiful, are long since gone. After decades of industrial dumping, most rivers are in no shape to support life. Even without artificial pollutants, many rivers and lakes carry enough bacteria from human and animal waste to cause life-threatening ailments. The upshot: Always carry enough food and fresh water for the journey's duration. A level-three filter pump should also be used for cooking and bathing.

4. WATCH YOUR ANCHOR LINE!: Too often, people feeling secure in their boat have stopped at night, dropped anchor, and dozed off. Some of these people never awoke. Zombies walking on the bottom can hear a boat approaching as well as the sound of an anchor hitting the mud. Upon finding the chain, they can use it to climb all the way up to your boat. Always leave at least one person on watch for this, and be prepared to cut your line at the first sign of trouble.

LIVING IN AN UNDEAD WORLD

What if the unthinkable happened? If zombie hordes grew large enough to dominate the entire planet? This would be a Class 4 or doomsday outbreak, in which humanity is driven to the brink of extinction. Improbable? Yes. Impossible? No. Governments of any type are nothing more than a collection of human beings—human beings as fearful, shortsighted, arrogant, closed-minded, and generally incompetent as the rest of us. Why would they be willing to recognize and deal with an attack of walking, bloodthirsty corpses when most of humanity isn't? Of course, one could argue that logic such as this might stand up in the face of a Class 1 or even Class 2 outbreak, but the threat posed by even a few hundred zombies would surely be enough to galvanize our leaders into action. How could they not? How could those in power, especially in such a modern, enlightened age as ours, ignore the spread of a deadly disease until it reached plague proportions? Just look at the world governments' response to the AIDS epidemic, and you will have your answer. But what if the "authorities" did recognize the threat for what it is—and were unable to control it? Massive economic recession, world war, civil unrest, or natural disasters could easily distract government resources from a rapidly growing outbreak. Even in perfect conditions, containing anything larger than a Class 2 outbreak is extremely difficult. Imagine trying to quarantine

a large city like Chicago or Los Angeles. Of the millions attempting to escape, how many of those would already be bitten, spreading the infection far beyond the quarantined area?

But wouldn't the vast oceans that make up the majority of our planet save us? Wouldn't those in Europe, Africa, Asia, and Australia be safe from a festering outbreak in North America? Perhaps. This is assuming all borders are sealed, all air traffic has ceased, and every world government is aware of and working to stop the outbreak. Even so, with the undead ranks already in the tens of millions, is it possible to stop every aircraft with an infected passenger, every ship with an infected crewman? Is it possible to patrol every inch of coastline to watch for a waterborne ghoul? At this point, sadly, the answer is no. Time is on the side of the undead. With each day, their ranks will swell, making containment and extermination more and more difficult. Unlike its human counterparts, an army of zombies is completely independent of support. It will not require food, ammunition, or medical attention. It will not suffer from low morale, battle fatigue, or poor leadership. It will not succumb to panic, desertion, or out-and-out mutiny. Like the virus that gave it life, this undead force will continue to grow, spreading across the body of this planet until there is nothing left to devour. Where would you go? What would you do?

THE UNDEAD WORLD

When the living dead triumph, the world degenerates into utter chaos. All social order evaporates. Those in power, along with their families and associates, hole up in bunkers and secure areas around the country. Secure in these shelters, originally built for the Cold War, they survive. Perhaps they continue the façade of a government command structure. Perhaps the technology is available to communicate with other agencies or even other protected world leaders. For all practical purposes, however, they are nothing more than a government-in-exile. With the total collapse of law and order, small bands of individuals

emerge to assert their authority. Looters, bandits, and common thugs prey on the survivors, taking what they want and indulging in whatever pleasure they can find. It is common at the end of any civilization to have one last massive party. As perverse as it sounds, orgies of people believing that this day is their last spring up all around the nation.

What police and military forces are left serve as protection for the government in hiding, desert in an attempt to save their families, or degenerate into bandits themselves. A total collapse in communication and transportation sweeps the globe. Isolated cities become open battlegrounds, with scattered groups of citizens fighting to defend barricaded areas from both ghouls and human renegades. Neglected machines eventually break down or, in some cases, blow up. Reactor meltdowns and other industrial accidents are common, polluting the landscape with toxic chemical by-products. The countryside flourishes with zombies. With cities picked clean of humans, the undead fan out in search of prey. Country homes and suburban neighborhoods are torn to shreds as citizens flee, attempt to stand and fight, or wait helplessly for the slouching multitudes to engulf them. The carnage is not limited to humans: The air is thick with the shrieks of farm animals trapped in pens, or even family pets trying bravely to protect their masters.

As time passes, the fires die, the explosions cease, the screams fade. Fortified areas begin to run low on supplies, forcing the occupants to face their undead attackers during foraging missions, evacuations, or battles driven by desperate insanity. Casualties will continue to mount as many well-protected and well-supplied but weak-willed humans take their own lives out of sheer despair.

The looters previously mentioned fare no better than any other human. These modern-day barbarians became such because of their disrespect for law, their hatred of organization, their choice of destruction over creation. Their nihilistic, parasitic existence feeds off the riches of others instead of producing their own. This mentality prevents them from settling down and building a new life. They are always on the run, fighting off the undead no matter where they stop. Even if they succeed in fending off this external threat, their need for

anarchy eventually leads them to turn on each other. Many of these societies will be held together by the strong personality of a chieftain. Once he or she is gone, there will be nothing to hold the group together. A disbanded gang of thugs, wandering aimlessly through hostile ground, cannot survive forever. After several years, little will be left of these ruthless human predators.

It is difficult to say what will happen to the remnants of government. This will depend greatly on which country we are talking about, what resources it had before the crisis, and what type of government it was. A society living for ideals such as democracy or religious fundamentalism stands a greater chance of survival. These survivors will not need to depend on the personal magnetism (or intimidation) of a single individual. Some Third World dictator might hold his minions together only as long as he survives. As with the barbarian gangs, his demise, or even a simple display of weakness, could spell the end for the entire "government."

But no matter what happens to the surviving humans, there will always be the walking dead. With glazed eyes and gawking mouths, their putrid forms will cover the earth, hunting all living things within their grasp. Some species of animals will undoubtedly face extinction. Others who are able to escape this fate may find ways to adapt and even thrive in a radically changed ecosystem.

This post-apocalyptic world will appear as a devastated landscape: burned-out cities, silent roads, crumbling homes, abandoned ships rusting offshore, gnawed and bleached bones scattered over a world now ruled by machines of walking dead flesh. Fortunately, you will not see this, because before it happens, you will be nowhere near!

STARTING OVER

In "On the Defense," you learned how to prepare a space for what could be a long siege until rescue. In "On the Run," you learned how to travel for what could be great distances until reaching safety. Now it is time to imagine and prepare for a worst-case scenario. In this scenario, you and your closest friends and family must be able to escape all civilization, find a remote, uninhabited corner of our planet (there are more than you think), and rebuild your life from scratch. Imagine a group of shipwrecked survivors on an island, or a human colony on a new planet. This must be your mind-set to survive. No one is coming for you, no rescue planned. There are no friendly forces to run to, no battle lines to hide behind. The old life is gone forever! The new one, in terms of both quality and duration, will be entirely up to you. As horrifying as this prospect sounds, remember that humans have been adapting and rebuilding since the beginning of our history. Even today, when society appears to have softened us beyond redemption, the will to survive is deep within our genes. Ironically, in a worst-case scenario, your greatest challenge will be dealing with day-to-day life and not the living dead. In fact, if your survival strategy works perfectly, you may never even see a zombie. Your goal is to create a safe little microcosm of the world, equipped with everything you will need to not only survive but maintain a modicum of civilization.

And when is the best time to start? Immediately! An all-out war might never happen. It might be years away. But what if it's soon? What if a Class 1 outbreak has already begun and is going unchecked? What if a Class 2 or even Class 3 outbreak has begun in a totalitarian country where the press is highly censored? If so, an all-out war could be months away. In all probability, this is not the case. But is it any reason not to be prepared? Unlike stocking up for a siege, preparing to recreate a tiny corner of civilization takes a tremendous amount of time. The more you have, the better off you will be. Does this mean you should give up your entire life and do nothing but prepare for the end of the world? Of course not. This text was prepared to coincide with the average citizen's conventional lifestyle. Minimum preparation, however, should take no less than 1,500 hours. Even if spread over the course of several years, this is a formidable amount of time. If you believe you can accomplish everything by "cramming" at the eleventh

hour, by all means, don't lift a finger now. But you may think twice about beginning to build your ark once it has already started raining.

GENERAL RULES:

1. ASSEMBLE A GROUP: As detailed in previous chapters, collective response is always preferable to an individual attempt. A group will extend your financial resources, allowing for the purchase of a greater amount of land and equipment. As with a siege, a greater variety of skills will also be available. Unlike a siege, in which you will be lucky with whatever talents you find, preparing for a worst-case scenario allows the time to train members of your party in whatever skills are required. For example, how many blacksmiths do you know? How many doctors can find medicines in the wild? How many real urban dwellers know anything about farming? Specialization also allows for quicker preparation (a team scouts potential land while another acquires equipment, etc.). During the crisis, one or several members of your group could be sent ahead to the designated safe zone to prepare it if the situation gets worse. Of course, there are potential dangers. Unlike the relatively short sieges of protected areas, this long-term survival may lead to social problems unknown in modern society. People who believe help is eventually coming are much more likely to remain loyal than those who know the future is what they make it. Discontent, mutiny, even bloodshed are always a possibility. As is the mantra of this manual, be prepared! Take several classes on leadership and group dynamics. Books and lectures on basic human psychology are always a must. This knowledge will be instrumental in choosing your members and governing them later. To reiterate earlier statements, making a group of individuals cooperate over a long period of time is the hardest task on earth. However, when successful, this group will be capable of anything.

- 2. STUDY, STUDY, STUDY!: To say you will be starting from square one is inaccurate. Our ancestors were in this position because knowledge took so long to discover, accumulate, and exchange. Your great advantage over the first sentient ages will be thousands of years of experience right at your fingertips. Even if you were to find yourself in some desolate, hostile environment with no tools whatsoever, the knowledge stored in your brain would still put you light-years ahead of the most well-equipped Neanderthal. In addition to general survival manuals, you should also add works on other worst-case scenarios. Many books have been published concerning wilderness survival in a nuclear war. Make sure these are as up-to-date as possible. Stories of true-life survival will also be a great help. Accounts of shipwrecks, plane crashes, even early European colonists will contain a treasure trove of dos and don'ts. Learn about our ancestors and how they adapted to their environment. Fictional accounts, as long as they are based in fact, may also be helpful, such as The Life and Adventures of Robinson Crusoe. Absorbing all these stories, both true and fictional, will help you realize you are not the first to attempt such an endeavor. Knowing that "it's been done" should be a calming influence as you embark upon your new life.
- 3. WEAN YOURSELF OFF LUXURY ITEMS: Most of us dream of a simpler yet more nutritious diet. "I'm cutting down on coffee," "I need to have less sugar," "I'm trying to eat more leafy greens" are phrases we either speak or hear frequently in everyday life. Living through a Class 4 outbreak would leave you with little choice. Even in ideal conditions, it would be impossible to grow or produce every food and chemical you now enjoy. To go from so much to zero overnight would be a significant shock to your system. Instead, begin to cut down on the foods and luxury items you will not have in your new home. Obviously, you will need to know what this new environment is and what you will be able to produce there. Even without going down a long list now, common sense

will dictate exactly what you can and cannot live without. For example, as much as you love them, tobacco and alcohol are not part of human physiology. Cravings for vitamins, minerals, and sugar can be satisfied with natural foods. Even certain medications such as light pain relievers can be supplemented with skills like acupressure, various massage techniques, or even simple meditation. All of these suggestions might sound a little too foreign or "crunchy granola" for our practical, Western society. Remember though that many of these diet and healing techniques originated not with Northern California burnouts but with Third World societies where resources were and are scarce. Always keep in mind how spoiled Americans are in comparison to the rest of the planet. Studying the so-called "less fortunate" might give you some insight into how to handle problems with simpler, if not as comfortable, means.

- 4. REMAIN VIGILANT: Implementing plans for a Class 4 outbreak should begin during the early stages of a Class 1. At the first sign of an outbreak (bizarre homicides, missing persons, unusual diseases, contradictory press, government involvement), contact all members of your group. Begin discussing your plans for evacuation. Make sure none of the laws have changed concerning travel, permits, equipment licenses, etc. If the outbreak expands to Class 2, prepare to move. Catalog and pack all your gear. Send a scouting party ahead to prepare the safe zone. Begin the first stage of your alibi. (If it's a funeral of a loved one, let it drop now that the loved one is ill.) Be ready to leave at a moment's notice. Once the outbreak expands to Class 3, get out!
- 5. TO THE ENDS OF THE EARTH!: You may be tempted to remain in your home or your newly constructed defensive zombie fortress permanently instead of heading for the wilderness. This is not recommended. Even if you lived in some sort of compound that is well-stocked and well-protected, with the means of pro-



ducing food and water for decades to come, the chances of survival would be marginal. Urban zones will, in the immediate future, become the center of vicious combat between the living and the dead. Even if your fortress survived these street battles, it would eventually fall victim to extreme military measures, such as saturation bombing. As discussed previously in "On the Defense," urban centers are the most likely areas for industrial accidents, large fires, and so on. Simply put: Stay in the city, and you stand little or no chance for survival. Suburban and even settled country areas will fare no better. As the numbers of living dead increase, they will almost certainly find your dwelling. A siege that begins with dozens of zombies will turn into hundreds, thousands, then hundreds of thousands in a short time. Once they find you, they will never leave. If anything, their moans, the collective shriek of several thousand zombies, will alert others hundreds of miles away. Theoretically, you could find yourself besieged by more than a million zombies

Of course, it may not come to that. If your fortress is in the Midwest, Great Plains, or even Rocky Mountains, the chances of a million-zombie siege are small (though not impossible!). In these places, however, there is a greater possibility of bandits. We will not know exactly what these brigands of the future will look likewhether they will travel on motorcycles or horses, carrying swords or military firepower. What is certain is that they will always be on the lookout for loot. As time goes by, this might mean women. Later it could mean children for slavery or new warriors. And, as if the threat of zombies were not bad enough, these ruffians could eventually look to their fellow humans as a last-ditch source of food. If they discover your compound, they will attack. Even if you repel an assault, one survivor is enough to put your fortress on the map forever. Until these gangs eventually self-destruct, you will always be their target. So when you run, it must be far away from all civilization. Not just far enough where the only thing you see is a road. There must be no road, no power or telephone lines nothing! It must be on the fringes of the globe, a place uninhabited by humans. It must be far enough away to make zombie migration difficult, make a bandit raid impractical, and make the risk of industrial fallout or military strikes insignificant. Short of flying to another planet or colonizing the bottom of the ocean, it must be as far as you can get from the centers of humanity.

- 6. KNOW YOUR LOCATION: When it comes time to flee, don't just pack up the Jeep, head north, and hope you find some nice safe nook in the Yukon. When planning to escape the living dead, especially in an uninhabited part of the world, you must know exactly where you are going. Spend time studying the most up-to-date maps. Older maps may not have roads, pipelines, outposts, or other structures listed. When choosing your location, make sure the following questions are answered:
 - A. Is it remote—at least several hundred miles from any civilization?
 - B. Does it have a source of fresh water for not only you but any

- animals you decide to bring? Remember that you will require water for a multitude of purposes, including drinking, washing, cooking, and farming.
- C. Does it have the capacity to produce food? Is the soil good enough for growing? What about animal grazing or fishing? Will foraging produce enough consistent sustenance without being depleted?
- D. Does it have any natural defenses? Is it atop a high peak or surrounded by cliffs or rivers? During an attack by the living dead or human bandits, will the terrain aid you or your enemy?
- E. What are its natural resources? Are there building materials such as wood, stone, or metal? What about fuel such as coal, oil, peat, or again, wood? How much building material would you need to bring with you in order to construct a compound? How much of the local flora has medicinal properties?

All these questions must be answered before you even begin to consider a permanent refuge. Building materials and natural defenses are negotiable. Food, water, and extreme distance are not! Without any of those three essential elements, you seriously compromise your long-term survival. When choosing your new home, make a list of at least five possible places. Visit them all, preferably in their harshest season. Camp at least a full week with primitive gear and zero outside contact. Only then should you make your decision about which is best suited to your needs.

7. BECOME AN EXPERT: Research your potential new home thoroughly. Read every book, every article, every sentence written about it. Examine every map and photograph. The type of terrain you choose will have its own specific survival manuals. Purchase and study them all. In addition, study the accounts of earlier, indigenous peoples who lived in similar environments. Again, visit the site many times, and during every season. Spend at least several weeks there, exploring and camping in every sector. Get to

know each tree and rock; every sand dune or ice floe. Calculate the most efficient source of food production (farming, fishing, hunting, gathering) and how many humans the land can support with this method. The answer will be vital in choosing the size of your group. If legally possible, purchase the land. This will allow you (resources permitting) to begin construction of an actual dwelling. It may not be your permanent domicile, but it should at least be something that can shelter you during construction of your future compound. If small and functional, it should serve as a storage shed for pre-stocked supplies. If large and comfortable, it could serve as a second home or vacation getaway. Many people during the Cold War built vacation homes that also served as potential escapes from nuclear holocaust. Familiarize yourself with the nearest local population. If they speak a different language, learn it, as well as local customs and personal history. Their knowledge and expertise should complement your book-learned education on the environment. Never tell the locals why you are there. (More on that later.)

8. PLAN YOUR ROUTE: Follow the rules relating to this section in "On the Run." Then multiply them by a hundred. Not only will you face the dangers of closed roads and natural barriers, but you will be crossing a landscape crawling with zombies, bandits, and all the chaotic elements of an imploding society. And all this is before a state of emergency is declared! Once that happens, all your previous problems will pale next to the threat of your own military. Unlike simply fleeing a zombie-infested zone, you will not have the luxury of choosing from a variety of possible destinations. There can only be one, and you will have to reach it to survive. As has been stated many times before: Advance planning can never be taken for granted! It should even be a factor in choosing your location. For example, a remote oasis in the middle of the Sahara Desert sounds great, but how will you get there if the airlines stop flying? Even an island several miles off the coast could

seem as far as the Sahara if you don't have a boat. All the lessons of "On the Run" will apply to this scenario. What it does not cover is the international perspective. What if, say, you buy a piece of land in the wilds of Siberia, and the airlines are still flying—but Russia has closed its borders? This does not mean you shouldn't choose a place in Siberia, but make sure you've set up the means (legal or otherwise) to enter the country.

- 9. PLANS B-C-D-E!: What if your first means of transportation doesn't work? What if the road or waterway is blocked? What if you discover that your safe haven has been overrun by zombies, bandits, the military, or other refugees? What if a thousand more things go wrong? Have backup plans. Map out potential hazards in your path and develop individual, tailor-made ways to counter them. Alternate vehicles, routes, even a backup safe area that, while it may not be as ideal or prepared as the first, will at least keep you alive long enough to think up a new strategy.
- 10. LIST YOUR GEAR, BE READY TO SHOP: Any competent disaster-survival manual should catalog everything you will need to begin a new life. Always maintain three detailed and up-to-date lists: 1. What you absolutely need to survive. 2. Equipment to help build and expand your dwelling and surroundings. 3. If not all the comforts of home, at least a close approximation. If finances permit, purchase all your items immediately. If not, know where to purchase them. Check prices and locations frequently. Keep track of suppliers that have moved and locate substitutes for those that have gone out of business. Always have at least two backup options in case your primary supplier runs out of stock. Make sure the suppliers are within several hours' driving distance at most. Do not depend on catalogs or on-line purchases. So-called "express" freight is unreliable enough in normal circumstances. What would it be like in an emergency? Keep all this information with your list. Adjust it accordingly. Always have a cash reserve for the bare



essentials (the total amount will depend on the prices of your gear). Even before the situation spirals out of control, checks and credit cards will not compare to the comfort of paper money.

- 11. CONSTRUCT DEFENSES: Nothing is more important than those structures that aid in your protection. Once you have established your group in a quiet corner of the wilderness, begin fortifying it immediately. You never know when the odd zombie will stumble into your camp, attracting others with its moans. Formulate detailed plans for your defense. The layout should be scouted and building materials either purchased or designated from the terrain. Everything, including building materials, tools, and supplies, should already be in place by the time you arrive, so there is nothing left to do but build. Remember: Your defenses must protect you not only from zombies but from bandits as well. Also remember that those human attackers will, at least in the beginning, possess firearms and perhaps explosives. If they succeed in breaching your defenses, always have a fallback position prepared. This secondary defense could be a fortified house, a cave, or even another wall. Keep it maintained and ready for action. A strong fallback position could be the turning point in an otherwise hopeless battle.
- 12. PLAN AN ESCAPE ROUTE: What if during an attack, your defenses are breached? Make sure everyone knows the escape

route's location and can get there on his or her own. Ensure that emergency supplies and weapons are packed and ready at all times. Designate a rally point for your fleeing group, a place to reassemble if scattered during an attack. Deserting your new "home" will not be psychologically or emotionally simple, especially after all the time and energy you have spent building it. People around the world who live in precarious situations will tell you how hard this can be. As attached as you may become to this place you now call home, it will always be better to cut and run than die defending it. An alternate location should also be chosen well before you land in your new home. It should be far enough away that zombies or raiders cannot track you from one place to another. It should also be close enough that an overland trek is possible under the harshest conditions (you never know when you might have to abandon your first base). Again, it must be chosen before the outbreak. Scouting for a new home or anything else after an outbreak won't be easy (see following section).

- 13. BE ON GUARD: Once you are settled in, defenses built, dwellings erected, crops planted, labor divided, by no means should you ever truly relax. Lookouts should be posted at all times. Keep them camouflaged and equipped with a reliable way to alert the others. Make sure the means of alarm will not alert the attackers as well. Designate a secure perimeter outside your fixed defenses. Keep that perimeter patrolled both day and night. People venturing outside the compound should never do so alone, and never unarmed. Those within camp should always be within several seconds of the weapons locker, ready for battle in case of attack.
- 14. REMAIN CONCEALED: Although the topography of your location should minimize the chances of discovery, you never know when a zombie or raider will venture close to your camp. Make sure no lights can be seen at night. Make sure the smoke

from your fires is extinguished before daybreak. If the area's natural elements do not already camouflage your compound, do so artificially. Practice "noise discipline" at all hours of the day and night. Yell only when necessary. Insulate your communal buildings so that music, conversion, and other sounds will not escape. During new construction and day-to-day maintenance, post additional scouts at the outer limit of the potential noise range. Remember that the slightest sound may be carried on the wind and can betray your position. Always determine which way the wind is blowing, either in the direction of possible inhabitants (the direction you came from) or across a known safe area (a large body of water, deep desert, etc.). If your power source is noisy (e.g., a fossil-fuel generator), make sure it is insulated and used sparingly. Such a constant state of heightened vigilance will be difficult at first. As time goes by, it will become second nature. Life was lived in this fashion for centuries from medieval Europe to the steppes of central Asia. Most of humanity's history has been the story of small islands of order in an ocean of chaos, people scratching to survive with the constant threat of invasion always hanging above their heads. If they could survive in this manner for countless generations, then, with a little practice, so can you.

15. REMAIN ISOLATED: Do not give in to curiosity under any circumstances. Even an expert scout, highly trained in the art of stealth, can accidentally lead armies of undead back to the compound. If your scout is captured and tortured by brigands, the bandits may learn of your location. Beyond the more dramatic threat of zombies or bandits, there is always the risk of your scout contracting some conventional disease and infecting the rest of the population (with few medicines at your disposal, an epidemic of any kind could be devastating). Staying put does not mean staying ignorant of the outside world. Dynamo- or solar-powered radios are a perfectly safe means of gathering information. But listen only! Transmitting will reveal your position to anyone with even

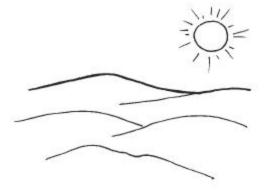
the crudest direction-finding equipment. As much as you trust those in your group, it would not be a bad idea to keep all transmitters, flares, and other signaling devices under lock and key. A moment's weakness could doom your entire existence. Your leadership training will be the best instruction on how to handle such a delicate matter.

TERRAIN TYPES

Examine a map of the world and find the best land and mildest climate. Overlay it with the densest population, and you will see a perfect match-up. Early humans knew what to look for when they began to build communities: moderate weather, fertile soil, plentiful fresh water, and a bounty of natural resources. These prime spots became the first centers of humanity, expanding outward into the modern population centers we know today. It is this way of thinking, this perfectly logical thought process, that you will have to completely abandon when choosing your new home. Back to the map. Say you find a place that looks immediately attractive. Chances are that several million people will be thinking the same thing when their time comes to flee. Combat this thinking with the slogan "harsher is safer," and to be as safe as possible, you will have to find the harshest, most extreme places on Earth. You will have to find an area that looks so unattractive, so inhospitable, that the last thing you would ever want to do is call it home. The following list of environments is provided to aid you in making an informed choice. Supplementary texts will give you more detailed information concerning their exact weather patterns, available food, water, natural resources, and so on. What this section demonstrates is how they relate to all the factors associated with an undead world.

1. Desert

Second only to the polar regions, this is one of the harshest and, therefore, safest environments in the world. Despite what we see in movies,



deserts are rarely oceans of sand. Rocks can easily be broken and shaped for building comfortable homes and, more important, defensive walls. The more remote your camp is, the greater chance it will have of avoiding raiders. These renegade scavengers will not be interested in riding across any deep desert where they know no major outposts exist. What would be the point? Even if some tried, the intense heat and lack of water would probably kill them off before they even reached your camp. Zombies, on the other hand, would not suffer from this problem. Heat and thirst are not part of the equation. The dry air would retard their already-slowed decomposition. If the chosen desert is situated between populated areas, such as those in the American Southwest, there will be a very real chance of some discovering your compound. Unless you build your fortification on top of a hill or large rock formation, the flat terrain will increase the need for artificial defenses.

2. MOUNTAINS

Depending on their location and elevation, this environment offers excellent defense against the living dead. The steeper the slope, the harder it will be for them to climb. If the mountain in question has no roads or wide paths, human bandits might also be deterred. Although high elevation allows a better view of the surrounding countryside, it also makes camouflage more difficult. Visual-concealment measures

must be a top priority, especially where lights and smoke are concerned. Another drawback of the strategic high ground is its distance from usable resources. Commuting to level ground for food, water, and building materials will compromise your security. Consequently, the mountaintop you choose may not be the highest or easily defended but must contain all you need to survive.

3. JUNGLE

The opposite of deserts, jungles or tropical rainforests will provide all the water, food, and building materials you need as well as a host of medicinal vegetation, burning fuel, and instant camouflage. The thick foliage acts as a noise buffer, insulating sounds that would travel miles in the open. Unlike what we saw in "On the Attack," where the terrain will work against a team of hunters, the absence of visibility and muddy earth are perfectly suited for a defensive posture. Bandit groups can be easily ambushed and destroyed. Individual zombies can be dispatched without alerting others. There are, of course, negatives associated with this equatorial ecosystem. Moisture breeds life, which includes millions of species of bioorganisms. Disease will be a constant threat. Any cuts or scrapes could turn rapidly gangrenous. Food will decompose much more quickly than in drier climates. Metal gear must be watched for rust. Any clothing not rubberized or otherwise treated will rot, literally, off your back. Mold will be everywhere. The local insect population will be your most constant enemy. Some will be mere nuisances; some may have painful, even fatally venomous stings. Some will carry horrible diseases such as yellow fever, malaria, or dengue fever. One positive natural aspect of jungle survival is that the intense moisture, coupled with the multitude of microscopic organic life, accelerates undead decomposition. Field tests have shown at least a 10 percent higher decay rate in jungle-bound zombies. In certain cases, the percentage has been as high as 25! What all these factors equal out to is an environment with many natural hardships but one extremely well-suited to worst-case survival.

4. Temperate Forests

This worldwide zone is easily the most comfortable for long-term survival. However, with such attractive land will come a host of problems. The wilds of Northern Canada are sure to be crowded with refugees. Caught unprepared, these panicked mobs will surely flee north. For at least the first year, they will roam the wilderness, stripping the land of food, turning to violence to obtain equipment, perhaps even turning to cannibalism in the cold winter months. Brigands will no doubt be among them or will follow in the later years when some decide to attempt a safe settlement. And of course, there is always the zombie threat. Temperate forests are still relatively close to civilization, as well as being dotted with outposts of humanity. Ghoul encounters would be ten times as likely as under normal circumstances. With an influx of refugees, the chances of the undead simply following them north is almost a given. Remember also, the problem of zombies freezing in the winter and thawing in the summer. Choose an area only if it is isolated by natural boundaries: mountains, rivers, and so on. Anything lesseven if it seems far from humanity—will be too much of a risk. Do not believe that the vast expanse of Siberia will be any safer than Northern Canada. Remember, to the south of this thinly peopled wilderness are both India and China, the two most populous nations on Earth.

5. TUNDRA

Refugees will not consider these seemingly barren lands capable of supporting life. Those who try will perish without large stores of supplies, elaborate equipment, or extensive knowledge of the environment. Bandits will also be hard-pressed to survive. In all probability, none will venture this far north. The living dead may reach your camp, however. Those that have migrated north following fleeing refugees, or former refugees now reanimated as zombies, may detect your presence and signal others. Their numbers will not be great and can be handled by those in your group. All the same, build your defenses strong and keep constant vigilance. As with temperate forests, be prepared for zombie activity to follow the seasons.

6. POLAR

This environment is, without a doubt, the harshest on the planet. Extremely low temperatures with a high wind chill can kill an exposed human in seconds. Building materials will consist mainly of ice and snow. Fuel will be scarce. Medicinal or any other type of plants are unheard of. Food is plentiful but takes skill and experience to obtain. Even in summer, hypothermia will be a constant danger. Every day will be spent on the fringe of existence. One mistake regarding food, clothing, shelter, even hygiene could mean certain death. Many people have heard of Allariallak, the Inuit whose life in the frozen Hudson Bay region was documented in the film Nanook of the North. Few know that "Nanook" starved to death a year after that documentary was shot. This is not to say that life in the polar regions is an impossibility. People have been doing it successfully for thousands of years. What it will take is ten times the knowledge and determination to even attempt a life at the top or bottom of the world. If you are not ready to spend at least one winter practicing under these conditions, do not try it when the time to flee comes. So why go? Why risk death from such a hostile environment when the goal is to stay alive? The truth is that the environment should be your only worry. Refugees and bandits will never make it that far. The chance of zombies randomly wandering that far north are one in 35 million (a proven calculated statistic). As with temperate forests and tundra, you do run the risk of an odd ghoul freezing and thawing in its travels. If you are camped near a coastline, watch for one possibly brought ashore by the current or a derelict-infested ship. Coastlines also leave you vulnerable, in the beginning, to pirates. (More on this concerning islands.) Maintain some means of static defense and always keep alert, although the need for both is relatively less than for any other environment.

7. ISLANDS

What could be safer than land surrounded on all sides by water? Zombies can't swim. Doesn't that mean living on an island is the obvious choice for a worst-case scenario? To some degree, yes. Its

geographical isolation does negate the possibility of mass zombie migration, something that must be taken into account when billions will be prowling every continent on the globe. Even islands a few miles offshore will save you from the writhing, clamoring hordes. For this reason alone, islands are always a preferable choice. However, just because you decide to live on a rock surrounded by water does not guarantee your survival. Offshore islands will be the obvious choices for refugees. Anyone with a boat or raft will make for them. Ruffians will use them as bases from which to conduct raids on the mainland. Offshore islands may also be destroyed by industrial accidents, some well inland that dump pollution into nearby rivers. To avoid these immediate dangers, choose an island accessible only by a sturdy craft and expert navigation. Look for one without a good natural harbor or too many accessible beaches. This will make it less attractive to other seaborne refugees attempting the same strategy as you. (Remember, purchasing an island will keep people away only before the crisis! No starving, frantic refugee ship is going to obey a "keep out" sign.) Look for islands with high cliffs and, if possible, wide, dangerous reefs.

Even with these natural boundaries, construct defenses and maintain concealment. Dangers are still out there! Pirates, in the beginning phases of the crisis, may cruise from island to island, hoping to scavenge what they can from survivors. Always keep a lookout for their ships on the horizon. Zombies, too, may come in many forms. With the world completely infested, many will certainly find themselves roaming the floors of our oceans. There is the possibility, slight though it may be, of one lumbering up the underwater slope that leads to your little coastline. Others still wearing lifejackets from mortal life may be carried to your island by the current. Then there is the chance of a zombie-infested ship, and in a worst-case scenario, there could be one wrecking on your shore and spilling its deadly cargo. No matter what, do not destroy your means of escape. Drag your boat onto the beach or keep it camouflaged offshore. Losing it will mean turning your fortress into a prison.

8. LIVING BY SEA

It has been suggested that, with the right vessel and crew, a group could survive a worst-case scenario entirely at sea. Theoretically, this is possible, but the odds of its success are astronomical. In the short run, many people will take to water in everything from two-person sailboats to 80,000-ton freighters. They will survive on what they have brought aboard, scavenging the world's infested ports, catching fish, and distilling fresh water if possible. Pirates in fast, armed private boats will roam the seas. These modern-day buccaneers already exist today, robbing freighters and yachts along many Third World coastlines and even strategic choke points. In a worst-case scenario, their numbers will swell to several thousand, and their targets will not be exclusive. As military ports become overrun, warships not supporting ground operations will set sail for safer anchorage. In these remote atoll bases, the world's navies will wait for the crisis to pass, and wait, and wait.

After several years, time and the elements will take their toll on these ad-hoc seaborne populations. Ships relying on fossil fuel will eventually run dry, doomed to drift helplessly. Some attempting to scavenge from abandoned ports and fuel depots may meet their end as zombie food. As medicines and vitamins run out, diseases such as scurvy will begin to take their toll. Rough seas will destroy many vessels. Pirates will eventually burn themselves out through infighting. clashes with victims who choose not to be victimized, and encounters with the occasional living dead. This last contingency will also lead to raider infection, increasing the danger of seaborne undead. Derelict, zombie ghost ships will float aimlessly across the world's oceans, their moans carrying on salty wind. This wind will eventually erode delicate machinery, including those that purify water and generate power. Within several years, only a few dedicated sailing ships will ride the waves. All others will be sunk, wrecked, reanimated, or will have simply dropped anchor in some remote beach, determined to make a go of it on land.

Anyone even entertaining the idea of a seaborne existence must have the following assets:

- A. At least ten years of experience at sea, either in commercial or military service. Simply owning a cabin cruiser for that amount of time does not qualify.
- B. A sturdy, wind-powered craft, at least one hundred feet or more with equipment constructed mainly of nonorganic, noncorrosive material.
- C. The ability to distill fresh water on a constant basis without relying on rain! Not only must your system and device be simple, easy to maintain, and resistant to rust, but you must also have a backup system aboard.
- D. The ability to catch and prepare food without the use of nonrenewable fuel. In other words, no propane stove.
- E. Complete knowledge of every aquatic plant and animal. All vitamins and minerals obtained on land can be replaced by a seaborne substitute.
- F. Full emergency equipment for everyone in your group should the need to abandon ship arise.
- G. Knowledge of the location of a safe haven. All boats need a port, no matter how primitive. It could be a collection of rocks off Canada or some barren atoll in the Pacific. No matter what it is, unless you know where your port in a storm is, you are, literally and figuratively, sunk.

With all these in place, it might be easier to simply compromise your living conditions. Use your boat as a movable home as you forage from small island to island, or coastline to coastline. This will be a more comfortable, safer existence than on the open sea. Even so, keep a watch for zombies in shallow water, and always, always, watch

your anchor line! Theoretically, this type of life is possible, but it is not recommended.

DURATION

How long will you have to endure this primitive existence? How long before the walking dead simply crumble to dust? How long before life can return to even a semblance of normality? Sadly, there is no exact figure. The first zombie to rise will, unless it is frozen, embalmed, or otherwise preserved, completely decompose after five years. However, by the time the undead have world domination, ten years might have already passed. (Remember, you will be fleeing when the war begins, not at its end.) When zombies truly dominate the planet, and there are no more fresh humans to infect, it will truly take five years for the majority of them to rot away. Dry climate and freezing will preserve many, keeping them functional for, potentially, decades. Bandits, refugees, and other survivors like yourself may become further prey, adding a newer but smaller generation to the older, decaying horde. By the time these turn to dust, the only undead left will be those preserved artificially or constantly refrozen with each winter. These you will have to watch for decades to come. Your children and even your children's children will have to be wary of them. But when will it be safe to come out?

Year 1: A state of emergency is declared. You flee. Your defenses are built; your compound is established. Labor is divided. A new life begins. All this time, you monitor radio and television broadcasts, keeping a close watch on the unfolding conflict.

Year 5–10: Somewhere within this time period, the war ends. The dead have won. The signals stop. You assume that the entire world is overrun. You continue your life, keeping a close eye on defense as bandits and refugees might begin to enter your zone.

Year 20: After two decades of isolation, you consider sending a scouting party. Doing so will risk discovery. If the party does not return by a fixed date, you assume they have been lost, perhaps even divulged your location. You stay hidden. Do *not* send out another search party, and prepare for battle. Another party will not be sent out for at least five years. If the scouts do return, their findings will determine your next course of action.

Your scouts will discover a new world in which one of three scenarios prevails:

- Zombies still roam the earth. Between those artificially preserved and those freezing with each winter, millions continue to exist. Although they may be infrequent, one per two square miles, they are still the planet's dominant predator. Almost all humanity is gone. Those who survive remain in hiding.
- 2. Few undead remain. Decomposition and constant warfare have taken their toll. Perhaps every hundred or so miles, a lone zombie will be spotted. Humanity has begun to make a comeback. Pockets of survivors have banded together and are striving to rebuild society. This could take many forms, from a harmonious collective of law-abiding citizens to the chaotic, feudal society of barbarians and warlords. The latter would be reason enough to stay hidden. There is the possibility, no matter how slight, that all or some governments-in-exile will eventually show their faces. Armed with the remnants of military and police, equipped with stored technology and archived know-how, they attempt, successfully, to set humanity on a slow but steady course to re-establishing global dominance.
- Nothing has survived. Before eventually rotting away, the living dead have cleaned out all vestiges of humanity. Refugees have been devoured. Bandits have either killed one another off or succumbed to ghoul attacks. Survivor camps have fallen to attack, disease,

internal violence, or simple ennui. It is a silent world, devoid of zombie or human activities. Apart from the wind rustling in leaves, the surf breaking upon shore, and the chirps and calls of what wildlife remain, the earth has found an eerie peace not known for millions of years.

No matter what the human (or undead) situation, the animal kingdom will go through its own metamorphosis. Any creatures unable to escape will be devoured by the living dead. This will lead to the near-extinction of many species of grazing animals, the chief diet of large predators. Birds of prey will also face starvation, as will carrion birds (remember that even after a zombie is killed, the flesh remains poisonous). Even insects, depending upon their size and speed, may find themselves the target of roving zombies. It is difficult to say what forms of wildlife will inherit the earth. What can be said is that an undead world will have as much, if not a greater, impact on the global ecosystem as the last ice age.

THEN WHAT?

Post-apocalyptic fiction usually shows the survivors of a new age reclaiming their world in dramatic steps, such as retaking an entire city. While this makes for exciting imagery, especially in moving pictures, it does not represent a safe or efficient means of re-colonization. Instead of marching across the George Washington Bridge to repopulate Manhattan, a safer, smarter, more conservative stance will be to either expand your existing living space or migrate to a better, if still relatively isolated area. For example, if you have made your home on a small island, the best choice would be to land on a larger, previously inhabited island, clean out what zombies are left, and reclaim the abandoned structures as your new home. On land, the equivalent would be to migrate from, for example, the deep desert or frozen tundra to the nearest abandoned town. Worst-case survival manuals, as well as many

historical texts, will be your best guide to a complete rebuilding. What they may not instruct you to do, and what you must do, is make sure that your new, more civilized home is secure! Remember: Yours is the only government, the only police force, the only army around. Safety will be your responsibility, and although the immediate danger may have passed, it must never be taken for granted. No matter what you will find, and no matter what challenges you will face, take heart in the knowledge that you have survived a catastrophe not seen since the extinction of the dinosaurs, a world ruled by the living dead.

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ABOUT THE AUTHOR

Max Brooks lives in New York City but is ready to move to a more remote and defensible location at a moment's notice.