

Sullivan Cave Preserve Management Plan

Revision Approved March 26, 2022

INTRODUCTION: The Sullivan Cave Preserve is a 30.0-acre property in Lawrence County owned and managed by the Indiana Karst Conservancy (IKC). The principal asset of the preserve is a portion of Sullivan Cave that lies underneath the preserve. Protecting the cave is critical, while still allowing visitation for scientific study and appropriate recreational use. The surface of the preserve, enrolled in the Classified Forest and Wildlife Program, will be managed to maintain/enhance the karst landscape's values, sub-surface water quality, the property's overall natural setting, and low impact recreational use.

HISTORY OF THE CAVE: The 40-foot section of Sullivan Cave from the entrance to the Waterfall Room and some of the crevice passage in that area has been known to explorers since the 1840s. Signatures from the late 1800s are found in a passage known as "The Backbreaker". In 1952, National Speleological Society cavers became interested in the cave and The Backbreaker passage.

Art Davis, a member of the newly formed Central Indiana Grotto, took an interest in Sullivan Cave. His first trip was on January 22, 1956. At that time, the known part of the cave consisted of The Backbreaker passage and the three branches of the Water Room passage. The ceiling drips in the Water Room were the only known water in the cave (other than at the entrance) at that time. The Popcorn Connection to the lower level was unknown (the crawl hole into the Water Room is now blocked by a ceiling collapse in the room). Art was sure the cave must contain an active stream. He decided to check every possibility between the entrance and the "end" of the cave.

On May 5, 1956, Davis and John Danner discovered the Mountain Room. The discovery passage was a small crawl under the ledge, about 30 feet toward the entrance from the present crawlway. The present passage to the Mountain Room was dug after the discovery. On December 29, 1956, Davis and Ruben Vig discovered the Quarry Room.

In August 1962, a group of seven cavers led by Mike Wischmeyer, a teen-age member of the Central Indiana Grotto, spent two weeks in Sullivan Cave. The group's main objective was to complete surveying of the cave. They surveyed 5,588 feet of passage and discovered about 2,000 feet of new passage.

Exploring north of the Quarry Room, they surveyed a side passage believing it to be the main passage. They noticed the main passage, but thinking it was a side passage, did not explore it.

Four months later, Wischmeyer, along with Leigh Lawton, Sam Frushour, and Ron Pflum checked out this side passage and discovered the Beyond-the-Beyond section consisting of 8,000 feet of passage and eight large rooms.

The second Sullivan Cave expedition was organized for August 1963 with the objective of exploring and mapping the Beyond-the-Beyond. This time a group, again led by Wischmeyer, spent three weeks isolated in Sullivan Cave.

Sullivan Cave has been a well-known and popular cave since the 1960s. Vandalism had always been a problem and one of the objectives of the two expeditions was to clean carbide graffiti off the cave walls. However, the invention of spray paint made it a never-ending battle. The vandalism was exacerbated in the 1970s when the owner, Willie Owens, erected a large sign along SR 54 and semi-commercialized the cave by letting anyone enter the cave unchaperoned. He charged \$1/person. He also ran a primitive campground on the same property so people could camp and cave.

After a divorce, remarriage, death, and a second remarriage, by the late 1980s the current owner, Janet Stewart, was tiring of all the traffic, noise, and inconsiderate visitors. In January 1990, in order to help protect the cave and to persuade the owner to let the cave remain open to responsible cavers, the Central Indiana Grotto placed a stout gate, designed by Keith Dunlap, on Sullivan Cave's main entrance and the grotto managed access on the owner's behalf.

In the summer of 1997, Janet Stewart indicated the property was going to be put up for sale. The sale of a large, popular cave is always an emergency for the caving community. Anything can happen with a new owner, and the concern was that it would not be good for the cave or cavers. Two Indiana Karst Conservancy members, Keith Dunlap and Bob Decker, agreed to temporarily purchase the property to hold for the IKC. In December 1997, the Executive Board of the IKC voted to purchase the property and to begin a fund-raising drive. The Indiana Karst Conservancy closed on the property October 27, 1998 and has managed the cave since that time.

HISTORY OF THE PROPERTY: The first record of the property appears to be the Land Patent from the Federal Government to John B Hayward on October 1, 1840 of 80 acres. In 1892, there was a reference to a 1,200-yard-long cave “two miles west of Springville” that is likely Sullivan Cave. The property owner at the time was F.B. Sutherland. A plat map of Indiana (circa 1920) showed the property was owned by J + O Migana. In the *History of Lawrence County, Indiana (1816-1990)* there is a brief mention on page 227 that indicated the owner at that time (circa 1930) was Edmund Hartman, but the author suggested the property was still referred to as the old Sutherlin Farm (rather than Sutherland). Either of these could have been the original name of the cave that somehow later got mistakenly switched to Sullivan (the earliest reference to Sullivan Cave within the caving community was from Roy Davis in the early 1950s).

Willie Owens acquired the 105-acre Sullivan Cave property from Hartman in the late-1950s. Willie Owens divorced his first wife and in 1978 married Janet Lindley. Willie subsequently passed away of cancer. In the contested estate settlement, Janet Owens received the 30 acres tract containing the cave, and the remaining acreage was split into five tracts going to Willie's five sons. Janet subsequently married Bob Stewart in 1988. They lived on the property in the mobile home until they decided to sell the property in 1997.

The IKC committed to buying the property, and in order to provide time for the IKC to fund-raise, IKC members Keith Dunlap and Robert Decker acquired the property on September 24, 1997. In order to reduce the price of the property, they subsequently split off a two acre-tract containing the residence and other out-building, and sold the tract to Lloyd and Buelah Lucas on September 21, 1998. Dunlap and Decker then transferred the remaining 28-acre tract to the IKC on October 27, 1998. Because the original driveway access to the cave was across the 2-acre tract, a new driveway off of SR 54 had to be constructed.

Lloyd Lewis passed away in 2016 and in the summer of 2020, Buelah contacted Keith Dunlap and informed him that she was planning to sell the property. After some brief negotiations, Keith re-acquired the 2-acre tract in late 2020 and subsequently demolished all of the structures on the property. The property was then offered to the IKC and the Board agreed to the purchase, completing the transfer on November 22, 2021, thus reassembling the 30-acre tract after 23 years. The new addition will provide overflow parking and safer egress onto SR 54.



Sullivan Cave Preserve: 30.00 acres.

MANAGEMENT PERSONNEL: Within this document, the following individuals and groups will have management responsibilities:

- **IKC Executive Board** – The membership-elected governing board of the IKC.
- **Property Manager** – The Executive Board-appointed individual whose primary responsibility is to implement and execute the Management Plan and oversee the property with the exception of Sullivan Cave. The Property Manager is required to make an annual report pertaining to the property to the Executive Board. The Property Manager will function as the back-up for the Cave Patron when the Patron is unavailable.
- **Cave Patron** – The IKC Executive Board-appointed individual whose primary responsibility is to oversee Sullivan Cave. This includes arranging access, monitoring impact, maintaining the entrance gate/lock, and maintaining usage records. The Cave Patron is also required to make an annual report to the IKC Executive Board pertaining to the cave, visitation usage, incidents, etc. The Cave Patron and the Property Manager may be the same person.
- **Property Management Committee** – This optional informal committee generally will consist of the Property Manager (de facto Chair) and the Cave Patron, and any other designated volunteer(s) who assist with maintaining the property and caves. The Property Manager can delegate responsibilities to the volunteer committee members.
- **Grotto Liaisons** – These are approved representatives from the grottos that have signed a cooperative agreement with the IKC for arranging access to specific caves covered in the agreement. Sullivan Cave is one of these caves. The Grotto Liaison has the authority to grant access to visit Sullivan Cave for the Liaison's respective grotto members. This is not only for the convenience of the grotto members, but also lessens the burden on the Cave Patron, and in theory the Grotto Liaison should be in a better position to know the person requesting access. The Grotto Liaison has the responsibility to follow all rules under the cooperative agreement, handle all paperwork appropriately, maintain access records (submitted annually), and work with the Cave Patron. Since Sullivan Cave is relatively “high use”, it is recommended that Grotto Liaisons still coordinate their trips, especially on weekends, with the Cave Patron to minimize multiple trips on the same day.

SUBSURFACE RESOURCES: Sullivan Cave is the fourth-longest cave in Indiana with 9.63 miles of mapped passage. The cave is developed in the Ste. Genevieve Limestone of the Crawford Upland. Entry into the cave is a series of short climb-downs to the waterfall room. A passage to the right connects with the infamous The Backbreaker, a long, low passage. The Backbreaker passage to the right (heading north) leads to the Lost Dome area. To the left (going south), the passage goes to the main part of the cave. The Backbreaker passage becomes higher as you approach the Tee intersection. To the right (west) is the Merry-Go-Round, a circular canyon passage. To the left (east) is the main portion of the cave. At about 500 feet from the Tee, the now-walking Backbreaker continues straight, but a low crawl off The Backbreaker leads to the Mountain Room, some 60 feet high and 100 feet across. The flood/over-flow route of the Sullivan River is reached here by climbing down to the lowest level of the cave. Downstream leads to the South-Y and the main Sullivan River. The river passage is 15 to 20 feet high. Upstream (to the left) from the South-Y, the passage ends at breakdown. Downstream leads to Armstrong's Folly (an unsuccessful dig through clay fill), and further downstream is the Spiral Room. A crawl from the Spiral Room leads around a breakdown blockage of the Sullivan River and out to the Speed Hollow Spring entrance of the cave (which the IKC does not own, nor can we grant permission to exit the cave via this entrance).

Upstream from the Mountain Room leads to the North-Y, the Quarry Room, and Beyond-The-Beyond. Continuing upstream from the Quarry Room is deep water and a 70-foot bathtub with 6 inches of air space at low flow (this bathtub sumps during higher flow). Beyond the bathtub is the Coliseum, and then the Colossus, the largest room in Sullivan Cave. The Colossus is 120 feet high and 200 feet long. There are eight rooms in total in this section of the cave. The passage upstream ends in a sump with a good flow of water, suggesting the cave extends onward if only a by-pass could be found. The north section is a difficult trip even if the route is known, and thus should only be attempted by experienced cavers with proper equipment.

Biological life in the cave consists of a small bat population (Tri-colored, Little Brown, and Indiana), cave and surface crayfish, salamanders, isopods, amphipods, and beetles. The infamous Sullivan “cavefish” is a sculpin routinely found in the lower portion of the Sullivan River from the South-Y to Speed Hollow Spring.

SUBSURFACE MANAGEMENT: Sullivan Cave will be managed as a natural, wild cave. No improvements for the convenience of the visitors are desired or will be allowed. Digging or other alterations for exploration or expansion of the cave is prohibited without prior approval of the Executive Board.

Cave restoration is limited to IKC-approved and supervised workdays. The purpose is to keep all restoration methods consistent with IKC-approved practices.

Due to the concerns about the impact of food, cooking, and elimination, in-cave camping is not allowed.

CAVE ACCESS POLICY: The cave is open to organized, responsible cavers. Those wishing to visit Sullivan Cave should contact the Cave Patron or their Grotto Liaison (if applicable) to obtain a permit. All persons entering the cave must read and sign a RELEASE AND WAIVER OF LIABILITY AGREEMENT, follow surface and subsurface rules established by the IKC, and agree to protect the cave's biology and other natural resources. Participants under 18 years of age must have a parent or guardian signature on the liability waiver/information form.

The Cave Patron and Grotto Liaisons (if applicable) can authorize or deny ordinary (recreational) cave trips. Trips with some extra-ordinary purpose (e.g., scientific studies) require Executive Board approval. Trip requests may be denied if there are concerns about the cavers' capability (improper gear, etc.). However, the authorizing parties are not expected to certify a caver's competence and approval is not attesting to the requestor's abilities.

For safety purposes, the recommended number of participants on a trip is no fewer than four. If a caver gets hurt, this allows someone to stay with the injured caver while the other two exit for help.

Currently there is no prescribed limit on the total number of cavers simultaneously in the cave (other than determined by the Cave Patron on a per case basis). Experience may show that a maximum number should be established in the future. Due to high visitation on some weekends, trips arranged through the Grotto Liaisons should be communicated to/coordinated through the Cave Patron to avoid multiple large-group conflicts and parking issues.

All groups must have one or more approved trip leader(s). A trip leader is an adult who practices conservation and safe caving as defined by the IKC and has first-hand knowledge of the cave. The Cave Patron/Grotto Liaison will determine if the caving group leader(s) meets the requirement. For larger adult novice groups, there generally needs to be an approved leader for every 12 participants. For youth groups, an adult leader should not oversee more than six youths. For anyone under the age of 12, the child must be accompanied by an adult of their immediate family. Organizations such as scouts are expected to comply with their internal rules in addition to the policies outlined by the IKC.

Prior to a trip, the trip leader will receive the liability waiver (also downloadable from the IKC website) and the visitation rules (see end of this document) to be followed while on the property. The trip leader will be responsible for having each participant read and sign a copy of the liability waiver, then return the signed copies to the Cave Patron/Grotto Liaison *before the trip*. The trip leader will also inform all the participants of the visitation rules before entering the property. Any improper behavior may result in those persons or group being barred from future visits.

The liability waiver will be kept on file for at least two years. *A new executed liability waiver is required for each caver for every trip.* The Cave Patron will maintain a log of trips and number of visitors to the cave to assess visitation impact on the resource. The Cave Patron will also prepare an annual report on visitation and impacts and present it to the Executive Board.

Monetary compensation of the trip leader (cave-for-pay) is strictly prohibited.

The Conservancy will vigorously prosecute any violations of the Indiana Cave Resource Protection Act, IC 35-43-1-3 or any other vandalism on the property.

SURFACE RESOURCES: The property consists of 30 acres of mostly wooded terrain. The tract is roughly 850 feet wide (east-west) and 1,400 feet long (north-south). The property is bounded by State Road 54 along its northern border, which provides access to the property. The cave entrance is located very near the eastern property line and all the known underlying passages are confined to the eastern half of the property. The property has over 130 feet of relief from the ridge top (820 feet ASL) down to the ravine near the cave entrance (690 feet). There are several rocky, wet-weather streambeds of interest and an intermittent spring on the property.

Approximately 25 acres of the property is mature forest, although the quality of the trees is better towards the east side of the property. There are two early successional areas (totaling about 4 acres) that were planted with hardwoods in 2000-2001. There is another open area (about 1 acre) in the newer tract that will be planted with trees as time permits.

There is a small “central” clearing/camping area (approximately one-quarter acre in size) adjacent to the primary parking area, both located just uphill and west of the cave’s entrance. There is a gated and maintained 500-foot driveway from SR 54 that provides access to the primary parking area. There is also a hardened open area immediately adjacent to SR 54 that can be used for over-flow parking or for parking when there is snow on the driveway, preventing access to the main parking area.

SURFACE MANAGEMENT: The entire property has been enrolled in the DNR Classified Forest and Wildlife program. Classified Forest signage along the boundaries needs to be maintained. The surface vegetation should be managed according to the Forest Stewardship Plan. Any native trees existing or introduced to the property should be maintained using current best practices outlined by the DNR Division of Forestry. Vine control and Timber Stand Improvements (TSI) should be utilized for maintaining and enhancing a healthy and diverse forest (rather than for marketable timber production).

Invasive plants such as Autumn Olive, Bush Honeysuckle, Multi-flora Rose, Stiltgrass, Garlic Mustard, etc, should be controlled and eradicated to the extent possible/practical. Exotic plants should be controlled if found to be impacting native plants. Pest control to protect native resources is permitted.

The central clearing will be maintained by occasional mowing and serves as the camping area. This area is poorly drained and is often soft, so maintaining a visible barrier to delineate the hardened parking area and keep vehicles off of the grass is advised. The grassy area may also need re-seeding occasionally due to use and shade. A locked gate will be maintained on the driveway to discourage unauthorized vehicular activities on the property.

There is an open woodshed structure on the east side of the central clearing. This structure will be retained and possibly upgraded as a place to store firewood for campers. It may also serve as a privacy room for changing clothes before and after cave trips. An informational sign or kiosk may be erected on the property to explain ownership and access, and to display the list of donors who helped purchase the property. Additional structures are not desired with the exception of a porta-potty or permanent privy constructed in accordance with State Department of Health regulations to prevent groundwater contamination.

The corners of the property are currently marked with rebar survey monuments, and secondary T-posts with 2" PVC pipe covers. These markings will be maintained for easy locating of the property boundaries. Concrete monuments at the boundary corners would be desirable.

There is a short trail from the primary parking area down to the cave's entrance that should be maintained to prevent erosion. There is also a trail from the highway pull-off opposite Phillip Lane down to the cave's entrance, although that parking area is rarely used and the trail is becoming insignificant. There is an opportunity for a nice interpretive/nature loop trail on the property roughly following its perimeter (part of this trail was constructed in 2000, but has not been maintained). No boardwalks, bridges, overlooks, or similar improvements should be installed unless needed to facilitate safety. Occasional mowing may be used to maintain the trails until sufficient foot traffic hardens the paths. Other measures (such as water bars or aggregate) may be necessary to control erosion on steeper sections of the trails. The decision and desirability to construct the loop trail will be at the discretion of the Executive Board and Property Manager.

Riding of horses, ATVs, motorized dirt bikes, mountain bikes, or similar conveyances are prohibited on the preserve. Except for maintenance activities, vehicular use is restricted to the hardened driveway and designated parking areas. Hunting and trapping are also prohibited, except as needed for appropriate wildlife management, and will be performed in a manner in keeping with state wildlife regulations. The discharging of firearms, fireworks, or other explosive devices will not be allowed. Digging or other surface modifications are prohibited without prior approval of the Executive Board. Collecting on the property is prohibited with the exception of the responsible harvesting of mushrooms, fruits/berries, flowers, and nuts.

Emergency Information sign(s) shall be installed and maintained at the trailhead down to the cave's entrance.

SURFACE ACCESS: Walk-in access to the property by the public is neither encouraged nor discouraged. Hiking and other passive activities (bird watching, photography, etc.) on the property generally do not require permission. However, all other surface activities require permission and coordination through the Property Manager.

CAMPING: Camping on the property is allowed in the designated camping area, but requires permission arranged through the Cave Patron and/or Property Manager. Camping privileges are granted to individual IKC members and their accompanying guests. Other than a porta-potty, amenities will not be provided so as to provide a primitive camping experience. Campers are to keep a low-profile with no loud music or other noises. This is not a place to party. To promote seclusion and solitude, and due to limited camping space, only one group at a time will generally be granted permission. Campfires are only allowed in the designated fire ring. Firewood should not be collected from the property, but generally will be available in the woodshed for a small donation. Campers should not bring in firewood from off-property to minimize the importation of invasives. All trash must be packed out.

PHOTOGRAPHY/VIDEOGRAPHY RESTRICTION: Commercial/professional use of photos/videos, either analog or digital, of the cave or property is prohibited without the specific approval from the IKC Executive Board. Amateur photos/videos posted to unrestricted internet access sites (e.g., YouTube) should generally not identify the cave, or specific location of the cave or property. Social media posts where viewing access is restricted (and not indexed by a search engine) should use common sense on the amount of information provided. No photos/videos regardless of usage should depict unsafe or inappropriate conservation activities. Postings should also indicate the cave is on private property and permission is required to visit.

SULLIVAN CAVE PRESERVE VISITATION RULES:

The following rules should be reviewed by all visitors *before entering the property*. These rules must be followed to protect the caves, the property, the IKC, and all visitors. It is also important to follow these rules to maintain a good relationship with the adjacent landowners. Remember you are a guest on this property and represent all cavers that come after you. *Please be on your best behavior.*

- Follow all rules and requests of the Sullivan Cave Patron and Property Manager.
- Park in the designated parking areas and do not block the gate. Close and lock the driveway gate behind you.
- Keep a low profile at all times while on the property. Talk quietly and no horse play.
- Do not change clothes in sight of the road or nearby property owners.
- Do not trespass onto adjacent properties. The Speed Hollow Spring entrance is not on IKC-owned property and therefore should not be used.
- Lock the cave gate behind you so unauthorized entry does not occur. Leave the cave gate key near the entrance in a location known to all members of your party. Do not lose or duplicate the key.
- At least one approved trip leader for each group of 12 adults. At least one trip leader for each youth group of 6. There must be an adult of the immediate family for every child under the age of 12. Minimum group size should be 4 adults.
- All cavers must wear a helmet and have three independent sources of light. Proper foot wear and clothing should be worn; in particular, prepare to be immersed in 52-degree water if visiting the upstream river passages.
- Do not enter the stream area of the cave during high water conditions. Do not enter the upstream area when there is a chance of significant rain.
- Do not enter the cave under the influence of alcohol or other substances.
- No smoking in the cave. No smoking on the property when dry conditions exist.
- Before leaving the parking area, be sure to pick up all trash, clothing, cigarette butts, etc.
- Tell someone where you have gone and when you will return.
- For rescue situations, refer to the Emergency Information placard near the parking area.