THE MULLET [1]

On a recent trip to the Everglades, our group of students stopped for the evening at the campsite located at Graveyard. As the legend goes, it gets its name for a battle that the local Indians had with the Spanish. For me, the stop became a battle between two different philosophies on how we should interact with the outdoor environment.

Physically, Graveyard is interesting for several reasons. First, the site is located on a narrow peninsula. Actually, the map indicates that it is less of a peninsula than it really is. Regardless, the site has the feel of a peninsula jutting out into Ponce de Leon Bay. On the one side it is bound by the Gulf of Mexico. On the second side it is bound by the Ponce de Leon Bay, and on the third side it is bound by the mouth of Graveyard Creek. In addition, the site is transitional between the sandy beeches found on Cape Sable further to the south and the more forested sites with their dirt floors found further to the west and north. Located on this transition, Graveyard contains some small sandy beaches that are carved out of forests behind them. These small beaches were excellent for pitching a tent.

Next, the mouth of Graveyard Creek creates a small cove that provides a unique setting where the topography changes dramatically between high and low tides. At high tide, the mouth of Graveyard Creek looks like it was nothing more than an extension of Ponce de Leon Bay. At low tide, the sandbar across the mouth of the cove where the creek interfaces with the bay creates a small fresh water pond that is almost totally isolated from the bay. All that connects this pond and the creek with the bay is a small stream that trickles across the large sand bar. The first time that we ever stayed at this site, we mistakenly beached our canoes in the cove only to find that in the morning at low tide they were nearly land locked. As the tide dropped, we spent half an hour dragging fully loaded canoes out to the bay in what was became a smaller and smaller stream through the sandbar. It was a little reminder to us as experienced backcountry travelers that original appearances are sometimes deceiving.

At high tide, the sand bar that extended across the mouth of the creek is generally no more than two feet deep. Students were able to walk across the sand bar in knee deep water to the other side of the cove where they could explore the shore that extended around the bay. A step or two off this sandbar on the inside and the students quickly stepped into deeper water that often extended over their head. The contrast between low and high tides made the topography of this area unique and interesting and ever changing.

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The students found the shallow sandbar delightful and they were able to amuse themselves in this shallow aberration that extended across the mouth of this small inlet. To their delight, they frolicked in the shallow water. Several students placed their folding chairs on the sandbar where they enjoyed the unique spaciousness of sitting fifty to a hundred feet out into the bay in what appeared to be deep water that actually wasn't.

For me, Graveyard was the place where I became a fisherman. Normally, I do not profess to be much of a fisherman. However, on this trip, I purchased a simple casting net and fishing licence. The fishing licence made the use of the casting net legal. However, of more importance was the ethical issue of catching and eating the fish on a backcountry trip. One would not normally think that catching and eating fish on a backcountry trip was much of an ethical issue. However, it was. For me, the reluctance of the students to eat the fish that we caught illustrated the convergence of two different philosophies toward the outdoor experience.

The first philosophy views our presence in the backcountry as a visitor, a visitor who in the literal sense leaves no trace of his or her trip. In addition, this approach seeks not to consume any of the resource. For us, everything was imported into the backcountry except the aesthetic backdrop. Our food, fuel, clothes, transportation and shelter were imported. Like an astronaut traveling though outdoor space, we imported many of the comforts of home from our urban environment into the wilderness.

I believe that the problem started innocently and over time the concept became extrapolated beyond its original intent. The concept of man as a visitor can be traced back to the Wilderness Act of 1964 and even to the origins of wilderness movement in the 1930s. Recently, it has been reinforced with the Leave No Trace ethic. Until this change in ethic, being a visitor was of little consequence. Historically, it reflected the fact that once people entered the cities to live, they became visitors to the backcounty. They no longer lived and worked in the natural environment and it became primarily through their recreation and leisure that they had the opportunity to experience the outdoors.

Wilderness has always been for people and about creating an experience for people. Capturing the essence of this principle quite well, Robert Marshall, one of the founders of the Wilderness Society, suggested in a April 1937 article in *Nature Magazine* titled "The Universe of the Wilderness is Vanishing" that "[t]o countless people the wilderness provides the ultimate delight because it combines the thrill of jeopardy and beauty. It is the last stand for that glorious adventure into the physically unknown that was commonplace in the lives of out ancestors, and has always constituted a major factor in the happiness of many exploratory souls. It is the perfect esthetic experience because it appeals to all of the senses" (p, 236).

Coupled with the concept of man as a visitor, the Leave No Trace (LNT) ethic has been transformed by some into a literal interpretation of its name. Actually, LNT is a collection of practical management practices for people in the backcountry. It includes management practices such as carry in, carry out, disposal of human wastes, etc. that are necessary to help prevent the backcountry from being overrun. As a collection of practical management practices for the backcountry user, I have no quarrel with LNT. However, LNT has been transformed by some into an ethic that has become similar to a religious belief or dogma that tends to take a literal interpretation of the term where every effort is taken by the backcountry traveler to minimize any impacts on the environment. It is the outdoor experience of gas stoves, freeze dried foods, nylon tents, and synthetic clothes. The result is to reduce the experience of the backcountry traveler to one that is primarily an "aesthetic experience."

The second philosophical approach seeks to create an interactive experience for the backcountry traveler. This approach acknowledges that in order to create an interactive experience with the environment, it is actually necessary to interact with the outdoor environment. In a sense, it is not too much different than the first philosophical approach. It is a really a matter of degree.

It was the second approach that was envisioned by Marshall and Leopold when they advocated for wilderness. For them, the concept of wilderness has always included creating an experience for people and in creating an experience that excites all of the senses of the backcountry traveler. Again, Robert Marshall, describes the experience of wilderness in his April 1937 article in *Nature Magazine* that "[i]t is a vast panoramas, full of height and depth and glowing color, on a scale so overwhelming as to wipe out the ordinary meaning of dimensions. It is the song of the hermit thrush at twilight and the lapping of waves against the shoreline and the melody of the wind in the trees. It is the unique odor of balsams and of freshly-turned humus and of mist rising from mountain meadows. It is all of these at the same time, blended into the unity that can only be appreciated with leisure and which is ruined by artificiality" (p, 236). In addition, Aldo Leopold in his essay on the "Land Ethic" in a *Sand County Almanac* recognized that consuming some of the resource may be a necessary cost in increasing people's perception about the outdoors. The necessary tradeoff for increasing perception is often the consumption of the resource. Even so, there is an emphasis on maintaining the integrity of the outdoor environment over time.

In a sense, the difference between the two approaches is in their directionality. The first philosophical approach seeks to remove or to distance people from the outdoors. It seeks to minimize people's impact and interaction with the outdoors. For some, it is a stated objective. For most, it is an unintentional consequence of a series of seemingly inconsequential individual

decisions and actions. It is the collective effect of using gas stoves, freeze dried foods, nylon tents, and synthetic clothes. As a friend cynically suggested, it is a “synthetic experience.”

In preparing our students for their outdoor experiences, it was the first philosophical approach that our students learned through their studies. And, unfortunately for me, it was the first approach that they practiced in the field. For the students on this trip, there was an ethical issue of catching and eating a few mullet in the backcountry.

In addition to the two philosophical approaches, my fishing experience at Graveyard Creek challenged the ecological tenet where even in a wilderness, people are part of the web of life, the food chain and the ecosystem. For me, the catching of the mullet reinforced the simple outdoor education concept of knowing the origin of your food and that it comes from a farm or in this case, from hunting and fishing rather than just the grocery store. Also, my fishing experience reinforced the notion that people are more than a visitor in the backcountry, they are part of the ecosystem, even in a wilderness.

During the 1970s and 1980s, advocates who mobilized the environmental movement advocated that man was not separate from the ecosystem. They advocated that man was as much a part of the ecosystem as any other animal. Designers of the environment and philosophers such as Ian McHarg in *Design With Nature* noted that the prevailing attitude in Western Civilization was that man was given dominion over the natural environment. Conceptually, this resulted in a dichotomy between man and the natural environment where man was viewed separately from and not as part of the natural environment.

Hence, one of the tenets of the environmental movement was that man is not separate from the environment. Man is part of the ecosystem. And just as any other animal, man has an impact on the environment. Hence the philosophical contradiction. If man is part of the ecosystem than how can man be a visitor who leaves no trace. Any other species in the ecosystem utilizes resources found in the system and it leaves a trace that it was present. The same is true for people. Hence, when the leave no trace philosophy becomes more than a mere collection of practical management practices, and when it takes on a philosophy that results in viewing man as separate from, and not part of the ecosystem, the Leave No Trace ethic violates the basic ecological tenet that man is part of the ecosystem. Hence, the conceptual dilemma faced with a literal interpretation of the LNT ethic.

As noted, fishing with a casting net was a new experience for me. Other than seeing pictures of natives throwing large nets, it is an understatement that I had little understanding of the technique involved. Most fishermen actually use the nets to catch small bait fish that they, in

turn, use to catch larger fish. However, for me, the net was a chance to catch dinner. It was a chance for me to experience the fundamental relationships of nature.

The net was about eight feet in diameter and there were lead weights along the entire perimeter of the net. Thin nylon cords extended from equal distances around the perimeter of the net to and through a grommet in the center of the net. These smaller strands connected to a single rope that, in turn, connected to the fisherman's hand.

The operation of the net is conceptually simple although it takes a knack to throw it correctly. The net is thrown so that it opens up and looks like a flat disk landing horizontally on the surface of the water. When thrown correctly, the net hits the water equally at all points around the perimeter. This confuses the fish and aids in their being caught. With the net coming from every direction, the fish are startled and don't know which way to turn in order to escape. Quickly, the lead weights sink the outside perimeter of the net to the bottom. The fish become trapped inside the net and have nowhere to escape. The main cord is pulled. The thinner strands pull the net toward the center and the fish are fully enclosed in the net.

Successful fishing involved two skills. First, the fisherman needs to develop a good throwing technique with the net and second, the fisherman needs to determine where the fish are so that there is something to catch in the net. Steve, my co-leader, helped me with learning how to throw the net. To say that my initial attempts of throwing the net were awkward is an understatement. I tried this and I tried that. The students watched sympathetically and I am sure that they chucked quietly to themselves that there was finally something at which their instructor was a rank beginner. For every good throw there were easily five or six bad throws. After enough throws and with sufficient learning, the tide changed so that there were more good throws than poor throws.

The Mullet were running into the cove during the rising tide of the late afternoon. I'm sure that they did this every day of the year in a fashion similar to that which occurred on the day that we visited Graveyard. They entered the cove to feed and they, in turn, became food themselves. They were easy to spot. Often, they broke the surface of the water as they swam and fed. In addition, the Pelicans swarming overhead were usually a sure sign that the Mullet were not far away either. Like dive bombers, one after another, they would dive and catch a fish. After catching a fish, the pelicans would raise their beaks slightly above their head and in one quick smooth action, the Mullet would slide down their throat and into their gullet. It was a smooth action reminiscent of how many people eat oysters.

Standing knee deep on the sandbar that extended across the mouth of the cove made a convenient launching pad for throwing the net. Steve threw the net a couple of times. He caught a fish. It was small and he released it. He tried a couple of more times and final netted four fish with one throw. While I envisioned fish for dinner, it was not to be. As Steve opened the net to retrieve the fish, they slithered back into the water and I watch helplessly as they quickly swam out of sight and into the sanctity of the deep water. I found out later that he had purposely released the fish. To those who were watching, I'm sure that my expression of joy over fish for dinner quickly turned to a horrified frown as I saw the fish swimming away to their freedom in the depths of the lagoon.

Slightly irritated, I was determined to catch my own fish for dinner. Concentrating on developing my casting technique, I quickly got better. In short order, I was able to throw my net with some degree of proficiency. The Mullet were plentiful and they were running throughout the lagoon. The net would hit the water and the silver underbellies of the startled fish would flash in the water as they turned and looked for a route to escape. There was no escape. In a flash, I knew I had netted several fish. Initially, I caught one or two fish. Then I was able to catch five, six or even eight fish at a time with a single cast of the net. I released most of the fish and kept several of the larger ones for dinner. I was like a little kid playing in the fish pond. I was focused. I was totally involved in my activity and I was learning first hand the intricacies of fishing. To those who watched, it must have been a unique occurrence to watch one of their instructors so immersed in an activity. After catching a couple of fish, I shared the excitement of the moment with the students and they too netted fish. Between all of us, we had enough fresh fish for an evening meal. If it was an outdoor education activity that I had purposely designed, I could not have done better.

For me the simple experience of catching, preparing, cooking, and eating the Mullet reminded me of the outdoor education concept that the outdoor educator needs to create interactions for his students in the natural environment, even in a wilderness. For me, the catching, preparing, cooking and eating of the Mullet linked me and the students with the core of our experience; it linked us with our primeval existence. In a very real sense, it brought home the basic concepts of the food chain, the web of life and the concept of predator and prey. It made a statement that we were part of our environment. The consequence of a few Mullet in the stomachs of students was more than offset by the ecological impact of us eating a few fish. From a recreational programmer's perspective, it was an activity that nicely met my objective to integrate students into the outdoor environment.

Unfortunately, the scene didn't play out quite the way that I had envisioned it. By the time the fish were cleaned and prepared for cooking, the students were already preparing their dinners.

Catching, preparing, cooking and eating fresh fish was inconsistent with the leave no trace ethic that they had learned and that they were practicing on the trip. It was inconsistent with us as a visitor who minimizes his or her impact with the natural environment. The students were crouched over their gas stoves. They listened to the steady hiss of the stove that seemingly drowned out any surrounding natural sounds. They were focused on cooking their preplanned meals imported from the grocery store.

Perhaps, it was a force of habit. I don't know. However, when several students tasted the fresh fish cooked over a gas stove, they were surprised how good fresh Mullet actually tasted. Perhaps, they were simply hungry or perhaps it made a connection for them with the environment that they intuitively felt in their bellies. They actually experienced the food chain and predator prey relationship. It was a perfect example of experiential learning. From a recreational engineering perspective, to borrow Leopold's terminology, it was a new experience for them where they were a part of their ecosystem. For others it was missed opportunity. Not that there was a right and wrong, it was just a missed opportunity where students had an opportunity to "live off the land" and to interact more fully with the natural rhythms of the wilderness and the natural environment.

In terms of Leopold's concept of recreation engineering, the few Mullet removed from the natural environment and put into the stomachs of students and the increase in perception about the natural environment that resulted from eating those fish was more than offset by the loss of a few fish in the ecosystem. For our group, we were visitors who left no trace in the strictest interpretation of the concept. Practicing this concept diminished the student's experience. However, for a brief moment, our trip opened up to the idea that perhaps experiencing the outdoors was more than just an "aesthetic appreciation" of wilderness and the outdoor environment. For me, it reinforced the concept that when the Leave No Trace philosophy is extrapolated beyond its mere management practices and transformed into an extreme purist position that emphasizes separation with the environment, it may become a philosophy that is at odds with the basic ecological tenet that all animals, including man, are part of the ecosystem. It may also be at odds with creating experiences that increase perception among the outdoor participants. Also, it reinforced the idea that while we are visitors in the backcountry by virtue of us leaving the cities, our experience there should be more than that of a visitor who leaves no trace.