Benefits-Based Management Through Fireworks, Duck Races, and Haunted Trails

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Immediately prior to joining the Forest Management faculty here at UMaine in September 2005, I worked for three years at the University of Minnesota on a benefits-based management research project involving rural Illinois communities and federally managed outdoor recreation areas. Benefits-based management (BBM) is an emerging framework in parks, recreation & tourism designed to incorporate outdoor recreation area values into a management framework. In its most basic form, benefits-based management forces planners and managers to adopt a more holistic view of outdoor recreation areas, as well as the landscapes within which they are found, to acknowledge that these public land and water resources provide for a diversity of values. To date, most research has concentrated on on-site recreation visitor benefits. Little was understood prior to this research project about on- and off-site benefits that accrue to community members living near federally managed outdoor recreation areas.

My research project looked at community benefits in the rural Illinois communities of the Kaskaskia watershed, which is partly managed by the U.S. Army Corps of Engineers (USACE). The Kaskaskia River starts near the town of Champaign and empties into the Mississippi River 300+ miles later near St. Louis, Missouri. Semi-structured interviews were conducted with 31 community members about the watershed, local communities, and USACE resource management. The primary research objectives of the project were:

• Identify benefits desired and attained by community members living near USACE projects in the Kaskaskia watershed,
• Identify social features of the USACE projects, USACE management, and local communities that influence benefit attainment, and
• Gather community member suggestions for increasing benefit opportunities in the future.

An inductive approach was used to identify community benefits—comprised of personal, social, economic, and environmental benefits—attained by participants (Figure 1).

Examples of specific benefits included:

• Appreciation of solitude or ability to be close to nature
• Maintaining an outdoor-oriented lifestyle
• Experiencing a sense of pride
• Awareness of environmental knowledge or management context
• Living in a healthy environment
• Developing social cohesion
• Presence of protected area contributes to community attractiveness
• Community ability to adapt to changes and be a self-sufficient community
• Navigability or ability to drain fields into river
• Attaining jobs from agriculture and tourism
• Presence of fish and wildlife or native prairie
Efforts to reduce erosion or conserve forestland
Combined efforts between local government, community groups and the USACE to improve the watershed
The results suggested that specific social features of the environment influenced benefit attainment:
Benefit attainment was positively linked to trust in the USACE
Benefits and trust increased for community members through changes in the USACE management and collective action by the citizen watershed council
Recreation participation was linked to trust

The community members interviewed suggested that changes made to communication, decision-making, and community develop could increase benefit opportunities in the future.

Communication suggestions were:
- Increase environmental education
- Increase visibility in local communities
- Focus communication on benefits

Decision-making suggestions were:
- Remain flexible in response to natural events (flooding)
- Develop consistency in management so long-term community decisions can be made
- Use transparent processes so communities know how decisions are reached

Community Development suggestions were:
- Focus on recreation and tourism
- Maintain facilities (dredging) for commercial industry

As a result of this research, we recommended that the USACE continue to interact with local communities and create additional opportunities for interaction. In addition to considering the community-generated suggestions, two additional recommendations were to encourage on-site recreation and maintain sponsorship of community events such as 4th of July fireworks displays, annual duck race fundraisers, and guided Halloween haunted trail tours. These activities provide benefit opportunities and build relationships between the agency and local communities. After the qualitative research, we completed a quantitative mail survey of randomly selected community residents.
I was fifteen years old when my mother bought a three-quarter ton Chevy conversion van. The van that I learned to drive in one winter served well as a moveable camp from Ohio to the state of Maine. My mother, a statuesque, well-spoken lady was of the opinion that we should see more of the country through family vacations.

My first trip to the state of Maine was a rite of passage. It was the first experience that I had of the harsh North Atlantic Ocean, but more importantly was the first experience of the North Maine Woods. Great white pines and fragrant balsam firs dominated the landscape of my childhood memories. It was a wide and vast landscape that inspired dreams of lumberjacks, early mornings, coffee and roaring fires. Greene Point was quietly set off the trail at Quoddy Head State Park. Lured there by the mystery a foreign place and sleepy coastal towns the park brought me to the eastern most point in the United States. There, looking out past the blue-flag iris to the ocean, I met Scott Thompson. A graduate of the University of Maine, he was a forestry student and currently working for the state parks service. He described to me the importance of forestry and its value as a recreational as well as industrial resource. It was there on Greene Point that my mind considered the idea of a life in the woods. These dreams, though thoroughly updated and somewhat redefined are still with me.

The University of Maine provides a tremendously broad base of information for anyone who finds that their interests lie in the woods. Identification, navigation, statistics, politics, it has all been a useful and educational precursor to how the wood is farmed and more importantly, how the wood is harvested. After three years in the halls of Nutting, I found employment at the University of Maine this summer. This experience challenged me as a student, but even more as a future forester.

Looking back on this past torturous summer spent with a graduate student that felt that he could change the world and an endless supply of mosquitoes, I realized that my ideals in the Forestry program at the University of Maine have changed. Being told in a discussion that, “they just want to be a bunch of loggers,” I was quite complacent about the need for artful and knowledgeable harvesting professionals. Having an interest in the science of forestry, I made an early assumption in my collegiate career that I was going to focus on research. Let the loggers of the world take care of the harvesting. This was before learning the importance of harvesting that not only supplies products for the people, but is also a renewable resource that requires Leopoldian stewardship so that our children will have the legacy of the North Maine Woods.

After nearly a semester in this harvesting class, I realized that statement offends me. Why not become loggers? The timber industry has served the
people of Maine for generations. It has provided food on the table of nearly every family in this state in one way or another. The state of Maine had quietly built a culture that at times is ridiculed, and other times honored for its toughness, its strength and most importantly its values. There are ways that loggers behave that no other profession, (outside of soldiering) can ever duplicate. The simple act of finishing a job can bring a sense of pride based solely on how hard the work was.

On a recent field trip, we were introduced to two loggers that have been working on the same crew for the better part of twenty years. Both rather ragged from a long day, but still looking as though they could whip even the toughest one in our class, they chose to stay late and tell us about their operation.

“We work four, maybe four and a half days a week. Depends.” Said one as he drew deep on his cigarette. The lines in his face were deep as well from the sun, but as I was closely listening to them both speak of their work with pride, I realized that their features were not distorted with the wrinkles of hard times, but rather laugh lines. Pleasant looks on their face that showed that they were easy to smile and happy to simply get the job done.

There is no doubt that there were hard times in the past twenty years. Indeed, one comes to expect hardships in any vocation that depends solely on the elements, the warm sun, and prospers on a long growing seasons. In Northern New England, these are not only endured, these conditions are expected. Adaptations made by such loggers such as winter roads for hauling or skidding and planning simply not to work are made not by novices such as myself, but by experienced loggers. These are choices made by these guys.

If I were to consider today what I want to do with my career, I would simply have to tell you that I had no idea what I wanted to do anymore. If you asked me if I would consider being a logger, I would say that the consideration would be there. I guess that the experiences that I have had in the past nine weeks has changed my perception. I no longer see a Certified Logging Professional as simply a logger. I see them as skillful masters of a dying art - an art that deserves respect.

This class, in tandem with the experiences that I have had this summer, would suggest that logging is simply something that I need to understand, do more research on or maybe even participate in. I would argue that while participation and research do more for the common good of the industry, understanding is more crucial. Understanding how logging works from the inside out is the key to the woods. It commands common sense and good choices, hard work and dedication to a job well done. Logging commands respect.
Undergraduates
Wildlife Ecology
Wildlife Ecology
Wood Science and Technology
My Summer Out West
Kyle Burdick
3rd Year Forestry Student

These are Giant Sequoia trees at Yosemite National Park. Imagine all the pencils you could make out of those!

Half Dome at Yosemite National Park. This is one of many national parks I stopped at while driving in and out of California for work.

This is me and my kayak, on my birthday! This is Lake Tahoe, California. Not only is this my birthplace, but a really cool place to visit when you aren’t working.

A lake in Glacier National Park. Even though the signs recommend that you don’t feed the wildlife, I did it anyway. There were these beetles that were falling out of the sky, and I feed one to a chipmunk.
Forestry and Forest Ecosystem Science
This past summer, I spent most of my time being a research technician at the Holt Research Forest on Arrowsic Island, Maine. Arrowsic Island is approximately 5 minutes from Bath, and was one of the most beautiful and interesting places in Maine that I have been to. The forest contains a unique set of forest types and wildlife, which left something new to discover every day. I recommend to anyone who wants to enjoy the island life and be surrounded by forests at the same time to check out this amazing place on the coast.
Forest Ecosystem Science
Agata Chomicz
Brian Curry
Daniel Gladden
Jessica Hudec
Nathan Jones
Catherine Kropp
Nicole Mercier
Matthew Noone
Michael Puleo
Silas Ratten
Stacy Trosper

Wildlife Ecology
Joseph Adamo
Katelyn Andre
Lindsay Bates
Dawn Bavaro
Daniel Bishop
Kerry Blenk
Michael Boshko
Stephanie Bosley
Jennifer Bradbury
Colby Bruchs
Sarah Campbell
Molly Castles
Rebecca Clark
Ashley Coe

Forest Operations Science
Matthew Avery
Brian Berube
Thomas Colman
Lance Cunningham
Dana Direnzo
Jesse Duplin
Edward Fortin
Walter Fyler Jr.
Tyler Gardner
Brian Hanlon
Anthony Laura
Ryan Lister
Oliver Markewicz
Timothy O'Brien
Joshua Roy
Matthew Taylor
Christopher Wener

Eric Hanson
Darian Higgins
Rachel Hirsch
Caitlin Holmberg
Matthew Hovey
Kristen Inman
Nathan Kay
Catherine Amy Kropp
Lindsay Keener-Eck
Erin Kennedy
Will Korth
Robert Lambert
Rory Larson
Ashley Leen
Heather Leigh
Vanessa Livermore
Derek Lucas
Jami MacNeil
Kathryn Manende
Mark Martin
Maureen McClintock
Crystalina McGrail
Adam McKay
James McLellan
Jesse Millen-Johnson
Alicia Miller
Heidi Murray
Nicole Nadeau
Carla Nelson
Joshua Noll
Rebecca Norris
James Osenton
Cassandra Pease
Jesse Perkins
Christopher Persico
Ben Piotrowski
Allan Roberts
Beth Royce
Craig Salmon
Andrew Shaffer
Brian Shaw
Molly Simonson
Trisha Singh
Jeremy Sirois
Mitchell Sirois
Sarah Spencer
Christopher Standley
Cory Stearns
Daniel Steege
David Veverka
Parks, Recreation and Tourism

Ryan Allen
Walter Archer
Charles Aurelia
Ian Ballinger
William Beeaker
Derek Blaylock
Gregory Bradford
Jacob Brodsky
Anthony Butts
Silvia Cassano
Adam Chenault
James Conway
Christopher Donahue
John Donovan
Nicole Donwen
Devin Foley
Matthew Foster
William Gagnon
Peter Gerard
Mark Glasberg
Trevor Goolsby
James Gray
Susan Harsche
Lee Hoagland
Kyle Irvine
Kyle Jennings
Kristopher Kendall
Jared Koelker
Matthew Krystkiewicz
Justin Lafond
Matthew Lambert
Jason Lavigne
Jonathan Lemke
Michael Lincoln Jr.
Scott Logosz
Scott Malicky
Kevin Martin
Samuel Martinelli
Eva McLoughlin
Senath Morrill
Christopher Mcpherson
Robert Miles
Danielle Nalepa
Barrett Nichols
Brian O’Connel
Scott O’Connor
Cristina Petrone
Anthony Pirruccello
Emma Pope-Welch
Russel Prime
Timothy Roberts
Chad Robertson
Clark Sanford
Jessica Small
Ryan Small
Travis Snell
Clint Sochulak
Michael Sopyla
Joshua Swierk
Charles Theriault
Breanna Torrey
Johanna Van Heiningen
Kyle Vosmus
Ian Woelfel
Zachary Worcester
Mallory Young

Wood Science and Technology

Brett Griskiewicz
Benjamin Jones
Daniel Lagasse
Spencer Perry
Bryan Pierce
Joseph Romano
Jacob Serdy
Jason Stevens
Keith Trask
Al taught me how to measure trees. Andy taught me how to design a cruise. Louis taught me how to make maps. Dr. Field even lectured to me about how to place value on each of these things. I think I learned their lessons fairly well, though I am sure that some of them slipped past somehow or another. However, regardless of how well I learned the material these great professors doled out, I learned how to put them all together, and how to implement them from a much different teacher.

I spent my summer working for LandVest out of Jackman. Over the course of the four months I worked for them, I traversed quite a range of woodlands, but the vast majority of my paychecks, and mileage reimbursements, came from an ownership known as Saint-Aurelie. Naturally, Saint-Aurelie isn’t technically the name of any of the townships in the ownership, but it is an actual town not far away. Of course, in order to get there, one must cross two chains of river, declare any items with them, and learn another language on the way.

Saint-Aurelie timberland is comprised of 61,000 acres of land directly adjoining the Canadian border. It was this acreage that really taught me how to put all of my college lessons together in order to actually accomplish something, but it was one tough teacher. I learned what I did by mucking my way through deep, methane belching, organic soil, and clothes-lining myself on sap lines. Odd combination?? Most definitely, but even more so given that the only difference between being in one or the other of these situations is likely to be five feet of elevation change and less than a chain of walking.

Saint-Aurelie timberland was recently purchased by a client of LandVest when I came of board for the summer. My work on the ownership included pre-commercial thinning (PCT) layout, planting checks, cruising, and some other small tasks. In the first couple of weeks that I worked I was sent up to meet the forester in charge of the Saint-Aurelie acreage, and to familiarize myself with the acreage. There was a crew already hired to come in and do the PCT and planting that the previous managers had ordered, and there were no blocks laid out, or true plans for which blocks to do. Thus was my introduction to the property. Pretty simple.

I spent my first two weeks on the property working to settle this little discrepancy. I drove all over the six townships of concern, checking out the actual status of the softwood blocks shown on the type maps, trying to decipher an entirely new typing system. You see, as I said, this parcel directly borders Canada, and was managed under Canadian systems. Under any normal typing strategy that I knew, bigger or older trees get assigned larger numbers in stand type designators, but not in Canada apparently. No matter how hard I looked, I could never find these stands of super sized softwood that logically should be present where one sees an “S6B” on a map. Even after three months of work, I still found myself confusing the fact that “6” meant seedlings, and “1” meant large sawtimber.

Once I got over the stand typing confusion, finding and laying out PCT blocks was simple enough. I spent two weeks finishing that project, spent another
week washing fir needles out of places that I didn’t know fir needles could get to, and then came back to Saint-Aurelie in mid July to work on the full cruise of the ownership. Then came the real education.

The cruise was set up with clustered lines of points, scattered over the entire ownership. Because the forester had other duties to attend to, and because there was a contract cruiser employed to do about a third of the points, the cruise was split into two sections. I got the North half. The north half was almost entirely black spruce-cedar types. When I started the project I had a brand new pair of heavy duty work pants, and by the end of the first week, they couldn’t even be salvaged by the sowing machine for another weeks work. Fighting my way through cedar bogs chock full of stubs left me with holes in my pants, my cruising vest and my skin. More than once, the moss beds that I was walking on proved to be merely floating on mud, as I found myself up to my nipples in rank black muck. No matter what I did, it was a challenge just to make it to each point. I really hated cruising after one week, and by the end of the third week, I could have burned every cedar and black spruce I ever saw.

Even with all of the trials and scars, I really came to appreciate the area. I always thought that black spruce was a low quality, poor formed species. Then I cruised through a stand of pure black spruce in Saint-Aurelie. Every single tree was sixty or better feet tall, with almost unnoticeable taper right up to the last log, and not a single limb in the first four logs. To top that off, there was not a square foot of ground under the canopy that didn’t have at least knee high spruce regeneration. The PCT crews could have moved into the stand as soon as the skidders moved out.

Then I cruised multiple stands of sugar maple that were all extraordinarily large in diameter, but full of tap holes. There wasn’t a good quality log in the butt of any tree in the stand, and yet the stands were all making significant profits for the owners from tap leases. In fact, the Saint-Aurelie ownership produces over sixty percent of all the syrup produced in the state of Maine.

Working for the summer in an area like Saint-Aurelie really drove home all of the lessons learned at UMaine in a way that only sweating and bleeding can. I really gained an appreciation for multiple use value of timberland, as well as alternative uses to timber production. Stands like the thick black spruce I saw also really helped to make lessons learned in silviculture and ecology about adapted species and possible treatments. The unique ground also really made me consider the alternative types of operations presented in harvesting. I really can’t think of any better way to get to know all that is taught in forestry than to have to know it, and work with it for a while.
FORESTRY ACROSS THE WAY  
A YEAR ABROAD IN IRELAND

BY CHRIS BYRNES  
FORESTRY STUDENT

Left- The Temple Bar, famous tourist pub in the middle of Temple Bar district in Dublin. Photo taken in Dublin.

Right- Another photo in an Irish Sitka spruce plantation. Sheep generally roam freely throughout the country side. The sign to the left indicates the border of an Irish speaking area. Photo taken in County Sligo.

Left- This is a typical Irish Forest. All joking aside, notice the burnt heather, indicative of the highly acidic soil. Photo taken in County Mayo.

Right- Archaeological ruins are scattered throughout Ireland and generally a concern for afforestation. Photo taken in County Meath.

Left- Loyalist Mural in Belfast. Murals created by both Nationalists and Loyalists during the troubles as a way of marking territory. Photo taken by John Grahams.
Seniors
Stephanie Joan Bosley
Hometown: Enosburg Falls, VT
Major(s)/Minor(s): Wildlife Ecology conc. in Conservation Biology
Official Clubs/Organizations: TWS
Activities/Hobbies: Trapping, shooting w/Josh, cross country skiing, running, reading, skinning muskrat! Playing frisbee
Favorite Memory: Meeting my surrogate sister in Maine: Sarah Spencer! Meeting Josh at Leonard’s Mills: woodcocking.

Simeon Matt Allen
Hometown: Blue Hill, ME
Major(s)/Minor(s): Forestry
Quote: “I would rather run backwards with my pants down through a corn field.”
Official Clubs/Organizations: I stay here in the wee hours of the morning to finish projects due in about 5 hours.
Activities/Hobbies: Hunting, fishing, homework, Miller Lite, Flexfiber, MapInfo, FVS, being late for class, Number 10, taking INT256 twice.
Favorite Memory: Going outside for Measurements I lab when it was -2° and the wind chill was -40° That was a great day!! NOT
Other Thoughts: First and foremost I would like to thank “G-Wagon” Gretchen Heldmann for not killing me and being my hooked-on-phonics. Also, I LOVE every computer lab in this building.

Maggie Lorinne Burke
Nicknames: Tubby
Hometown: Readfield, ME
Major(s)/Minor(s): Forestry
Quote: “The thing about land; they’re not making any more.”
Official Clubs/Organizations: Woodsmen Team, The Maine Forester, SAF
Activities/Hobbies: Hunting, photography, fishing, eating
Robert Cousins
Hometown: Carmel, ME
Major(s)/Minor(s): Forestry
Quote: “90 percent of life is just showing up.”
Official Clubs/Organizations: Maine Forester, Woodsmen Team, SAF, Xi Sigma Pi
Activities/Hobbies: Hunting, fishing, hiking, drag racing
Favorite Memory: All the late nights in Nutting working on projects.
Other Thoughts: It’s been a great four years that I will probably never forget.

Brian Hanlon
Nicknames: Hanlon, because no one knew my first name.
Hometown: Claremont, NH
Major(s)/Minor(s): Forest Operations Science
Quote: “Don’t compromise yourself because you’re all you’ve got!”
Official Clubs/Organizations: Xi Sigma Pi, SAF
Activities/Hobbies: Fishing, hunting, hiking, sailing/boating
Favorite Memory: The past 4 years. . .there are too many to pick just one.

Gretchen AJS Heldmann
Nicknames: G-Wagon, G-Unit, G
Hometown: Coventry, CT
Major(s)/Minor(s): Forestry
Quote: “F***! No, I don’t know where Louis is!!!!”
Official Clubs/Organizations: SAF, Xi Sigma Pi, Pride of Maine Black Bear Marching Band, Maine Forester, Town of Hampden GIS/IT
Activities/Hobbies: being LPO! (loud, proud, obnoxious), hiking, camping, watching movies, driving and working on the Porsche
Favorite Memory: Too many- band camp, silvitorture with M & S, Mgmt. I, almost killing Matt & Simeon
Other Thoughts: Thank to Louis, you helped me find my place here & helped me out of my first-semester-here slump. Word up to Simeon, you’re a nut but a nice guy, you mean well- good luck! Being on woodsmen team is equally as dorky as being in band, so shut up. :-)

61
Benjamin Martinelli
Hometown: Manchester, ME
Major(s)/Minor(s): Forestry
Activities/Hobbies: Hunting, fishing, hockey, skiing, being in the woods
Favorite Memory: Too many to decide.

Wilfred Mercier
Nicknames: Wil
Hometown: Fayette, ME
Major(s)/Minor(s): Forestry/Minor in Surveying
Quote: Wil to Gretchen, “Nursing students!” Gretchen to Wil and Adam, “They don’t wash their hands!”
Official Clubs/Organizations: SAF (chair), Xi Sigma Pi (Forester), Alpha Zeta
Activities/Hobbies: Camping, hiking, playing guitar
Favorite Memory: Breaking into the tour bus during summer camp after Louis locked the keys inside.

Adam Nicak
Nicknames: Ironballs
Hometown: Gray, ME
Major(s)/Minor(s): Forestry/Minor in Surveying
Quote: “What were we talking about...oh yes, sex and alcohol.” (Barry Goodell)
Official Clubs/Organizations: Woodsmen Team, SAF, Xi Sigma Pi
Activities/Hobbies: Fishing, trapping, hunting, reading, flying
Favorite Memory: Being left on the side of Rt. 16 because our van was out of gas.
Sarah Spencer
Nicknames: Long-john Silver
Hometown: Old Town, ME
Major(s)/Minor(s): Wildlife conc. in Forestry
Quote: “Live as if you were to die tomorrow, learn as if you were to live forever.” (Ghandi)
Official Clubs/Organizations: The Wildlife Society, Xi Sigma Pi
Activities/Hobbies: Hiking, canoeing, watching birds, hauling wood with Dad, skiing, snowshoeing
Favorite Memory: TWS meeting: Lindsay Seward brought in a survey TWS conducted my 1st year here, and read it out loud to everyone. Wow, was I a loser!
Other Thoughts: The last 4 years have been the greatest time of my life. The people I’ve met will never be forgotten. We’ve shared so many great memories and I’m looking forward to many more.
Brian Stoddard
Nicknames: Stoobs
Hometown: New Fairfield, CT
Major(s)/Minor(s): Forestry
Quote: “Peep the ‘sitch”
Official Clubs/Organizations: Bear Brew Pub
Activities/Hobbies: Snowboarding, surfing, fishing, plants
Favorite Memory: Forestry summer camp, cruising woodlot in Carroll, ME for capstone project.
Other Thoughts: I would like to say thank you to all of the faculty that have helped me over the past 4 years, and especially Dr. David Field.

Timothy Taylor
Nicknames: Kingman
Hometown: New Fairfield, CT
Major(s)/Minor(s): Forestry
Quote: “You aren’t drunk if you can lie on the floor without holding on.”
Official Clubs/Organizations: President of Men’s Lacrosse Club
Activities/Hobbies: Snowboarding, lacrosse, camping, hiking
Favorite Memory: Mike’s version of “Like a Prayer.”

Michael Tippet
Hometown: Readfield, ME
Major(s)/Minor(s): Forestry
Quote: “Is it Plausible?”
Activities/Hobbies: Skiing, fishing, the outdoors, trees, relaxin with friends
Favorite Memory: May term forestry summer camp, cruising for capstone project in Carroll, ME
Other Thoughts: Thank you to all the faculty who helped me through the last 4 years, special thanks to Dr. White and Dr. Field.