Market-Based Conservation for Working Lands, Natural Resources and Military Training: Lessons Learned from the Market Based Conservation Initiative (MBCI) Pilot

Presented by: Dr. John Diaz

Collaborating Authors: Dr. Robert Bardon, Dr. Dennis Hazel, Dr. K.S.U. Jayaratne and Dr. Jackie Bruce
North Carolina

• Home to 10 million people
• 9th most populated state in the nation
• By 2030 projected to be 7th largest state with 12.2 million people
• NC Agriculture Industry
  • 18+ Million acres in forest and 8+ million acres in farm
  • contributes $78 billion to the economy of NC
  • 17% of the states income
  • employs 16% of the states workforce

Image Credit: North Carolina Department of Agriculture
North Carolina

• NC Military Presence
  • 3rd largest military population
  • Home to the largest Army installation in the world
  • Home to largest Amphibious Training Complex in the world
  • 10% of the states economic activity
  • 2nd largest economic sector in NC
• Threats to working lands, conservation, and military readiness
  - Unplanned Development
  - Encroachment
Market Based Conservation Initiative

- Protection of military training route
- Used by all services
- 17 counties
- Reverse auction bidding
- Steering committee selection process
- Performance-based contracts
- Attempt to quantify military training as ecosystem service
MBCI Partners: NC Sentinel Landscapes Partnership
Methods

• Case study design
• Semi-structured interviews
  • Purposive and snowball sampling
• Analysis: constant comparative method
  • Interviews and partnership documents
  • Evaluative framework for cross-sectoral partnership programs
    (Melaville & Blank, 1991)
• Results: Key factors influencing results of program
# MBCI Landowner Bids

## Aggregated Data

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MBCI Landowner Bids

A 40% increase in acreage offered between Phase I (Ag) and Phase III (Forestry).

More landowner interest in 20 year contracts as lower bids considered in later bid rounds.

- Phase I – 44% at 30 years, 27% at 20 years
- Phase III – 27% at 30 years, 42% at 20 years
- Phase I Bid Round 2 – 19% at 30 yrs, 50% at 20 yrs
MBCI Landowner Bids

• As predicted during program design:
  • Bid Round 2 Phase 1 represents the first occurrence of competition amongst landowners thus driving bids below $20/acre.
  • The bid range ceiling trended to $30/acre.
  • Approximately 70% of the acreage offered by landowners was for 20+ year contracts.
  • First contact signed spring 2015
Results: Key Factors

1. Understanding the purpose and associated risks of a pilot program
2. Perception of rural landownership patterns
3. Institutional mandates of the Navy
4. Funding authority to establish agreements
5. Development of landowner trust and program credibility
Results: Key Factor 1

**Purpose and associated risks**

- Had to pitch as “concrete” program to attain military support
- Disconnect between idea of testing concept and full protection of military training route (MTR)
- Misunderstood financial risk of approach
- One reason for early termination of pilot

**Demonstrates deficiency in education/communication approach**
Results: Key Factor 2

*Rural Landownership Patterns*

- Navy → lack of engagement with local communities
  - Less than other branches of service
- Did not understand property ownership in NC
  - Predominantly small family farms
  - Misperception that they could purchase a few tracts and achieve goals
- Resulted in incompatible military process requirements
  - “restrictions on [landowners] not matching up with the realities of farmers on the ground.”
  - Required perfect land tenure records

**Demonstrated need: better educate military stakeholders on the context**

Photos Credit: NC Cooperative Extension Service
Results: Key Factor 3

**Institutional Mandates of the Navy**

- Program designed to have multiple bid rounds
  - Identify lowest cost to achieve conservation goals
  - Achieve results among breadth of landowners (early-late adopters)
- $25/acre internal mandate from Navy
- Resulted in early termination of pilot
- Insufficient bidding iterations
  - Unable to test concept and identify acceptable market
  - Inability to identify market characteristics (value of airspace: urban-rural gradient)
  - “questions still surround the bid floor, conservation drivers, limitation of development rights, and possibility of enhancing other ecosystem services”.

**Multiple bid rounds needed to identify salient market, variance across landscape and affect among breadth of adopters**
Results: Key Factor 4

Funding Authority and Landowner Agreements

• U.S. Code § 2684a (Agreements to limit encroachments and other constraints on military training, testing, and operations)
  • Evokes real-estate transaction process
  • “complicated tremendously the process of doing the due diligence, title searches, the question about appraisals, the questions about do we need surveys or not, on and on and on.”
  • “boils down to...[the Navy] want[s] to assume zero risk.”

• Increased cost for due diligence and lengthy process resulting in lost deals
  • Due diligence requirement 60 year title search
  • Involved attorneys and real estate specialists
  • 3 year time from first bid to contract

**Recommendation from partnership: SIKES Act Provides better and more flexible funding authority**
Results: Key Factor 5

Landowner Trust and Program Credibility

• Trust and program credibility were significant military issues
• BMPs
  • Partners with established relationships and trust with landowners and community leaders
  • Local administration of program through Soil and Water Conservation Districts
  • Landowner workshops provide effective venue for discussion
  • Farmer from Sampson County began program manager

**Trust building using intermediaries sympathetic to landowner needs is critical to program success**
Conclusion

• Military involvement creates special nuanced challenges
• Transferable lessons across varying contexts (i.e. Florida)
• Special attention is needed to communication and education efforts
  • Allow program to be implemented in its intended fashion
  • Perception and trust issues will persist without thoughtful, strategic efforts
Questions?

Email: john.diaz@ufl.edu
Phone: 863-455-5289