North Florida Research and Education Center

Strategic Plan

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Research • Strategy • Learning

TECKER INTERNATIONAL

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Overview

On October 21, 2013, a strategic planning group consisting of Advisory Committee of the North Florida Research and Education Center (NFREC) met to update its long-range strategic direction. Likewise, on December 10, 2013, a strategic planning group consisting of faculty members of the North Florida Research and Education Center (NFREC) met for the same reason. Bud Crouch, a principal consultant of Tecker International, LLC and president of Innovations Plus led the groups through the planning process.

This planning document is a combination of the input from both groups and defines NFREC's clear strategic direction. It is the planning group's consensus on what will constitute the NFREC's future success as it addresses issues related to the overall IFAS road map. It answers the following two fundamental strategic questions:

1. Why will NFREC exist in the future? *Its reason for being and core purpose*.
2. Where is NFREC going? *Its future direction and goals*.

Planning Strategically:

The existence of this strategic direction and its successful implementation signals the leadership team's desire to lead NFREC strategically. Developing a strategic direction is not a one-time event, but an ongoing commitment and process. The strategic direction represents a compass that will be used to guide and focus NFREC's future strategic decision-making and ongoing operational work.

Strategic Focus:

Organizational strategic focus or intent is very important. One of the challenges that NFREC faces is the fact that there is more it can do than it has resources to accomplish. The temptation to do everything can lead an organization to try to be all things to all people. Planning strategically is the counter to the all-things syndrome. It is about identifying a limited number of goals that NFREC must undertake to move successfully into the future.

Strategic Approach/Philosophy:

The approach in defining the new strategic direction was not to identify what NFREC wants to continue doing today (its current operational plan). Rather, the team determined what the organization is not doing today, but must engage in to be successful in the future and meet the needs of UF/IFAS.
This strategic direction is not about business as usual — *it is about the change needed to stay relevant!* This separates the strategic plan from the operational plan. Both are important. The strategic direction is a constant reminder, as the leadership team oversees the development of the annual operational plan, of what must be changed to stay relevant to what member are seeing in their real world.

Updating the Strategic Plan:

A strategic plan can only stay current and relevant if NFREC insures that the plan is updated. It is the leadership team's *working document*. Therefore, the faculty members and NFREC

advisory committee have the responsibility to: change the strategic plan anytime it needs to be changed based on sound reasoning and assessment; and update the plan regularly on an ongoing basis.

Timeless Core Ideology

Core Ideology describes an organization's consistent identity that transcends all changes related to its relevant environment. Core ideology consists of two elements: **Core Purpose** – the organization's reason for being – and **Core Values** – essential and enduring principles that guide the behavior of an organization.

Core Purpose: ***To deliver science based solutions.***

Core Values: ***We believe in:***

- ***Respect***
- ***Ethical behavior***
- ***Fellowship and mutual assistance***
- ***Education and growth***
- ***Unbiased scientific information***
- ***Stakeholder focus***
- ***Innovation and creativity***

Long-Term Envisioned Future (10+ years)

The **envisioned future** conveys a concrete yet unrealized vision for the organization. It consists of **a big audacious goal (B.A.G.)** – a clear and compelling catalyst that serves as a focal point for effort.

NFREC's B.A.G.: ***By 2020 the NFREC will have an economic impact of 50% over the 2013 baseline.***

Indicators of Achievement

The indicators of achievement are designed to measure the progress towards achieving the outcomes described in NFREC'S B.A.G. They should be reviewed yearly by the faculty and advisory committee.
The indicators of achievement also help to clarify what is intended by the goal. They describe what the profession and NFREC will look like when the B.A.G. is successfully completed.

If we accomplish our B.A.G., what would look different?

The NFREC will:

- Establish a baseline for 2013.
- Establish a procedure for estimating the economic impact of research and extension programs
- Annually update estimates of economic impact.
- Annually analyze the data and decide what must be accomplished in subsequent years.
- Analyze the information with an independent review every 3 years.

NFREC will experience:

- Broader awareness and branding,
- Increased resources of all types.
- Increased financially security and stability.
- Pride in organization and profession.
- Increased opportunities to be seen and function as respected leaders at the table, before decisions are made.
- Sought after for expertise, knowledge and skills.
- Initiators of change.

Key Success Factors

The following Key Success Factors were identified by participants. They propose outcomes of NFREC will need to be achieved or sustained over the next five years.

Research

1. Focused research and delivered results on critical problems in agriculture and natural resources in North FL and Florida in general - the usual. We need to work with inputs from extension folks while starting a "predictive analytical" program (see book by Eric Siegel) to obtain a different perspective on "true needs".
2. Increased funding for sustainable research programs engaged in cutting edge activities.
3. Enhanced relationships with policy makers to provide education of agricultural practices.
4. Develop novel research and extension activities and outreach for our target audience addressing their real needs.
5. Build research teams.

6. NFREC must be relevant and constantly evaluating its programs for relevancy, the other things will follow.
7. Increase the numbers of North Florida citizens and landowners engaged in NFREC programs, and implementation of research and UF science everyday of their lives.
8. Research that impacts the economy of North/Northwest Florida

Financial

1. Improve business acumen in the granting process and improve fiscal effectiveness in grant management.
2. Develop larger and more integrated funding sources.
3. Increase financial stability.

Other

1. Ensure that all faculty members are positioned to become leaders in their respective fields.
2. Primarily success is measured by excellence and high productivity in science and technology.
3. Deeper engagement with underserved clientele groups such as crop consultants.
4. Increase international programs.
5. People. Good combination of senior faculty leadership and young researchers collaborating together. Also the proximity to stakeholders and good relationship with them make NFREC very competitive.
6. Better branding is important.

Five-Year Goals

Goals represent **outcome-oriented statements** intended to guide and measure the NFREC's future success**.** The achievement of each goal will move the organization towards the realization of its five year **envisioned future**.

Goal A: ***NFREC will direct research toward evolving areas of agriculture and natural resources.***

Goal B: ***NFREC will expand outreach.***

Goal C: ***NFREC will have an economic impact of 20% over the 2013 baseline by 2016.***

Long-Range Goals, Strategies and Indicators of Achievement

Strategies indicate how NFREC will organize, focus and expend its resources and actions to maximize its effectiveness and efficiency in achieving its three to five year goals. The strategies must be reviewed and updated on an annual basis.

Priority Key:
(High) = Must begin objective in next fiscal year
(Medium) = May begin objective, if resources permit, in next fiscal year
(Low) = Begin objective in subsequent fiscal year

Indicators of Achievement are used to determine the overall progress toward a goal. They indicate how close NFREC is to achieving a goal as it executes the individual strategies for each goal. ***The indicators of achievement measure goal achievement, not strategy achievement.***

Goal A: ***NFREC will direct research toward evolving areas of agriculture and natural resources.***

Strategies		Priority Key
A1.	Develop consensus concerning future areas for agriculture research.	High
A2.	Focus on the areas of diversification of commodities, new invasive species, and new production systems.	Low
A3.	Create faculty meetings focused on the goals , and identify working groups	High
A4.	Invite and involve outside experts (potential collaborators), extension groups, and producers to help identify the new areas.	High
A5.	Develop a biannual (or annual) orientation of programs for local, state, and federal political staff to expand their understanding of the Centers mission and needs.	High
A6.	Develop a complete Center succession planning process for each key center position. This must include overlapped employment time with the successor.	High

A7.	Secure industry funding for 20% of the annual budget that includes: • matching or "challenge grants". • A check off system for all commodities.	Medium
A8.	Seek additional endowments.	Low
A9.	The faculty will have sustained funding for research: • water- irrigation technology. • variable rate technology for irrigation and fertilization. • prescribed fire and wild life management opportunities and potential enhancement. • high residue cover crops – strip till. • alternative energy technology and sources e.g., hydrogen/butane and electric generators. • address the challenge of future human resources.	High

Indicators of Achievement	
An increase in:	**The existence of a:**
• The understanding of the Center and its mission. • New talented and professional Center employees. • Science communication success. • NFREC's visibility and branding with key stakeholders. • Center response time and nimbleness. • Grants, funding and endowments. • Research that is directed at new enterprises that meet clientele needs	• Successful biannual orientation program. • Succession planning program. • 1-3 year science communication agenda with prioritized issues. • Quick response team and a rapid extension communication system to groups of agents for new diseases and problems in the region. • Check off system for challenge grants and commodities. • A biofuels enterprise for farmers • Improved cattle herds in N. Florida • Programs combating limiting factors to new enterprises.

Goal B: ***NFREC will expand outreach.***

Strategies		Priority Key
B1.	Implement using non-traditional social media tools and popular media outlets to reach out to non-traditional cliental.	**High**
B2.	Enhance relationships with trade and popular media outlets.	**Medium**
B3.	Increase the availability of decision aide tools.	**Low**
B4.	Establish events with underrepresented audiences.	**Medium**
B5.	Use non-traditional methods to train county faculty and allied industries.	**High**
B6.	Create alternative enterprises like small farms and specialty crops.	**High**
B7.	Develop new labor mechanisms (robotics) to deal with herbicides.	**High**
B8.	Advance wildlife control and crop protection.	**Low**
B9.	Improve salmonella and poultry litter rules.	**Low**

Indicators of Achievement	
An increase in:	**The existence of:**
• Overall efficiency and productivity • Advanced wildlife control and crop protection. • Alternative enterprises like small farms and specialty crops. • Non-traditional training methods • Reporting early events so they can be better advertised • Relationships with appropriate media • Evidence of informing non-traditional	• Improved salmonella and poultry litter rules. • New labor mechanisms (robotics) to deal with herbicides. • A complete list of field days and events for the year. • Improved website use and newsletter use (like Panhandle Ag). • Training programs for new farmers on small farm and specialty crop

clientele	enterprises.

Goal C: ***NFREC will have an economic impact of 20% over the 2013 baseline by 2016.***

Strategies		Priority Key
C1.	Establish an economic base line.	High
C2.	Conduct an annual evaluation of the economic impact.	Medium
C3.	Identify potential project areas. • Forestry • Row crops • Specialty crops	Low
C4.	Concentrate on economic impact evaluation of extension	High

Indicators of Achievement	
An increase in:	**The existence of:**
• Success stories from each faculty member • Economic impact numbers by research/extension program	• A 2013 baseline for economic impact of NFREC • Grants dealing with economic impact of a research station • Collaboration with environmental economists at FAMU and FSU if appropriate

Appendix

External Assumptions about the Future Environment of NFREC

The following information reflects the respondents' initial thinking and identification of draft key elements for the strategic plan prior to the meeting of both groups. This information formed the basis for the planning group's review and update of its strategic direction and was shared and utilized during the planning session.

- External assumptions about the future environment.
- Long term internal mega/strategic issues facing NFREC.
- Review the core purpose or mission statement.
- Review the core values.
- Review the big audacious goal (B.A.G.)
- Identify where NFREC needs to reshape for the future.

Part One: Assumptions about the Relevant Future Environment

Please identify the most significant external trends, challenges, issues, major forces, etc. that you believe will impact the profession in the future (five years — the future environment of 2018). These forces may represent either future external opportunities or threats to NFREC and the overall future environment of agricultural research and education in Northwest Florida. Examples of possible trend areas could be competition, financial, technological, insurance, employee benefits, governmental regulation or political issues, worldwide changes etc.

Financial

1. Difficulty obtaining funding for programs based on commodities.
2. Funding of applied agricultural research and environmental regulations on agriculture government policy.
3. Increased economic impact of invasive species such as two spotted *drisophola* and the brown mormorated stinkbug. Increased economic impact of Citrus greening and the reemergence of citrus to North Florida. Agricultural development by Agriculture Reserves Incorporated, a subsidiary of the Mormon Church, that purchased 383,000 acres from St. Joe Paper Company.
4. Funding environment for agricultural research is currently a challenge and will likely continue to be for the next five years.
5. Funding for agricultural research in other countries is still available and they are willing to collaborate with international partners.

6. The requisite use of People Soft makes it hard to do business with the University of Florida and The State of Florida.
7. Federal grants are moving towards few large awards involving many agencies. This simplifies grant management for Federal grant administrators while passing along inter-agency administration of activities and funding to PIs.
8. Issues regarding water quantity and quality will receive greater attention and more grant opportunities within the coming two years in Florida, and throughout the world long-term.
9. Employee benefits, funding for research, funding for extension (even more critical than funding for research).
10. How do we continue funding bio-scientists since they are essential for data generation in research centers where no undergrads are typically available?
11. Funding shortfalls (negative trend).

Faculty

1. Difficulty of finding potential faculty with any practical (field) interests and skills.
2. UF central administration will expect higher academic standards for NFREC faculty. This is an opportunity for faculty to be better scientists/technologists but the added expectation that faculty fund biologists, farm crew, graduate students makes the expectations extremely challenging.

Farming

3. Fewer conventional "farmer" clientele. What are left will be very large or very small and unfocused on a commodity like we are organized. Lack of conventional support for the center, thus, the need to develop new clientele.
4. Reduced farm profitability due to environmental regulations, inadequate water supply, reduced value of products and increased cost of production.

Global

5. Increased emphasis on thinking global and buying local.
6. Global warming.
7. Increase of human population worldwide will increase food demand in the next five years.
8. Increased emphasis on the organic production of fruits and vegetables.

Research and Development

9. Agriculture R&D will be needed more and more in the years to come.
10. New designs of alternative systems are necessary.

11. Bio-fuel and fiber production for second-generation ethanol are competing with cattle production.

Climate

12. Climate change and environmental aspects of agriculture will likely be one of the major drivers of Ag research.
13. Climate change shifts in funding sources and reduction in state support.

Other

14. Increased government regulation of agriculture and environmental issues (positive trend for research/extension).
15. Increasing recognition of "systems" solutions to problems and issues.
16. St. Joe is in the process of selling 383,000 acres in the Panhandle (i.e., size of Gadsden CO) to Ag Reserves. St. Joe had owned some of its land for 80 years, functioning as caretakers of pine forests; Ag Reserves has a reputation for aggressively managing to promote economic gain through intensive agriculture and cattle farming. This change in land ownership may have significant impacts on wildlife and water over very large areas.

Please identify the most significant “mega” issues that NFREC will need to address in the next 2 to 5 years. Mega issues are defined as overriding issues of strategic importance that cut across multiple goals or outcome areas. They address key strategic questions that NFREC must answer, illuminating choices the Center must make and challenges that it must overcome to better serve its membership and mission and to successfully move into the future. Mega issues might include: How does NFREC drive and gain brand awareness and recognition? What are the organization’s clear and compelling cause, mission, and/or goals? In what way can NFREC best define, fund, communicate, and nurture its diverse membership who support its mission in many different ways? How does NFREC collaborate with other organizations and build coalitions to achieve its policy objectives?

Faculty

1. How will NFREC handle the retirement of more than half its faculty within the next few years?
2. Will new faculty be recruited to cover disciplines similar to those of faculty who are lost, or will we take these retirements as an opportunity to reshape the focus of the entire center?
3. How does the NFREC fill faculty positions that will be vacated by retirements in the next 3 to 5 years?

4. How can we insure replacement of positions as faculty retires? (Not necessarily keeping the retiring faculty's position description).

Branding, Awareness, Relevance and Collaboration

1. How does NFREC remain relevant to the general population while developing a new core group of clientele
2. How does the NFREC achieve excellence in science and technology?
3. How does NFREC market itself as a leader in agricultural research to policy makers and stakeholders and remain relevant?
4. How does NFREC improve the communication with producers? Most importantly, how could we improve our ability to hear and understand their most urgent needs?
5. How can scientists at the main campus better collaborate with the NFREC, which functions as a separate entity fiscally and by product recognition (e.g. # Journal Pubs)?
6. How does NFREC stay relevant to the panhandle and our scientific disciplines?

Research

1. How will NFREC research inform the debate over water quality and quantity in relation to agricultural use?
2. Given the global nature of agricultural research, how will NFREC best communicate to stakeholders the benefit of international engagement?
3. How does NFREC improve its capacity of funding research? What other interactions with the industry are necessary in order to meet that goal?
4. How can NFREC provide value added research and extension programs?
5. How can NFREC researchers survive in a scenario of ever decreasing federal funds and increasing competition for all types of funding opportunities?

Mission

1. What is the NFREC's mission and how does it integrate with the mission of IFAS and UF?
2. What specific benchmarks should we consider to quantify the degree of success or failure in addressing our mission and/or goals?

Other

1. How will NFREC remain engaged with clientele as the private sector increases its dominance in decision-making by farmers?
2. What is the impact of, and how do we quantify, the impact of NFREC to local, state and national agriculture and agriculture economies?

3. How does the NFREC best reach out to clientele (i.e. what is working and what is not)?
4. What is the best mechanism to reach out to commercial agriculture operations?
5. How can we attract students to off-campus research centers to develop a quality graduate research program?
6. How do we mitigate funding shortfalls?

Part Two: Timeless Core Ideology

The Core Purpose or cause of an organization is the fundamental reason why it should exist. What would key stakeholders, members, and the public lose if NFREC ceased to exist? What was it originally organized to do and/or has this mission changed over time?

NFREC's Current Core Purpose is: ***To enhance agriculture, natural resources and quality of life through science.***

Should it stay the same? Should it change? If so, what changes do you suggest?

1. Stay the same. (6)
2. Stay the same but interpreted differently: more emphasis on helping landowners make a living from their land holdings small-large; to include rural development components. This will ensure that we actually have an "agricultural based" clientele as we transition to whatever awaits us as North Florida becomes urbanized.
3. To enhance sustainability of agriculture, natural resources and quality of life through science.
4. May expand title to, "To enhance agriculture, natural resources, economic well-being and quality of life through science".
5. Change is needed as society's needs have migrated from agricultural production technologies to natural resource protection and enhancement.
6. Perhaps amend it to include the "people" component. Something like ". . . by educating stakeholders who implement NFREC-researched, science-based solutions"

Core Values are standards of behavior that are needed within NFREC to successfully achieve the core purpose.

To fulfill its current Core Purpose, NFREC pursues and adheres to these Core Values.

We believe in:

- Respect
- Ethical behavior

- Fellowship and mutual assistance
- Education and growth
- Unbiased scientific information
- Stakeholder focus
- Innovation and creativity

Should these Core Values stay the same? Should they be changed? Should a Core Value be added or deleted?

1. They should stay the same. (7)
2. Same more or less; perhaps instead of stakeholder focused we should be citizen focused?
3. May also include, "Agricultural Sustainability"
4. We should add: Believe in and adhere to the Land-Grant mission of extension, teaching, and research
5. I would only add national and international recognition in Science & Education.

A **Big Audacious Goal (B.A.G.)** should be so clear and compelling and it will require little or no explanation. A B.A.G. is a huge challenge but will have a clear finish line, and can require 5 to 10 years to complete (so they are well beyond the goals in the organization's 3 to 5 year plan).

NFREC's Current BAG: NFREC will be recognized as the number one Center in the Southeast.

Should the BAG stay the same or make changes?

1. Stay the same. (3)
2. The current BAG is too vague, and needs refinement. What does being "the number one center in the SE" mean??? Number one in what, exactly? Number one among what other centers, exactly?
3. I think it is too vague and should be more focused, e.g., recognized as the #! Center for XYZ.
4. I think 'Center' needs to be defined. In my mind we should change this to be: 'NFREC will be recognized as the number one off-campus research center in the US".
5. I suggest putting a date on that, for example, by 2020.
6. We need to focus on a few core businesses. Animal nutrition is a clear example of a core program meeting needs worldwide.
7. Change it to: NFREC will lead the southeast through science.
8. I think it should stay the same as it remains a difficult challenge considering the number of research centers in the area. Perhaps we could add something relative to the most

cultural diverse center or something along those lines. We are becoming recognized for the diversity of our interns and students.

9. It's ok, but perhaps make it more specific ("#1 for systems-based research", etc.).

The respondents were asked to identify the top three **critical success factors** that must be accomplished by NFREC over the next 36 months.

Research

9. Focused research and delivered results on critical problems in ag and natural resources in North FL and Florida in general - the usual. I think we need to work from inputs from extension folks but start a "predictive analytical" program (see book by Eric Siegel) to obtain a different perspective on "true needs".
10. Increased funding for sustainable research programs Enhanced relationships with policy makers to provide education of agricultural practices.
11. Conduct "cutting edge" research and have success in procuring competitive grants.
12. Develop novel research and extension activities and outreach our target audience addressing their real need.
13. Build research teams.

Financial

4. Improve business acumen and fiscal effectiveness.
5. Larger and more integrated funding sources.
6. Increase financial stability.

Other

7. Ensure that all faculty are positioned to become leaders in their respective fields.
8. Primarily success is measured by excellence and high productivity in science and technology.
9. Deeper engagement with underserved clientele groups such as crop consultants.
10. Increase international programs.
11. People. Good combination of senior faculty leadership and young researchers collaborating together. Also the proximity to stakeholders and good relationship with them make NFREC very competitive.
12. Better branding is important.

Part Three: Focusing on Outcomes – 3-5 Years into the Future

Based on the trends in the external environment and the strategic challenges facing NFREC, the participants identified key areas where NFREC will need to reshape itself to be successful over the next five years.

Faculty

1. We need a cluster hire of 2-3 faculty dealing with water quality/quantity issues from both the Ag and natural resources perspective.
2. Achieve a balance of integrated faculty expertise and programs to position NFREC for future funding and recognition.
3. Commitment to support staff Increased laboratory space.
4. Enhance collaboration between faculty members.

Financial

1. NFREC is well structured and governed but continued funding, even enhanced, is critical. Keeping support for biological scientists is a critical issue.
2. Funding for graduate students
3. It is nearly impossible for the University to function under the current system of cost accounting. We are hard to do business with, and our customers are going elsewhere.
4. Financial structure relative to bio scientists.

Other

1. We need closer relationships with our extension counterparts, they are our branding and delivery mechanism as well as critical to garnering support from the public.
2. Identify some key problems or barriers in commodity production and address them in teams.
3. I believe we need a professional rural development component (which I have pushed for).
4. Irrigation technology that allows precise irrigation research.
5. Assist (encourage) county agents in developing an outreach program for crop consultants.
6. Continue to identify and address high profile scientifically- and economically-important issues.
7. Committee to prospect international opportunities to advance NFREC international reputation.

8. Need to fully integrate administration functions with science activities to address climate change.
9. Governance so far I believe it is not an issue. We have good leadership and most challenges are external.