

Federal marine personnel needs and perception of competency in management and research hires



Photo from pifsc.noaa.gov

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Introduction—Hiring pressures

- Demand on NMFS
 - Legislative mandates
 - Retirements
- Supply from universities
 - Reduced budgets
 - University hiring freezes
 - Replacing fisheries faculty with positions tied to more lucrative research funding

Previous studies

National Marine Fisheries Service higher education priorities and programs in 2007

- Frequent vacancies for:
 - Population dynamics biologists
 - Statisticians
 - Sociologists/Anthropologists
 - Policy personnel
 - Database management personnel

Previous studies

National Marine Fisheries Service higher education priorities and programs in 2007

- Frequent vacancies for:
 - Population dynamics biologists
 - Statisticians
 - Sociologists/Anthropologists
 - Policy personnel
 - Database management personnel
- Most difficulty filling positions for:
 - Population dynamics biologists
 - Statisticians
 - Sociologists/Anthropologists
 - Economists

Previous studies

Is there a shortage of fisheries stock assessment scientists?

- Studies directed by Congress in 2007 MSA reauthorization
- Studies focused on stock assessment biologists only
- One study on demand
- One study on supply

Previous studies

Is there a shortage of fisheries stock assessment scientists?

- Demands on NMFS
 - Growing responsibilities
 - Many retirements coming up
- Supply from universities
 - Fewer faculty positions available; fewer of those in population dynamics
 - Only 7% of universities with graduate fisheries programs offer all of the NMFS essential curriculum
 - Lack of undergraduate students with strong quantitative skills

Current study

- Why did we do this?
 - Update
 - Other studies were not interactive– we wanted feedback
 - Ask not just about the pool, but the recent hires



Methods

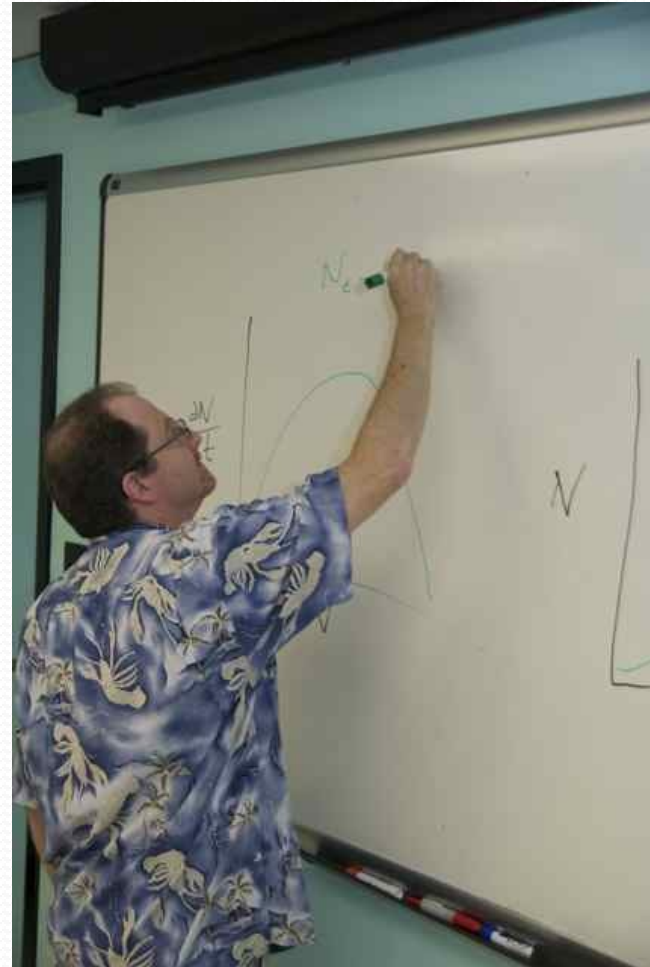
- Invited several Deputy Directors to participate via email with list of questions
 - Science Centers (6)
 - Regional Offices (6)
 - Headquarters (1)
 - Total (13)
- Those who wished to participate were interviewed via phone
- Response Rate
 - Science Centers 66.6% (4)
 - Regional Offices 66.6 % (4)
 - Headquarters 0 % (0)
 - Total 61% (8)

Results



Greatest hiring needs for the agency

- Population dynamics, stock assessment and other quantitative scientists
- Economists
- Social scientists
- Also mentioned:
 - People with broad biology skill sets
 - ESA trained individuals
 - Statisticians
 - Data management
 - Information technology



Changing needs in the past five years

- Additional Region
 - Pacific Islands
- Overall need less acute
 - Funding
 - Experienced hires
 - Normal ebb and flow
- Increased Need for:
 - Social scientists
 - Economists
 - Anthropologists
 - Ecosystem modelers
 - Outreach positions



Photo by Hussain Isa

How has the pool of applicants changed?

Larger Pool

- More interest in working for the federal government
- State agencies cutting back

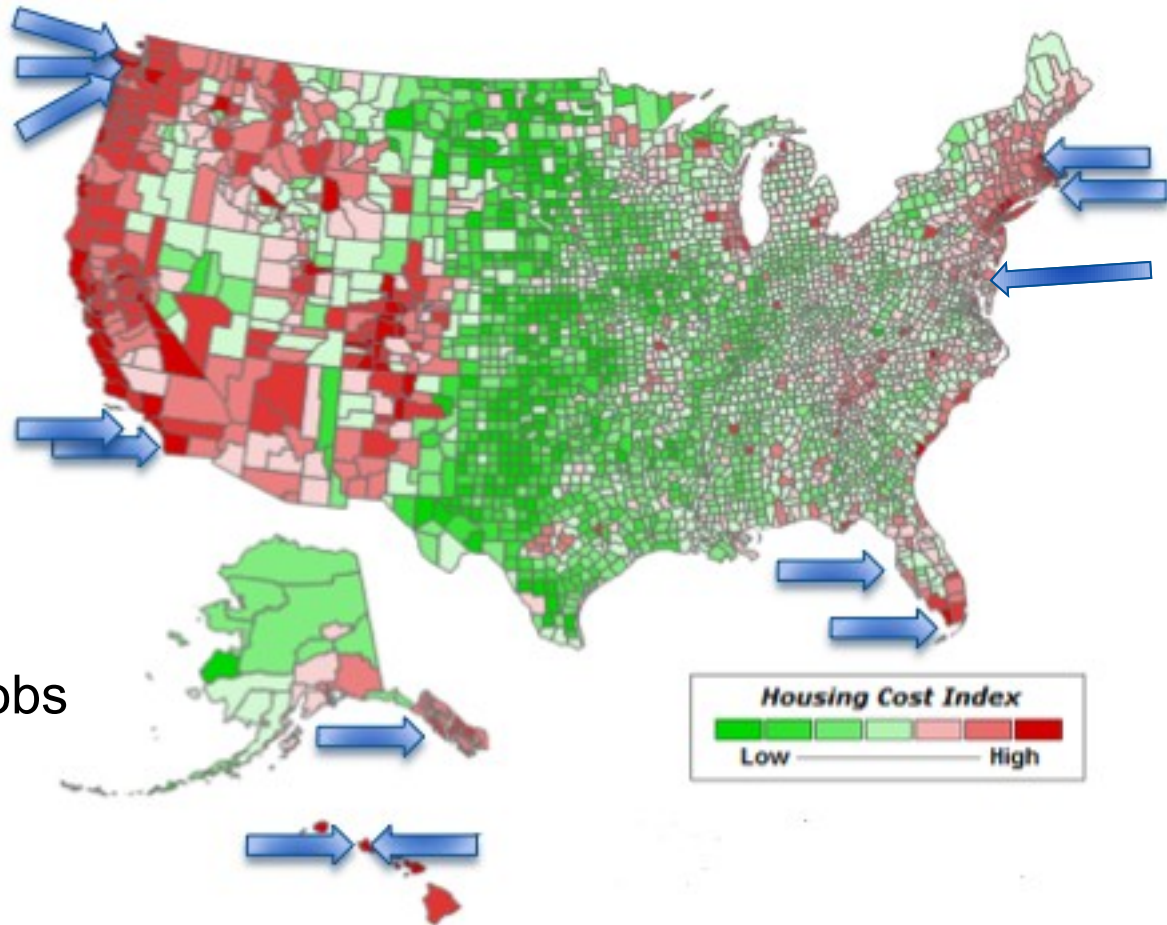
Smaller Pool

- People shifting more towards policy
- People becoming too specialized
- Demand for people with specific skill sets has increased

Pool Unchanged

Location, Location, Location

- Cost of living
 - West coast
 - Hawaii
- Reputation of location
- Amenities of location
- Ability for family to get jobs



Satisfaction with and competency of recent hires

- Overall satisfaction and perceived competency is the same or has increased

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Why?

- System filters out “less qualified”
- People hired to fit specific, advertised needs

Skills needing improvement in new hires

- Communication skills

- Writing
- Communicating importance of work
- Public interaction

- Experience

- Execution of school skills
- Judgment
- Political sensitivities



Conclusions

- Hiring needs are consistent with previous studies
 - Population dynamics biologists
 - Sociologists/Anthropologists
 - Economists
- A shortage of applicants continues for highly quantitative positions
- Overall, NMFS personnel are satisfied with their hires
- Need for employees in policy and science arenas with:
 - Experience
 - Ability to work and communicate with the public

Questions?

