



**SU ADVANCE**

**The Inclusive, Connective Corridor: Social Networks  
and the ADVANCEment of Female STEM Faculty**

# **Finding Mentors in a Networked World**

## **Graduate School Presentation**

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# Today's Agenda

1. Define mentoring and understand why it is important.
2. Understand rationale and conceptual background for model
3. A brief look at social and developmental networks
  - a) Network building
4. Overview of the mentoring model
5. A closer look at 4 aspects
  - a) Mentor roles and role distribution
  - b) Active negotiation
  - c) Career planning
  - d) Goal setting with networks in mind



# “Mentoring” or Professional Development

- Provision of career & technical guidance and psycho-social support for professional development.
- Why? Robust evidence that mentoring impacts:
  - Career Satisfaction
  - Career Outcomes
  - Intent to Stay
  - Productivity

(De Janasz & Sullivan, 2004;  
Parise @ Forret, 2007)



# Consider

- Graduate student enculturation focuses on 3 areas:
  - working relationships;
  - integration and understanding of expectations; and
  - knowledge and skills. (Weidman, Twale and Stein, 2001 p.643)
- Doctoral advisors play a central and often singular role in fulfilling advice and information needs of their students.

- Today, one person cannot meet all information and advice needs. (Antony, 2002; Lazer & Mergel, 2011; Thiry, et al., 2013)
- Multiple mentor approach is recommended for all and found to be particularly effective for women and other URG. (Johnson, 2002)
- Network **building** drives career success. (Blickle, et al., 2008)
- One all knowing wizard is no longer effective in today's information world.



## Wizard of Oz Phenomenon



Notes:

Wizard of Oz – Following the yellow brick road to the all knowing being only to find out that it is within your power and your network (Dorothy, Toto, Tin Man, Scarecrow, Lion and Glenda the Good Witch). Look within yourself and your network for your mentoring needs not for a wizard with a cloak of a presumed expansive set of expertise and other characteristics to “be the one and all” for you.

**Academic ADVISORS** are still critical in your development but not the only source of support for your development.

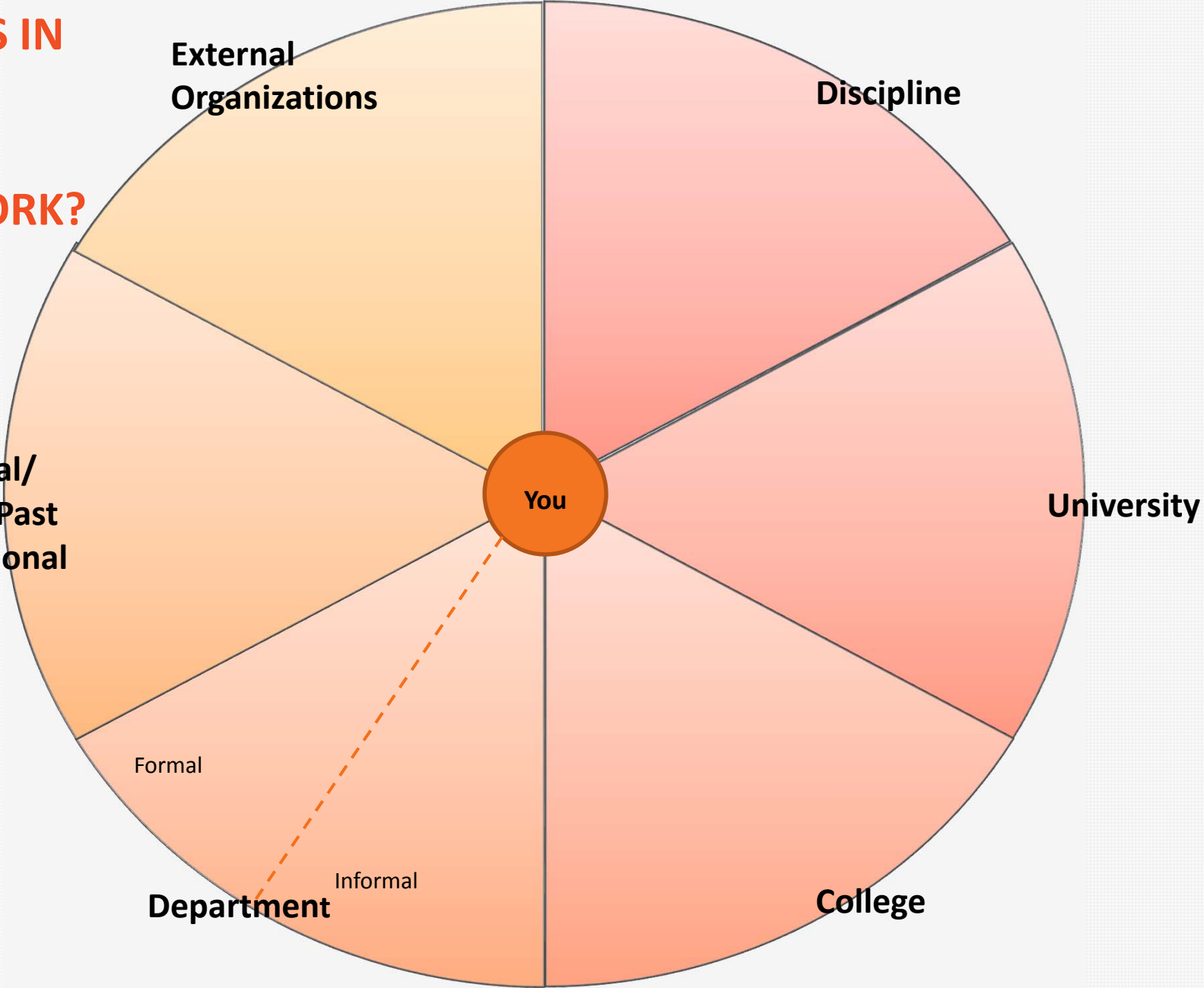


# Conceptual Background

- **Social Network:**
  - is made up of individuals and organizations with career related and/or personal links/relationships with one another. This perspective looks at how a group members interact with one another and the benefits or consequences of such interactions or lack.
- **Developmental Network Model:**
  - consists of multiple, simultaneous, social relationships that foster career development and personal growth (Higgins and Kram, 2008; Molloy, 2005; & Blickle, et al., 2009).

(Applying social network theory to mentoring)

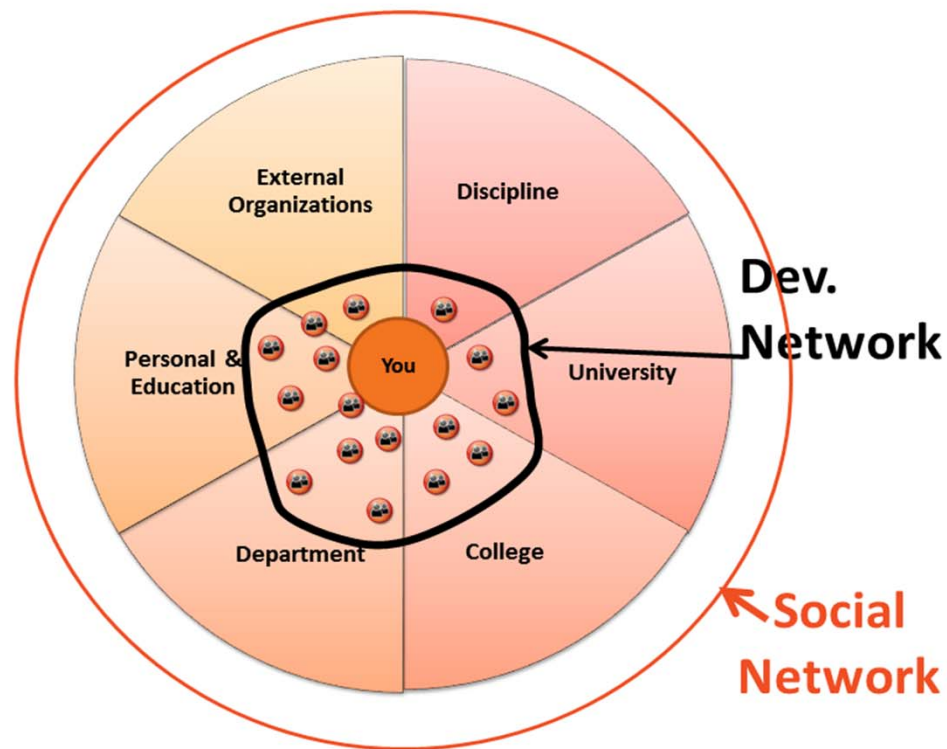
**WHO IS IN  
YOUR  
SOCIAL  
NETWORK?**





# Developmental Network is a Subset of Your Social Network

The specific makeup (shape) of a developmental network will change over time.





# Building Your Network

- **Network building behavior:**
  - improves availability of new information,
  - increases system knowledge at the work place,
  - provides access to resources and support by others, and
  - stimulates personal initiative, i.e., behaviors that go beyond formal work requirements.
- **Networking is a social skill and just one of the strategies used to build your network.**

(Blickle, 2009; Ferris et al., 2007; Morrison, 2002)

# Network for Success -- Diversify

- On-campus: depart, college, graduate school
- Off campus: academy, industry, NGOs, Gov

## Systems Diversity



- Colleagues at different stages.
- Up & Down Ladder
- Peers, & faculty
- Resource folks
- Leadership

## Positional Diversity



- Gender, race, age, etc.
- Education & cultural background
- Disciplines

## Demographic Diversity

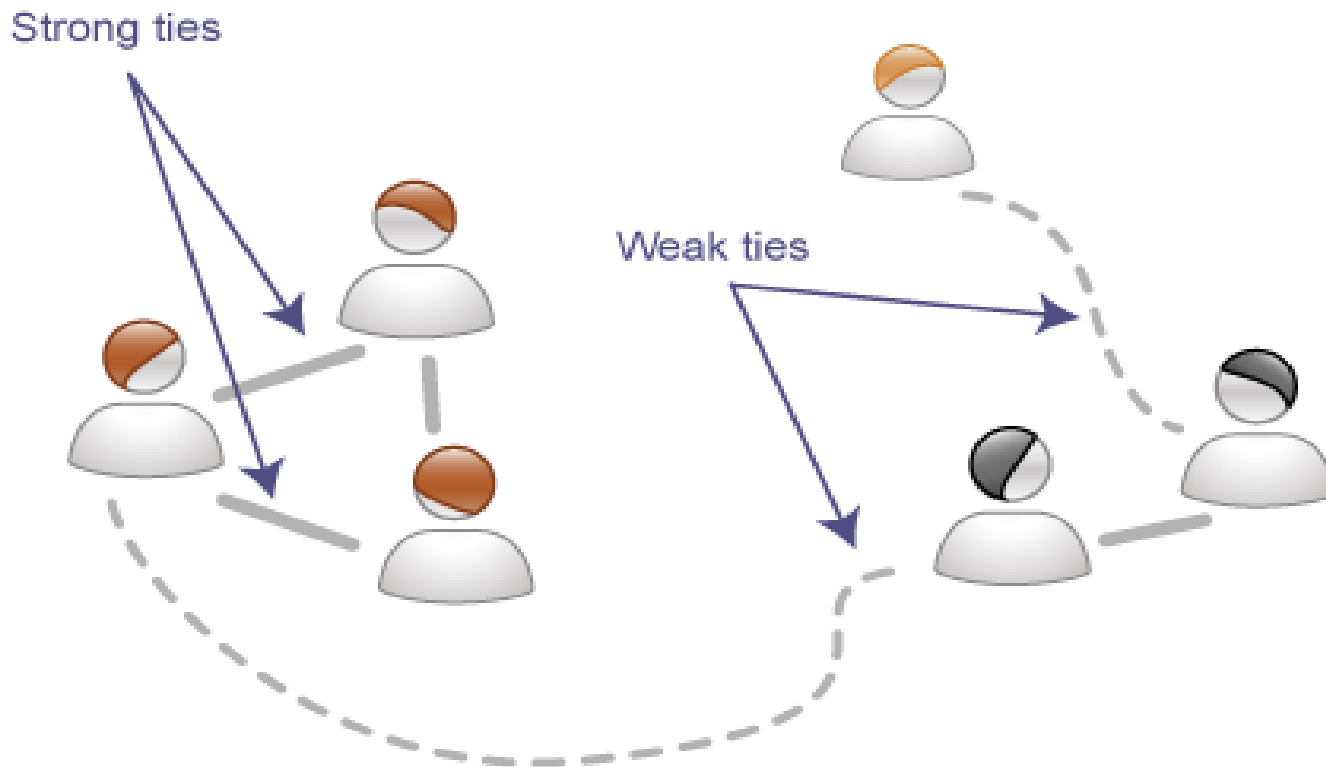


- Mentors serving different roles
- Mix of strong & weak ties
- Short and long term

## Functional Diversity



# Importance of Close and Casual Relationship Ties



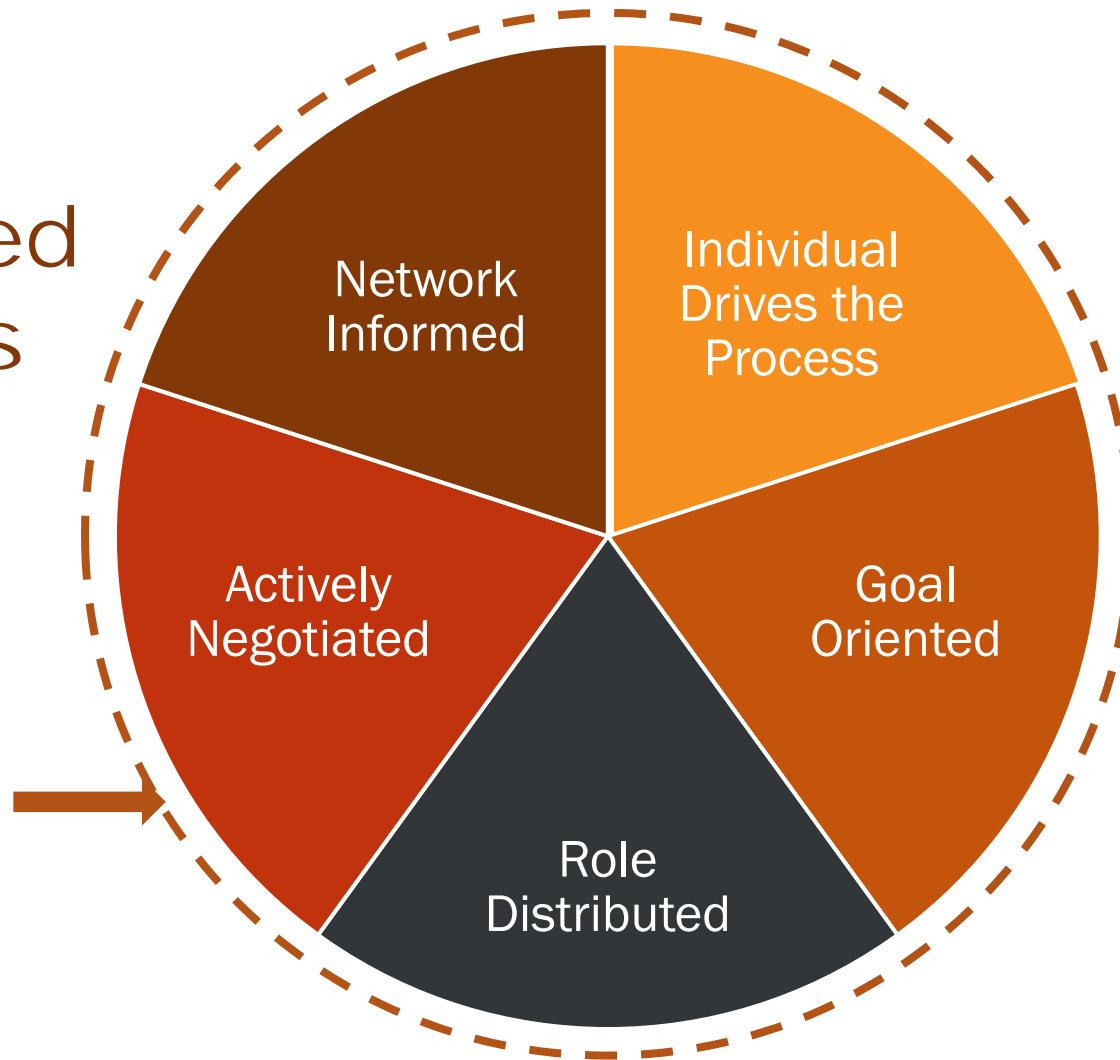
Picture courtesy of I. Mergel



# Notes

- **Baking a pie example:** Orange hair group has everything needed to make a pie except apples and an oven. Now the black hair group owns an apple farm. Orange hair uses one of their members weak ties to the apple farmers to get the final ingredient and finds out (novel information) that one of the farmers knows someone (yellow hair) with an oven who volunteers to connect yellow hair with the orange hair group. And that is how the best apple pie is made.
- **Strength of ties** is defined by the degree of personal closeness, mutual exchange, and frequency of communication as described by Granovetter (1973,1983). **Strong ties** are often intimate, reciprocal and interdependent in nature resulting in motivation to help each other and a high level of trust (Crona and Bodin 2006; Cross and Parker 2004; Newman and Dale 2004). However, a long established network with only strong, centralized ties, as stated previously, also runs the risk of sharing redundant information (Prell, 2008). Conversely, varied information and new concepts are more likely to be generated from weak ties. **Weak ties** are characterized by less give and take and infrequent communication but offer more novel information and different resources. They may be social relationships that were once established but are no longer used as often as those connections in close proximity (Granovetter, 1973, 1983). Weak connections can be reactivated when needed. Weak relationship ties in the extended social network can provide access to people who can bridge a **structural hole** or become conduits to necessary resources that are not otherwise available in the existing network.

Developmental  
Network Model  
Six  
Integrated  
Elements



Surrounded by  
Institutional  
Support




## MENTORING WORKS BEST WHEN:

- **Individuals drive the process.** Informal mentoring is the most meaningful, comfortable, and enduring (Johnson, 2002). Self-initiated mentoring is a better predictor of career success than participation in an assigned mentoring relationship (Blickle, et al., 2008). Female faculty in STEM at Syracuse University attribute more importance to informal mentoring than male STEM faculty do when assessing factors they believe are connected to career success (Brandes, et al., 2013).
- **It is goal oriented.** Mentoring relationships are most productive when the goal is clear (Latimer, et al., 2012) and when the goals are aligned with critical developmental domains important to all faculty (Yun and Sorcinelli, 2008; Goodwin, 2013). Goals may or may not be derived from key career transitions, such as achieving tenure or promotion.
- **Role Distributed/There are multiple kinds of support.** There are at least three roles filled by successful mentors. Mentors are at once advisors, coaches, and sponsors (Dinolfo & Nugent, 2010), but mentors commonly cannot serve all roles well. In addition, many faculty turn to a mentor for interpersonal support which may result in conflicts of interest if mentors are then in a capacity to review the mentee's performance. The mentor role is better served by multiple individuals. See especially Section 1 for more information about these roles.
- **The mentoring relationship is open to negotiation.** The concept of "mentoring", that is, what constitutes a helpful developmental interaction, is culturally specific and should be negotiated by individual pairs (Harley, 2005). However, there are some "best practices" for negotiating how that interaction can and should evolve over time in the academic context (Luz, 2011; see Sections 2 and 3) and how the interaction can be respectful of gender and cultural differences (e.g. Thomas, 2001; see especially Section 5).
- **Mentors exist in a defined, well managed network.** Mentoring consortia, which can include individuals from across the University, from multiple academic institutions, and those outside of the academy contribute to productivity (Girves et al, 2005). The mix of strong and weak ties in a developmental network, as well as the density and diversity of the network itself determine the kind of information and support available (Higgins and Kram, 2001). Ensuring a developmental network has grown to meet individual needs is aided by the perspective of a developmental network coach (although one can conduct this assessment for oneself). Information about dimensions of developmental networks is in Section 1; more detail on the connection between social network theory and developmental networks is in Section 6.
- **It is acknowledged as a valuable and important activity within the institution.** All faculty and academic leaders have an important role to play in supporting a culture of continued professional development. While mentoring is highly individualized on one hand, it is a communal responsibility on the other. Perceived support for mentoring initiatives by organizational leadership - for example by department chairs - plays a significant role in a mentor's satisfaction with the activity (Parise & Forret, 2007). Support can include engaging mentors in program development, arranging for training on being a good mentor, and/or public recognition of the mentor's contribution to a unit's goals through mentoring. Ideas for supporting mentoring are in Section 4.



# Roles



Role  
Distributed

In your developmental network you should have people who can operate in different ways.

- **Navigators:** breadth of knowledge
- **Sponsors:** elevate your status and advocate
- **Coach:** skill building you can't receive in your traditional setting
- **Confidant:** trustworthy sounding board and motivator





# Actively Negotiated

- Goals and anticipated outcome
- Role
- Time: timeframe, meeting times
- Discussion about cross-mentoring differences if any
- Confidentiality and Conflicts of Interest
- A graceful exit strategy





# Making Developmental Networks Work For You

Career Planning/Mapping while in  
Doctoral Program  
Setting Goals



Career  
Plan &  
Goal  
Focused

# Four Paths to Map\*





## Notes

- **Subject & Technical Knowledge** – profession centered competencies
- **Professional Development** – professional & leadership competencies that lead to success grounded in a clear understanding of self
- **Thriving Personally** – Resilience: Personal care, stress reduction, optimism, nurturing relationships, prioritizing
- **Creating Your Own Good Luck** – being prepared, ready to take advantage of opportunities as they are presented. Presenting yourself well

“Luck is what happens when preparation meets opportunity.”

[Seneca](#) (Roman philosopher, mid-1st century AD)

Two other ways to look at it. SU ADVANCE Developmental Domains or NPA Core Competencies



# PLANNING

- Know where you are; Current state
- Performance requirements
- Your strengths
- Understanding priorities (personal, current program and next stage)
- Where you want to be; Desired state
- **Set goals**



# Strengths & Challenges

- Strength-based strategies for success.
  - Your strengths are what will most likely fuel your success.
  - Understand and leverage your strengths.
- Self-Assessment Resources
  - Recognizing and Leveraging Your Strengths Inventory
  - NPA Core Competency Self-Assessment Checklist.  
Can be found at <http://myidp.sciencecareers.org>
  - Guided exploration at [www.suwise.syr.edu](http://www.suwise.syr.edu) on the Publications page



# SMART GOALS

**S** = Specific and strategic

**M** = Measurable

**A** = Achievable (& challenging)

**R** = Realistic & Results focused

**T** = Time bound

([http://myidp.sciencecareers.org/Project Goals/QuickTips](http://myidp.sciencecareers.org/Project%20Goals/QuickTips))



# Develop a SMART Goal Together

By the end of the fall semester, I will add 3 new contacts to my social network who have the potential to be a part of my developmental network for the purpose of \_\_\_\_\_  
(Goal topic)

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Ex: Learning to effectively communicate orally (formally and informally) about my research/scholarship.

*Use this goal to create/fill in the next form*



# Connecting Your Network to Your Goal

Developing	Supporting	Leading
<b>Developmental Network Plan</b>		
Name: _____		Date: _____
Goal # ____: (State of Being)		
Action Plan: (objectives/strategies, benchmarks and target dates)		
How can you leverage your personal strengths to achieve this plan?		
_____		
Developmental Network for Goal # ____		
<b>Navigator</b>	<b>Sponsor</b>	
Strong Ties: _____	Strong Ties: _____	
Weak Ties: _____	Weak Ties: _____	
<b>Coach</b>	<b>Confidant</b>	
Strong Ties: _____	Strong Ties: _____	
Weak Ties: _____	Weak Ties: _____	

**You**



# Role Play

- Break into pairs, Use form just completed.
- One individual will be a “navigator” and the other a mentee. Then switch half-way
- Mentee will ask the navigator who is a casual connection for help with planning a goal (common goal) and finding a strong set of mentors to address it.
- Switch roles

**Potential Discussion Questions:**

What was the approach you used to make that connection with a weak tie?

How did it feel to ask for help?

Was the focus of the discussion specific enough?

Did you gain new insights into how to address the goal?

When discussing possible developmental network mentors – what were your thoughts? Surprises?

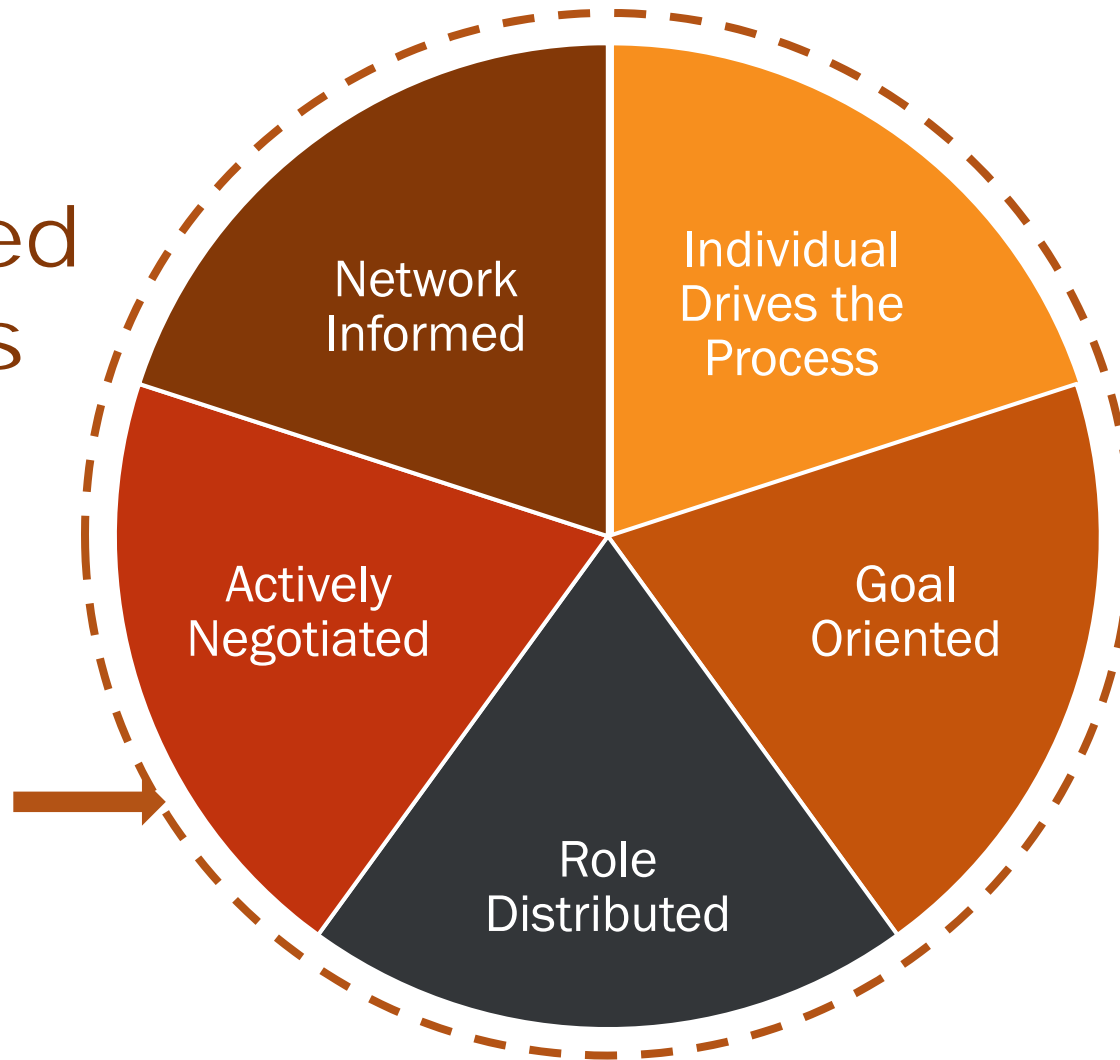
If someone said no, what is the next step?



# What's Available on Web

- Link to further Resources at <http://suadvance.syr.edu>
  - Section 2: Developing – Getting the Mentoring You Need
  - Section 3: Supporting as a Navigator, Sponsor, etc.
  - Section 5: Sensitivity to Working Across Differences.
  - Section 6: More on Social Network Theory and Developmental Networks
- [www.suwise.syr.edu](http://www.suwise.syr.edu)
- <http://myidp.sciencecareers.org>
- <http://www.nationalpostdoc.org>

Developmental  
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# ANY Questions?

# Thank you!



# SU ADVANCE


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