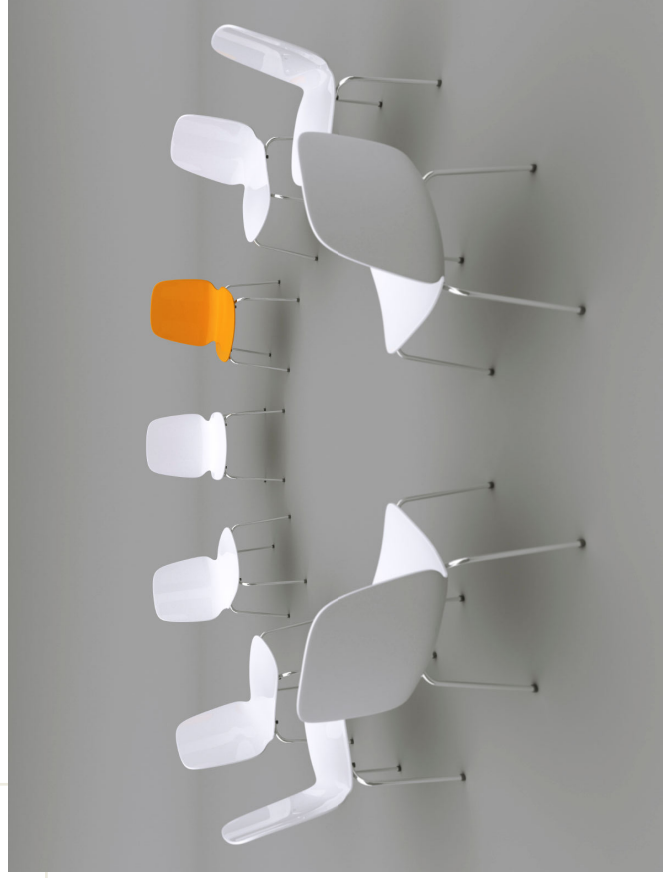


Transport Utility Case Study: Succession Planning and Organisational Design



April 2008

Overview

- About Optimice and Transport Utility
- Situation Overview
- Key Findings
 - Knowledge and Information Flow Patterns
 - Succession Planning Analysis
 - Organisational Redesign
- Benefits Summary
- Appendix – ONA fundamentals



About Optimice and Transport Utility

Optimice Pty Ltd

- Founded in 2007 to assist clients in optimising their business relationships. Specialisation in organisational and value network analysis.
- Developer of “The Partnership Scorecard” used for monitoring and managing critical relationships.
- Developer of ONA Surveys: a survey tool purpose designed for conducting organisational/social network analyses

Transport Utility

- An Australian organisation that delivers metropolitan and rural passenger rail services throughout its State .
- The staff profile is one of an ageing workforce and imminent loss of staff through retirement.

Situation Overview

Challenge

Transport planning is a complex task. Unforeseen disruptions to planned schedules are commonplace. The ability to amend schedules with minimal disruption to the traveling public takes years of experience. Like most mature organisations, the ageing workforce brought into focus critical succession planning and the rapid up-skilling of junior staff. The introduction of new IT systems was also changing the nature of the department, with a reduction in the requirement for lower skilled clerical and administrative positions and a movement toward self managed teams. A proposed re-organisation was challenged by what is now “core” and what functions could be released to a shared service function

The Role of Network Analysis

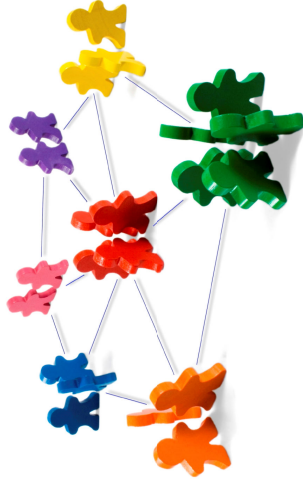
ONA was identified as the best approach for identifying the true dependency network within the department. Specific tasks included:

- Mapping the dependency network to identify the most critical staff.
- Identify succession issues for the identified critical staff.
- Identify mentoring strategies for up-skilling high potential staff.
- Assess support groups potential or otherwise as a shared service

The initial analysis focused on succession planning issues. A second analysis was undertaken to look at business unit interactions with internal support groups.

Knowledge and Information Flow Patterns

- Knowledge flows show how tacit or non-codifiable knowledge is shared through personal relationships (Advice Network).
- Information flow patterns identify the relative efficiency of information flows around the organisation.
- Analytical technique used is Organisational Network Analysis (ONA) – See Appendix for details.



Experience attributes of staff were collected

The screenshot shows a Microsoft Internet Explorer browser window displaying a survey editor. The address bar shows the URL: <http://www.onasurveys.com/editrespondent.php?SurveyID=112>. The browser's menu bar includes File, Edit, View, Favorites, Tools, and Help. The address bar also shows the address: <http://www.onasurveys.com/editrespondent.php?SurveyID=112>. The browser's toolbar includes Back, Forward, Stop, Refresh, Home, Search, Favorites, and a search box. The browser's status bar shows "Done".

The main content area of the browser displays the survey editor interface. At the top left, it says "Welcome Railcorp" and "logout". The main heading is "OPTIMIZE" with the tagline "optimising business relationships". Below this is a navigation menu with links: HOME, SURVEY MANAGER, SUBSCRIPTIONS, HELP, and FORUM. A "Survey manager > Edit Survey" button is visible. The "Steps" section lists: 1. About the Survey, 2. About respondents (highlighted), 3. Respondent Lists, and 4. About relationships. A note says "Click to jump between steps." Below this is a text box: "This section contains questions for the each respondent (the 'nodes') about themselves." The main content area contains three questions:

1. How long have you worked in Train Planning?*
2. How long have you worked in the rail industry?*
3. What Age Group are you in?*

Each question has radio button options and an "Edit" button. Question 1 options: Less than 1 year, Between 1 and 3 years, Between 3 and 10 years, More than 10 years. Question 2 options: Less than 1 year, Between 1 and 5 years, Between 5 and 10 years, Between 10 and 20 years, Between 20 and 30 years, More than 30 years. Question 3 options: Less than 1 year, Between 1 and 3 years, Between 3 and 10 years, More than 10 years. The browser's status bar shows "Done".

Staff were surveyed on their dependency relationships

Address <http://www.onasurveys.com/editrelationship.php?SurveyID=112>

Survey manager > Edit Survey

HOME
SURVEY MANAGER
SUBSCRIPTIONS
HELP
FORUM

Steps: 1. About the Survey 2. About respondents 3. Respondent Lists 4. About relationships

Click to jump between steps.

This section contain questions respondents will answer regarding their relationships.

1. Please identify those people that provide advice to you and rank the importance of this advice*

- Critical
- Important
- Moderate
- Not Applicable

2. Please select those people who you go to for information in helping you do your job*

- Critical
- Important
- Moderate
- Not Applicable

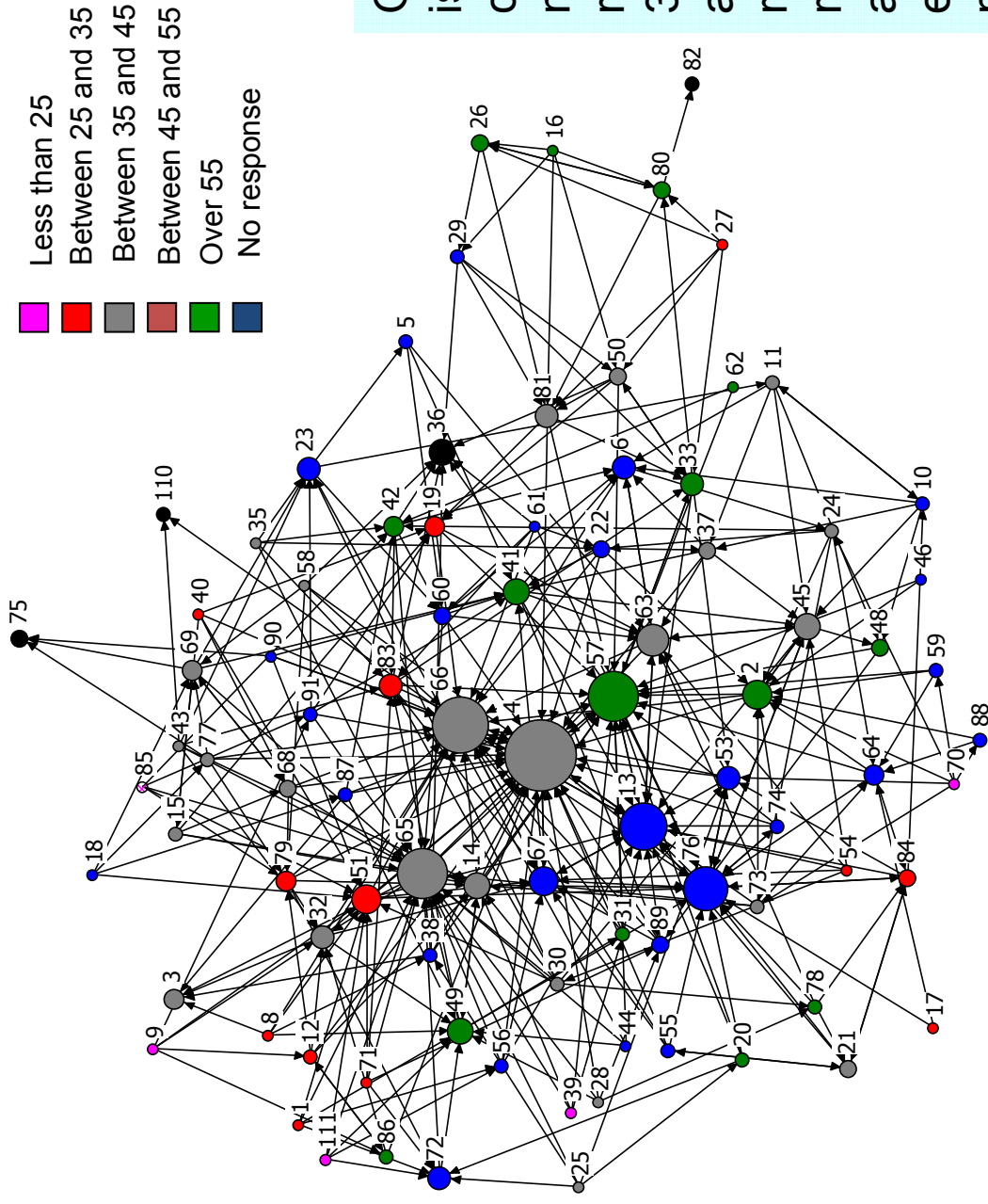
3. Please select those groups who provide information to you in performing your job*

- Critical
- Important
- Moderate
- Not Applicable

4. Please select those systems that you directly access information from and rank their importance*

- Critical

Objective: Succession Planning - Advice Network – by Age



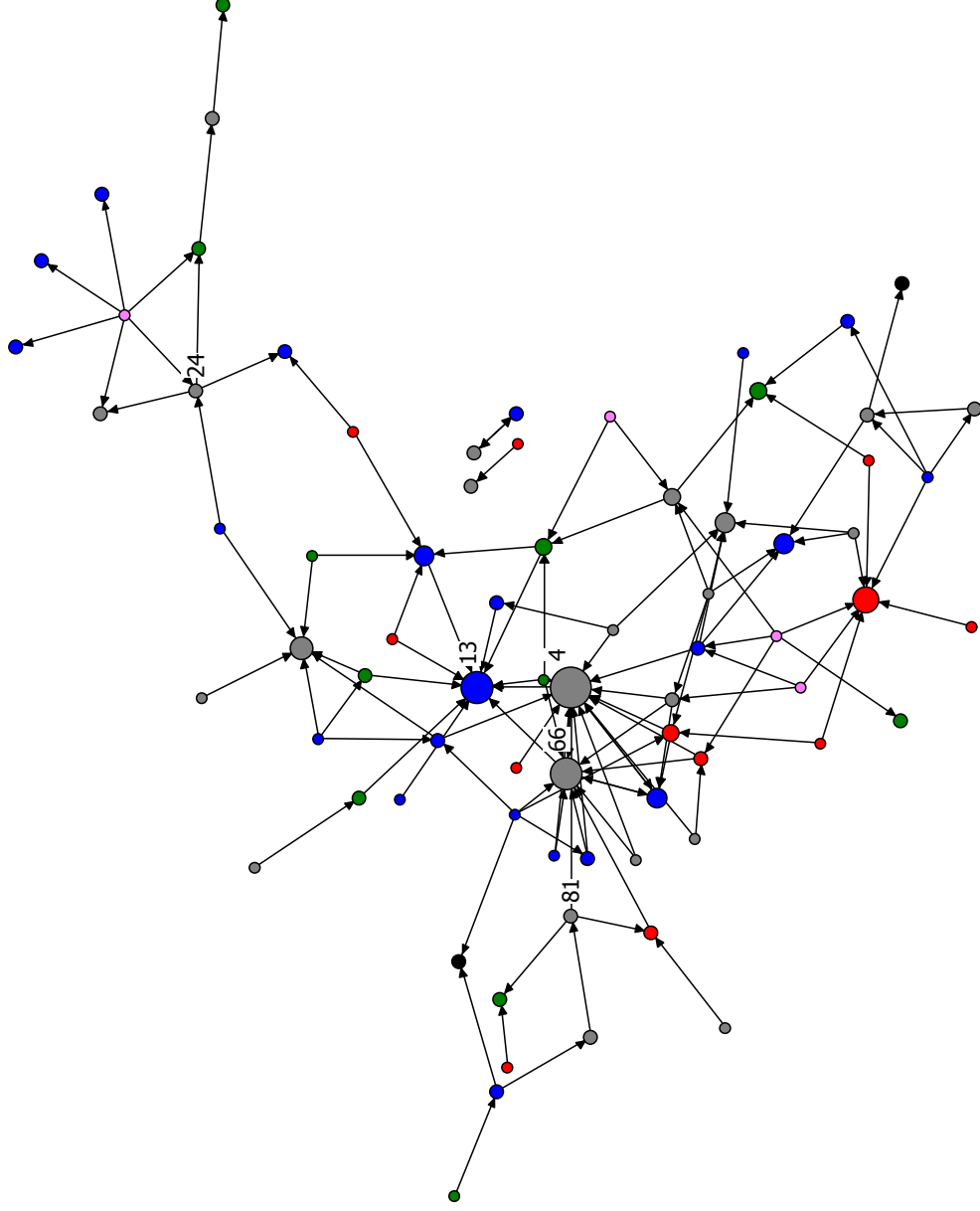
Overall the network is relatively well connected. The 2 most critical resources are in the 35 – 45 age bracket and therefore not at risk of loss to retirement. Node 57 and to a lesser extent 41 and 49 may be at risk of loss to retirement.

* Node size reflects number of nominations

optimising business relationships

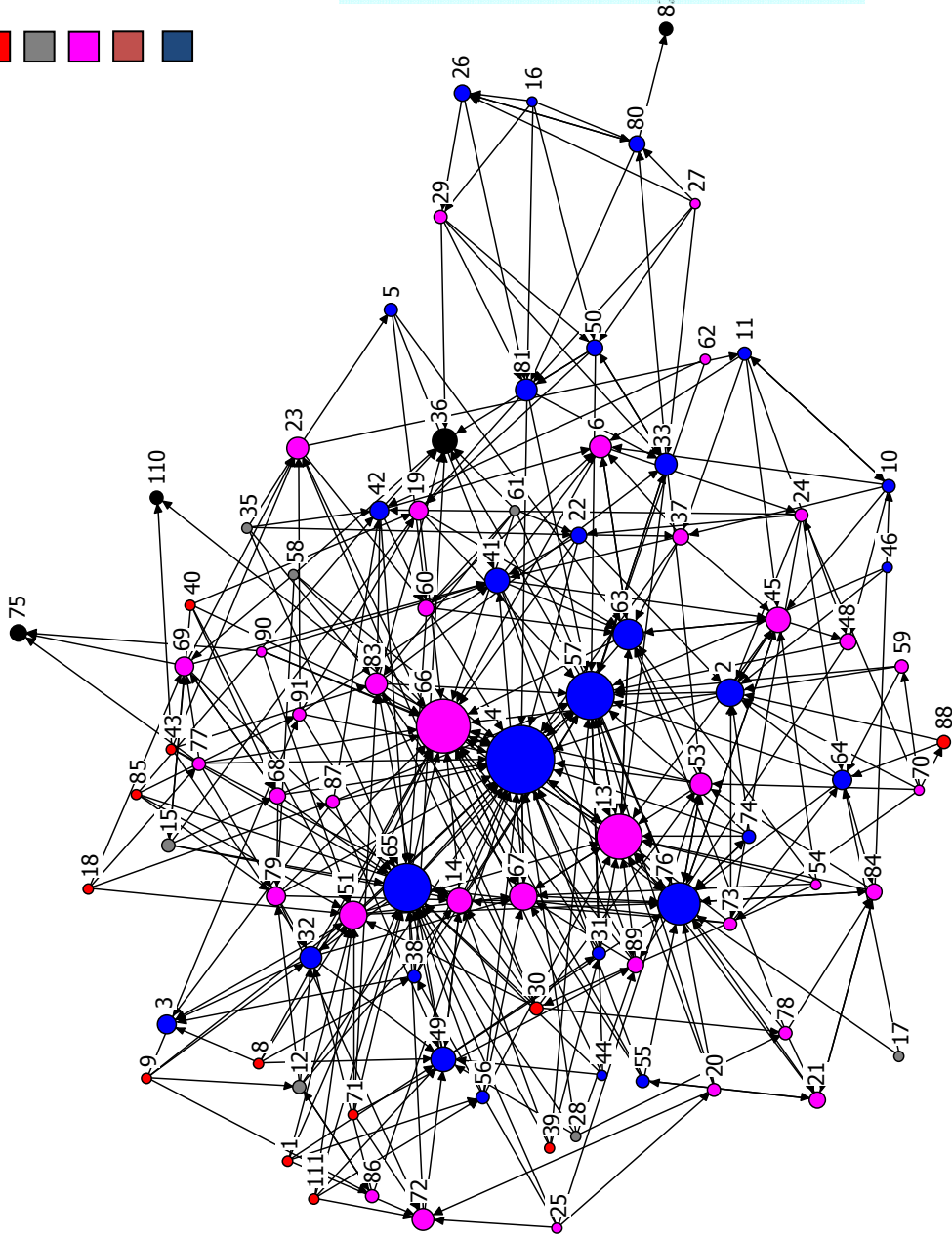
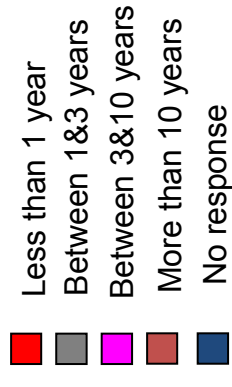
Objective: Succession Planning - Advice Network – by Age

“Who provides *critical* advice to you in helping you do your job”



The “critical” advice network exposes some other potential points of fragility. 24 and 81 are brokering small clusters.

Objective: Succession Planning - Advice Network – by time in Transport Planning

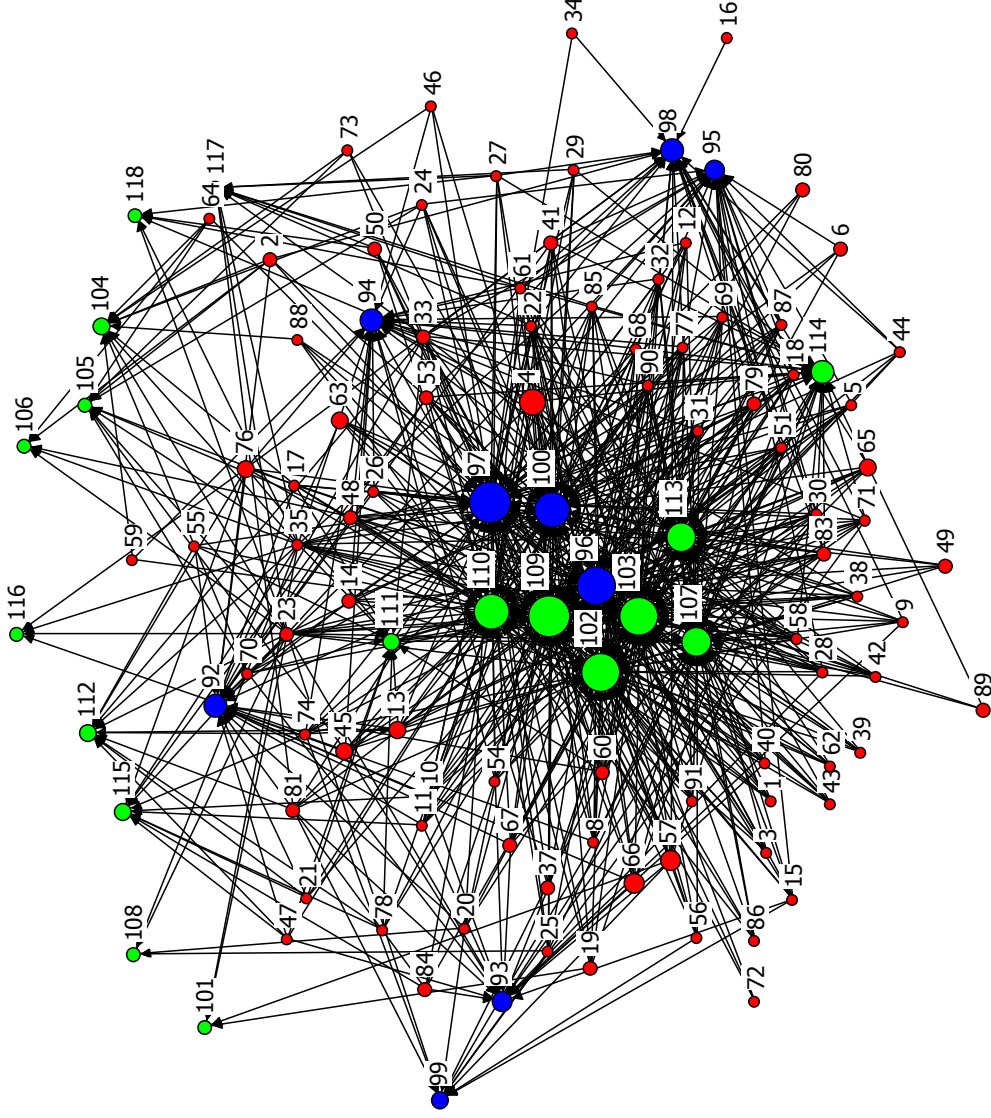


The data identifies that the Transport Planning (TP) network is dominated by longer term staff members. New-comers may be finding it difficult to penetrate the established networks

How can newcomers engage more quickly with the “network”?

Objective: Potential Information Flow Bottlenecks - Groups and Systems

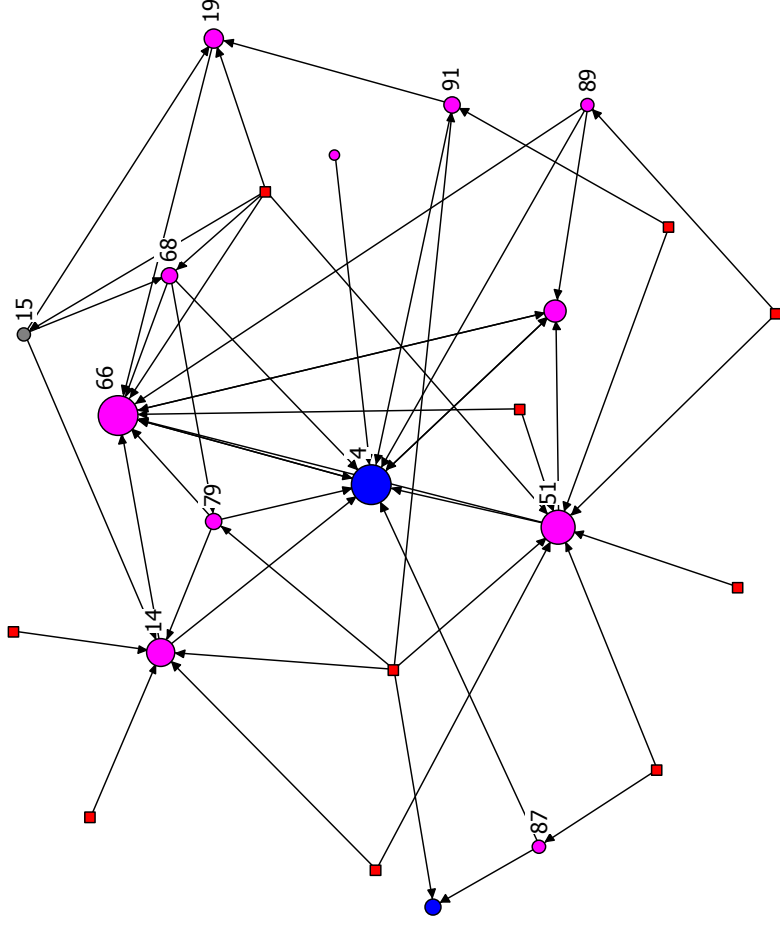
- People
- Groups
- Systems



The data identifies up to 6 critical systems and 3 groups that TP substantially rely on. Direct access to these systems and groups are not overly constrained and therefore not an issue.

Critical advisors are also critical information providers, leading to potential overloading. Can these tasks be separated and redistributed?

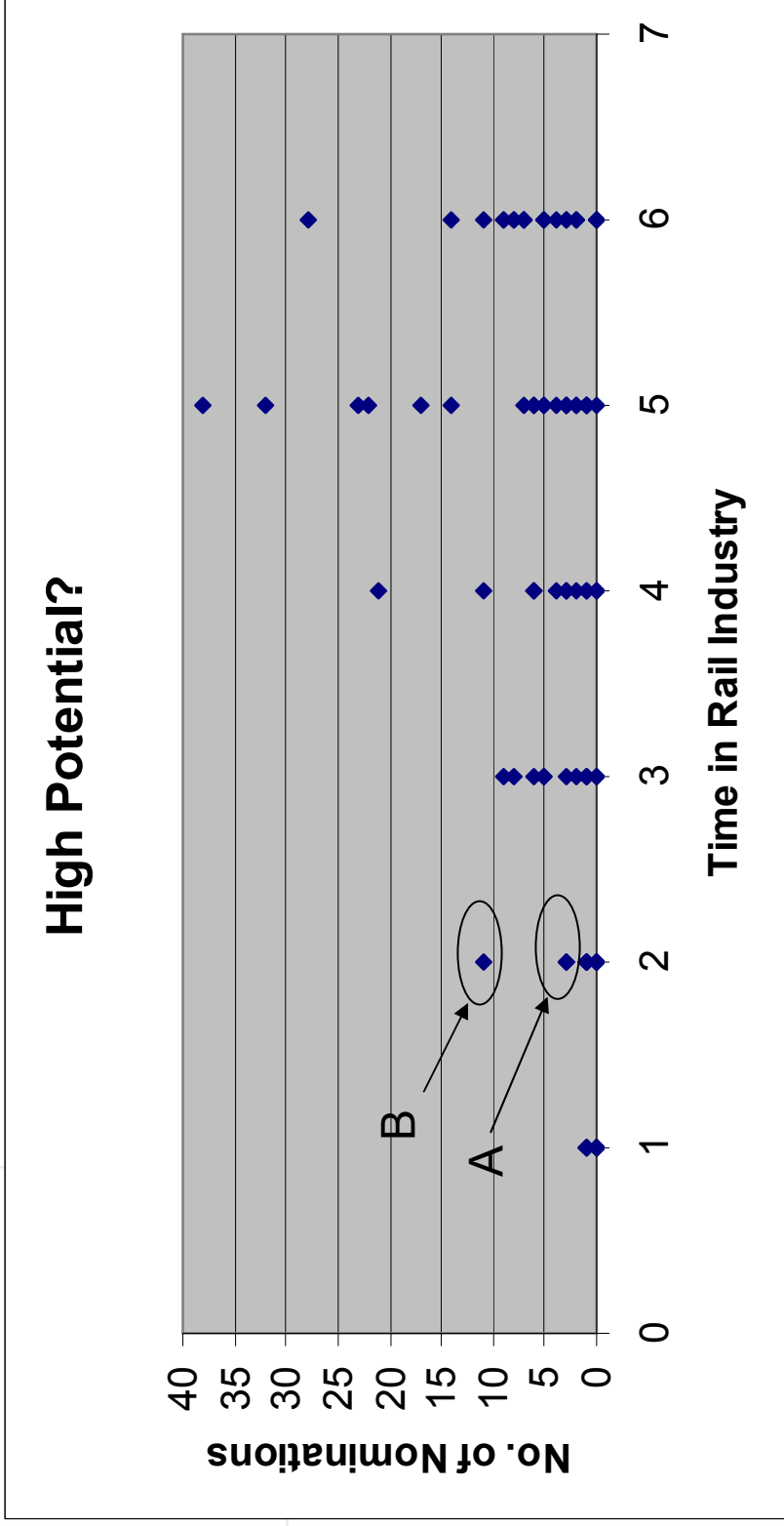
Objective: Rapid Induction - Who Trainees Seek Out (time in TP)



The connection of the trainees into the advice network is limited, with the 10 trainees nominating only 9 advisors, none of whom have more than 10 years transport planning experience. Only node 4 from the most experienced group is less than 2 degrees separated from the trainees.

Faster up-skilling could be facilitated by more direct contact with the most experienced staff

Identifying High Potentials



1 = < 1 year

2 = Between 1 and 5 years

3 = Between 5 and 10 years

4 = Between 10 and 20 years

5 = Between 20 and 30 years

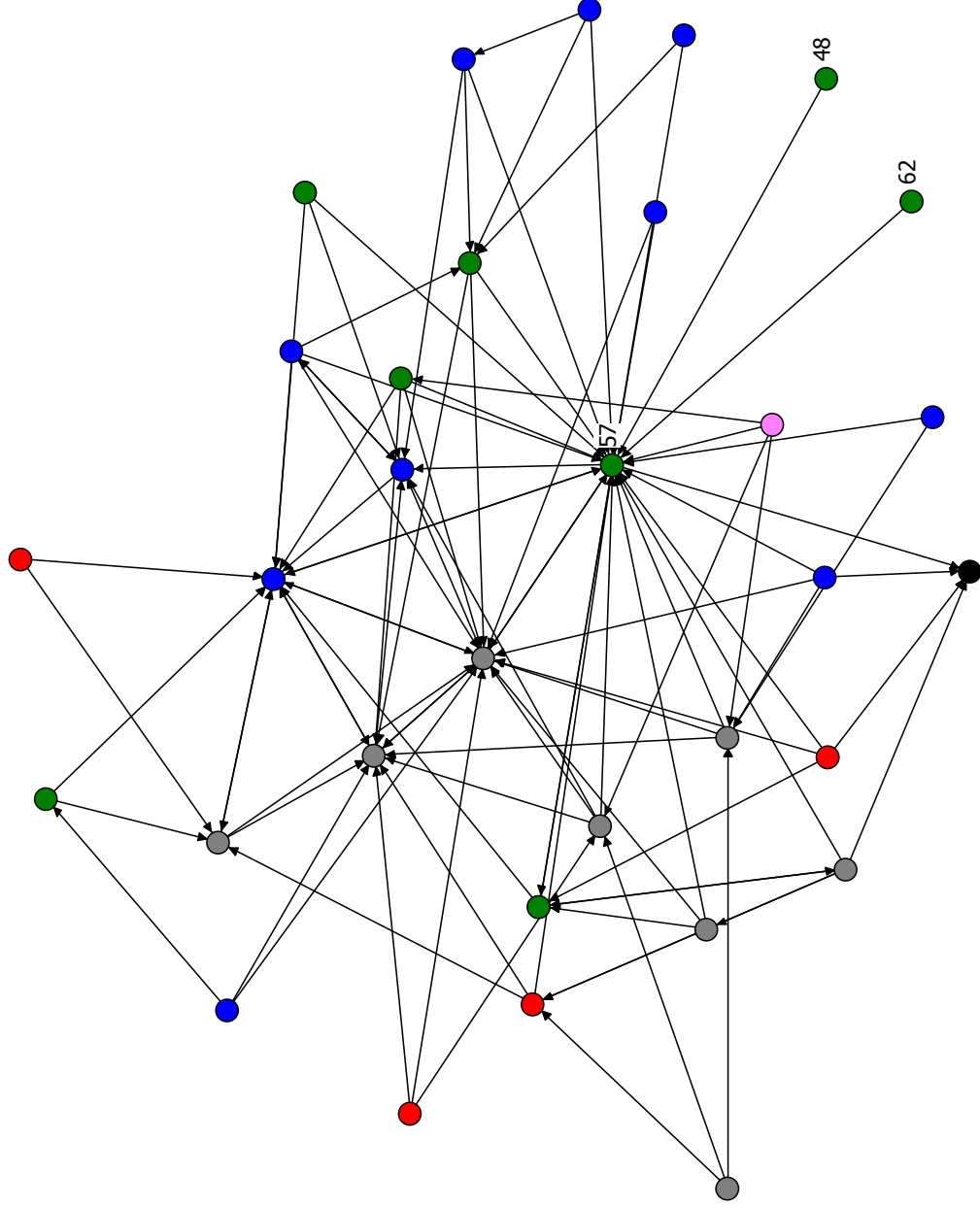
6 = More than 30 years

Perhaps A and B are high potentials?

Less than 5 years in rail industry and in training, yet already sought after to a limited extent.



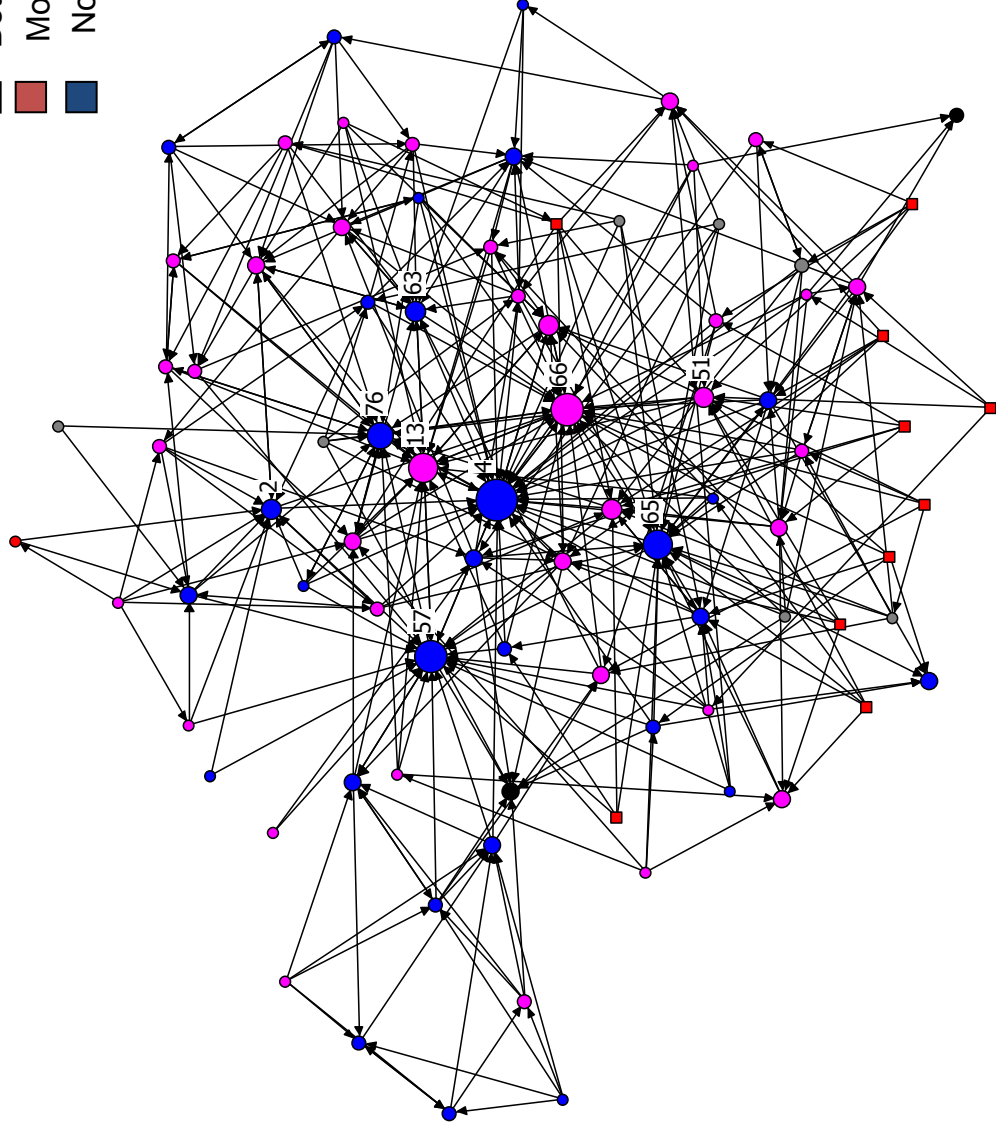
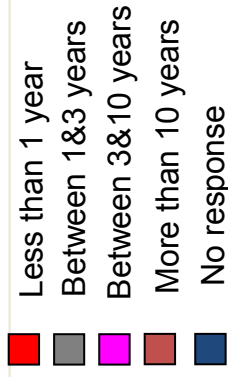
Targeted Succession Planning



- Less than 25
- Between 25 and 35
- Between 35 and 45
- Between 45 and 55
- Over 55
- No response

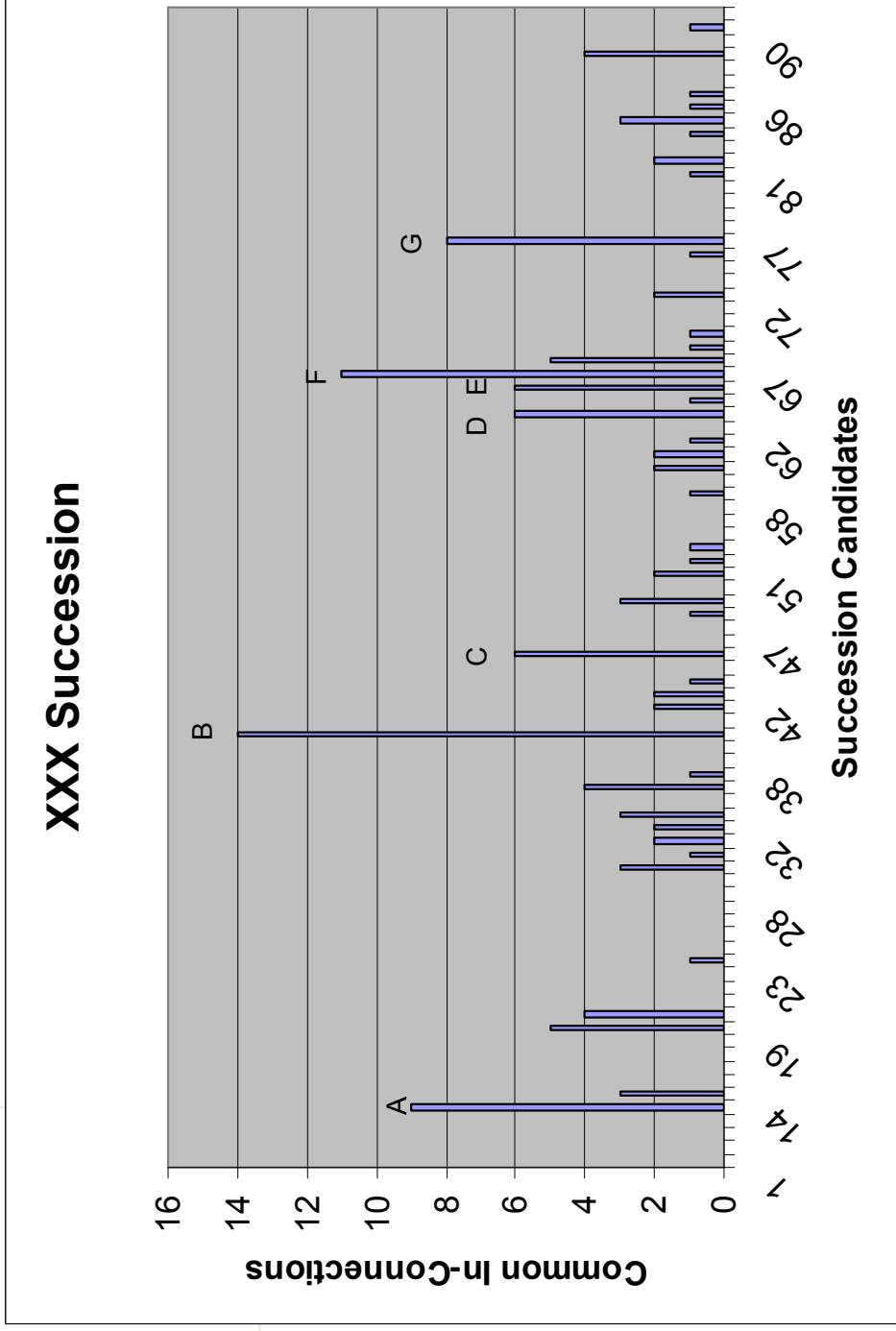
The network is comprehensive enough to cover for the majority of 57's advice links with the exception of 48 and 62 who are also in the more than 55 age bracket.

Identifying Mentors



The data suggests that the identified officers would be the best options for mentoring new staff. Only nodes 66 and 51 have been identified by the trainees as direct advisors. The challenge is to adjust the priorities of these central members to accommodate a mentoring activity.

Individual Succession Plans

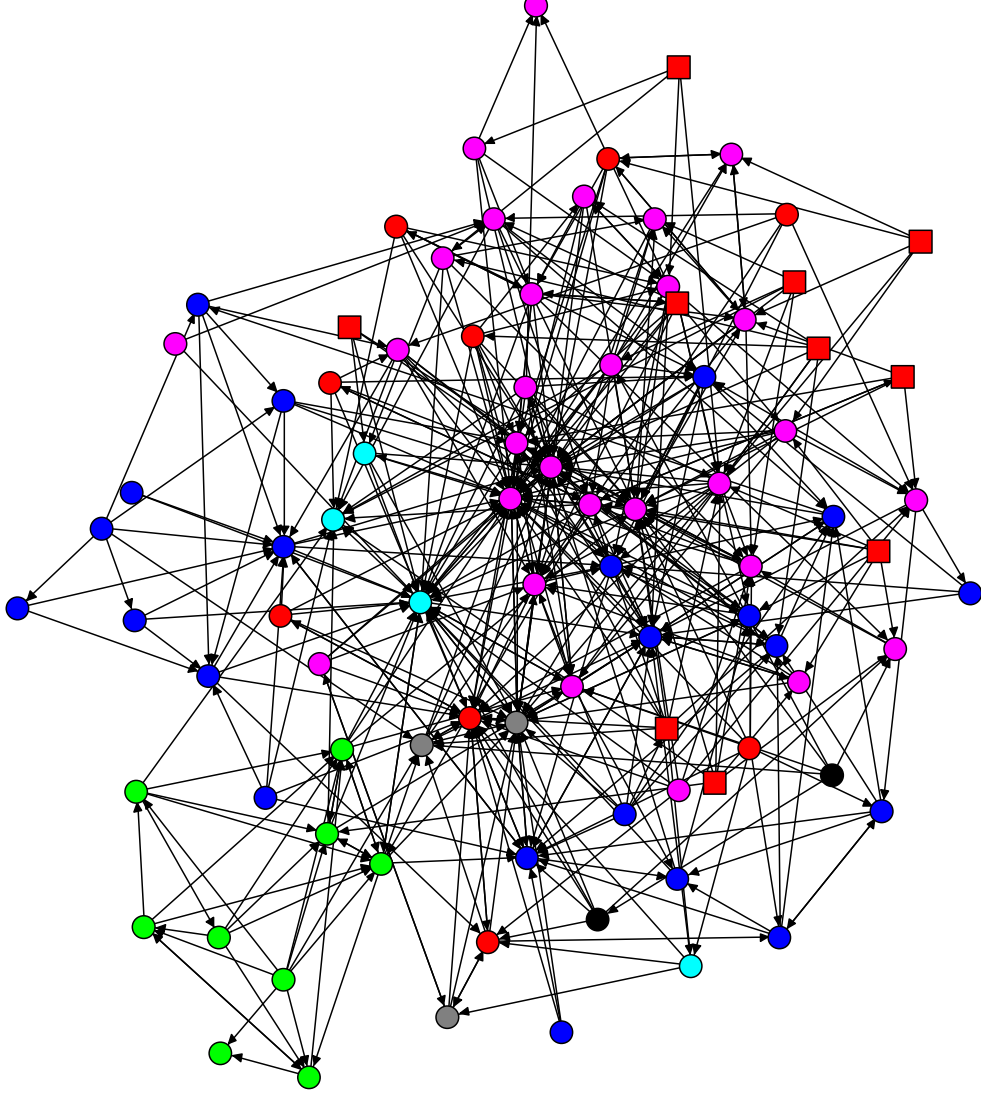


Common “In-connections” identify those that can best “cover” for others in their absence. This can be used as a useful input into succession plans

Organisational Re-Design

Transport Planning Sectional Analysis

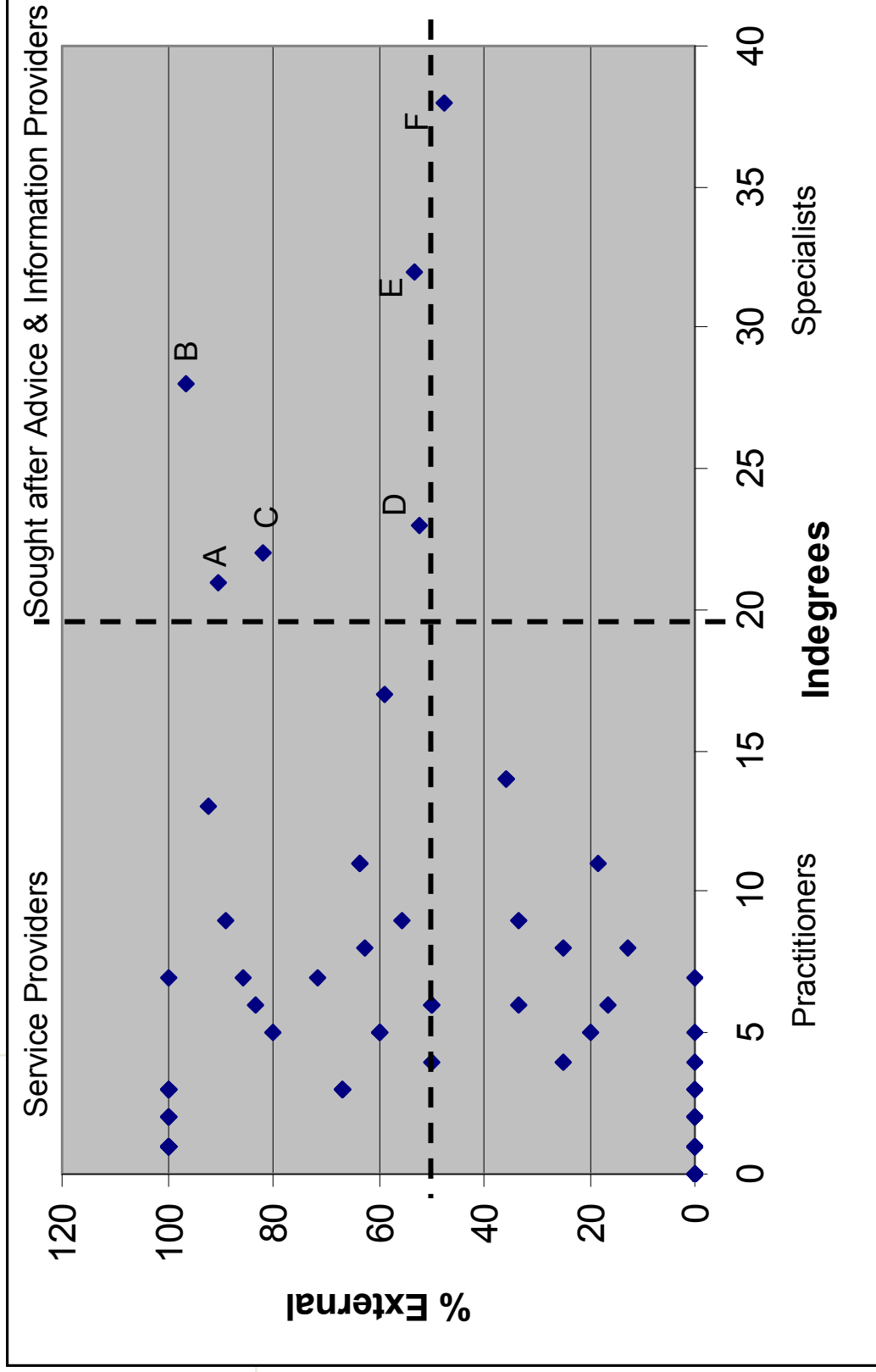
- Business Support
- Operating Timetable
- Timetable production
- Program Delivery
- Operations Analysis
- Graphic Support
- Managers Office
- Trainee



Of the two support groups, Graphics Support could potentially be deployed as an organisational wide shared service. In contrast, the Business Support section is more tightly embedded with the core business units. Program Delivery appears to be split into two independent clusters.

Non-core sections exhibit limited embeddedness with the core and are therefore candidates for share service deployment.

Demand Matrix

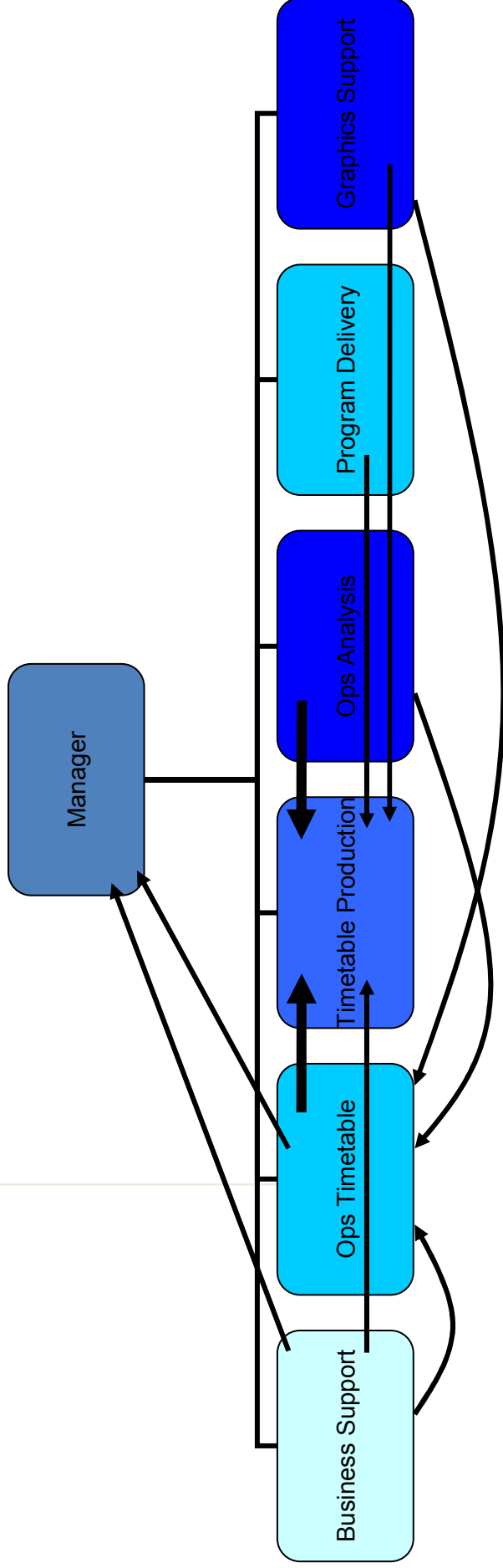


Five to six staff are heavily sought after by those outside their own sections. These staff are potentially overloaded and possible bottlenecks. Consideration should be given to restructuring these job roles.

Inter-sectional Communications

	Business Support	Program Delivery	T.T. Production	Manager	Graphic Support	Operations Analysis	Operations Timetable
Business Support	2%	3%	12%	15%	1%	0%	13%
Program Delivery	1%	13%	11%	3%	0%	0%	9%
T.T. Production	7%	6%	33%	8%	0%	0%	8%
Manager	3%	3%	8%	12%	0%	0%	16%
Graphic Support	0%	1%	11%	2%	42%	0%	14%
Operations Analysis	5%	2%	33%	9%	0%	50%	13%
Operations Timetable	4%	2%	25%	3%	3%	0%	17%

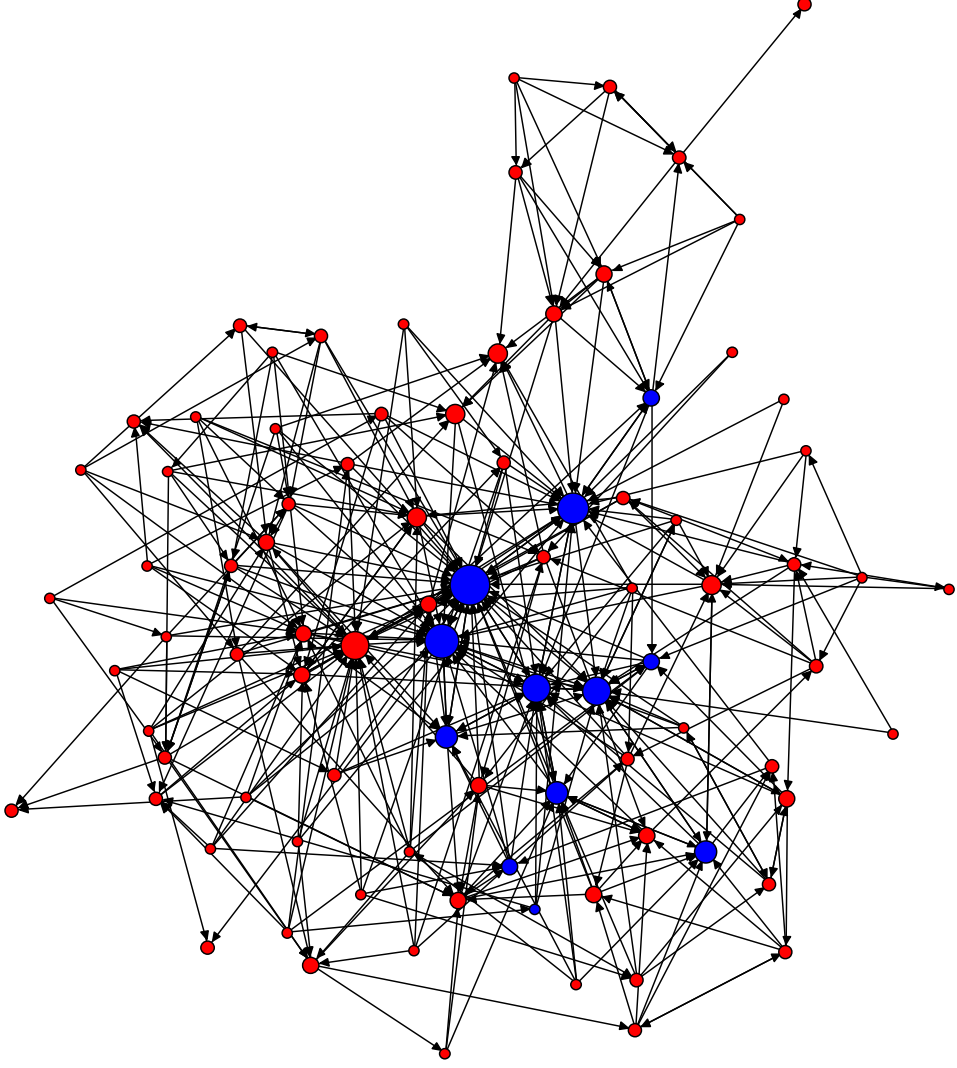
Percentage densities indicate the relative reliance of one section on another. The diagonal show intra-sectional reliance.



Informal links shown for densities > 10%; internal communications density reflected in darkness of colours. Value chain is shown to be centred on Timetable Production

Objective: Self Managed Teams

Positioning of Transport Planning Executives in the advice network



It is anticipated that organisations who successfully operate self managed teams will have several central nodes who are not formally part of the executive. The data suggests (with one exception) that this is not the case here, with the majority of the central network nodes being also part of the executive team

Self managed teams yet to be achieved

Benefits Summary

- Long gestation period for developing experienced staff reinforced by the findings.
- Individuals identified for critical succession plan attention based on relationship dependency nominations.
- Candidates for succession identified based on shared common relationships.
- Issues and opportunities for more rapid induction of new staff identified.
- Overloaded staff roles identified prompting a re-assessment of job roles and providing catalysts for self managed teams.
- Core and non-core sections identified, informing decisions related to restructuring for shared services.

Appendix

- Why Organisational Network Analysis?
- Interpreting Network Maps
- Network Analysis Measures and Metrics



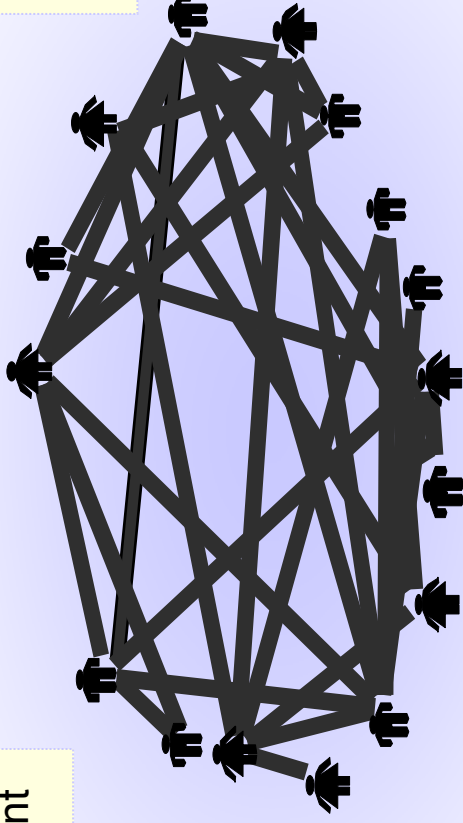
Source: University of Virginia Network Round Table

Why We Should Focus Our Attention on Organisational Networks

Key Reasons Why Organisational Networks Are Important

Where Work Happens

- Lack of boundaries
- Informal networks increasingly important



Where People Engage

- Join and commit to people
- Trust accrues in networks of relations

Where Knowledge Lives

- Rely on people for information
- People can provide more than databases

BUT...

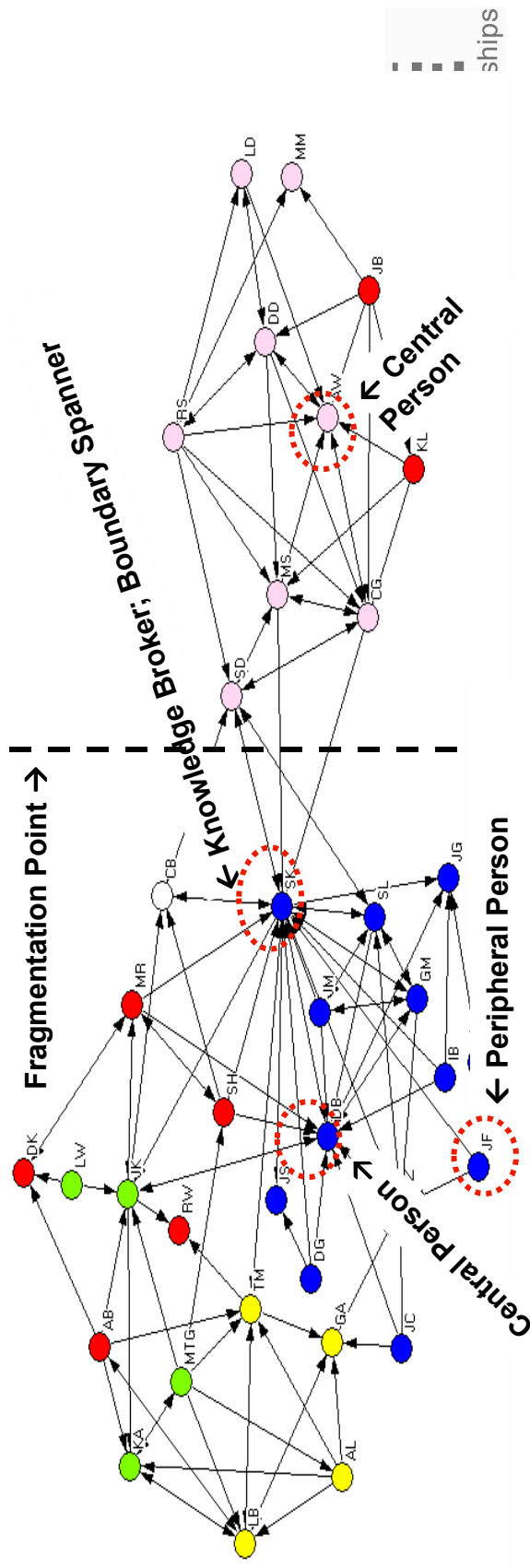
- Invisible
- Complements formal structure

OPTIMICE

optimising business relationships

How to Interpret a Network Diagram

- **Central People**
 - Are an important source of expertise
 - May become bottlenecks
- **Peripheral People**
 - Are underutilized resources
 - Feel isolated from the network
 - Have a higher likelihood of leaving
- **External Connectivity**
 - Provides balanced and appropriate sources of learning
 - Holds relevant influence with key stakeholders
- **Brokers**
 - Are critical connectors between diverse information sources and specific kinds of expertise. High leverage points.
- **Fragmentation Points**
 - Affect information flow across boundaries (e.g., cross functional, hierarchical, geographical, or expertise)
 - Provide targeted opportunities
- **Personal Connectivity**
 - Improves community leader effectiveness
 - Enables grass roots network development efforts



Key ONA Terms—Quantitative Metrics

Density: Robustness of network (group measure)

- Number of connections that exist in the group out of 100% possible in that network.
- **Bottom Line:** More points connected means quicker and more accurate information flow.

Cohesion (Distance): Ease with which a network can connect

- Shows average distance for people to get to all other people.
- **Bottom Line:** Shorter distances mean faster, more certain, more accurate transmission/ sharing.

Centrality: Identifies influential people (individual measure)

- Number of direct connections (ties) that individuals have with others in the group.
- **Bottom Line:** Individuals with more ties to others may be in more advantaged positions and may have access to more of the information or knowledge in the network.