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Social Network Analysis and High Velocity Learning

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Monterey, California: Naval Postgraduate School

<http://hdl.handle.net/10945/70037>

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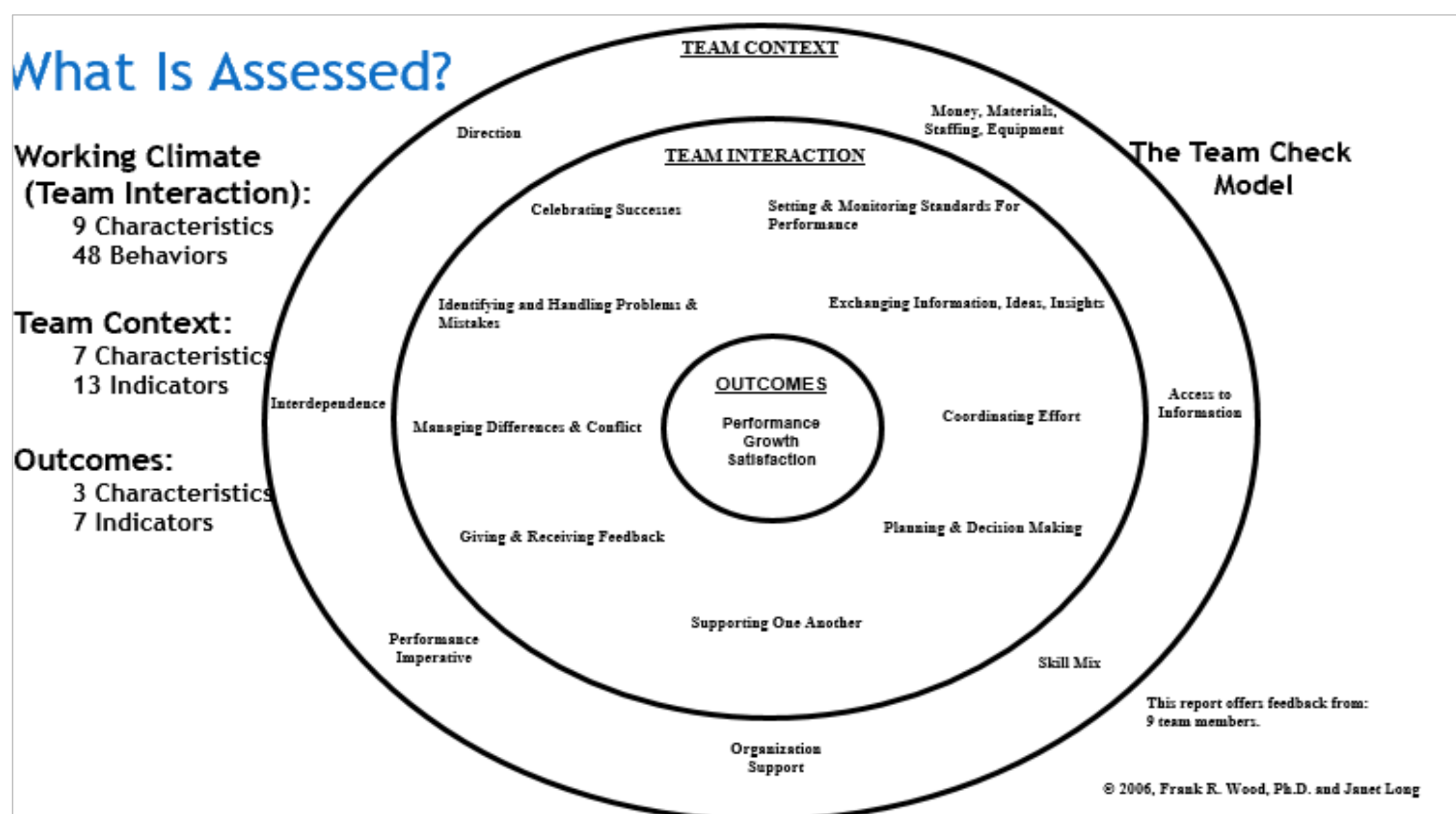
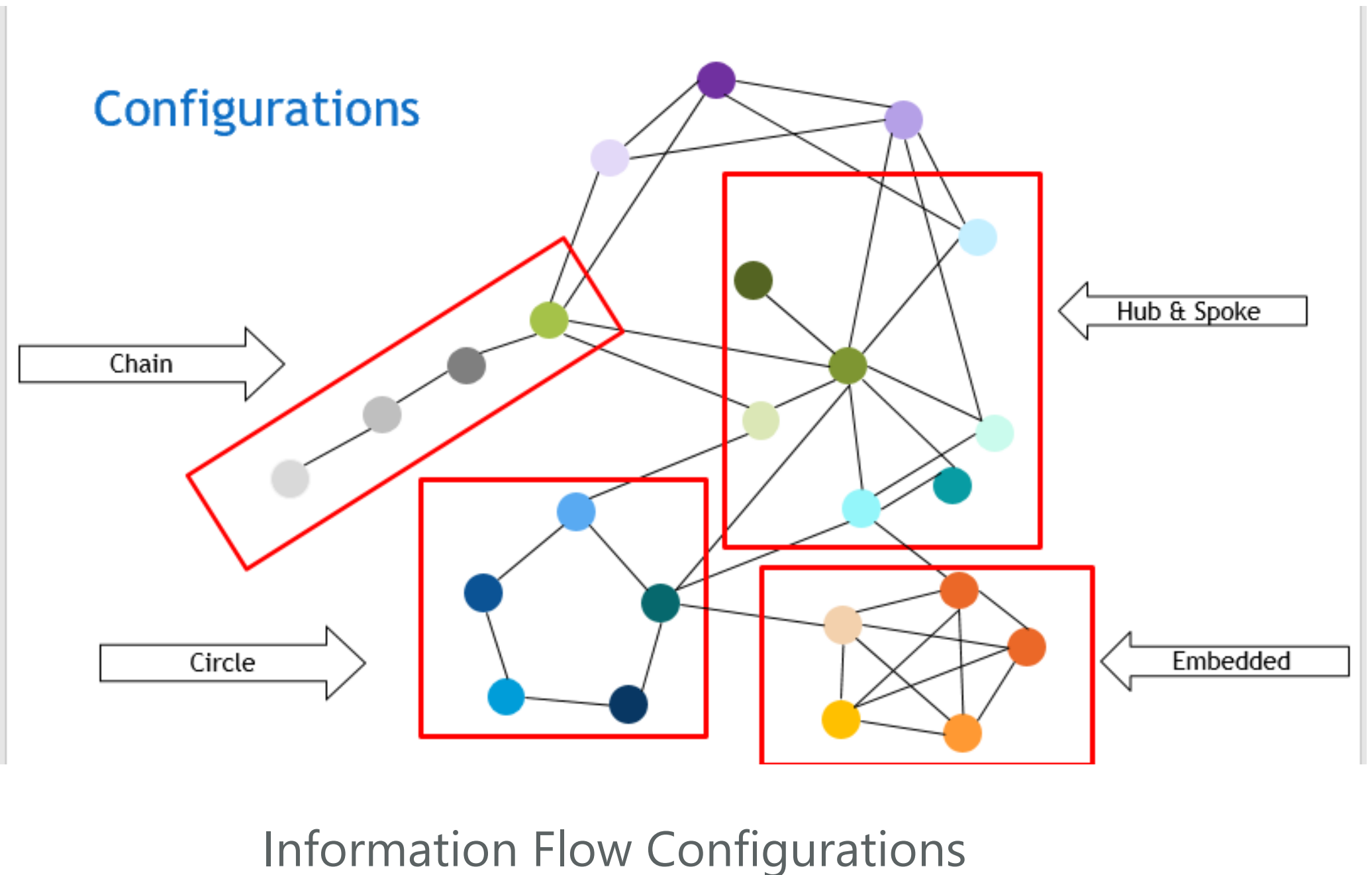
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Purpose

This study examined the relationship between an organization's current information sharing structure, team processes and its goals of agility, innovation, speed, and effective teamwork. A learning center within Navy's Education and Training Command (NETC), which included 5 commands, participated in the study. Their mission is to enable optimal performance of their trained graduates across the full spectrum of military operations.



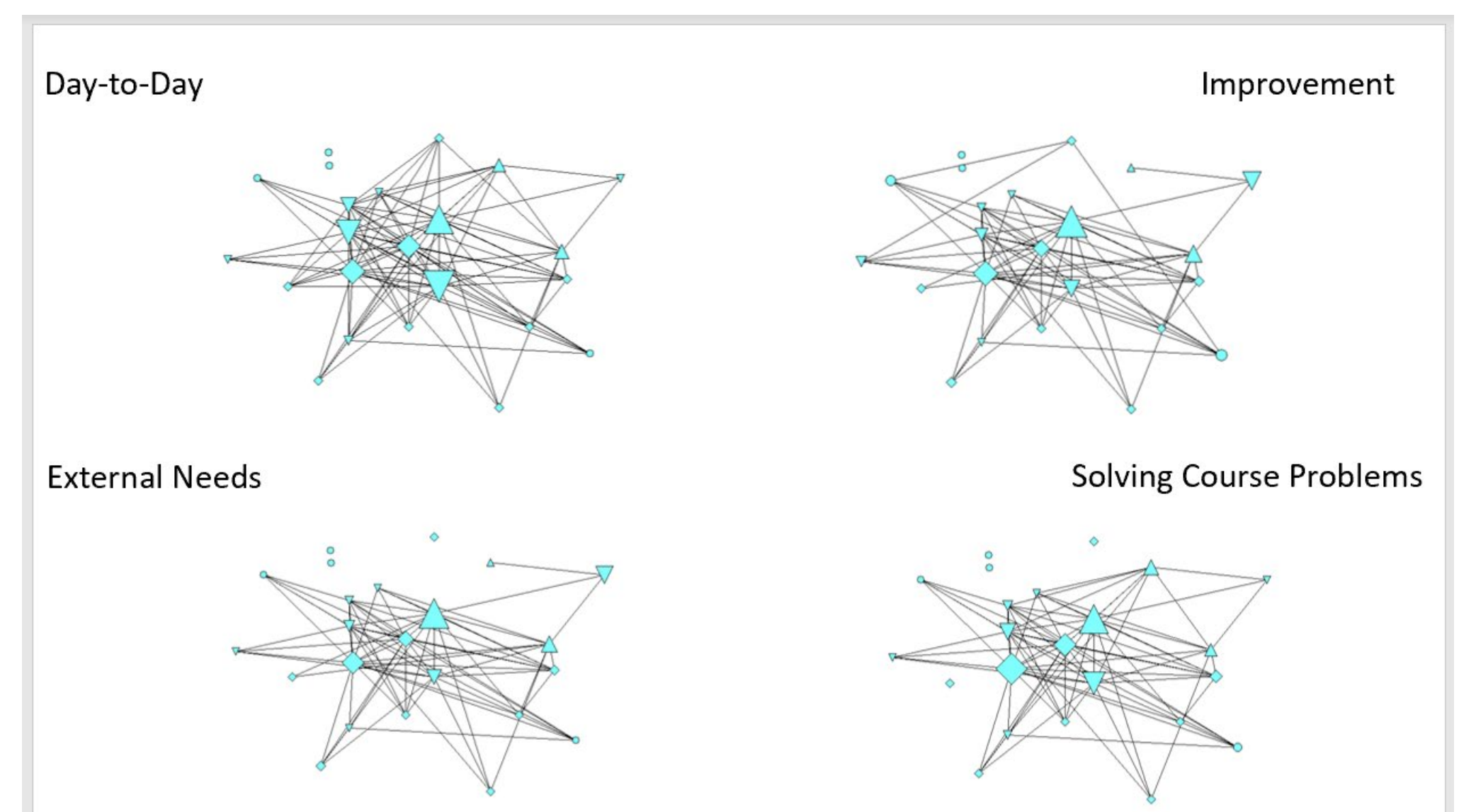
Team Dynamics Assessment Measurement Model

Method

Data collection included interviews, a social network analysis (SNA) survey, and a team diagnostic instrument. The social network survey explored three types of information sharing amongst the leadership team: a) day-to-day operations, b) training improvements, and c) connections with external customers. A fourth network focused on vertical information sharing pertaining to two training course executions. We also assessed team effectiveness for the five commands.

Findings

Network analysis showed that day-to-day connectivity is relatively low across the whole network (network density 3.4%; average # of links to others 6.3, total ties 1160). Likewise, day-to-day connectivity within sites varies from low to moderate: Organization A 24.5% network density; Org B and C 10%; Org D 8.15%, and Org E 7.6%. Average number of links 5.4 for Org A; 4.2 for Org B; 5.0 for Org C; 1.3 for Org D; and 2.2 for Org E.



Network Types Varied within Each Organization

Day-to-day communication is more likely to move vertically within sites or across sites than horizontally (homophily measure 0.28). When instructors run into problems, communication is mostly one-way upward. Last, the connection to the deck plate was very sparse, even at lower levels of the organization.

Conclusions

This domain has been considered effective based on past measures of success. But, as the US Navy transforms to address global threats, several barriers exist that will prohibit this organization from realizing the imperatives of agility, innovation, speed, and high performing teams that would enable them to achieve the optimal performance required to compete and win in future military operations.