Using Systems Thinking in Cross-Functional Teamwork to Create Innovation
(Perspectives, Attitudes, Intentions)

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SYSTEMS THINKING PRINCIPLES

*The Big Picture
*The Context of a Project
*The Interaction Between Key Components (People, Organization, Technology)
*Flow of Ideas, Decisions, & Activities
*The Timing of Key Events
*Impact the Process of Designing, Creating, Developing, & Maintaining Systems

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KEY INGREDIENTS IN CROSS-FUNCTIONAL TEAMWORK

Behaviors
Motivation
Qualities
Attitudes
Intentions
Leadership Approach
Tools:
Perspective
Taking
& Integrating

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INNOVATION

Commercial result, often a new product, produced by the organization for the first time.
IDENTIFY THE SYSTEMS CONTEXT

Environment

ORGANIZATION

Customers

Div A 2 Depts 8 Groups

Div B 3 Depts 12 Groups

Div C 2 Depts 8 Groups

Div D 2 Depts 8 Groups

Div E 3 Depts 12 Groups

Cross-Functional Team 1

Cross-Functional Team 2

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HIGHER LEVEL CONTEXT FOR CROSS-FUNCTIONAL TEAMS

Organization

Division A

Division B

Division C

Division D

Division E

Ovals = Cross-functional Teams

Depts

Depts

Depts

Depts

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COLLABORATIVE LEADERSHIP: STARTS WITH EACH INDIVIDUAL PARTICIPANT

Needs Theory
(Leading Self)

Clear Leadership Model
(Authentic Engagements)

Negotiated Order Theory
(Dedication to “We”)

Boundary Spanner
(Using Language-Tailored for Each Specific Group)

(Adapted from Ang’ana & Chiroma and Santa & Bretherton by Dr. Julia Taylor, Copyright 2022)
TEAM BEHAVIORS

1. Team Mission Analysis
2. Goal Specification
3. Planning
4. Coordination
5. Cooperation
6. Information Exchange
7. Performance Monitoring
8. Systems Monitoring
9. Backing Up Behaviors
10. Intrateam Coaching
11. Collaborative Problem Solving
12. Team Practice Improvement

(From: Sondre Kristensen, 2019)
**TEAM QUALITIES**

1. *Works as a Problem Solver* (By Having a Shared Mental Model)
2. *Treats Others in a Respectful & Supportive Manner*  
   (Looks to Synthesize & Integrate Ideas Rather than Engage in Conflict.)
3. *Communicates Constructively* (With Positive Intention for Action.)
4. *Listens Actively* (Have a Curious Attitude)
5. *Functions as an Active Participant* (Not limited to a single aspect.)
6. *Shares Openly & Willingly* (Others may be inspired by them.)
7. *Shows Commitment to the Team* (Appreciates this team’s goals.)
9. *Exhibits Flexibility* (Fluid situation requires quick adaptability.)
10. *Demonstrates Reliability* (Shows up for difficult moments.)

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Attitudes & Intentions: BEHIND TEAM QUALITIES

PROBLEM SOLVER  Can Do Attitude, Intention to Resolve Problem
RESPECTFUL    Appreciate Other’s Opinions, Intention to Use other’s ideas
CONSTRUCTIVE  Attitude of Cooperation, Intention to Advance Project
CURIOUS LISTENING  Desire to Learn about Different View, Intend Understanding
ACTIVE         Intention to Contribute in Multiple Ways, Helpful Attitude
OPEN SHARING  Make it Safe for Others to Share More, Foster Authenticity
COMMITMENT   Show Faith in the Cross-functional Team, Dedication to It
COOPERATES    Volunteer to Help Others, Take Initiative with Forward Intent
FLEXIBILITY   Show Attitude of Resilience & Adaptability, Intend Success
RELIABILITY  Attitude of Being There thr Thick & Thin, Consistent Intention

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LEADERSHIP IN CROSS-FUNCTIONAL TEAMS

1. Intellectual Stimulation
2. Individual Consideration
3. Charismatic Leadership
4. Directive Leadership
5. Participative Leadership
6. Interactive Leadership

7. Transformational Leadership
8. Transactional Leadership

9. Strategic Leadership
10. Shared Leadership
11. Distributed Leadership

11. *Power Transitions* (Heterarchy)

(Numbers 1-3 from Avolio, Bass & Young 1999, Numbers 4-10 from Kesting, Ulhoi, Song & Niu 2015, & Number 11 from Aime, Humphrey, Derue, & Paul 2014)
PERSPECTIVE TAKING: This technique involves the leader suggesting for team members to take on another perspective, a perspective that goes against their own point of view.

For example, if R&D can adopt Marketing’s perspective, new creative insights can emerge.

INTEGRATING PERSPECTIVES: After adopting other’s perspectives, the next step is to integrate those perspectives into a viable perspective that is in alignment with Strategic Objectives. This often requires a leader who can instill a positive attitude and inspire high level participation, while bucking the status quo at the same time.

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HYPOTHETICAL MODEL: BEHAVIORS, QUALITIES, & LEADERSHIP STYLE FOR SPECIFIC STAGES OF INNOVATION

Phase 1: Shared Leadership
- Team Mission Analysis
- Goal Specification
- Planning
- Prototype Creation/Testing

High Ranking on All of the Qualities

Phase 2: Strategic Leadership
- Planning Coordination
- Cooperation
- Collaborative Problem Solving

*Communicates Constructively
*Listens Actively
*Functions as an Active Participant

Phase 3: Participative Leadership
- Information Exchange
- Cooperation
- Listen Actively
- Exhibits Flexibility

*Communicates Constructively
*Listens Actively

Phase 4: Directive Leadership
- Performance & Systems Monitoring
- Collaborative Problem Solving
- Team Practice Improvement
- Works as a Problem Solver
- Communicates Constructively
- Shares Openly & Willingly
- Shows Commitment to the Team

*Shows Commitment to the Team
*Demonstrates Reliability

Phase 5: Transactional Leadership
- Power Transitions

Unfreezing

Freezing

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INTEL P6 MICROPROCESSOR: EXAMPLE OF CROSS-FUNCTIONAL TEAMS FOR INNOVATION

Robert Colwell (First Participant)
Dave Papworth, Glenn Hinton, Michael Fetterman, Andy Glew

Systems Approach, Strategic Integration, Champion Driven,
Behaviors, Qualities, Multiple Leadership Approaches
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