

TEAM AND COLLABORATION DEVELOPMENT IN INTERORGANIZATIONAL CONSTRUCTION MAINTENANCE CONTRACTS

Eveline Hinfelaar & Leentje Volker

University of Twente, The Netherlands
Departement of Construction Management & Engineering

UNIVERSITY
OF TWENTE.



Eveline Hinfelaar MBA
e.hinfelaar@eve-n.nl

Successful collaboration sounds so easy!

We work in subteams and trust the outcome of these (sub)teams to be good

Visitors cannot define who is from which parent organization. We are one equal team

We share the responsibility for the development of the maintenance plan (plan + finances)

Within this contract we work very effective because we never have to do things twice

We have only few procedures and protocols within this team because we trust each other

We combine knowledge and experience which is reducing risks and unforeseen costs

→ Literature focuses on what contributes to successful collaboration.

→ Goal of this research: Identify how interorganizational teams develop effective collaboration?

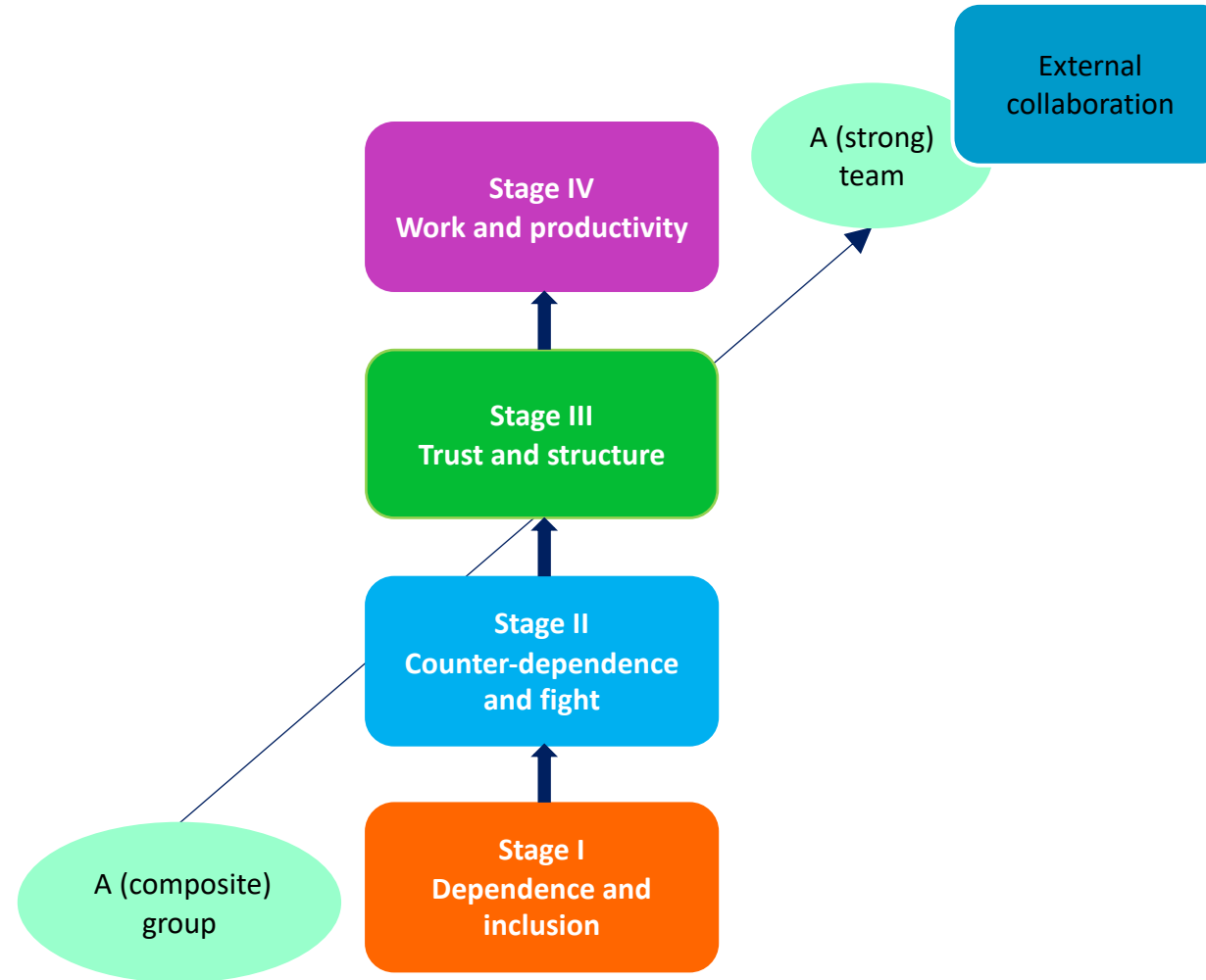
Change in collaboration between client organization and contractor

→ Project-based collaboration -> new forms of business relationships:

- **Long term contracts;**
- **Early contractor involvement** (ECI);
- Contracts based on **interorganizational and interpersonal collaboration.**

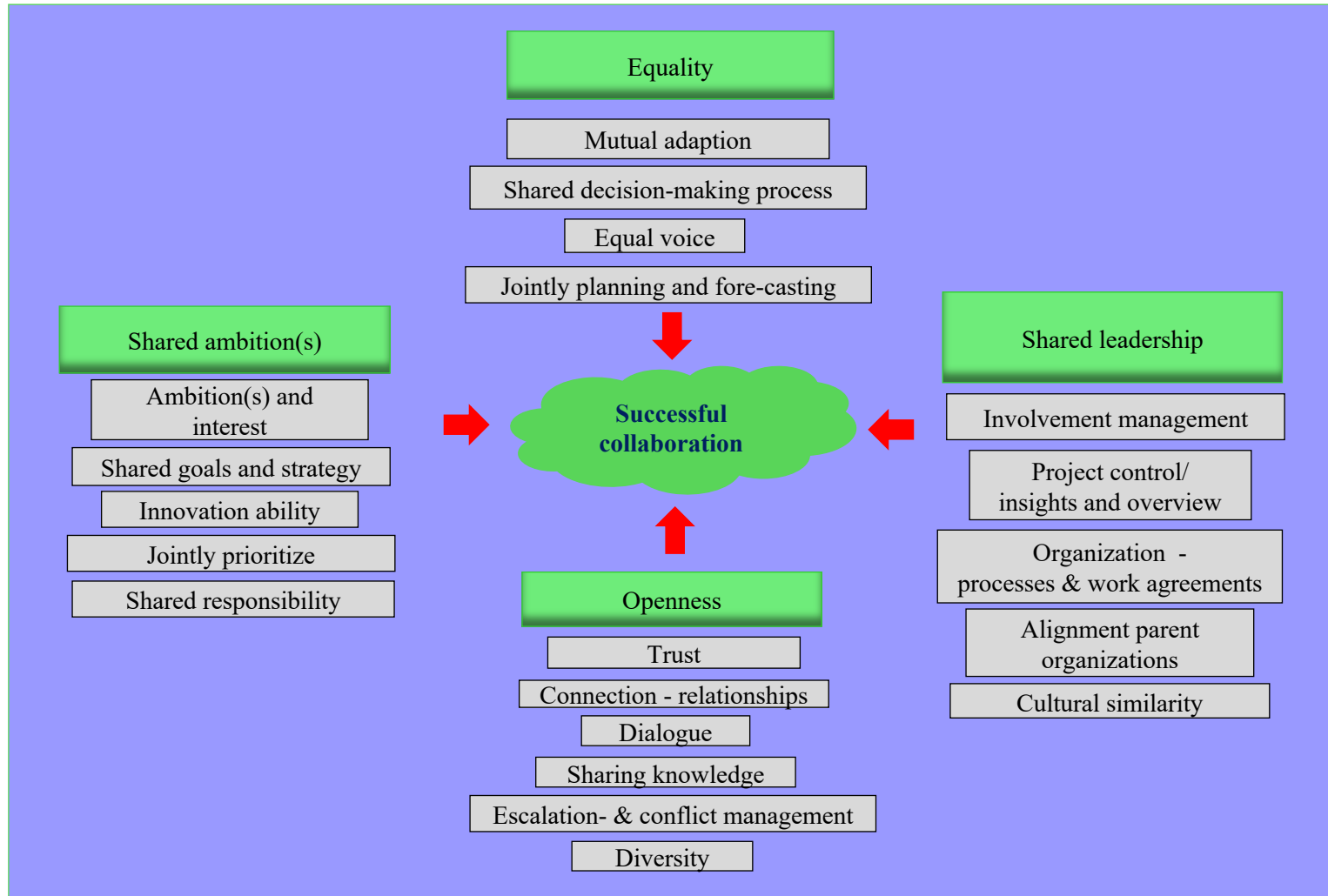
Interorganizational collaboration seems to be required to be successful
in these new contracts (literature).

Effective interorganizational collaboration!



Group Development Questionnaire (GDQ; S. Wheelan 2001)

Effective interorganizational collaboration!



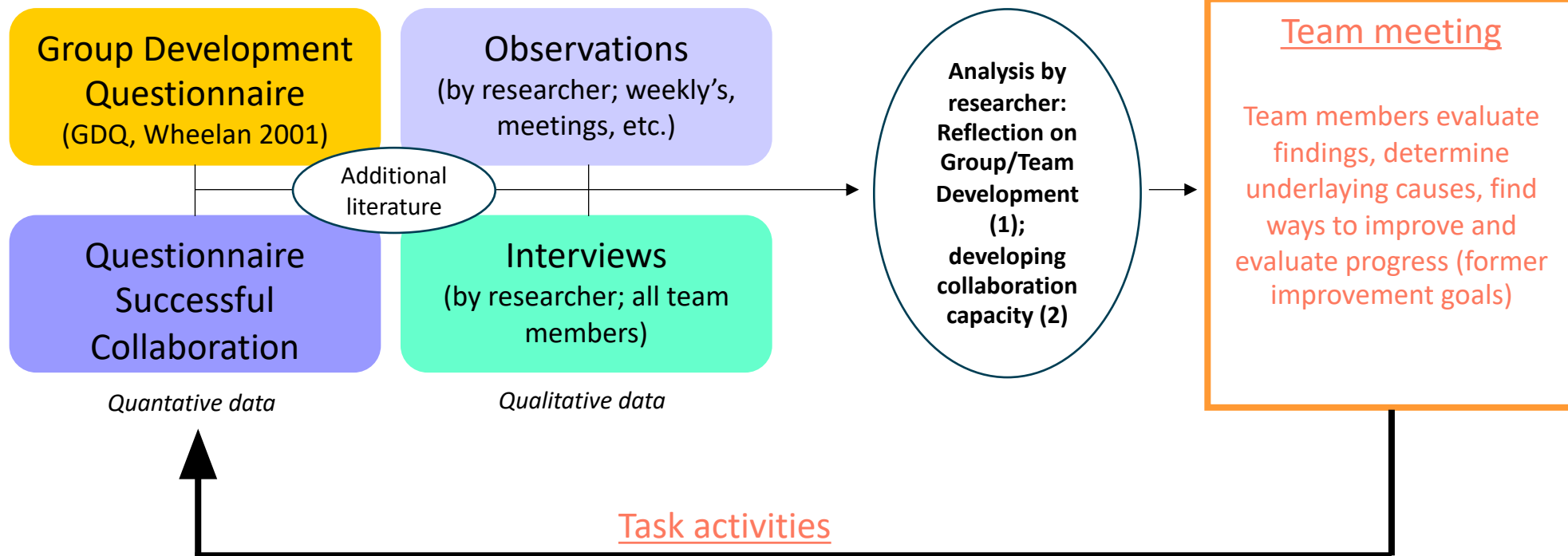
Successful collaboration (de Waal et al., 2015; Kaats & Opheij 2012; Knight, 2000)

The case study

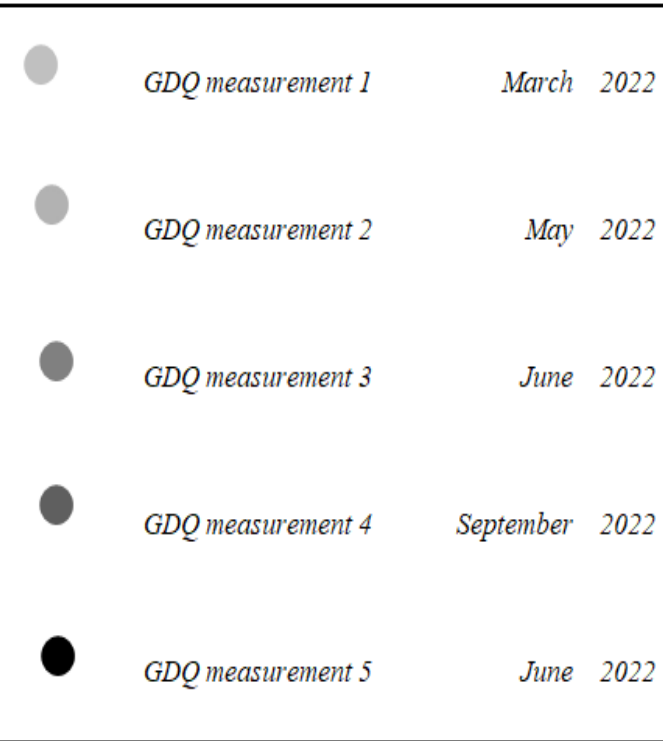
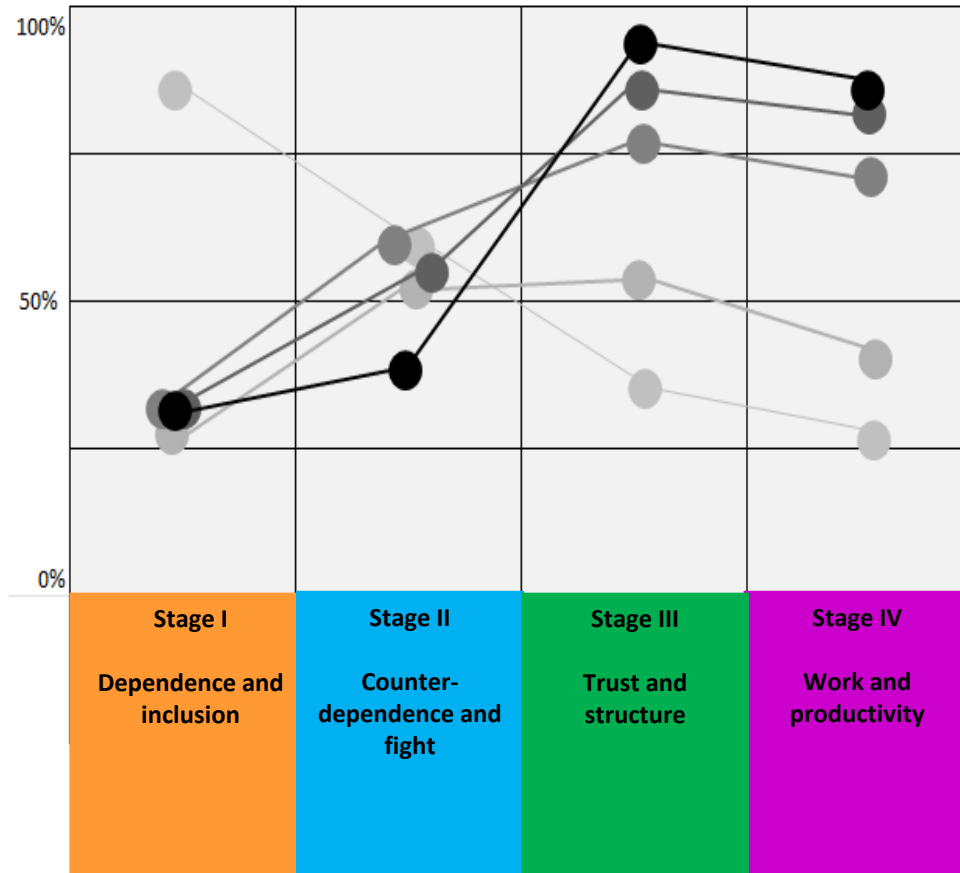
Maintenance team MaastunnelComplex (MTC), Rotterdam, The Netherlands.

1. **Long term contract** : 15 years (+ additional 5 years);
2. **Early contractor involvement** : a two-phase contract in which the first year (2022) is defined for 'mobilizing the collaboration and jointly designing the maintenance plans and requirements (for 2023)';
3. The contract focuses on developing an **effective and interorganizational & interpersonal collaboration** and a collective sense of ownership for the maintenance.

Participatory action research *March, May, June, September, December 2022*



Findings questionnaire: GDQ (1)



GDQ measurements during 2022

Findings interviews and observations: GDQ (1)

- Significant growth of team effectiveness and productivity (from phase 1 to phase 3/4 GDQ).

March 22: "We are not a team yet"

December 22: "We can count on each other"; "We are a succesful team"

- Observations and interviews confirm team development as positive and succesfull.

December 22: "We learned to work in subteams on specific tasks based on quality and knowlledge of team members regardless the parent organization.";

"There is interpersonal trust and professional trust in other team members. That makes us highly effective."

- The GDQ-model for team development was considered very helpfull to give insight and direction to improve the effectiveness of the team.

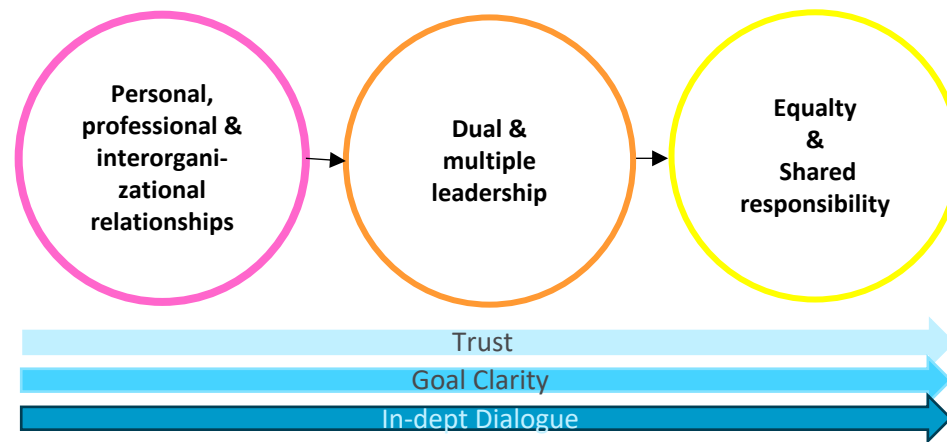
June 22: "Can we please continue this GDQ measurements because it is really helping us with insights how to improve."

Results development successful collaboration (2)

- The team developed collaboration capacities that are specific for interorganizational collaboration.
- The research determined sequential development, preliminary to each other;
 1. Building personal, professional en interorganizational relationships;
 2. Developing leadership;
starting from leadership by the parent organization at the start -> to dual leadership -> to multiple leadership;
 3. Equality & Shared Responsibility.
- The research determined parallel developments of collaboration capacities.
These collaboration capacities are specific for interorganizational collaboration as well.
 1. Trust; personal, professional and interorganizational trust;
 2. Goal Clarity; developing from goals set by client organization to shared goals;
 3. In-depth dialogue; developing from small task-oriented themes to strategic topics.

Conclusions and insights:

- The Group Development Questionnaire contributes to improving team effectiveness because it gives teams insight on how to develop team effectiveness within construction maintenance contracts.
- The model for successful collaboration contributes to improve interorganizational collaboration because these insights deepen our understanding on how interorganizational collaboration within construction maintenance contracts develop.
- The development of interorganizational collaboration runs partly sequential and partly parallel.



-> Combining both models and insights seem to contribute to becoming an effective interorganizational team!



Team meetings and tasks activities

- Team meetings contribute to team-awareness about the status of team development and collaboration.
- Team meetings contribute to the process of making agreements and defining actions for improving effectiveness of the team and collaboration.
- But team development takes place mainly place in team meetings and within the task activities.

Participatory research approach

- The results of the questionnaires were presented to the team in a participatory research approach.
This seemed highly effective and advisable!
Team members evaluated the analysis, determined underlying causes and appoint improve-actions themselves.
By doing that they keep ownership over their development.
In every team meeting they also evaluate progress in the (by themselves) appointed development.
- Coaching, training, helps!
Teamcoaching (interventions during meetings or on collective working days)
Personal coaching (when needed)



Thank you for your attention!

Eveline Hinfelaar MBA

i: e.hinfelaar@eve-n.nl