



University of Pretoria

Creating Team Coherence

Experiences with Software Engineering Teams in the Classroom

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Outline

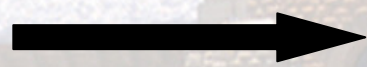
The background image shows a large, historic stone building with a central clock tower. The building has a gabled roof and arched windows. In the foreground, there is a courtyard with a fountain and a statue of a bull. The sky is blue with some clouds.

- Orientation
- Aim
- The experiment
- Our Findings

Orientation

Software Engineering (COS301)

Theory



Practice

Hard Skills

Soft Skills

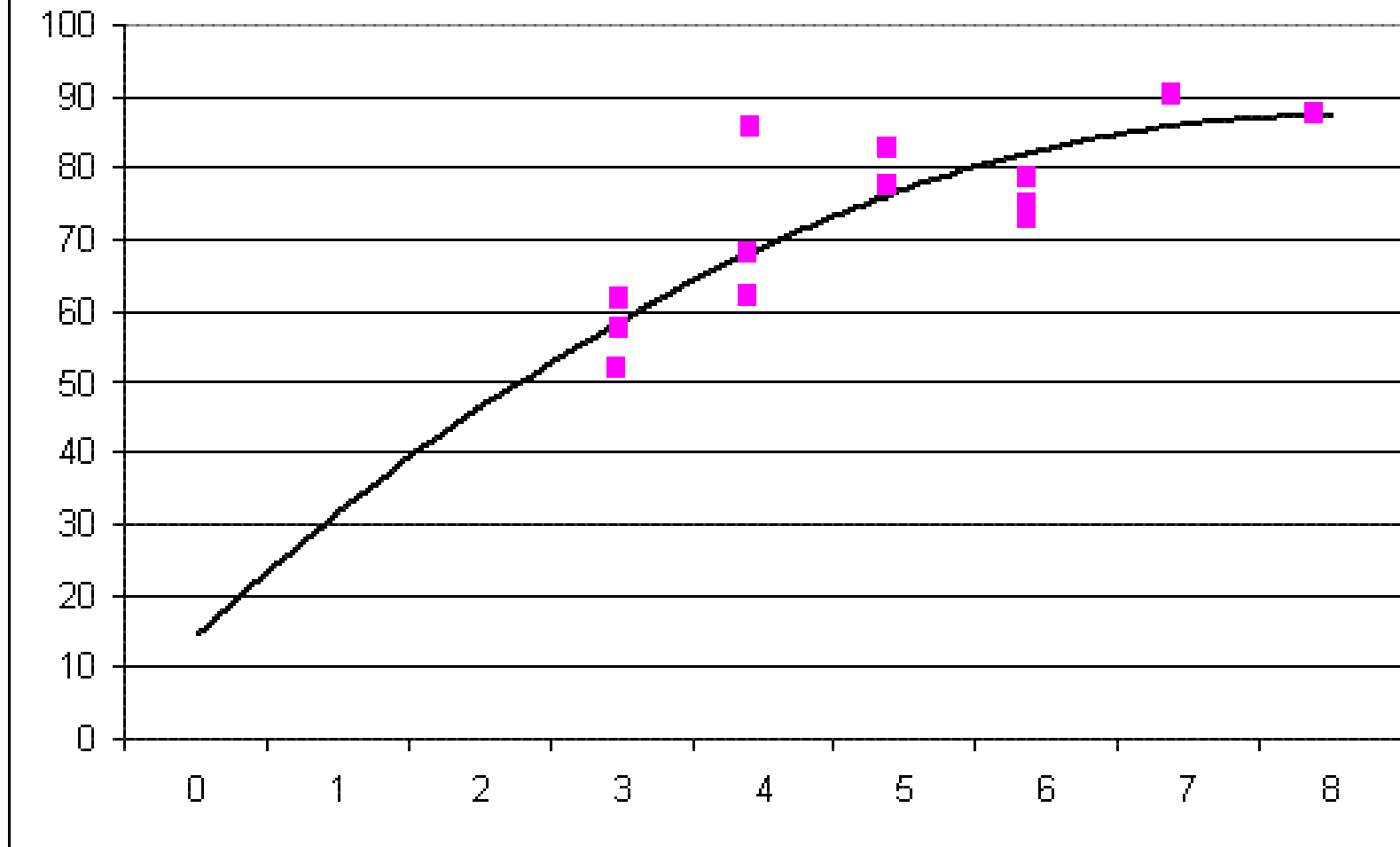
Defining terminology

- Diversity of personality in a team
- Academic alignment in a team
- Social Loafing
- Heroism

Aim

To investigate whether teams with members who are academically diverse are more likely to be dysfunctional than teams whose members are academically aligned.

Influence of Personality Diversity



Hypothesis

- Teams with academically aligned students experience less conflict.
- Heroism and social loafing occurs as a consequence of lack of academic alignment.

Conflict was not an issue

- We found that there were both aligned and unaligned teams with and without conflict.
- A quote from an unaligned team:

“We were a lovely group. We were different, different weaknesses and strong points. We had unbelievable fun. We had more fun than what we worked. We worked but we also had lots of fun playing”

Social Loafing

- Not found in aligned teams

“Our project was working and we could actually see it working perfectly and we know that all contributed equally to it”

Social Loafing

- Most severe cases found in unaligned teams

“there was a time that he ... questioned us and said ‘listen, what the hell is going on, why aren't I getting any programming tasks?’ We told him ‘listen, we don't want to put any pressure on

you”

Heroism

- Found in both aligned and unaligned teams

“They knew that they would disappoint **me** if it wasn't done ”

“I was involved with most of the coding of the **actual** project ”

Findings

- **Most cases of social loafing occurred where team members were not academically aligned and the weaker members did not pull their weight.**
- **Social loafers in these cases were not unwilling to contribute, but were denied the opportunity by their more competent team mates.**