



Fostering Curiosity in Grade 5 Boys through Inquiry-Based Learning

Lester Lalla
St Stithians Boys' Preparatory

Further Information

This poster and further information is available at <http://www.theibsc.org/>

Researcher's Email: llalla@stithian.com

Introduction

People who are curious orient their lives around an appreciation of novelty and a strong urge to explore, discover, and grow (Kashdan, Sherman, Yarbro, & Funder, 2013).

The world over, our curricula and education ministries are being challenged to develop young men who are not simply book smart, but those who are able to adapt to uncertainty and ever evolving global markets.

A necessary tool or disposition in the expansive tool kit of our students must be curiosity. My study sought to measure whether inquiry-based learning could foster curiosity in Grade 5 boys.

The Research Question

How might inquiry-based learning (IBL) foster curiosity in Grade 5 boys?

Research Context and Participants

St Stithians Boys' Preparatory is one of five schools which make up St Stithians College. A preparatory school with an enrolment of 400, we educate boys between the ages of eight and thirteen years old. Our College is situated in Sandton, South Africa, a region which is considered the business hub of Africa. As a proud Methodist Church school, we hold dear to our Christian roots, yet seek to reflect a society that is diverse and multifaceted.

The participants in my study were 29 Grade 5 boys. I taught this group for a total of 90 minutes per week in their Natural Science class.

The Research Action

For this action research project, 29 boys were exposed to a six-week inquiry unit which was guided by the essential question: Can rooftop gardens help feed our city's homeless? Their inquiry involved research into the historical and political background of our city as well as biological and sustainable aspects of gardening.



"I wished all subjects involved real-world problem solving."



Data Collection and Analysis

I used the following data collection methods:

- Surveys
- Participant observation by the researcher
- Exit tickets
- Focus group discussion

The data collected were analysed using a thematic analysis approach. I categorised and coded data, identified themes, organised a category system, and developed a report framework.

Key Findings and Discussion

- I witnessed many of the boys move from passive students to being engaged and in control of their own learning. Over time, I observed the locus of control of learning progressively shift from me to my students.
- A strong theme in the accounts of the boys was the energizing effect and sheer engagement they derived from the production process.
- Close observation of the boys' interactions revealed healthy engagement when learning outcomes and timeframes were clearly understood.
- Contextual and experiential learning was the catalyst for intellectual curiosity.

Conclusions

Through my data analysis, I learnt that inquiry-based learning is a powerful instructional practice to foster curiosity. The boys thoroughly enjoyed the choice and transfer of knowledge this unit presented. They had to use the knowledge they acquired to create a sustainable garden as well as answer the essential question. Unless we actively promote, measure, and reflect on future fit competencies, our students will not naturally develop them. It is incumbent on teachers and parents to prepare boys for a rapidly changing digital world which requires a skill set that is digital, human, and transferable.

Key Readings

Kashdan, T., Sherman, R., Yarbro, J., & Funder, D. (2013). How are curious people viewed and how do they behave in social situations? From the perspectives of self, friends, parents, and unacquainted observers. *National Center for Biotechnology Information Support Center*, 81(2),142-154. <https://doi.org/10.1111/j.1467-6494.2012.00796.x>

Mackenzie, T. (2016). *Dive into inquiry: Amplify learning and student voice*. Irvine, CA: EdTechTeam Press.

Reichert, M., & Hawley, R. (2010). *Reaching boys teaching boys: Strategies that work – and why*. San Francisco, CA: Jossey-Bass.



"I was very nervous coming to the inner city but this experience was amazing."

"...this felt easier because this was not just about marks, it was about learning and working together."