The Bersila Workstation:
A New School Furniture Concept

by

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Signed statement of originality

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Abstract

In a period of globalization bersila practice has gradually begun to change as the modern form of seating has been introduced into the home, the school and the business environment and a more western approach to seating has been adopted.

This research project investigates the developing of a body of furniture that takes into account the typical Malaysian sitting position called bersila or the cross-legged sitting position, which is common in most Asian cultures. The aim of this project is to foster the continued use of bersila particularly amongst young Malays. The early formative years of schooling were chosen for the development of a versatile workstation design to facilitate the bersila sitting position, identified as the Bersila Workstation: Kindergarten and the Bersila Workstation: Primary.

Although chairs have been marketed to suit the Yoga sitting position, a kindergarten and a year one workstation to facilitate the bersila position is without precedent. In order to ensure that the workstation can be used in early schooling, a number of design criteria must be applied. These include:

- Suitability for low cost mass production
- The use of economic materials
- Robust construction
- Ease of manoeuver and stability
- Safe handling by young people
- Flexible use to suit various classroom activities
- Flat packing to aid distribution.

The significance of the project is its tangible contribution to Malaysian culture. The bersila sitting position is a part of Malaysian and other Asian cultural identity as well as having ergonomic and life style benefits. In a world where globalization promotes conformity the early encouragement of bersila sitting in school will assist in encouraging the practice.
This project outcome is an example of finding a design solution to meet cultural and lifestyle needs. The tangible results are two workstations that are suitable to the growing needs of kindergarten and primary school students. The furniture ideas have been tested in Malaysia and Australia schools, and the outcomes of the research demonstrate that the research project has the capacity to be introduced widely in the Malaysian education system at the same time as creating a versatile and flexible seating system at an important formative time in children’s development.

Malaysia is situated at the centre of a billion strong populations in a group of nations with a climate of economic growth due in part to the rising middle class. This indicates a demand for larger furnished homes. There is status implied in furniture and particularly in seating. However these populations also have long standing traditions that include the bersila seating position which suggests a potential to cater for both bersila and Western sitting. This project heralds a direction for the region in furniture design that combines both functional and cultural criteria.
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Phase 7: Prototype testing
Phase 8: Redesign the Problem

Design for the *Bersila* Workstation: Primary

Phase 1: Sketches
Phase 2: Technical drawing
Phase 3: Mock-up Development
Phase 4: Design development
Phase 5: Prototype development
Phase 6: Prototype Redesign
Phase 7: Prototype Testing for Angles 0º, 5º, 10º and 15º.
Phase 8: Redesign the Idea

Material and Processes

Experiments with MULTICAM
Experiments with materials

CHAPTER 4: CONCLUSION

APPENDICES

Appendix A: List of illustrations
Appendix B: Bibliography
Appendix C: Internet Reference
Appendix D: Approval Letter
  Economic Planning Unit (Malaysia).
  Anak Cemerlang Kindergarten Management.
  ABIM Kindergarten Management.
  Human Research Ethics Committee (Tasmania).
  Department of Education (Tasmania).
  Consent Form.
  Participant Information Sheet Social Science/ Humanities Research.
  Parent/Guardian Information Sheet.
  Deed of Release
Appendix E: PhD Examination Submission Show.
Appendix F: Curriculum Vitae