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Rental Bike Design for the New Zealand National Cycleway
Alistair Patterson© 2010
ABSTRACT
This project seeks to find a product solution to increase user access to the proposed national cycleway throughout New Zealand. This is achieved through the design of a self-service bike rental system to be placed at points along the proposed cycleway track.

Various possible bike rental systems precedents were analysed for the national cycleway. Included in this were three short films that documented cycling conditions on New Zealand roads and the current bike rental systems that operate in New Zealand.

A practical approach was taken wherein a significant amount of testing in full scale via 3D model making techniques. To complete the process, a full-scaled ergonomic/usability test rig was built. Following this, a full-scale design model could be developed. The resultant proposed solution features an innovative bicycle and locking system with distinct and unique styling. The bikes are styled to convey a fun and user friendly aesthetic. The risks of vandalism or theft of the bikes has been mitigated by a unique parts system whereby nothing on the bikes would be usable on any other frame if stolen.
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Student ID: 05017955
Surname: Patterson
First Name: Alistair
Paper Number: 197.800
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# CONTENTS

## 1.0 INTRODUCTION
- 1.1 The national cycleway P. 2
- 1.2 Research question P. 3
- 1.3 Aim P. 3

## 2.0 LITERATURE REVIEW
- 2.1 Sustainability in product design P. 5
- 2.2 Existing bike rental systems P. 6
- 2.3 Bike design P. 9
- 2.4 Research questions P. 12

## 3.0 RESEARCH METHODOLOGY
- 3.1 Existing Bikes P. 14
  - 3.1.1 Discrimination maps P. 15
  - 3.1.2 Geometry Comparison P. 17
- 3.2 Case studies P. 19
  - 3.2.1 Velo v P. 19
  - 3.2.2 Smartbike DC P. 21
  - 3.2.3 Bixi P. 23
- 3.3 User surveys P. 25
  - 3.3.1 Participants P. 25
  - 3.3.2 Survey specifics P. 25
  - 3.3.3 Results P. 25
- 3.4 Video Documentaries P. 26
  - 3.4.1 Riding on New Zealand roads P. 27
  - 3.4.2 Cycle touring P. 28
  - 3.4.3 Next bike rental system P. 29
- 3.5 Analysis of findings P. 30

## 4.0 DESIGN METHODOLOGY
- 4.1 Schematic design P. 32
- 4.2 Package drawing P. 33
- 4.3 Concepts P. 34
  - 4.3.1 Bikes P. 34
  - 4.3.2 Scale mock-ups P. 40
  - 4.3.3 Concept ideation P. 40
  - 4.3.4 Concept direction P. 40
- 4.4 Development P. 41

## 4.5 Expert interviews P. 42
- 4.5.1 Chris Tuckey P. 43
- 4.5.2 Galloway International P. 44

## 4.6 Material and production P. 45
- 4.7 Full scale mock-up P. 46
- 4.8 Ergonomic testing P. 47
  - 4.7.1 Full scale 2D package drawing testing P. 47
  - 4.7.2 Full scale ergonomic test rig P. 48

## 5.0 FINAL MODEL PROCESS
- 5.1 Metal under construction P. 49
- 5.2 Foam body construction and shaping P. 50
- 5.3 Resin and skim bogging P. 51
- 5.4 Details P. 52
- 5.5 Wheel construction P. 54
- 5.6 Stand construction P. 55
- 5.7 Finishing and paint P. 56

## 6.0 FINAL DESIGN
- 6.1 Features P. 60
- 6.2 Context P. 64
- 6.3 Usability P. 65
- 6.4 Branding P. 66
- 6.5 Users P. 67

## 7.0 CONCLUSION

## 8.0 REFERENCES
- 8.1 Bibliography P. 69
- 8.2 Reference list P. 70
- 8.3 Image Reference list P. 71

## 9.0 APPENDICES
LIST OF FIGURES
Fig 01: Cycleway visualisation.
Fig 02: Velo ‘V third generation bike sharing system.
Fig 03: Second generation bike.
Fig 04: First generation bikes, Witte Fietsen.
Fig 05: World map illustrating the scale and distribution of bike sharing systems throughout the world.
Fig 06: 1900’s bicycle.
Fig 07: 1981 injection molded bicycle the Itera.
Fig 08: Time trial racing position.
Fig 09: Upright relaxed riding position.
Fig 10: 1927 diamond frame bicycle.
Fig 11: 2009 diamond frame bicycle.
Fig 12: Images 1–7 existing bikes.
Fig 13: Discrimination map, ease of use vs attractiveness.
Fig 14: Discrimination map, complexity vs simplicity.
Fig 15: Series of bikes used for geometry comparison.
Fig 16: Geometry comparison chart.
Fig 16: Velo’V bike sharing system.
Fig 17: Velo’V, scale of the stations.
Fig 18: Velo’V, the bikes.
Fig 19: Velo’V bikes in use.
Fig 20: Smartbike DC bike sharing.
Fig 21: Smartbike DC bikes in use.
Fig 22: Smartbike DC, the bikes.
Fig 23: Bixi bike share system, Montreal.
Fig 24: Bixi bikes.
Fig 25: Bixi bikes in use.
Fig 26: Video documentary 1 beginning of the ride.
Fig 27: Video documentary 1 during the ride.
Fig 29: Touring bike used during the touring documentary.
Fig 28: Video documentary 2, half way.
Fig 30: Next bike rental system bikes.
Fig 31: Test riding the next rental bikes.
Fig 32: Design schematic, Images 1–17.
Fig 33: Package drawing.
Fig 34: Initial concept drawings.
Fig 35: Initial concept drawings.
Fig 36: Concept drawings.
Fig 37: Concept rendering.
Fig 38: Concept rendering.
Fig 39: 1:4 scale mock-ups.
Fig 40: Development trace over.
Fig 41: Full scale mock-up.
Fig 42: 99th percentile male package drawing test.
Fig 43: 1st percentile female package drawing test.
Fig 44: Full scale ergonomic/ test rig adjusted for 99th percentile male rider.
Fig 45: Full scale ergonomic/ test rig adjusted for 1st percentile female rider.
Fig 46: Full scale ergonomic/ test rig adjusted for 50th percentile male rider.
Fig 47: Final model process, metal under construction.
Fig 48: Final model process, foam body construction and shaping.
Fig 49: Final model process, resin and skim bogging.
Fig 50: Final model process, details.
Fig 51: Final model process, details.
Fig 52: Final model process, wheel construction.
Fig 53: Final model process, stand construction.
Fig 54: Final model process, finishing and paint.
Fig 55: Ryde NZ final design.
Fig 56: Ryde NZ final design.
Fig 57: Designer Alistair Patterson with Ryde NZ final design.
Fig 58: Integrated helmet design.
Fig 59: Internally integrated chain and gearing design.
Fig 60: Integrated front LED light.
Fig 61: Integrated rear LED light.
Fig 62: Integrated seat adjustment lever closed.
Fig 63: Integrated seat adjustment lever open.
Fig 64: Snap on pannier bag clips.
Fig 65: Pannier bag attached to the Ryde NZ bike.
Fig 66: Pannier bag in use.
Fig 67: Multiple Ryde NZ bikes along side a track.
Fig 68: Ryde NZ bike in a potential environment
Fig 69: Ryde NZ usability storyboard.
Fig 70: Ryde NZ branding.
Fig 71: Ryde NZ users.