# Thesis Title Line1
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Firstname1 Surname1

A Thesis Submitted in Partial Fulfillment of the Requirements for the Degree of
Doctor of Philosophy in Computer Engineering
Prince of Songkla University
2022

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| **Thesis Title** | Thesis Title Line1 |
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This is to certify that the work here submitted is the result of the candidate's own investigations. Due acknowledgement has been made of any assistance received.

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I hereby cetify that this work has not been accepted in substance for any degree, and is not being currently submitted in candidature for any degree.

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# ABSTRACT

This thesis presents ...

# ACKNOWLEDGEMENTS

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# LIST OF ABBREVIATIONS AND SYMBOLS

| | |
|---|---|
| CNN | Convolutional Neural Network |
| ROI | Region of Interest |
| RPN | Region Proposal Network |

# CHAPTER 1

# Introduction

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# BIBLIOGRAPHY

[1] Wongtanawijit, R. and Kaorapapong, T. (2018). Rubber Tapped Path Detection using K-means Color Segmentation and Distance to Boundary Feature. In *2018 15th International Conference on Electrical Engineering / Electronics, Computer, Telecommunications and Information Technology (ECTI-CON)*, pages 126–129.

[2] Wongtanawijit, R. and Khaorapapong, T. (2019). Rubber Tapping Position and Harvesting Cup Detection Using Faster-RCNN with MobileNetV2. In *2019 23rd International Computer Science and Engineering Conference (ICSEC)*, pages 335–339.

# APPENDIX A

# Publications

## A.1 Conference

A.1.1 Wongtanawijit, R. and Kaorapapong, T. (2018). Rubber Tapped Path Detection using K-means Color Segmentation and Distance to Boundary Feature. In *2018 15th International Conference on Electrical Engineering / Electronics, Computer, Telecommunications and Information Technology (ECTI-CON)*, pages 126–129

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## A.2 Journal Article

A.2.1 Wongtanawijit, R. and Kaorapapong, T. (2018). Rubber Tapped Path Detection using K-means Color Segmentation and Distance to Boundary Feature. In *2018 15th International Conference on Electrical Engineering / Electronics, Computer, Telecommunications and Information Technology (ECTI-CON)*, pages 126–129

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| Degree | Name of Institution | Year of Graduation |
|---|---|---|
| Bachelor of Engineering (Computer Engineering) | Prince of Songkla University | 2022 |

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Scholarship declar goes here..

**List of Publication and Proceeding**

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