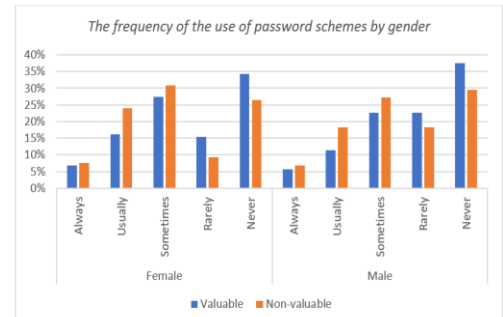
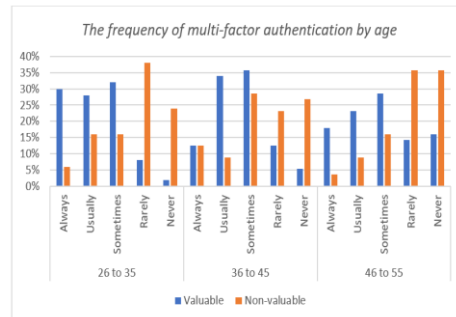
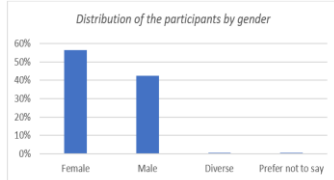
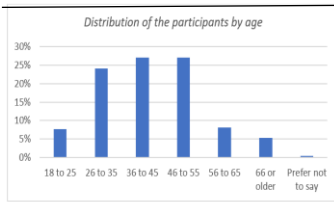


Password creation, usage and perceived value of the resources protected by passwords

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The demographics information

The finding of multi-factor authentication

The finding of the use of password schemes

INTRODUCTION

Passwords play a vital role in online services, and password security needs to be considered carefully by the password user.

In order to explore whether individuals' perceived value has an impact on the creation and use of passwords, this thesis mainly focuses on analysing the habit of password creation and usage, particularly in relation to the individuals' perceived value of the resources protected by passwords.

DEVELOPMENT

This research used the quantitative survey method. An online questionnaire was designed on SurveyMonkey to measure the differences in password creation behaviour and perceived value of the resource being protected between different participants.

The questionnaire was divided into three parts with a total of 38 questions, including the collection of demographic information, participants' password behaviour for valuable resources, and participants' password behaviour for non-valuable resources.

The participants were recruited via the researcher's personal Facebook page. All the participants were over the age of 18.

In the stage of data analysis, descriptive statistics were used to help understand the data. Data was visualised against different dimensions using tables and graphs.

FINDINGS

Multi-factor authentication is used more frequently in valuable resources than in non-valuable resources. The younger the participants, the higher the proportion using multi-factor authentication. In addition, males use multi-factor authentication for valuable and non-valuable resources more frequently than females. New Zealanders use multi-factor authentication for valuable and non-valuable resources less often than Chinese.

Females are more likely to share passwords with their children than males. More males than females share passwords with their parents and friends.

CONCLUSION

This research demonstrated participants' habits of password creation and usage, and also established the relationship between individuals' password behaviour and perceived values.

In this research, individuals have different perceived value to different resources. Online banking was considered to be the most valuable resource. In addition, the perceived value influences some behaviours of password creation and usage. When creating passwords, individuals prefer to set more characters for passwords with high perceived value, and less use password schemes for valuable resources. Individuals share valuable passwords less often than non-valuable passwords.