

Doctoral Dissertation

Introducing Appropriate Respondents to  
Questioners at Question and Answer Sites

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Doctoral Program of Engineering Design  
Graduate School of Science and Technology  
Kyoto Institute of Technology

Yuya Yokoyama



# Contents

|   |     |
|---|-----|
| List of Tables .....                                  | IV  |
| List of Figures .....                                 | VII |
| Abstract .....  | i   |
| Chapter1 Introduction .....                           | 1   |
| Chapter 2 Related Works .....                         | 5   |
| 2.1. Impression Evaluation .....                      | 5   |
| 2.2. User Behaviors or Activities .....               | 5   |
| 2.3. Quality of Answers or Their Relationships.....   | 7   |
| 2.4. Estimation of Best Answers .....                 | 9   |
| 2.5. Introducing Users to Answers .....               | 10  |
| 2.6. Difficulty of Questions and Answers .....        | 11  |
| 2.7. Systems or Techniques Related to Q&A Sites ..... | 13  |
| 2.8. Summary .....                                    | 16  |
| Chapter 3 Factors of Impression of Statements .....   | 17  |
| 3.1. Approach .....                                   | 17  |
| 3.2. Impression Words.....                            | 17  |
| 3.3. Experimental Procedure.....                      | 18  |
| 3.4. Experimental Result.....                         | 20  |
| 3.5. Summary .....                                    | 23  |

|  |               |
|--|---------------|
| <b>Chapter 4 Estimation of Factor Scores of Statements .....</b>               | <b>24</b>     |
| 4.1. Approach.....   | 24            |
| 4.2. Feature Values of Statements .....  | 24            |
| 4.2.1. Syntactic Information.....  | 24            |
| 4.2.2. Word Imageability.....  | 25            |
| 4.2.3. Closing Sentence Expressions .....                                      | 26            |
| 4.2.4. Word Familiarity .....  | 27            |
| 4.2.5. Notation Validity .....   | 27            |
| 4.3. Adopting Feature Values of Statements .....                               | 28            |
| 4.3.1. Multicollinearity and Quadratic terms .....                             | 28            |
| 4.3.2. Procedure of Choosing Feature Values .....                              | 28            |
| 4.4. Estimation Results.....   | 29            |
| 4.4.1. Using only Monadic Terms.....   | 29            |
| 4.4.2. Using Quadratic Terms .....   | 32            |
| 4.5. Considerations.....   | 32            |
| 4.5.1. Comparison of Estimation Accuracy .....                                 | 32            |
| 4.5.2. Interpretations for each Factor .....                                   | 35            |
| 4.6. Summary.....  | 37            |
| <br><b>Chapter 5 Impression and Suitability of Questions and Answers .....</b> | <br><b>38</b> |
| 5.1. Purpose.....  | 38            |
| 5.2. Dataset.....  | 38            |
| 5.3. Results.....  | 40            |
| 5.4. Analysis.....   | 42            |
| 5.5. Considerations.....   | 43            |

|   |         |
|---|---------|
| Chapter 6 Finding Appropriate Respondents to Questions .....                          | 47      |
| 6.1. Method .....   | 47      |
| 6.2. The Number of Answers Used .....   | 48      |
| 6.3. Evaluation .....   | 49      |
| 6.3.1. Evaluation Procedure .....   | 49      |
| 6.3.2. Obtaining Averaged Fitness Rates toward Determining Relevant Respondents ..... | 54      |
| (1) Procedures .....  | 554     |
| (2) Obtaining Averaged Fitness Rates toward Determining Relevant Respondents.....     | 56      |
| (3) Relevant Respondents .....  | 57      |
| (4) Usage of Relevant Respondents in Calculating Precision and Recall .....           | 64      |
| 6.3.3. Evaluation Result .....  | 65      |
| 6.4. Considerations.....  | 65      |
| 6.5. Summary.....   | 72      |
| <br>Chapter 7 Conclusions .....   | <br>73  |
| <br>Acknowledgements .....  | <br>75  |
| <br>Bibliography.....   | <br>76  |
| <br>Appendix A .....  | <br>86  |
| Appendix B .....  | 87      |
| Appendix C .....  | 88      |
| Appendix D .....  | 166     |
| <br>Publication List .....  | <br>185 |

# List of Tables

|  |    |
|--|----|
| 3-1 Chosen Impression Words.....   | 19 |
| 3-2 The Order of Experiment Procedure.....   | 19 |
| 3-3 Results of Inspecting Significance of Gender.....  | 20 |
| 3-4 Results of Inspecting Significance of Books.....   | 20 |
| 3-5 Eigenvalues, Contribution Ratio and Cumulative Contribution Ratio of Each Factor.....    | 21 |
| 3-6 Factor Burdens of Nine Factors.....  | 22 |
|  |    |
| 4-1 The Procedure of Choosing Feature Values of Statements.....                              | 29 |
| 4-2 Feature Values Used for Estimating Factor Scores.....                                    | 30 |
| 4-3 Multiple Correlation Coefficients.....   | 31 |
| 4-4 Explanatory Variables with the Highest SPRCs.....  | 36 |
|  |    |
| 5-1 The Question Statements Used for the Experiment: English Version.....                    | 39 |
| 5-2 The Question Statements Used for the Experiment: Original Japanese Version.....          | 39 |
| 5-3 Answer Statements whose Factor Scores are Close to those of the Question on Auction..... | 44 |
| 5-4 Answer Statements whose Factor Scores are Close to those of the Question on PC.....      | 45 |
| 5-5 Answer Statements whose Factor Scores are Close to those of the Question on Love.....    | 46 |
|  |    |
| 6-1 An Example of Appearance Times and Scores.....   | 48 |
| 6-2 The Number of Unique Users.....  | 48 |
| 6-3 The Number of Answers Written by Fifteen Unique Users for Each Statement.....            | 50 |
| 6-4 The Rank Based on the Appearance and Score (Auction).....                                | 51 |
| 6-5 The Rank Based on the Appearance and Score (PC).....                                     | 52 |

|   |     |
|---|-----|
| 6-6 The Rank Based on the Appearance and Score (Love).....                            | 53  |
| 6-7 An Example of the Result Obtained by the Method Based on Averaged Scores.....     | 54  |
| 6-8 An Example of the Result Obtained by the Method Based on Distance.....            | 54  |
| 6-9 Results of Inspecting Significance of Gender.....                                 | 57  |
| 6-10 Averaged Fitness Rates (Auction).....  | 58  |
| 6-11 Averaged Fitness Rates (PC).....   | 59  |
| 6-12 Averaged Fitness Rates (Love).....   | 60  |
| 6-13 Best Averaged Fitness Rates (Auction).....                                       | 61  |
| 6-14 Best Averaged Fitness Rates (PC).....  | 62  |
| 6-15 Best Averaged Fitness Rates (Love).....  | 63  |
| 6-16 Actual Results from Evaluations (Auction, Male, Proposed Method, n=4.0).....     | 64  |
| <br>  |     |
| B-1 Notation and Their Descriptions.....  | 87  |
| <br>  |     |
| C-1 A Set of Question and Answer Statements (Auction, English Version).....           | 88  |
| C-2 A Set of Question and Answer Statements (Auction, Original Japanese Version)..... | 97  |
| C-3 A Set of Question and Answer Statements (PC, English Version).....                | 107 |
| C-4 A Set of Question and Answer Statements (PC, Original Japanese Version).....      | 125 |
| C-5 A Set of Question and Answer Statements (Love, English Version).....              | 142 |
| C-6 A Set of Question and Answer Statements (Love, Original Japanese Version).....    | 154 |
| <br>  |     |
| D-1 Precision and Recall on Auction (Male, Proposed).....                             | 167 |
| D-2 Precision and Recall on Auction (Male, Averaged Score).....                       | 168 |
| D-3 Precision and Recall on Auction (Male, Distance).....                             | 169 |
| D-4 Precision and Recall on Auction (Male, Proposed).....                             | 170 |
| D-5 Precision and Recall on Auction (Male, Averaged Score).....                       | 171 |
| D-6 Precision and Recall on PC (Male, Distance).....                                  | 172 |
| D-7 Precision and Recall on PC (Male, Proposed).....                                  | 173 |

VI

D-8 Precision and Recall on PC (Male, Averaged Score).....174  
D-9 Precision and Recall on PC (Male, Distance).....175  
D-10 Precision and Recall on PC (Female, Proposed).....176  
D-11 Precision and Recall on Love (Female, Averaged Score).....177  
D-12 Precision and Recall on Love (Female, Distance). ....178  
D-13 Precision and Recall on Love (Female, Proposed).....179  
D-14 Precision and Recall on Love (Female, Averaged Score).....180  
D-15 Precision and Recall on Auction (Female, Distance).....181  
D-16 Precision and Recall on Auction (Female, Proposed).....182  
D-17 Precision and Recall on Auction (Female, Averaged Score).....183  
D-18 Precision and Recall on Auction (Female, Distance).....184



# List of Figures

|  |    |
|--|----|
| 5-1 The Rank According to Increasing Euclidean Distance (Auction)..... | 41 |
| 5-2 The Rank According to Increasing Euclidean Distance (PC).....      | 41 |
| 5-3 The Rank According to Increasing Euclidean Distance (Love).....    | 42 |
|  |    |
| 6-1 Precision and Recall on Auction (Male, Proposed).....              | 66 |
| 6-2 Precision and Recall on Auction (Male, Averaged Score).....        | 66 |
| 6-3 Precision and Recall on Auction (Male, Distance).....              | 66 |
| 6-4 Precision and Recall on PC (Male, Proposed).....                   | 67 |
| 6-5 Precision and Recall on PC (Male, Averaged Score).....             | 67 |
| 6-6 Precision and Recall on PC (Male, Distance).....                   | 67 |
| 6-7 Precision and Recall on Love (Male, Proposed).....                 | 68 |
| 6-8 Precision and Recall on Love (Male, Averaged Score).....           | 68 |
| 6-9 Precision and Recall on Love (Male, Distance) .....                | 68 |
| 6-10 Precision and Recall on Auction (Female, Proposed).....           | 69 |
| 6-11 Precision and Recall on Auction (Female, Averaged Score).....     | 69 |
| 6-12 Precision and Recall on Auction (Female, Distance).....           | 69 |
| 6-13 Precision and Recall on PC (Female, Proposed).....                | 70 |
| 6-14 Precision and Recall on PC (Female, Averaged Score).....          | 70 |
| 6-15 Precision and Recall on PC (Female, Distance).....                | 70 |
| 6-16 Precision and Recall on Love (Female, Proposed).....              | 71 |
| 6-17 Precision and Recall on Love (Female, Averaged Score).....        | 71 |
| 6-18 Precision and Recall on Love (Female, Distance).....              | 71 |



## Abstract

On the Internet, the users of Question and Answer (Q&A) sites rapidly increase. With more users, however, the mismatch of questioners and respondents arises. It is required to introduce a question to the users who could appropriately answer it.

A number of prior works have tackled the issues arising on Q&A sites. To the best of our knowledge, however, the way of introducing appropriate respondents to questioners has not been established yet. The objective of this research is to present questions to qualified users who can appropriately answer them.

Firstly, in order to be able to judge the affinity of a questioner and a respondent, the impressions of 60 questioners and their responses posted at Yahoo! Chiebukuro are experimentally evaluated. By applying factor analysis to the scores of the experiment, it is clarified that the impression of the statements could be captured by nine factors.

Factor scores are then estimated by using the features including syntactic information, word imageability, closing sentence expressions, word familiarity, and notation validity. With the consideration of quadratic terms and multicollinearity, the good overall estimation accuracy has been obtained.

The method of introducing appropriate respondents to questioners is proposed. The proposed method uses the number of appearance of respondents and the score based on the distance between the factor scores of a question and an answer already posted. Impression evaluation experiment is carried out in order to evaluate the proposed method. The proposed method is compared with the methods using averaged scores and the distances. It is shown that the proposed method outperforms the other methods. It is also shown that the proposed method could successfully select the respondents that are almost more than averagely appropriate to a question.



# Chapter1

## Introduction

Recently, the number of people using Question and Answer (Q&A) sites on the Internet has been increasing. In 2014, Yahoo! Chiebukuro [1], one of those Q&A sites, has over 16.7 million users registered, and accumulative 130 million question and 340 million answer statements since 2004 [2]. Q&A sites are online communities where users can manually post questions and answers. Hence, these sites can be considered as databases containing enormous amounts of knowledge that can be used to solve various problems. When a user posts a question, other users may respond. The questioner selects the most appropriate response as the “Best Answer” and awards the respondent with some points as a form of fee. The Best Answer is the response statement that the questioner subjectively finds most satisfying.

As the number of users of Q&A sites increase and more questions are posted, however, it becomes harder for respondents to select questions that match their specialty and interests. Consequently, a question posed by a user may not be seen or answered by qualified respondents. Moreover, if an appropriate respondent is not encountered, mismatching may occur, which may cause the following problems:

- A questioner may acquire incorrect knowledge from inappropriate answers.
- Respondents may not have the necessary knowledge to properly answer the question, and thus the problem remains unsolved.
- Users may be offended by answers that contain abusive words, slanders, or statements against public order and standards of decency.

There are a number of prior works that investigate Q&A sites; behaviors or activities of users [4-21], inspecting the quality or tendency of answer statements [22-32], estimating Best Answers [33-43], challenging the difficulties of question or answer statements [50-64], or systems related to Q&A sites [65-85]. Especially, there are several prior works that introduce users to answers through user profiles or relationships between users [44-49]. For example, one of these works focused on using profiles constructed on the basis of their answering history in order to provide appropriate experts with a newly posted question [44]. These works, however, have focused mainly on text features or link analysis. Some users may prefer polite style, while others may write statements in rude style. Some users often use abstract words, whereas others express specific words. These tendencies have not been considered. Meanwhile, our work focuses on using impression as well as textual feature values. To the best of our knowledge, the way of introducing appropriate respondents to questioners has not been established yet.

The objective of this research is to present questions to qualified users who can appropriately answer them, thus avoid the problems described before. Here, the impressions of question and answer statements are focused on. They are related to feeling, sense, and/or mind. They may play an important role in judging the fitness of question and answer statements. Considering the impressions of statements may enable questions to be presented to appropriate users.

First, the impressions of statements are experimentally obtained. The impressions of sixty statements posted on Yahoo! Chiebukuro are evaluated. By applying factor analysis to the scores obtained in the experiment, nine factors are obtained.

Factor scores obtained through factor analysis represent the impressions of statements. However, mere factor scores for the statements used in the experiment can be obtained. It is required to estimate the factor scores of other statements. They are estimated through multiple regression by using feature values of the statements. Feature values include the syntactic information of the statements, such as word classes (such as nouns and verbs), and the number of appearances (or the percentage) of Chinese characters and alphanumeric characters. Moreover, word imageability, closing sentence expressions, word familiarity and notation validity are also adopted as new feature values. It is shown that the overall estimation accuracy for all the nine factors is good. The validity of estimating the scores of each factor by obtaining the major feature values is confirmed.

The possibility of detecting respondents who can give an appropriate answer to a newly posted question is examined. It is shown that there is possibility that users other than actually posted respondents could be an appropriate answerer. It is also shown that there are some users who appear several times in higher rank in ascending order of Euclidean distance between the factor score of a questioner and that of a respondent. Those users are thought to be capable of giving proper responds to a question.

Based on the observation described above, the method of selecting respondents who can give an appropriate answer to a newly posted question is proposed. The proposed method determines and ranks the possibly qualified respondents according to the appearance and score on the basis of distance. It is experimentally evaluated by comparing it with the methods based on averaged scores and distances through precision and recall. It is shown that the proposed method outperforms the methods compared with it. It is also shown that the proposed method could successfully select the respondents that are almost more than averagely appropriate to a question.

The organization of this dissertation is as follows. In Section 2, related works are described. A number of prior works have been reported on investigating Q&A site users; estimating Best Answers, inspecting the quality or tendency of answer statements, challenging the difficulties of question or answer statements, or systems related to Q&A.

Factors of impression of statements is obtained in Section 3. First, fifty impression words that are considered to be effective as evaluating sentences are extracted. With using these impression words, impression evaluation experiment is conducted against sixty question and answer statements actually posted at Yahoo! Chiebukuro [1]. As a result of factor analysis applied to the experimental result, nine factors on statements were obtained.

Estimation of factor scores of statements is depicted in Section 4. Factor scores are estimated from feature values of statements through multiple regression analysis. The seventy-seven feature values adopted are syntactic information, word imageability, closing sentence expressions, word familiarity, and word validity. With the consideration of quadratic terms and multicollinearity, all the factors are confirmed to be validly estimated.

Section 5 examines the questions actually already posted in Yahoo! Chiebukuro in order to inspect the

possibility of detecting qualified users who can be expected to give an appropriate answer. It is assumed that the answerers, who posted the answer statements close to the question one, might pose the answer to the question. Through the analysis, it can be considered that the appearance and the score on the basis of the distance between the factor scores of a question and an answer already posted may also help us select appropriate answerers.

Section 6 proposes and evaluates the method of selecting the factor score of a questioner and that of a respondent. By using the appearance and the score based on the distance, the proposed method determines and ranks the possibly qualified respondents. Experimental evaluation shows the superiority and applicability of the proposed method.

Finally, Section 7 concludes the paper.



# Chapter 2

## Related Works

### 2.1. Impression Evaluation

Kumamoto has evaluated the impression from newspaper [3]. A hundred subjects examined ten newspaper articles with forty-two impression words by five levels (Agree, Fairly Agree, Fairly Disagree, Disagree, None), which were conducted nine times. Collecting and analyzing impression evaluation scores, he has proposed impression axes suitable for expressing impression from newspaper.

For our research, similar methods are used except that the target of the impression evaluation experiment is a set of question and answer statements rather than newspaper articles.

### 2.2. User Behaviors or Activities

A number of researches on user behaviors or activities at Q&A sites have been conducted. Miura *et al.* have conducted a questionnaire survey of Yahoo! Chiebukuro users in order to illustrate the common profile of the users [4-10]. The result suggests that members join the community and post their own information for helping others. Respondents can be divided into four types of participation pattern according to the number of questions and answers posted [4, 5]. They gradually investigate each tendency of several aspects on Q&A sites: the activities and behaviors of questioners [6], the knowledge observed from the data of respondents [7], the inspection through morphological analysis [8], and the features of continuous and active participants [9]. They have also constructed hypothetical model on the basis of derived knowledge and have investigated its performance by using highly generalizable data [10]. Sato *et al.* have proposed an evaluation method named QARank, which quantifies how users have

contributed in Q&A sites [11]. QARank is examined and compared with random networks built on the first answer users who immediately answers the question and the best answer users who give the most useful answer. It is shown that respondents are classified into four groups in accordance with their contributions.

Sato *et al.* also proceed to introducing “QARank” and “QAHits” that estimate how users contribute in Q&A sites [12]. With these methods added to the analysis, user behavior difference among categories can be detected. Chen *et al.* have proposed a method to evaluate the expertise of respondents based on their reputation [13]. The proposed system outperforms the existing system with the consideration of trend analysis and ranking correlation scores. At the same time, it has been shown that more people tend to answer questions rather than mere ask questions.

Liu *et al.* have attempted to predict the satisfaction of respondents through their models with state-of-the-art classification techniques incorporated [14]. Their results have shown that the model outperforms human evaluations and the satisfaction can vary according to their history at Q&A sites. They have also focused on predicting the satisfaction of respondents at Q&A sites, defined as “searcher satisfaction.” [15] They have proposed two methods for a prediction issue: a direct method and a composite method. The consideration of predicting searcher satisfaction results in a considerable improvement over the quality of ranking provided by Google's search engine. Rose *et al.* construct a framework for understanding the underlying goals of search [16]. Their analysis has led to the suggestion that “navigational” searches are much less dominant than generally expected, while previously unexplored goal appears to be the majority of web searches. It is also indicated that understanding of search goals can be used to develop web search engine.

Zhang *et al.* have analyzed a large online help seeking community in order to encourage how people can mutually help [17]. They have then examined a set of network-based algorithms that analyze the relative expertise. The experimental result has shown that structural information help evaluate an expertise network, and that the algorithms rate as human assessors do.

Welser *et al.* distinguished the structural and behavioral signatures of one role from others [18]. Their analysis leads to two points: (1) visualization is effective in identifying signatures of social roles; and (2) social roles in online environment needs examining through the mixture of multiple measures. Shah *et al.*

tried to understand how various characteristics of user participation could affect the design and success of the Q&A sites [19]. It has been shown that active user participation plays a vital role in Q&A sites. They also showed that Yahoo! Answer design prompts users to make an active contribution. Choi *et al.* focused on the issues of identity and anonymity that is occasionally related to key answer outcomes, which are particularly essential in the field of health questions [20]. It has been shown that objective and clearer identity helps respondents comprehend what they seek for and prompts them to give an answer to his/her question.

On the other hand, there is a research focusing on malicious users at Q&A sites. Ishikawa *et al.* have proposed a method to detect users who post Q&A through multiple accounts and manipulate their evaluation as respondents [21]. They have revealed users according to posted histories and characteristics of statements. The experiments were considered to be effective as 135 user pairs suspicious to be an identical user were detected.

These prior works focus on the user behaviors or activities at Q&A sites by using posted histories of users. In these researches, however, the impression that users might feel from the statements has not been considered and vague.

### 2.3. Quality of Answers or Their Relationships

Several researches are focusing on investigating the tendency of quality of answers or relationships of answers. Agichtein *et al.* used the content and usage features of questions and answers to assess their quality [22]. Of the twenty major features determining the quality of a question, eleven were related to web information and nine were obtained through questions. Liu *et al.* have analyzed the question types so that alternatives to the best answers can be found out [23]. Then they have proposed applying automatic summarization techniques to shortened answers or best answers. Their experimental results have shown that question-type focused summarizations lead to the drastic improvements of answer quality.

Taki *et al.* aim to construct the trust indexes for Q&A sites [24]. From the data used for the analysis, three tendencies have been confirmed: (1) The answers to be uniquely determined hardly gets additional

answers, (2) The answer including external reference, URL, is apt to be chosen as best answers, and (3) Whether the time zones of many questions posted and those of best ones depend on categories. Based on the results, three criteria for answer trust are: (i) for the question whose answers to be uniquely settled, the time since the last answer posted and the number of unseen of the answer, (ii) the existence of external references that supports answer, and (iii) for question classifications which differ in the time zone of many questions posted and that of many best answers, merely the time zone of questions and answers.

Asanoma *et al.* have examined what features the documents with high measure values have and whether evaluation measures are predictable from the features of documents [25]. They have introduced two evaluation measures from the point of view of accuracy and minuteness of the explanation: how match answers are and how minute explanations. For how-to type questions, regression analysis is applied to the investigation. The analysis resulted in positive correlation between the presence of itemization and each measure, thus it is possible to predict how answers match.

Shimada *et al.* have proposed a method to relate articles by estimating the overlaps of interested fields among respondents from relationships among several answers given to an identical question [26]. The distribution of number of respondents per question and the overlaps of categories they post were revealed. Ishikawa *et al.* have conducted an experiment in which the quality of answers was evaluated by several assessors [27-29]. They then quantitatively determined the value of “Good Answer with Weights (GAWs).

Raban focused on self-presentation expressions between questioners and respondents related to value of information [30]. The examinations conducted on Google Answers indicated that implicit cues in textual online communication can make Q&A sites successful and sustainable. Suryanto *et al.* have proposed a quality-aware framework that can choose answers from Q&A sites considering both answer quality and answer relevance [31]. It has been proved that quality as well as relevance are an important criteria in selecting answers. Zhu *et al.* have constructed a multi-dimensional model for assessing the quality of answers in social Q&A sites [32]. They considered both informational quality and natural language processing techniques. Their performance results showed that the dimensions and linear model are the best suited to assess the synthetic quality.

These related works focus on the tendency of quality of answers or relationships of answer. These works, however, have not assessed the quality of the answer statement through the impression a reader might feel.

## 2.4. Estimation of Best Answers

Several researches at estimating the Best Answers have been attempted. Blooma *et al.* used both textual and non-textual features to predict the Best Answers. They used five textual and five non-textual features [33]. It was found that textual features influence the quality of answers more than non-textual features. Accuracy, completeness, language, reasonableness, and length are considered as textual features. The analogical reasoning approach [34] finds the Best Answer by using links between questions and answers contained in previous knowledge. In their approach, three textual features, seven statistical features, and five user interactions were used.

Kim *et al.* have proposed the Best Answer selection criteria [35], composed of seven categories: content value, cognitive value, socio-emotional value, extrinsic value, information source value, utility, and general statement. For information-type questions, content values are important. Utility is important for suggestion-type questions, while socio-emotional values are vital for opinion-type questions. Nishihara *et al.* have also proposed a method of detecting the Best Answer to a question [36]. The Best Answer to a question is obtained by noticing the affinity between closing sentence expressions of questioners and respondents, and the clustering combinations of questions and Best Answers.

Ishikawa *et al.* investigated if a machine learning is able to estimate best answers on a QA site [37]. First, a best answer estimation experiment was conducted with two human assessors. Factors that lead to best answers were then analyzed from the experimental result. Using the factors “Detailed,” “Evidence” and “Polite,” they constructed a machine learning system and compared the results between machine learning system and human assessors. As a result, the precision of the machine learning system outperforms the result of the assessors in “Personal computer” category. Adamic *et al.* have analyzed the characteristics of knowledge of Yahoo! Answers and cluster the categories into three groups by thread length [38]. The prediction of Best Answer was attempted by using network analysis, entropy and

cross-validation. The results showed that reply length, the number of competing answers, and the track record of the user were the most predictive of whether the answer would be chosen.

Kuriyama *et al.* have classified posted questions into several types by manually analyzing them [39]. Common features were extracted and used to inspect if questions are automatically classified. Furthermore, the association between question types and Best Answers was examined. It was considered that whether Best Answers were chosen by questioners might be affected by question types and user answer histories. They also investigated how the expression of question statements could affect the contents and expression of answer statements [40]. It was proved that the proportion of characters included in questions and answers have certain tendency. They also revealed that it is possible to estimate “Best Answers” by considering the features of histories of users [41].

Kagawa *et al.* premised that users who are going to post additional answers would see the answers already posted as well as its question [42]. They tried to analyze network figures manually created by two subjects in order to evaluate the extraction of dependence between questions and answers. They also proceeded to analysis by comparing the dependences using good answers with best answers [43]. It was proved that there is a possibility of detecting the features of good quality answers.

These prior works focus mainly on the estimating Best Answers. These researches, however, emphasize on estimating and analyzing Best Answers and not the other non-best answers.

## 2.5. Introducing Users to Answers

Several researches have been attempted in terms of introducing users to answers. Riahi *et al.* investigated the way to provide appropriate experts with a newly posted question [44]. Profiles were constructed on the basis of their answering history and then used through several measures. For some of the dataset, their proposal model showed better performance than other methods in recommending new questions to experts.

Jurczyk *et al.* detected authority users for specific question categories through link analysis [45]. Link structures of communities was analyzed in order to improve the quality of answers. Kabutoya *et al.* have proposed a method that recommended questions to the appropriate respondents [46]. They used link

prediction by focusing on the growing pattern of QA network. Experimental evaluation results showed that their proposed method was likely to be effective in recommending a right question to a respondent.

Watanabe *et al.* examined the question classification considering the existence of objectively correct answers to the question so that it becomes easier for respondents to choose questions [47]. The distribution of question types differed according to categories when classified by an assessor. It is generally possible for questions to be classified by question types when classified by two assessors. Classified by machine learning, question types are thought to be profoundly affected by some specific words.

Harper *et al.* sought for predictors of answer quality through a comparative and controlled field study of responses provided across several online Q&A sites [48]. As a result of the comparison analysis, it was shown that each Q&A site had individual tendency and features as to user contributions to the sites. Arai *et al.* have proposed a general model to predict quality of contents in Q&A sites with using non-textual feature values [49]. Their experimental results showed that its performance attained best when correlation features, answer features and answerer history features are considered.

These prior works try to introduce users to answers through user profiles or relationships between users. The impression, however, is not taken into consideration in these works.

## 2.6. Difficulty of Questions and Answers

Several researches are tackling the challenging issues of question or answer statements. Jimbo *et al.* focused on and used the relations between utterances so that users can easily read answers [50]. They defined and identified two types of the relations between questions and answers, and four between answers. Then they proposed a method for summarization of answers in QA sites. They showed that relations between utterances improve the performance of summarization. Taniguchi *et al.* showed a method of extracting information necessary for various questions from the answers posted at Q&A sites [51]. Out of 297 kinds of information that must be written in various questions extracted through proposed method, 241 kinds were correctly extracted.

Inoue *et al.* have proposed methods for collecting opinions and extracting issues against current topics,

and have measured the effectiveness through evaluation experiment [52]. Polarity was taken into consideration in collecting opinions and detecting the polarity inversion. Severyn *et al.* constructed structural representations of question and answer statements and their mutual relationships by mere utilizing an off-the-shelf shallow syntactic parser [53]. Experimental results showed that their model contributed to reducing error in recall. Jeon *et al.* have proposed an automatic retrieval method of building collections semantically similar question pairs from the Q&A archives [54]. This system also integrated word translation probabilities in order to measure the semantic similarities between words. Experimental results showed that their model performed better than other approaches in detecting semantically similar questions.

Cong *et al.* proposed a system to detect question-answer pairs from online forums [55]. Two different components were proposed: a sequential pattern based classification for finding questions, and a graph based propagation method for detecting answers. Their system was proved to be effective through experiments. Duan *et al.* proposed an MDL-based tree cut model to search questions by identifying question topics and question focus [56]. They then structured questions in a data structure composed of question topics and questions. Experiment was conducted on ‘travel’ and ‘computer & Internet’ categories from Yahoo! Answers. Their results showed that their approach outperformed other approaches.

Magnini *et al.* have proposed an approach to answer validation by considering and comparing two techniques: statistical and content-based techniques [57]. The integration of those techniques resulted in attaining high performance. It was also observed that there was a correlation between the system and human assessment towards the correctness of respondents. Cui *et al.* focused on fuzzy relation matching rather than too strict matching so that semantically equivalent relationships between questions and answers can be used [58]. Their analyses resulted in great performance in retrieving by at most 78%.

Verberne developed an analysis method for automatically answering why-questions based on syntactic categorization and answer type determination [59]. The performance was proved to be promising as it showed a high precision. Girju focused on automatic obtainment of the causal relations for question answering regarded to be as one of the challenging issues in natural language processing [60]. She developed an inductive learning approach to the automatic discovery of lexical and semantic constraints



needed for the disambiguation of causal relations.

Soubbotin *et al.* assumed that answers can be discerned by their correspondence to patterns describing the structure of strings that conveys certain semantic contents [61]. Various patterns were built by using different combinations of blocks and syntactic elements. Their analysis resulted in high degree of accuracy. Harper *et al.* distinguished informational and conversational questions in Q&A sites [62]. The questions were automatically classified as informational or conversational through machine learning. Its classification accuracy achieved as high as 89.7%.

Bian *et al.* proposed a ranking framework to retrieve factual information from social media [63]. In order to find the right factual contents, they focused on how to incorporate the relevance, user interaction, and community feedback information. The analysis results indicated that textual features and community features were vital. Surdeanu *et al.* focused on linguistic features to improve search on ranking answers to non-factoid questions [64]. They then constructed representation for complicated linguistic features. Their experimental results proved that considering complex linguistic features contributed to statistically significant performance improvement.

These prior works mostly use syntactic information or textual features to solve the issues of Question and Answers sites. None of these works, however, have tried to solve the issues by using the impression readers might feel.

## 2.7. Systems or Techniques Related to Q&A Sites

There are some researches tackling and using systems or techniques related to Q&A sites. Kwok *et al.* proposed a fully automated question-answering system named MUDLER [65]. Compared with the performance of Google or AskJeeves, its performance showed better recall and required less user effort. Hovy *et al.* introduced a system named Webclopedia [66]. The system classifies QA types, uses a syntactic-semantic parser, and combines word- and parse-tree-level information so that answer passages can be identified.

Brill *et al.* proposed a method by using a number of text data online [67]. They first sought for suitable answer strings from online text. They then developed two semi-independent system so that

mutual strengths can be enforced and wrong answers can be corrected. Eda *et al.* have proposed an instant question system [68]. The system supports making question statements by posing a similar question as the one being input, calculated through Vector Space Model and Locality Sensitive Hashing.

Kiyota *et al.* have developed a dialog based QA system, Dialog Navigator, which can answer questions based on large text knowledge base in order to lessen the vagueness of questions [69, 70]. The system has features of precise text retrieval and user navigation so that users can get desired answers [69]. It was confirmed through experiments that the system had the ability to make dialogs with clarifying vague questions as well as modifying speech recognition errors [70].

Wang *et al.* have constructed a system that extracts and poses a question similar to the one which is about to be asked and its answer from the respondent's histories of the questions and answers [71]. This system is expected to enable questioners to estimate the attitude and thoughts of respondents. Through the experiment result, the proposal method showed certain validity. Lin *et al.* constructed an open-domain question answering system called Araena that can extract answers from websites by using "knowledge annotation" and "knowledge mining. [72]" The system was confirmed if it correctly worked and evaluated with using TREC-2002 data. Its performance on each component as well as both as a whole was evaluated.

Zhang *et al.* proposed a system equipped with pattern mining and matching approach to question answering [73]. Textual patterns can be learned from the Web and used to answer the question. Several experiments were conducted in order to evaluate its performance by using TREC QA track data. Prager *et al.* used a new technique for question answering named Predictive Annotation and inspected its performance system [74]. Ninety percent of the questions could be dealt with by their techniques.

Ko *et al.* developed a unified framework in order to enhance the ranking of correct answers [75]. The framework could regard evidence of similarity among answer candidates as well as use multiple resources for inspecting answer candidates. Their experiment results showed that the framework drastically improved answer selection performance for four different extraction techniques. They also proposed a language-independent probabilistic answer ranking frameworks for different languages [76]. Chinese and Japanese performance showed 40 percent and 45 percent improvement, respectively, thus proving applicable to multiple languages.

Xue *et al.* proposed a retrieval model equipped with both word-to-word translation probabilities for question part and a query likelihood approach for the answer part [77]. Their experimental results showed the effectiveness of both a retrieval model and an estimation method. Higashinaka *et al.* constructed a corpus-based method for answering why-questions so that manual efforts could be saved [78]. Casual expressions were automatically collected and used to yield features to answer candidates by using machine learning technique. Their system named NAZEQA surpasses baseline using manual patterns.

Cao *et al.* proposed a category-based framework for seeking categorization information [79]. Several techniques were incorporated to develop the characteristics of the categories and to integrate the probabilities of users. Their proposed system showed the potential of improving the performance of question search. Soricut *et al.* proposes a question answering system that goes beyond answering factoid questions on the basis of the assumption that many of the questions whose answers to be needed are not factoid questions [80]. They used large document collections and learning mechanisms for answer extraction. Their evaluation system in a modular fashion showed high answer accuracy for non-factoid questions.

Donato *et al.* have demonstrated that research missions, which was defined as requiring the obtainment of facts and information online, could be automatically discerned on the spot [81]. Search Pad, an application launched by Yahoo!, was utilized to verify their belief that identifying and using search missions is helpful for users. They evaluated and provided results by using the data gathered by Search Pad. Leinder *et al.* proposed an evaluation method by inserting answers from Frequently Asked Questions (FAQs) to inspect how competent the retrieve system is [82]. FAQs were used for two aspects: a good simulation for truly open-domain systems, and providing a fully-automated evaluation process. The strong advantage of their evaluation method was described as “fully automatic nature.”

Du *et al.* devised a reading comprehension system aiming to understand a document and automatically return answer [83]. They proposed a method by using external knowledge in order to enhance the performance beyond the baseline set by bag-of-words method. Their analysis performance showed the improvement due to the metadata matching and the application of Web-derived answer patterns. Takahashi *et al.* focused on the semantic similarity of words in detecting similar questions

because the size of documents was often so small that the words included in questions did not appear in the documents of retrieval object [84]. They proposed the appropriate use of answer information and the combination of theoretical and automatic combination of estimated values. Their method showed effective use of answer statements and significantly outperforms the baseline. Punyakanok *et al.* represented the approximate tree matching algorithm by using dependency trees and semantic information [85]. The evaluation was conducted on the TREC-2002 questions and resulted in the potential of their proposed method.

These prior works have developed systems or techniques by integrating syntactic information or textual features. These works, however, have not developed the system that considers the impression.

## 2.8. Summary

There have been a number of researches on Q&A sites; estimating Best Answer, inspecting the quality or tendency of answer statements, challenging the difficulties of question or answer statements, or systems related to Q&A. While these prior works mainly use mere textual feature values, this work focuses on using impression as well as textual feature values and then establishes a system integrating how to introduce questioners to appropriate respondents. To the best of our knowledge, a system that introduces appropriate respondents to questioners at Q&A sites has not been referred yet.

# Chapter 3

## Factors of Impression of Statements

### 3.1. Approach

The goal of this study is to introduce a question to the users who could appropriately answer it. To this end, the correspondence between a question and its “Best Answer” is tried to be clarified. For clarifying the correspondence, the degrees of impression of statements are used. These degrees are experimentally obtained by evaluating the statements. First, impression words used in the experiment are selected. The statements of questions and answers posted at Yahoo! Chiebukuro [2] are evaluated through the impressive words. Factor analysis is applied to the scores obtained through the experiment in order to obtain factor scores.

### 3.2. Impression Words

First, some words, which seem effective as impression words out of 21,690 words listed in a vocabulary dictionary [86], are extracted. 806 words are extracted. Next, impression words are chosen according to the following procedures:

- 1) 806 impression words are classified into the following groups:
  - Group A: Words used in positive sense
  - Group B: Words used in negative sense
  - Group C: Words that cannot be divided into A or B
- 2) In each group, words of similar meanings are combined.
- 3) In evaluating sentences, the most generally used words are considered and determined.
- 4) Words of similar meanings are merged.

Through these procedures, fifty words are selected. Impression words obtained are listed in Table 3-1. The words can be divided into words as to sentence expressions and those as to sentence contents.

### 3.3. Experimental Procedure

With using the 50 impression words, impression evaluation experiment is conducted for 41 subjects (33 males and 8 females, age of 19-23). Experiment materials are twelve sets of question and answer statements (three each from four major categories: Yahoo! Auction, PC, love counseling & human relationships, and political & social problems), out of the statements actually posted at Yahoo! Chiebukuro [1] on September 2005. Each set consists of a question and four answers including the “Best Answer.” The “Best Answer” is defined as a respond statement the questioner subjectively finds most satisfying. Sixty statements are used in total.

The criteria of statement selection are as follows:

- Exclude too biased statements.
- Exclude statements contrary to public order and standards of decency.
- Exclude questions necessary to refer to URL.
- Select evenly the amounts of letters by weaving shorter ones and longer ones.
- Select not to overlap statements with similar contents and points.
- Select uniformly each category.

Subjects may be tired before finishing all of the evaluations. If so, reliability decreases. Therefore, twelve sets are divided into three groups, each of which contains four categories. For each group, answer-filing forms are prepared as a book. Three books are denoted as Book A, B and C. Subjects evaluate the impression of the statements in the order of Book A, B and C. For each book, subjects evaluate the impression of the statements in the order shown in Table 3-2. Here, §1 - §3, §4 -§6, §7 -§9 and §10 -§12 are the questions and answers of the categories of Yahoo! auction, PC & peripherals, love counseling & human relationships and political & social problems, respectively. Q indicates a question

**Table 3-1: Chosen Impression Words.**

| Expression of Statements(22 words) |              | Content of Statements(28 words) |                |
|------------------------------------|--------------|---------------------------------|----------------|
| Easy                               | Persistent   | Touching                        | Resentful      |
| Skillful                           | Faltering    | Wonderful                       | Disillusioning |
| Courteous                          | Dull         | Favorable                       | Fearful        |
| Beautiful                          | Insufficient | Impressive                      | Regrettable    |
| Refreshing                         | Exaggerating | Accurate                        | Unjust         |
| Fluent                             | Minute       | Appropriate                     | Thoughtless    |
| Special                            | Simple       | Important                       | Amazing        |
| Persuasive                         | Firm         | Warm-Hearted                    | Real           |
| Clear                              | Long         | Creative                        | Inevitable     |
| Ambiguous                          | Complicating | Fullfilling                     | Hot            |
| Difficult                          | Original     | Fun                             | Powerful       |
|                                    |              | Uncomfortable                   | Unexpected     |
|                                    |              | Suspicious                      | Marvelous      |
|                                    |              | Sharp                           | Dear           |

**Table 3-2: The Order of Experiment Procedure.**

| Book A |       |       |       |       | Book B |       |       |       |       | Book C |       |       |       |       |
|--------|-------|-------|-------|-------|--------|-------|-------|-------|-------|--------|-------|-------|-------|-------|
| § 1    |       |       |       |       | § 2    |       |       |       |       | § 3    |       |       |       |       |
| Q1     | A1-1  | A1-2  | A1-3  | A1-4  | Q2     | A2-1  | A2-2  | A2-3  | A2-4  | Q3     | A3-1  | A3-2  | A3-3  | A3-4  |
| ↓      |       |       |       |       | ↓      |       |       |       |       | ↓      |       |       |       |       |
| § 4    |       |       |       |       | § 5    |       |       |       |       | § 6    |       |       |       |       |
| Q4     | A4-1  | A4-2  | A4-3  | A4-4  | Q5     | A5-1  | A5-2  | A5-3  | A5-4  | Q6     | A6-1  | A6-2  | A6-3  | A6-4  |
| ↓      |       |       |       |       | ↓      |       |       |       |       | ↓      |       |       |       |       |
| § 7    |       |       |       |       | § 8    |       |       |       |       | § 9    |       |       |       |       |
| Q7     | A7-1  | A7-2  | A7-3  | A7-4  | Q8     | A8-1  | A8-2  | A8-3  | A8-4  | Q9     | A9-1  | A9-2  | A9-3  | A9-4  |
| ↓      |       |       |       |       | ↓      |       |       |       |       | ↓      |       |       |       |       |
| § 10   |       |       |       |       | § 11   |       |       |       |       | § 12   |       |       |       |       |
| Q10    | A10-1 | A10-2 | A10-3 | A10-4 | Q11    | A11-1 | A11-2 | A11-3 | A11-4 | Q12    | A12-1 | A12-2 | A12-3 | A12-4 |

in the section, while A does an answer to it. For example, Q1 is a question of § 1, and A1-1, A1-2, A1-3 and A1-4 are answers to Q1. Subjects are asked to read answers after a question because some answers are obscure before reading a question. The answers Ai-1 (i=1, 2, ..., 12) are the “Best Answers” actually chosen at Yahoo! Chiebukuro. This fact, however, is not informed to the subjects.

### 3.4. Experimental Result

In order to inspect whether or not gender difference affected impression evaluation, t-test was applied with the significance level at 1% between answers of thirty-three males and those of eight females. This result is shown in Table 3-3. As a result, there is a significant difference between males and females. Therefore, the answer statements of males are used in the following analysis.

Next, in order to measure fatigue effect, the significance level at 1% was tested among three books: Book A, B and C. This result is shown in Table 3-4. Since the value p is larger than significance level, there is no significant difference among books. Therefore, no fatigue effect can be observed. Impression evaluation scores of all the books could be used.

Factor analysis is applied to the impression evaluation scores with Varimax rotation. The factors which exist in a set of objects or concepts are obtained by applying the factor analysis. Please see Appendix A for further explanation of the factor analysis. By adopting the criterion that eigenvalues of their factors are over 1.0, nine factors are obtained. Eigenvalue, contribution ratio and cumulative contribution ratio of each factor are listed in Table 3-5. Factor burdens are shown in Table 3-6. The factor burdens, whose absolute values are over 0.5, are shown shaded. The impression words whose absolute values of factor burdens are large explain the factor.

**Table 3-3:** Results of Inspecting Significance of Gender.

| Gender | Average | Variance | Value p   |
|--------|---------|----------|-----------|
| Male   | 1.255   | 1.143    | 1.768E-33 |
| Female | 1.627   | 1.937    |           |

**Table 3-4:** Results of Inspecting Significance of Books.

| Book | Average | Variance | Value p |
|------|---------|----------|---------|
| A    | 1.228   | 1.563    | 0.429   |
| B    | 1.240   | 1.660    |         |
| C    | 1.238   | 1.623    |         |



**Table 3-5:** Eigenvalues, Contribution Ratio and Cumulative Contribution Ratio of Each Factor.

| Factor | Eigenvalue | Contribution Ratio[%] | Cumulative Contribution Ratio[%] |
|--------|------------|-----------------------|----------------------------------|
| 1      | 11.098     | 14.5                  | 14.5                             |
| 2      | 6.777      | 11.4                  | 25.8                             |
| 3      | 2.686      | 6.1                   | 31.9                             |
| 4      | 2.238      | 3.7                   | 35.6                             |
| 5      | 1.575      | 3.6                   | 39.2                             |
| 6      | 1.500      | 3.5                   | 42.8                             |
| 7      | 1.429      | 3.1                   | 45.9                             |
| 8      | 1.184      | 2.1                   | 48.0                             |
| 9      | 1.098      | 2.0                   | 50.0                             |

Interpretation against each factor is as follows:

- 1st factor: Positive evaluation sentences, such as “persuasive,” “wonderful,” “fulfilling,” etc. This factor is called “accuracy.”
- 2nd factor: Negative evaluation sentences, such as “uncomfortable,” “resentful,” “disillusioning,” etc. This factor is called “displeasure.”
- 3rd factor: Unusual viewpoints and contents of sentences, such as “special,” “creative,” “original,” “unexpected,” etc. This factor is called “creativity.”
- 4th factor: Clarity of statements, such as “easy” and “clear” as positive, and “difficult,” as negative. This factor is called “ease.”
- 5th factor: Persistent and detailed statements, such as “minute,” “persistent” and “long.” This factor is called “persistence.”
- 6th factor: Ambiguity of sentences, such as “insufficient” and “ambiguous.” This factor is called “ambiguity.”
- 7th factor: Moving sentences, such as “impression” and “warm-hearted.” This factor is called “moving.”
- 8th factor: Hardship and effort for a long time, such as “touching.” This factor is called “effort.”
- 9th factor: Enthusiasm and zeal from sentences, such as “hot” and “powerful.” This factor is called “hotness.”

From the factors obtained, factor scores are calculated and can be used to estimate the “Best Answers” of any question and answer statements.

Table 3-6: Factor Burdens of Nine Factors.

| Impressive Word | 1      | 2      | 3      | 4      | 5      | 6      | 7      | 8      | 9      |
|-----------------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| Persuasive      | 0.751  | -0.171 | -0.114 | 0.009  | 0.054  | -0.148 | 0.002  | 0.065  | 0.024  |
| Wonderful       | 0.735  | -0.165 | 0.040  | 0.061  | -0.012 | -0.064 | 0.313  | -0.002 | 0.144  |
| Important       | 0.722  | -0.120 | -0.020 | -0.090 | 0.046  | 0.016  | 0.012  | 0.096  | 0.079  |
| Fulfilling      | 0.705  | -0.122 | 0.009  | -0.037 | 0.157  | -0.063 | 0.174  | -0.015 | 0.047  |
| Accurate        | 0.702  | -0.220 | -0.132 | 0.114  | 0.013  | -0.201 | -0.079 | 0.014  | 0.006  |
| Real            | 0.662  | -0.154 | -0.165 | -0.032 | 0.106  | -0.085 | -0.084 | 0.179  | -0.074 |
| Appropriate     | 0.612  | -0.179 | -0.166 | 0.147  | 0.074  | -0.046 | -0.067 | 0.047  | -0.012 |
| Skillful        | 0.588  | -0.051 | 0.090  | 0.030  | 0.096  | -0.064 | 0.103  | 0.025  | 0.045  |
| Favorable       | 0.582  | -0.384 | -0.051 | 0.109  | 0.006  | -0.123 | 0.391  | 0.022  | -0.028 |
| Beautiful       | 0.559  | -0.094 | 0.005  | 0.027  | 0.030  | -0.007 | 0.463  | 0.087  | 0.216  |
| Courteous       | 0.542  | -0.337 | -0.111 | 0.002  | 0.189  | -0.206 | 0.136  | 0.069  | -0.081 |
| Fluent          | 0.511  | 0.010  | 0.146  | 0.175  | 0.185  | 0.004  | 0.071  | 0.056  | 0.116  |
| Refreshing      | 0.510  | -0.032 | 0.205  | 0.165  | -0.129 | -0.006 | 0.210  | -0.001 | 0.138  |
| Uncomfortable   | -0.233 | 0.834  | 0.079  | -0.039 | 0.124  | 0.078  | -0.025 | -0.071 | 0.004  |
| Resentful       | -0.054 | 0.778  | 0.103  | -0.074 | 0.074  | 0.002  | 0.028  | 0.093  | -0.039 |
| Thoughtless     | -0.243 | 0.728  | 0.230  | 0.002  | 0.070  | 0.103  | 0.040  | -0.040 | -0.001 |
| Disillusioning  | -0.212 | 0.709  | 0.160  | 0.032  | 0.124  | 0.167  | -0.034 | 0.063  | -0.024 |
| Unjust          | -0.108 | 0.658  | 0.241  | -0.091 | 0.061  | 0.168  | 0.047  | 0.101  | -0.051 |
| Regrettable     | -0.327 | 0.627  | 0.132  | 0.025  | 0.129  | 0.203  | -0.062 | 0.142  | -0.051 |
| Amazing         | -0.394 | 0.592  | 0.177  | 0.043  | 0.121  | 0.261  | -0.033 | 0.033  | 0.036  |
| Fearful         | -0.050 | 0.528  | 0.185  | -0.073 | 0.146  | 0.036  | -0.121 | 0.163  | 0.177  |
| Creative        | 0.036  | 0.087  | 0.759  | 0.044  | 0.055  | 0.047  | 0.028  | -0.018 | 0.027  |
| Special         | -0.019 | 0.218  | 0.756  | -0.019 | 0.108  | 0.048  | 0.008  | 0.039  | 0.051  |
| Original        | 0.028  | 0.175  | 0.644  | -0.012 | -0.078 | 0.018  | -0.003 | 0.138  | 0.075  |
| Unexpected      | -0.088 | 0.255  | 0.608  | -0.026 | 0.048  | 0.067  | 0.040  | 0.073  | 0.021  |
| Marvelous       | -0.079 | 0.261  | 0.541  | -0.095 | 0.155  | 0.180  | 0.055  | 0.170  | -0.011 |
| Easy            | 0.235  | -0.024 | -0.012 | 0.706  | 0.015  | 0.058  | 0.044  | 0.022  | -0.060 |
| Clear           | 0.369  | -0.073 | 0.040  | 0.558  | -0.057 | -0.160 | -0.048 | 0.016  | 0.040  |
| Difficult       | 0.169  | 0.130  | 0.171  | -0.584 | 0.241  | 0.250  | -0.084 | 0.128  | 0.070  |
| Minute          | 0.293  | 0.100  | 0.003  | -0.077 | 0.627  | -0.017 | 0.016  | -0.003 | 0.001  |
| Persistent      | -0.019 | 0.331  | 0.095  | -0.052 | 0.521  | 0.054  | -0.020 | 0.135  | 0.095  |
| Long            | 0.243  | 0.039  | 0.036  | -0.168 | 0.513  | -0.117 | 0.083  | 0.027  | -0.030 |
| Ambiguous       | -0.292 | 0.195  | 0.146  | -0.095 | 0.021  | 0.569  | 0.029  | -0.031 | -0.017 |
| Insufficient    | -0.210 | 0.338  | 0.116  | -0.095 | -0.048 | 0.564  | 0.013  | -0.019 | -0.092 |
| Warm-Hearted    | 0.470  | -0.199 | 0.033  | 0.088  | 0.056  | -0.019 | 0.580  | 0.212  | 0.058  |
| Impressive      | 0.474  | -0.041 | 0.076  | -0.020 | -0.010 | -0.016 | 0.509  | 0.263  | 0.243  |
| Touching        | 0.129  | 0.066  | 0.152  | -0.019 | 0.103  | -0.088 | 0.125  | 0.558  | 0.069  |
| Hot             | 0.323  | 0.024  | 0.094  | -0.066 | 0.155  | -0.145 | 0.254  | 0.185  | 0.546  |
| Powerful        | 0.438  | 0.185  | 0.145  | 0.013  | 0.018  | -0.054 | 0.096  | -0.020 | 0.514  |
| Exaggerating    | -0.115 | 0.283  | 0.172  | 0.046  | 0.381  | 0.127  | 0.000  | 0.194  | 0.259  |
| Firm            | 0.238  | 0.151  | 0.061  | -0.118 | 0.265  | 0.149  | -0.076 | 0.059  | 0.170  |
| Sharp           | 0.052  | 0.487  | 0.052  | -0.015 | -0.001 | 0.046  | -0.201 | 0.048  | 0.144  |
| Suspicious      | -0.205 | 0.445  | 0.305  | -0.026 | 0.160  | 0.266  | 0.015  | -0.003 | 0.130  |
| Simple          | 0.030  | 0.150  | 0.125  | 0.477  | -0.109 | 0.336  | 0.024  | 0.036  | 0.053  |
| Fun             | 0.263  | -0.059 | 0.254  | 0.174  | 0.000  | 0.072  | 0.331  | 0.085  | 0.031  |
| Dear            | 0.162  | 0.136  | 0.111  | -0.041 | 0.046  | 0.063  | 0.098  | 0.399  | 0.026  |
| Inevitable      | 0.074  | 0.240  | 0.017  | 0.097  | 0.187  | 0.212  | -0.134 | 0.247  | 0.020  |
| Dull            | -0.135 | 0.366  | 0.022  | 0.089  | -0.105 | 0.426  | -0.218 | -0.120 | 0.018  |
| Complicating    | 0.217  | 0.172  | 0.224  | -0.411 | 0.330  | 0.157  | -0.105 | 0.152  | -0.020 |
| Faltering       | -0.096 | 0.170  | 0.076  | -0.003 | 0.271  | 0.374  | 0.060  | 0.216  | -0.085 |

### 3.5. Summary

The impression of the statements of a Q&A site was obtained in order to match a questioner and respondents properly. First, fifty impressive words are selected. With these fifty impressive words, the impressions of the statements are evaluated. Sixty statements of questions and answers really posted at Yahoo! Chiebukuro are used. As a result of factor analysis, nine factors on statements were obtained. The nine factors obtained are *accuracy*, *displeasure*, *creativity*, *ease*, *persistence*, *ambiguity*, *moving*, *effort*, and *hotness*.

## Chapter 4

# Estimation of Factor Scores of Statements

### 4.1. Approach

The factor scores obtained, however, are only on sixty statements used in the experiment and explained in Chapter 3. To be able to estimate the factor scores of any other statements, multiple regression analysis is applied to the feature values of statements. The adopted feature values are the syntactic information of the statements, such as word classes (such as nouns and verbs), and the number of appearances (or the percentage) of Chinese and alphanumeric characters, word imageability, closing sentence expressions, word familiarity, and notation validity. Thus, each type of feature values is explained in the next subsequent subsections.

### 4.2. Feature Values of Statements

#### 4.2.1. Syntactic Information

Syntactic information is extracted as the feature values of statements. Here, statistics of statements is used as feature values. Statistics of statements includes the length of a statement, numbers of words classes, and their ratios to all the words. In order to obtain statement lengths and numbers of word classes such as nouns and verbs, morphological analysis is applied to sixty statements used for experiment in Chapter 3.

Considering that words are likely to appear more than once in statements, the number of vocabularies and that of words are uniquely extracted. The number of vocabularies is defined as counting a word “one” even if the same word appears in sentences several times, while that of words means its

appearance times. For example, in a sentence “I know I feel happy,” the word “I” appears twice, so for a vocabulary “I,” the number of the word “I” is 2. Additionally, the Type Token Ratio (TTR), which represents the ratio of vocabulary to word is considered as well.

It can be also said that, as to Chinese characters, symbols and alphanumeric characters, the proportion of their appearance can affect impression. Therefore, not only their number of appearance, but the length of sentences including them and their percentage content in sentences (The number of concerned kinds of letters out of that of whole the letters) are needed to be considered.

#### 4.2.2. Word Imageability

The data subjectively evaluated by humans and the objective ones including numbers of appearance of words and letters in newspapers for 14 years have been recorded [87]. These data are widely known as major impact on language processing for people. Each recorded characteristic value and the relationship between the values imply the characteristic of Japanese itself. Therefore, these data are thought to be useful for feature values of statements.

Here, word imageability is adopted as the feature values of statements. Word imageability is a subjective characteristic that implies how we can come up with various imaginations aroused by words. The characteristic value of word imageability is the one evaluated by 7 level scales (1: very difficult or unable to imagine – 7: very easy to imagine) [87]. The word imageability value is the average value of the characteristic values evaluated by several persons [87]. If the word exists in the morphological analysis data, the word imageability value of the word is used as the feature value. Otherwise, the word imageability value of the word will not be taken into consideration.

For example, if we hear a word “apple,” we can imagine a red round-shaped fruit, sweet, fresh and juicy taste or smell, crisp sound, and the touch in holding it. The value of its word imageability is 6.137. Meanwhile, for words “world” or “economy,” it seems less easy for us to imagine concrete imagination than “apple.” Their values of word imageability are 3.706 and 3.485, respectively.

In spite of the same notation word, it can have different meanings or readings. For instance, “Earth” can mean “ground connection,” “the Earth” or “pesticide” (the name of a maker.) If such words exist in

the morphological analysis data, the meaning or reading will manually be determined by judging from the context.

In extracting the feature values of word imageability, single and half points are used to indicate values such as “over 4.0 below 5.0” or “over 6.5 and below 7.0.”

### 4.2.3. Closing Sentence Expressions

Nishihara *et al.* used closing sentence expressions [36]. They defined the pattern of the closing sentence expressions as “those included in mere questions and their Best Answer.” The closing sentence expressions are also adopted as the feature values. The closing sentence expressions adopted are in all of the questions and their answers.

The fundamental Japanese words adopted are “zo,” “da,” “yo,” “ne,” “ka,” “na,” “shi,” “desu,” “masu,” “tai,” and “nai.” The meaning and usage of each closing sentence expression in detail are explained as follows:

- The words “yo” and “ne” are friendly expressions.
- The words “ka” and “na” are used in questions.
- The word “shi” is used in enumerations.
- The words “desu” and “masu” are polite expressions.
- The word “tai” expresses desire.
- The word “nai” is a negative expression.

For these words, the closing sentence words, the appearance, and closing sentence appearances as well as those words themselves are adopted as feature values.

The words “desuka,” “naidesu,” “masuka,” and “mashita” are adopted as well. The words “desuka,” “naidesu,” and “masuka” are the mixture of “desu,” “ka,” “nai,” and “masu” as polite expressions. The word “mashita” is the past tense form of the mere word “masu.”

#### 4.2.4. Word Familiarity

Word familiarity is an index representing the familiarity a subject feels with a word [88]. Here, words are evaluated either aurally or visually using scores ranging from 1 to 7. Though both types of data are recorded, only data evaluated visually is used. For example, in Japanese, the word “tan-ni” can mean “simply” or “a C size battery.” If the former is meant, the value of word familiarity is 5.312; otherwise, the value of word familiarity is 3.594. These values are averages of scores obtained by subjects.

Similar as the feature values of word imageability, the number (or percentage) of words corresponding to the word feature values of familiarity is used. Single and half points are also used to indicate values such as “over 4.0 below 5.0” or “over 5.5 and below 6.0.”

#### 4.2.5. Notation Validity

Notation validity represents the validity of a word and is expressed by an index ranging from 1 to 5 [88]. A word can have several different meanings and styles. For example, in Japanese, the word “kosho” could mean “breakdown,” “name,” “lake,” etc. It can be written using Chinese characters, Hiragana or Katakana characters, or a mixture of Chinese and Hiragana characters. The notation validity of each case is recorded. For instance, the word “goraku,” which in Japanese means entertainment, has a value of 2.95 if written in Hiragana, 1.95 if written in Katakana, and 4.90 if written in Chinese Character.

A word could have different meanings or readings. For instance, “earth” can mean “ground,” “the Earth,” or “pesticide” (i.e., the name of a pesticide manufacturer) as described before. If the morphological analysis data contains such a word, its meaning or reading is manually determined by judging it within its context.

The way of extracting feature values is similar as the cases of adopting word imageability and those of word familiarity.

### 4.3. Adopting Feature Values of Statements

#### 4.3.1. Multicollinearity and Quadratic terms

Before estimation, two important points are taken into consideration in choosing explanatory variables: (A) multicollinearity and (B) quadratic terms.

First, in performing multiple regression analysis, it is required that explanatory variables are not correlated to each other, and the following conditions hold:

- (a) An explanatory variable is selected if its correlation coefficient to a respondent variable is high.
- (b) If two criterion variables have the correlation coefficients, either of them should be excluded.

If Condition (b) is not satisfied, the partial regression coefficients cannot properly be computed. This situation is termed “multicollinearity.” To avoid multicollinearity, one of the explanatory variables with high correlation coefficients must be adopted and the other be excluded from the explanatory variables.

Secondly, a quadratic term, which means the product of explanatory variables, is also considered in order to estimation accuracy.

#### 4.3.2. Procedure of Choosing Feature Values

For feature values of statements explained in Section 4.2., how to choose them is briefly explained with the consideration of (A) multicollinearity and (B) quadratic terms. How to adopt feature values is shown in Table 4-1. The order of procedure is consistently (A), (B), and (A), for all the feature values.

For the feature values of syntactic information, multicollinearity is first considered and the number of explanatory variables is minimized. After that, with the consideration of quadratic terms, multicollinearity is taken into consideration again.

For those except syntactic information, feature values to be adopted and those already adopted are combined. For example, in the case of choosing feature values of word imageability, they are those to be adopted, and those already considered are the feature values of syntactic information. And in the case of



**Table 4-1:** The Procedure of Choosing Feature Values of Statements.

| To Be Adopted                    | Procedure   | Already Considered |
|----------------------------------|-------------|--------------------|
| (1) Syntactic information        | (A)→(B)→(A) | -                  |
| (2) Word imageability            |             | (1)                |
| (3) Closing sentence expressions |             | (1), (2)           |
| (4) Word familiarity             |             | (1) – (3)          |
| (5) Notation validity            |             | (1) – (4)          |

choosing feature values of closing sentence expressions, they are those to be adopted, and those already considered are the feature values of syntactic impression and word imageability.

Through these procedures, overall 77 feature values are adopted and listed in Table 4-2. The selected feature values of syntactic information are denoted as g1 – g36. “Katakana (word)” (denoted as g6 shown in Table 4-1) means the number of Katakana in sentences, while “Chinese characters (Percentage)” (g15 in Table 4-1) means the percentage of Chinese characters in them.

The chosen feature values of word imageability are g37 and g38.

The adopted feature values of closing sentence expressions are g39 – g64. The “closing word” that appears g44 – g51 represents the appearance of the word at the end of a sentence. The variable g60 “ka (Closing Percentage)” means the proportion of the appearance time of word “ka” at the end of a sentence to its whole appearance time itself in the sentence.

The chosen feature values of word familiarity are g65 – g71, while those of notation validity are g72–g77.

## 4.4. Estimation Results

### 4.4.1. Using only Monadic Terms

In order to estimate the factor scores of statements not used in the impression evaluation experiment shown in Chapter 3, multiple regression analysis is performed on the sixty questions and answers employed in the impression evaluation experiment, using the seventy-seven explanatory variables listed in Tables 4-3, and the respondent variables with factor scores for the nine factors shown in Section 3.4.

**Table 4-2: Feature Values Used for Estimating Factor Scores.**

| g   | Feature Values                                 | g   | Feature Values                                   |
|-----|--|-----|--|
| g1  | Auxiliary Verb (Vocabulary)                    | g39 | "ka" (Word)                                      |
| g2  | Prefixes                                       | g40 | "na" (Word)                                      |
| g3  | Signs (Vocabulary)                             | g41 | "shi" (Word)                                     |
| g4  | Sentences                                      | g42 | "tai" (Word)                                     |
| g5  | Average Length of Sentences (Letters)          | g43 | "nai" (Word)                                     |
| g6  | Katakana (Word)                                | g44 | "da" (Closing Word)                              |
| g7  | Full-Size Characters (Word)                    | g45 | "ka" (Closing Word)                              |
| g8  | Full-Size Alphanumeric Characters (Word)       | g46 | "na" (Closing Word)                              |
| g9  | Adjective (Word)                               | g47 | "shi" (Closing Word)                             |
| g10 | Adverb (Word)                                  | g48 | "desu" (Closing Word)                            |
| g11 | Pre-Noun Adjectival (Word)                     | g49 | "masu" (Closing Word)                            |
| g12 | Conjunction (Word)                             | g50 | "tai" (Closing Word)                             |
| g13 | Interjection (Word)                            | g51 | "nai" (Closing Word)                             |
| g14 | Hiragana (Percentage)                          | g52 | "zo" (Percentage)                                |
| g15 | Chinese Characters (Percentage)                | g53 | "da" (Percentage)                                |
| g16 | Katakana (Percentage)                          | g54 | "yo" (Percentage)                                |
| g17 | Signs (Percentage)                             | g55 | "ne" (Percentage)                                |
| g18 | TTR  | g56 | "ka" (Percentage)                                |
| g19 | Full-Size Characters (Percentage)              | g57 | "desu" (Percentage)                              |
| g20 | Alphanumeric Characters (Percentage)           | g58 | "masu" (Percentage)                              |
| g21 | Full-Size Alphanumeric Characters (Percentage) | g59 | "nai" (Percentage)                               |
| g22 | Noun (Percentage)                              | g60 | "ka" (Closing Percentage)                        |
| g23 | Adjective (Percentage)                         | g61 | "desuka" (Word)                                  |
| g24 | Adverb (Percentage)                            | g62 | "naidesu" (Word)                                 |
| g25 | Pre-Noun Adjectival (Percentage)               | g63 | "masuka" (Word)                                  |
| g26 | Conjunction (Percentage)                       | g64 | "mashita" (Word)                                 |
| g27 | Interjection (Percentage)                      | g65 | Word familiarity percentage of words             |
| g28 | Exclamation Marks                              | g66 | Word familiarity over 6.5 below 7.0 (vocabulary) |
| g29 | Question Marks                                 | g67 | Word familiarity over 4.0 below 5.0 (word)       |
| g30 | Periods  | g68 | Word familiarity over 5.0 below 6.0 (word)       |
| g31 | Commas   | g69 | Word familiarity over 5.5 below 6.0 (word)       |
| g32 | Middle Dots                                    | g70 | Word familiarity over 6.0 below 7.0 (word)       |
| g33 | Three Dots                                     | g71 | Word familiarity over 6.0 below 6.5 (word)       |
| g34 | Quotation Marks                                | g72 | Notation validity percentage of words            |
| g35 | Parentheses                                    | g73 | Notation validity over 3.0 below 4.0 (word)      |
| g36 | Slash Characters                               | g74 | Notation validity over 3.5 below 4.0 (word)      |
| g37 | Word Imageability over 4.0 below 5.0 (Word)    | g75 | Notation validity over 4.0 below 5.0 (word)      |
| g38 | Word Imageability over 6.5 below 7.0 (Word)    | g76 | Notation validity over 4.0 below 4.5 (word)      |
|     |  | g77 | Notation validity over 5.0 below 6.0 (word)      |

Please see Appendix B for further explanation of the multiple regression analysis. The set of regression expressions obtained is Equation (4.1):

$$\begin{cases}
 y_1 = 0.00295 g_{37} + 0.150 g_{12} + 0.0609 g_{59} + 0.0533 g_{21} + 0.0105 g_7 - 0.113 g_{29} + 0.0896 g_9 \\
 \quad + 0.0151 g_{19} - 0.750 \\
 y_2 = 1.73 g_{44} + 1.79 g_{50} - 0.115 g_1 + 0.110 g_{43} + 0.0341 g_8 - 0.172 g_{12} + 0.261 \\
 y_3 = 0.161 g_{52} + 0.0682 g_8 - 0.0670 g_{43} + 0.888 g_{50} + 0.0816 g_{60} - 0.0852 g_{74} + 0.0197 g_{65} \\
 \quad - 0.175 \\
 y_4 = -0.0468 g_{37} - 0.0843 g_{52} + 0.0916 g_9 - 0.178 g_{45} + 0.305 \\
 y_5 = 0.0807 g_1 + 0.0168 g_6 + 0.126 g_{29} + 0.0155 g_{15} + 0.00308 g_5 + 0.0275 g_4 + 0.502 g_{49} + 0.731 g_{50} \\
 \quad - 0.0792 g_{70} - 1.14 \\
 y_6 = -0.0759 g_{31} - 0.11163 g_{43} - 0.0618 g_{56} - 0.0342 g_8 - 0.126 g_{55} - 0.772 g_{44} - 0.691 g_{50} - 0.125 g_{25} \\
 \quad + 0.698 \\
 y_7 = 0.557 g_{13} + 0.0297 g_{66} + 0.105 g_{23} - 0.243 \\
 y_8 = 0.0871 g_1 + 0.0788 g_{60} + 0.104 g_{23} - 0.00560 g_{20} - 0.00905 g_8 - 0.388 \\
 y_9 = 0.193 g_{52} - 0.0435 g_{75} - 0.0148 g_{16} + 0.321 g_{50} - 0.109 g_{51} - 0.0260
 \end{cases} \quad (4.1)$$

where  $y_i$  ( $i=1, \dots, 9$ ) is the  $i$ th factor score.

In Table 4-3, the column entitled “Monadic Terms” contains the multiple correlation coefficients obtained. Only the estimation accuracy of the fifth factor is very good, while that of five other factors is fairly good, and that of the remaining three factors is poor.

**Table 4-3: Multiple Correlation Coefficients.**

| Factor |               | Multiple Correlation Coefficient |                 |
|--------|---------------|----------------------------------|-----------------|
|        |               | Monadic Terms                    | Quadratic Terms |
| 1st    | (accuracy)    | 0.832                            | 0.989           |
| 2nd    | (displeasure) | 0.774                            | 1.000           |
| 3rd    | (creativity)  | 0.788                            | 0.999           |
| 4th    | (ease)        | 0.728                            | 1.000           |
| 5th    | (persistence) | 0.908                            | 0.925           |
| 6th    | (ambiguity)   | 0.872                            | 1.000           |
| 7th    | (moving)      | 0.552                            | 0.963           |
| 8th    | (effort)      | 0.650                            | 0.950           |
| 9th    | (hotness)     | 0.674                            | 1.000           |

## 4.4.2. Using Quadratic Terms

Next, the seventy-seven explanatory variables explained in Section 4.2. are used, but the quadratic terms are considered. By considering the quadratic terms, 281 explanatory variables were obtained. Similar to the case considering only monadic terms, multiple regression analysis is performed on the sixty questions and answers, using the respondent variables of the factor scores obtained using nine factors and explanatory variables corresponding to these 281 feature values. The set of regression expressions obtained is shown in Equation (4.2).

## 4.5. Considerations

### 4.5.1. Comparison of Estimation Accuracy

The case of using only monadic terms is compared with that of using quadratic terms. The criteria of estimation accuracy are as follows:

- When the value of the multiple correlation coefficient (MCC) is above 0.9, the precision of the analysis is considered to be very good.
- When MCC is greater than 0.7 but less than 0.9, the precision is considered fairly good.
- When MCC is below 0.7, the precision is considered poor.

In the case of only monadic terms, only 5th factor shows good estimation accuracy, 5 factors show good estimation, and the rest of three factors show poor. In the case of quadratic terms, on the other hand, all the nine factors show very good estimation accuracy, because the multiple correlation coefficients of all factors are over 0.9. Therefore, it can be concluded that considering quadratic terms can improve estimation accuracy.

$$\begin{aligned}
y_1 &= 0.210g_{12}g_{58} + 0.0369g_9g_{59} + 0.174g_{30}g_{66} - 0.0909g_{12}g_{59} - 0.413g_{54}g_{64} - 0.135g_{49}g_{60} + 0.102g_{18}g_{18} \\
&\quad + 0.166g_{24}g_{54} - 0.180g_{25}g_{71} + 0.704g_{51}g_{60} - 0.0893g_{13}g_{57} - 0.0535g_{52}g_{73} + 0.149g_{42}g_{55} \\
&\quad + 0.000737g_5g_{57} - 0.0904g_{26}g_{58} + 0.0527g_{32}g_{42} - 0.0504g_3g_{18} - 0.0781g_{21}g_{60} \\
&\quad + 0.0142g_{16}g_{51} + 0.0174g_{21}g_{42} - 0.00404g_{14}g_{18} - 0.338 \\
y_2 &= -0.0486g_{49}g_{57} + 0.00356g_{72}g_{75} - 0.0447g_{32}g_{42} - 0.0111g_{25}g_{72} - 0.0141g_{66}g_{72} - 0.176g_{11}g_{77} \\
&\quad - 0.0287g_{12}g_{16} + 1.01g_{28}g_{53} + 0.151g_{29}g_{55} + 0.165g_{60}g_{76} - 0.188g_{21}g_{60} - 0.0509g_{49}g_{54} + 0.0415g_{17}g_{18} \\
&\quad - 0.325g_{46}g_{69} + 0.0479g_8g_{59} + 0.0345g_{16}g_{51} + 0.0288g_{71}g_{73} - 0.0568g_{51}g_{60} + 0.00155g_{21}g_{22} \\
&\quad - 0.0512g_{43}g_{54} + 0.140g_{32}g_{61} - 0.0196g_{30}g_{66} - 0.00425g_{16}g_{57} + 0.00648g_9g_{16} \\
&\quad - 0.103g_{13}g_{73} - 0.0921g_3g_{18} - 0.504g_{60}g_{64} + 0.0120g_{30}g_{56} + 0.000152g_5g_{16} \\
&\quad - 0.00898g_8g_{39} - 0.0185g_{21}g_{69} + 0.0412g_{60}g_{71} + 0.00388g_9g_{57} + 0.0204g_{76}g_{77} \\
&\quad - 0.0562g_{55}g_{76} + 0.00349g_{43}g_{59} + 0.00213g_4g_{58} + 0.000243g_5g_{24} \\
&\quad + 0.00106g_9g_{72} - 0.00116g_{74}g_{75} + 0.00458g_9g_{54} - 0.0000604g_{22}g_{72} \\
&\quad - 0.000833g_{22}g_{72} - 0.000833g_7g_{25} - 0.00486g_{49}g_{55} + 0.00583g_{25}g_{32} \\
&\quad - 0.00219g_{32}g_{54} + 0.000484g_{54}g_{57} - 0.000809g_{41}g_{76} + 0.00319g_{64}g_{74} + 0.00120g_{24}g_{54} \\
&\quad - 0.000160g_{51}g_{72} + 0.0000497g_{16}g_{48} - 0.00000922g_3g_{22} - 0.0000527g_{25}g_{75} + 0.00124g_{27}g_{75} \\
&\quad + 0.00000238g_{29}g_{73} - 0.00000274g_{55}g_{73} + 0.000000177g_{10}g_{59} - 0.0591 \\
y_3 &= 0.0179g_{52}g_{73} + 0.979g_{28}g_{53} + 0.113g_{60}g_{71} - 0.00832g_{43}g_{59} + 0.298g_{25}g_{60} + 0.0136g_{55}g_{72} \\
&\quad + 0.0300g_{65}g_{77} - 0.0212g_5g_{57} - 0.425g_{54}g_{63} + 0.0192g_8g_{39} - 0.0100g_{16}g_{60} \\
&\quad - 0.106g_{55}g_{73} - 0.0153g_{19}g_{24} + 0.176g_{49}g_{54} + 0.0606g_{24}g_{40} - 0.00110g_{20}g_{58} \\
&\quad - 0.0150g_{49}g_{57} + 0.450g_{51}g_{60} - 0.0310g_{32}g_{42} + 0.214g_{46}g_{69} - 0.824g_{33}g_{76} \\
&\quad + 0.404g_{33}g_{45} - 0.0331g_{11}g_{59} - 0.128g_{49}g_{55} + 0.0387g_{18}g_{18} + 0.0514g_{27}g_{36} - 0.111g_{45}g_{74} \\
&\quad + 0.0386g_{60}g_{77} - 0.227g_{45}g_{53} + 0.0120g_9g_{57} - 0.101g_{63}g_{71} - 0.0205g_{24}g_{54} \\
&\quad - 0.00159g_{16}g_{57} + 0.00128g_{16}g_{75} - 0.00672g_{12}g_{58} - 0.00299g_{66}g_{72} - 0.00302g_{56}g_{59} \\
&\quad + 0.0000512g_5g_{16} - 0.00122g_{30}g_{65} - 0.0856 \\
y_4 &= -0.178g_{48}g_{77} + 0.00717g_{16}g_{57} - 0.000238g_5g_6 - 0.486g_{33}g_{45} - 0.0474g_{49}g_{57} + 0.961g_{33}g_{76} \\
&\quad - 0.0612g_{52}g_{73} - 0.0119g_{29}g_{72} - 0.0734g_{41}g_{59} + 0.00156g_{32}g_{22} - 0.00339g_{16}g_{37} \\
&\quad + 0.553g_{55}g_{71} + 0.00485g_{31}g_{54} + 0.0284g_{10}g_{65} + 0.0116g_2g_6 + 0.466g_{51}g_{60} \\
&\quad + 0.0855g_{25}g_{59} - 0.106g_{54}g_{64} - 0.0141g_{56}g_{65} - 0.0232g_{19}g_{25} - 0.0173g_{51}g_{72} \\
&\quad + 0.00435g_4g_{56} - 0.219g_{60}g_{66} - 0.0639g_2g_{56} - 0.0105g_7g_{25} + 0.0334g_{25}g_{32} \\
&\quad + 0.0406g_{12}g_{59} - 0.0248g_{49}g_{59} + 0.109g_{60}g_{69} + 0.00289g_{55}g_{72} + 0.376g_{25}g_{66} \\
&\quad + 0.0421g_{18}g_{58} - 0.0490g_{49}g_{66} + 0.0163g_{53}g_{77} - 0.124g_{46}g_{70} - 0.000393g_{20}g_{58} \\
&\quad + 0.00546g_{56}g_{56} + 0.00258g_{19}g_{24} + 0.000827g_{68}g_{72} - 0.00177g_{16}g_{70} + 0.00365g_{71}g_{73} \\
&\quad + 0.00925g_{61}g_{75} - 0.00218g_{19}g_{55} - 0.000573g_9g_{56} + 0.0145g_{28}g_{53} - 0.0405g_{25}g_{35} \\
&\quad - 0.00269g_{32}g_{61} + 0.00531g_{25}g_{71} + 0.000473g_{65}g_{76} + 0.000959g_{55}g_{56} \\
&\quad + 0.000713g_{27}g_{36} - 0.0000444g_{22}g_{57} - 0.000255g_{56}g_{68} - 0.0000329g_{56}g_{59} \\
&\quad - 0.0000544g_{74}g_{77} - 0.000268g_{63}g_{68} - 0.00000214g_{45}g_{59} + 0.000000382g_{15}g_{18} + 0.183 \\
y_5 &= 0.182g_1g_{18} + 0.000280g_5g_6 + 0.00467g_{24}g_{60} - 0.0467g_{23}g_{58} + 0.00985g_4g_{58} + 0.102g_{23}g_{29} \\
&\quad + 0.339g_{33}g_{45} - 0.201g_{66}g_{71} - 0.0149g_{51}g_{72} - 0.266g_{51}g_{54} - 0.672
\end{aligned}
\tag{4.2}$$

$$\begin{aligned}
y_6 = & -0.169g_1g_{18} - 0.0548g_{31}g_{54} - 0.0207g_{22}g_{53} + 0.0826g_{49}g_{54} - 0.00124g_3g_{22} - 0.0144g_{55}g_{72} \\
& - 0.109g_{60}g_{77} - 0.0204g_4g_{18} - 0.0739g_{68}g_{77} - 0.0749g_9g_{54} + 0.0247g_{32}g_{60} + 0.0190g_{66}g_{72} \\
& + 0.00864g_{16}g_{23} - 0.00686g_{16}g_{70} + 0.110g_{48}g_{63} - 0.116g_{25}g_{73} - 0.0563g_{24}g_{40} + 0.0202g_{69}g_{75} \\
& - 0.0503g_{52}g_{73} - 0.0135g_{21}g_{56} + 0.0504g_{54}g_{77} + 0.0181g_{16}g_{51} - 0.332g_{51}g_{60} + 0.0901g_{49}g_{60} \\
& + 0.105g_2g_{11} + 0.114g_{54}g_{69} + 0.0200g_{29}g_{73} - 0.00800g_7g_{25} + 0.0375g_{25}g_{59} + 0.0396g_{25}g_{75} \\
& + 0.00247g_{16}g_{57} - 0.403g_{25}g_{66} - 0.00561g_{16}g_{48} + 0.00799g_{54}g_{56} + 0.129g_{63}g_{71} - 0.000959g_5g_{54} \\
& - 0.0107g_{71}g_{73} - 0.00945g_{45}g_{59} - 0.00362g_{28}g_{65} - 0.00355g_{23}g_{58} - 0.0119g_2g_{56} + 0.000505g_8g_{72} \\
& + 0.00146g_{16}g_{66} - 0.00135g_{32}g_{59} - 0.00360g_{29}g_{54} - 0.00124g_{49}g_{56} + 0.0000572g_{14}g_{18} \\
& + 0.00960g_{47}g_{69} + 0.00000334g_5g_{57} + 0.000212g_{76}g_{77} + 0.0000234g_{17}g_{58} + 0.00000263g_5g_{65} \\
& - 0.0000250g_{60}g_{75} + 0.0000166g_{12}g_{70} - 0.00000330g_9g_{58} + 0.000000122g_{20}g_{73} \\
& - 0.0000000433g_{22}g_{59} + 0.000000101g_{74}g_{77} + 0.795 \\
y_7 = & 0.0258g_{10}g_{65} + 0.643g_{51}g_{54} + 0.143g_{13}g_{57} + 0.106g_{30}g_{66} - 0.0235g_{29}g_{73} + 0.00282g_5g_{54} \\
& + 0.0296g_{28}g_{65} + 0.459g_{28}g_{53} + 0.0857g_{52}g_{73} - 1.28g_{60}g_{64} + 0.708g_{51}g_{60} + 0.0226g_{23}g_{58} \\
& + 0.0988g_{48}g_{63} + 0.0351g_{12}g_{59} - 0.00278g_{21}g_{22} + 0.0190g_{30}g_{54} - 0.00435g_{17}g_{56} \\
& + 0.0394g_{26}g_{58} - 0.326 \\
y_8 = & 0.274g_{23}g_{42} + 0.834g_{13}g_{73} + 0.102g_{11}g_{68} + 0.0571g_{60}g_{77} + 0.0457g_{49}g_{57} + 0.300g_{60}g_{69} \\
& - 0.0471g_{32}g_{58} - 0.223g_{66}g_{71} + 0.00873g_{16}g_{48} - 0.253g_{26}g_{54} + 0.00512g_4g_{56} \\
& - 0.0422g_{29}g_{71} - 0.299g_{30}g_{66} + 0.0529g_{32}g_{40} + 0.143g_{60}g_{66} - 0.0585g_{61}g_{75} \\
& - 0.00436g_{19}g_{24} - 0.232 \\
y_9 = & 0.133g_{42}g_{59} + 0.103g_{52}g_{73} + 0.192g_{46}g_{76} + 0.0242g_{56}g_{65} + 0.0238g_{74}g_{75} - 0.310g_{47}g_{54} \\
& - 0.0532g_{56}g_{59} - 0.000204g_5g_6 + 0.0422g_{54}g_{56} + 0.0313g_9g_{59} - 0.141g_{18}g_{57} - 0.113g_{32}g_{42} \\
& + 0.254g_{42}g_{77} - 0.0501g_{60}g_{76} + 0.0372g_{23}g_{57} + 0.514g_{25}g_{66} + 0.0442g_{27}g_{36} + 0.319g_{60}g_{64} \\
& - 0.0290g_8g_{59} - 0.00793g_4g_{18} - 0.00400g_{16}g_{23} - 0.00750g_{19}g_{25} + 0.0202g_{26}g_{65} \\
& - 0.204g_{55}g_{76} + 0.0163g_{16}g_{51} + 0.0202g_{54}g_{73} - 0.0427g_2g_{58} - 0.0987g_{48}g_{63} \\
& - 0.00774g_{25}g_{72} + 0.00371g_{29}g_{72} + 0.0383g_{32}g_{61} - 0.0251g_{49}g_{60} + 0.00784g_{11}g_{58} \\
& + 0.0223g_{25}g_{49} + 0.0389g_{27}g_{75} - 0.0142g_{25}g_{73} - 0.0125g_{25}g_{75} + 0.0157g_{43}g_{71} \\
& + 0.00123g_{21}g_{42} - 0.0350g_{51}g_{60} - 0.000426g_{16}g_{75} - 0.00543g_{11}g_{65} + 0.0716
\end{aligned}$$

In Table 4-3, the column entitled “Quadratic Terms” contains the multiple correlation coefficients obtained. Because the values of all factors are above 0.9, it is concluded that the estimation accuracy of all nine factors is very good.

## 4.5.2. Interpretations for each Factor

To explain each factor, explanatory variables (EVs) whose absolute values of the standardized partial regression coefficient (SPRC) are above 0.4 are used. The variables used are shown in Table 4-4. The notation of “g\_g” is used to represent the product of two EVs. For example, “g1\_g9” is the product of “g1” and “g9.” Components of those notations are listed in Table 4-4. For convenience, word imageability, word familiarity and notation validity are abbreviated “WI,” “WF” and “NV,” respectively. For g8 and g21, “full-size alphanumeric characters” is notated as “full-size alpha/num chars.”

- 1st Factor (accuracy): g12\_g58 and g30\_g66 have large positive SPRC values. Therefore, more conjunctions and periods, a higher percentage of the word “masu,” and highly familiar words could contribute to higher factor scores for accuracy.
- 2nd Factor (displeasure): g8\_g59, g72\_g75 and g28\_g53 have large positive SPRC values. Thus, more full-size alphanumeric characters, more occurrences of the word “nai,” more relatively valid notation words and exclamation marks, and a higher percentage of "da" increase the factor scores for displeasure. Conversely, g21\_g60 has a large negative SPRC value. Hence, a smaller percentage of full-size alphanumeric characters and less occurrences of the closing word “ka” could result in higher factor scores for displeasure.
- 3rd Factor (creativity): g25\_g60, g52\_g73 and g28\_g53 have large positive SPRC values. Thus, more pre-noun adjectives and exclamation marks, a higher percentage of the words “zo” and “da,” more occurrences of the closing word “ka,” and moderately valid notation words could result in higher factor scores for creativity. Meanwhile, g5\_g57 has a large negative SPRC value. Therefore, shorter sentences and smaller percentage of “desu” could lead to higher factor scores of creativity.
- 4th Factor (ease): g16\_g57, g10\_g65 and g33\_g76 have positive large SPRC values. Thus, a higher percentage of "katakana" and familiar words, more occurrences of the word “desu,” three dots, and highly valid notation words could result in higher factor scores for ease. Conversely, g48\_g77 and g16\_g37 have large negative SPRC values. Therefore, a smaller percentage of “katakana,” fewer

**Table 4-4:** Explanatory Variables with the Highest SPRCs.

| Factor               | EV      | Components                         | SPRC   |
|----------------------|---------|------------------------------------|--------|
| 1st<br>(accuracy)    | g12_g58 | Conjunction (word)                 | 0.841  |
|                      |         | "masu" (%)                         |        |
|                      | g30_g66 | Periods                            | 0.491  |
|                      |         | WF 6.5-7.0 (word)                  |        |
| 2nd<br>(displeasure) | g8_g59  | Full-size alpha/num chars (word)   | 0.586  |
|                      |         | "nai" (%)                          |        |
|                      | g72_g75 | NV percentage of words             | 0.423  |
|                      |         | NV 4.0-5.0 (word)                  |        |
|                      | g28_g53 | Exclamation marks                  | 0.421  |
|                      |         | "da" (%)                           |        |
|                      | g21_g60 | Full-size alpha/num chars (%)      | -0.500 |
|                      |         | "ka" (closing (%))                 |        |
| 3rd<br>(creativity)  | g25_g60 | Pre-noun adjectives (%)            | 0.479  |
|                      |         | "ka" (closing (%))                 |        |
|                      | g52_g73 | "zo" (%)                           | 0.449  |
|                      |         | NV 3.0-4.0 (word)                  |        |
|                      | g28_g53 | Exclamation marks                  | 0.443  |
|                      |         | "da" (%)                           |        |
|                      | g5_g57  | Ave. Length of sentences (letters) | -0.405 |
|                      |         | "desu" (%)                         |        |
| 4th<br>(ease)        | g16_g57 | Katakana (%)                       | 0.487  |
|                      |         | "desu" (%)                         |        |
|                      | g10_g65 | Adverb (word)                      | 0.451  |
|                      |         | WF (%)                             |        |
|                      | g33_g76 | Three dot leaders                  | 0.443  |
|                      |         | NV 4.0-4.5 (word)                  |        |
|                      | g48_g77 | "desu" (closing word)              | -0.481 |
|                      |         | NV 5.0-5.5 (word)                  |        |
|                      | g16_g37 | katakana (%)                       | -0.522 |
|                      |         | WI 4.0-5.0 (word)                  |        |
| 5th<br>(persistence) | g1_g18  | Auxiliary verbs (vocabulary)       | 0.521  |
|                      |         | TTR                                |        |
| 6th<br>(ambiguity)   | g60_g77 | "ka" (closing (%))                 | -0.401 |
|                      |         | NV 5.0-5.5 (word)                  |        |
|                      | g31_g54 | Commas                             | -0.504 |
|                      |         | "yo" (%)                           |        |
|                      | g1_g18  | Auxiliary verbs (vocabulary)       | -0.510 |
|                      |         | TTR                                |        |
| 7th<br>(moving)      | g30_g66 | Periods                            | 0.400  |
|                      |         | WF 6.5-7.0 (word)                  |        |
| 8th<br>(effort)      | g23_g42 | Adjectives (%)                     | 0.730  |
|                      |         | "tai" (word)                       |        |
|                      | g11_g63 | Pre-noun adjectives (word)         | 0.430  |
|                      |         | "masuka" (word)                    |        |
| 9th<br>(hotness)     | g42_g59 | "tai" (word)                       | 0.842  |
|                      |         | "nai" (%)                          |        |
|                      | g56_g65 | "ka" (%)                           | 0.700  |
|                      |         | WF (%)                             |        |
|                      | g54_g56 | "yo" (%)                           | 0.614  |
|                      |         | "ka" (%)                           |        |
|                      | g56_g59 | "ka" (%)                           | -0.767 |
|                      |         | "nai" (%)                          |        |



occurrences of the closing word “desu,” fewer highly valid notation words, and words moderately easier to imagine could result in higher factor scores for ease.

- 5th Factor (persistence): g1\_g18 has a large positive SPRC value. Hence, more auxiliary verbs and different words could contribute to higher factor scores for persistence.
- 6th Factor (ambiguity): g1\_g18, g31\_g54 and g60\_g77 have large negative values. Thus, fewer auxiliary verbs and commas, less identical words, a smaller percentage of “yo,” less occurrences of the closing word “ka,” and fewer highly valid notation words could result in higher factor scores for ambiguity.
- 7th Factor (moving): g30\_g66 has a large positive value. Therefore, more periods and highly familiar words could result in higher factor scores for being moving.
- 8th Factor (effort): g23\_g42 and g11\_g63 have large positive SPRC values. Thus, a higher percentage of adjectives and more occurrences of the words “tai,” “masuka,” and pre-noun-adjectives could result in higher factor scores for effort.
- 9th Factor (hotness): g42\_g59, g56\_g65 and g54\_g56 have large positive SPRC values. Hence, more occurrences of the word “tai,” higher percentages of the words “nai,” “ka,” and “yo,” and higher percentage of familiar words could result in higher factor scores for hotness. Conversely, g56\_g59 has a large negative SPRC value. Thus, smaller percentages of the words “ka” and “nai” could contribute to higher factor scores for hotness.

## 4.6. Summary

It is shown that overall estimation accuracy for all the nine factor scores is good. Considering quadratic terms is effective in improving estimation accuracy. Each factor is interpreted by focusing on the feature values whose absolute values of SPRCs are large. Then whether the important feature values are certainly used in the statements having high factor scores are inspected. As a result, all the factors are confirmed to be validly estimated.

## Chapter 5

# Impression and Suitability of Questions and Answers

### 5.1. Purpose

Given a question statement, the differences between the impressions of the question and answers already posted in Yahoo! Chiebukuro can be obtained by calculating the Euclidean distance between the factor scores of the question and the answers. If a premise is possible that the impression of answers similar to that of question could lead to searching for an appropriate respondents who can answer the question, these differences might be used. Here, the differences of the impressions of questions and answers and the suitability of answers to questions are examined.

### 5.2. Dataset

Three question statements actually already posted and solved in Yahoo! Chiebukuro [1] are examined in order to inspect the tendency of the distances between a question and answers. The question statements [89-91] used for the experiment are shown in Table 5-1, and Table 5-2. The statements shown in Table 5-1 are those translated into English, while those shown in Table 5-2 are original Japanese ones. The categories of three question statements used for the analysis are Auction, PC and Love, one each.

For the respondents who posted the answers to those questions, the factor scores of almost all of their answer statements posted in 2005 are obtained by using the multiple regression expressions shown in Equation (4.2). Factor scores are calculated through Java programs that can also execute morphological

**Table 5-1:** The Question Statements Used for the Experiment: English Version.

| Denote          | Statements  |
|-----------------|---|
| Auction<br>[89] | How many days did it take you to finish your transactions at latest?<br>It took me one month.<br>I was an exhibitor and my evaluation rate was 20th, while my client 17th.<br>I felt some anxiety but current evaluation manage to exceed 70.<br>Anyone who has ever experienced troubles, please tell me.<br>I am troubled by a successful tenderer I cannot contact for a week. |
| PC<br>[90]      | I taught myself Excel by reading an introductory book.<br>I've finished the book.<br>I'm worried about how much I can do with it, since I don't use it at work and don't have access to it to practice.<br>It will be OK if I can stop worrying.<br>How should I practice?  |
| Love<br>[91]    | I'm planning to see a guy I used to date, but I haven't seen him in a long time.<br>It is long time no seeing him and just meet him, so I suppose it is the same for him too.<br><br>I am living in Nagoya, and he is in Tokyo. Is that too far to see him more often?  |

**Table 5-2:** The Question Statements Used for the Experiment: Original Japanese Version.

| Denote          | Statements   |
|-----------------|--|
| Auction<br>[89] | 取引で最高、何日ぐらいかかったことがありますか？<br>私は、1ヶ月かかりました。<br>その時の私は出品者で評価が20位、相手は17位だったと思います。<br>この先、不安を感じましたが何とか現在の評価は70を越えました。<br>苦労したことのある人教えてください。<br>現在、1週間連絡の取れない落札者もいて困っています。 |
| PC<br>[90]      | エクセルを入門書を読みながら自分なりに勉強しました。<br>とりあえず、入門書での勉強は終わったのですが、<br>仕事として、実践として使用してる訳ではないので、<br>現状でどれだけ使いこなせるのかが不安です。<br><br>不安解消になる程度でいいのですが、<br>この後は、どんな練習をすればいいですか？          |
| Love<br>[91]    | 昔付き合っていた人と久しぶりに会いに行こうかと思っています。<br>私は本当に久しぶりで、一目会いたいぐらいの思いで、<br>多分彼もそうだと思います。<br><br>私は名古屋で彼は東京です。ちょっと会うには遠いですか？  |

analysis applied to the original texts written by the respondents because morphemes are essential to the equations. Morphological analysis was unable to be applied to some of the answer statements due to syntax error or original text including mere URL.

Here, the factor scores calculated are altogether 66,238 answer statements. These are explained in detail as follows:

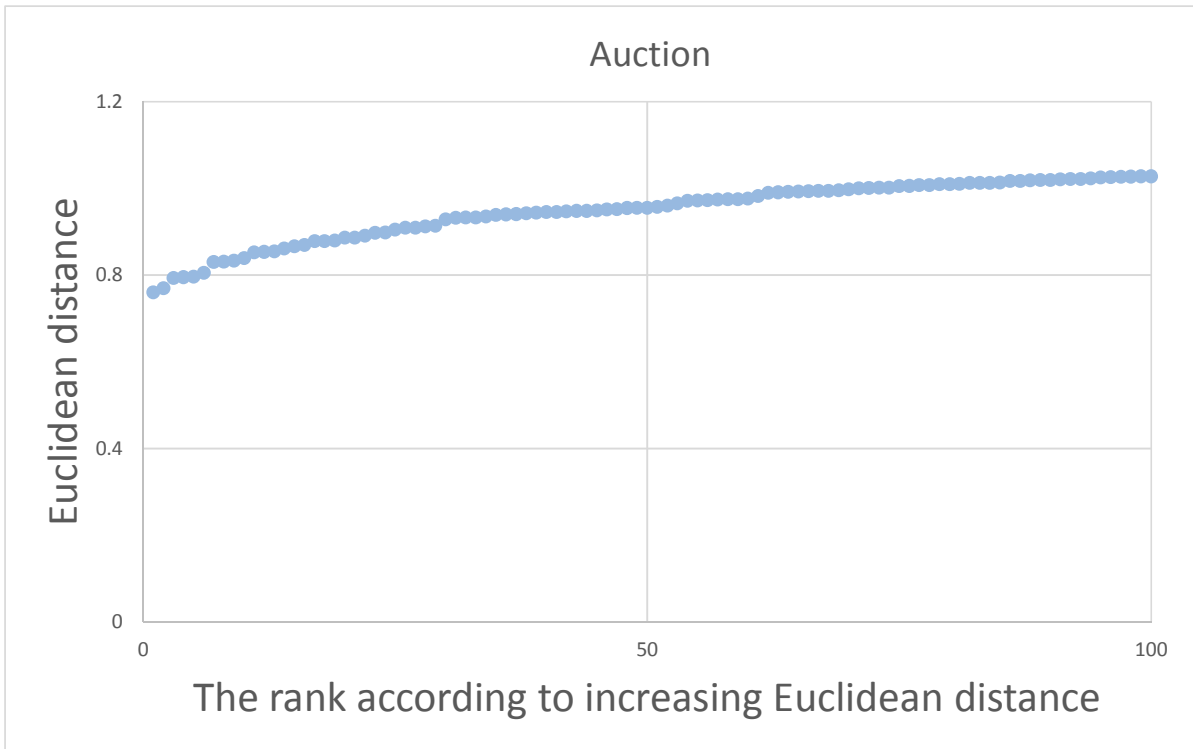
- The numbers of the respondents who gave answers to the question statements on Auction, PC, and Love are 10, 6, and 6, respectively. Those of the total answer statements posted by those users and the statements they posted other than the three answer statements are 22,787, 8,251, and 8,190, respectively.
- The number of the answer statements posted by users who answered the statements other than the three used for the analysis is 27,010. These statements actually posted in 2005 were extracted from the data provided by National Institute of Informatics (NII) [92].

### 5.3. Results

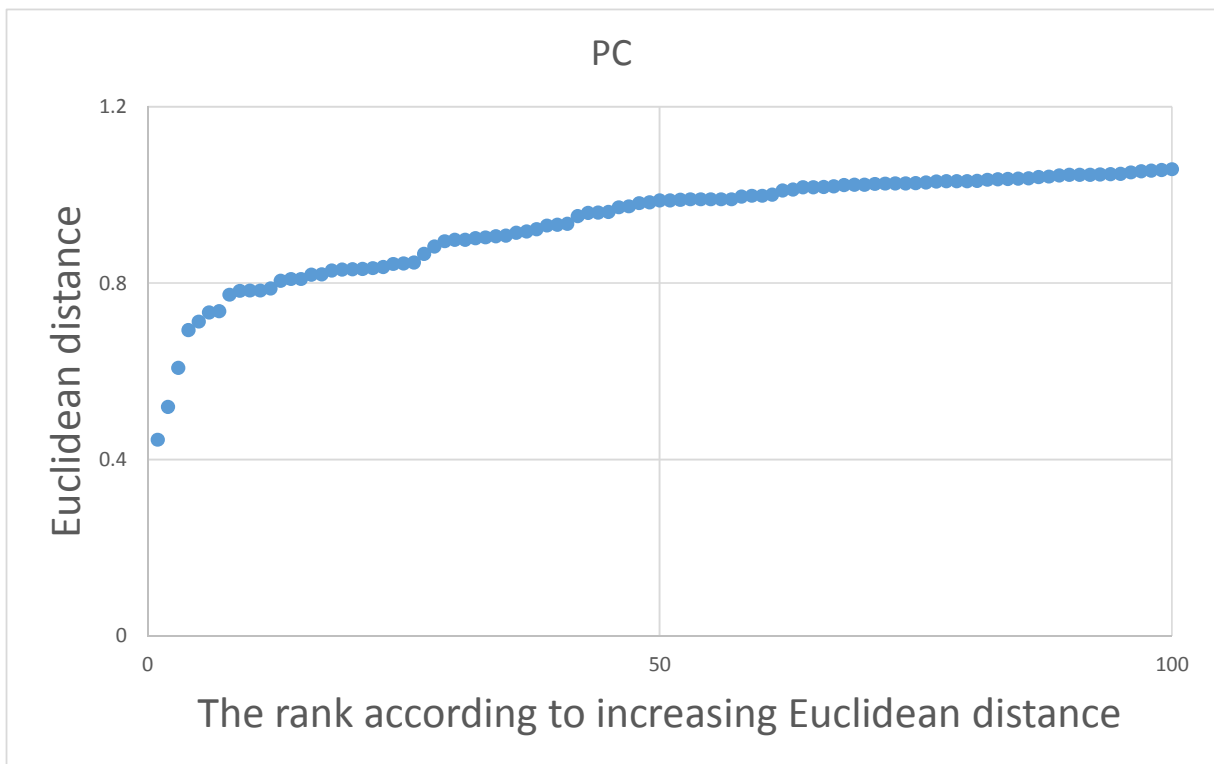
Euclidean distances between each question statement and 66,238 answer statements are calculated. The distance  $D$  is calculated by using the formula (5.1):

$$D = \sqrt{\sum_{k=1}^9 (Fac_{Q_k} - Fac_{A_k})^2} \quad (5.1)$$

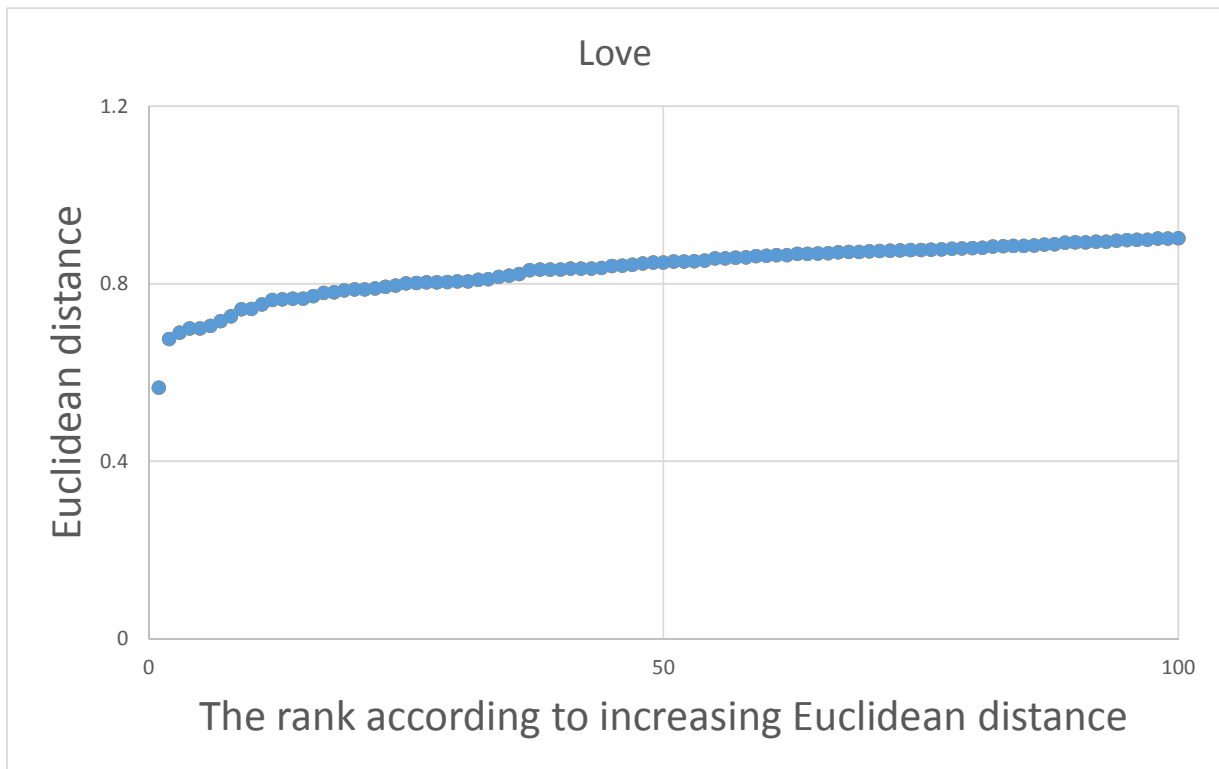
where  $Fac_{Q_k}$  and  $Fac_{A_k}$  are the  $k$ th factor score of a question and that of the answer, respectively. The distances are sorted by ascending order. The distances obtained are plotted in Figure 5-1, Figure 5-2 and Figure 5-3.



**Figure 5-1:** The Rank According to Increasing Euclidean Distance (Auction).



**Figure 5-2:** The Rank According to Increasing Euclidean Distance (PC).



**Figure 5-3:** The Rank According to Increasing Euclidean Distance (Love).

## 5.4. Analysis

The results in higher rank are focused on. Each threshold is determined according to the irregular bump observed in Figure 5-1, Figure 5-2, and Figure 5-3. Thresholds are set as 26, 35, and 29 for the Auction, PC, and Love statement, respectively. The answer statements included in each threshold are shown in Table 5-3, Table 5-4, and Table 5-5. The column entitled “Answer” indicates whether the respondents posted answers to the questions used for the analysis. If they gave an answer to the questions, it is denoted as “A,” “P,” and “L” which stands for Auction, PC, and Love, respectively, regardless of the identical category, accompanied by numbers from “01 to “10” for Auction and those from “01” to “06” for PC and Love, respectively. The number “01” means the answer statement actually chosen as “Best answer” by the questioner. The numbers from “02” and “10” indicate the answer statements other than best answers denoted as virtually posted in chronological order. If they did not answer the questions, it is denoted as “Others.” Users who actually did respond to the question of

identical category are denoted as a double circle in the column entitled “Posted.” Users who appear at least twice in each table are denoted as (A) to (F) in the column entitled “Overlap.” Those users are shaded in Table 5-3, Table 5-4, and Table 5-5 to emphasize that they appear at least twice.

From the results shown in Table 5-3, Table 5-4, and Table 5-5, the numbers of users who actually answered the questions of each identical category are 15, 1, and 3 for the Auction, PC, and Love statement, respectively. This result could imply that the Euclidean distance would not be necessarily smaller even if a user really gave an answer to the question.

Next, the users who appear more than once in Table 5-3, Table 5-4, and Table 5-5 are focused on. The users denoted as (A) and (B) in the “Overlap” column appear 4 and 8 times in the Auction statement, respectively. The users denoted as (B), (C), and (D) in the “Overlap” column appear 5, 3, and 2 times in the PC statement, respectively. The users denoted as (A), (B), (E), and (F) in the “Overlap” column appear 6, 11, 2, and 2 times in the Love statement, respectively. Especially, the users denoted as (A), (B) appear in question statements of different categories.

## 5.5. Considerations

In order to inspect the possibility of seeking for qualified users who can be expected to reply an appropriate answer, the questions actually already posted in Yahoo! Chiebukuro are inspected.

There are some users who appear over once in the list as described in Section 5.4. This means that they posted several answers whose impressions are similar to that of the question. The possibility that such users give appropriate answers to the questioner is considered to be high. The number of appearance can help us select appropriate answerers.

Distance is the difference between the factor scores of the question statement and that of an answer one. It is considered that the answerers, who posted the answer statements close to the question one, may pose the answer to the question. Figure 5-2 (Figure 5-3, respectively) shows that the first three (the first)

answers on PC (Love) are very closer than the others. The users who posted these answers are thought to be appropriate answerers. It is considered that distance may also help us select appropriate answerers.

It is also shown that there is possibility that users other than actually posted respondents could be appropriate answerers.

**Table 5-3:** Answer Statements whose Factor Scores are Close to Those of the Question on Auction.

| Answer | Distance | Posted | Overlap |
|--------|----------|--------|---------|
| Others | 0.760    |        |         |
| A03    | 0.770    | ⊙      |         |
| A07    | 0.793    | ⊙      | ( A )   |
| A07    | 0.795    | ⊙      | ( A )   |
| A01    | 0.796    | ⊙      | ( B )   |
| A01    | 0.805    | ⊙      | ( B )   |
| L06    | 0.830    |        |         |
| A04    | 0.831    | ⊙      |         |
| A01    | 0.834    | ⊙      | ( B )   |
| A01    | 0.840    | ⊙      | ( B )   |
| Others | 0.852    |        |         |
| L05    | 0.853    |        |         |
| A07    | 0.855    | ⊙      | ( A )   |
| A01    | 0.862    | ⊙      | ( B )   |
| Others | 0.867    |        |         |
| A07    | 0.870    | ⊙      | ( A )   |
| Others | 0.878    |        |         |
| Others | 0.878    |        |         |
| Others | 0.880    |        |         |
| Others | 0.887    |        |         |
| Others | 0.887    |        |         |
| Others | 0.891    |        |         |
| Others | 0.898    |        |         |
| A09    | 0.899    | ⊙      |         |
| Others | 0.905    |        |         |
| A01    | 0.909    | ⊙      | ( B )   |
| Others | 0.910    |        |         |
| A01    | 0.913    | ⊙      | ( B )   |
| A01    | 0.914    | ⊙      | ( B )   |



**Table 5-4:** Answer Statements whose Factor Scores are Close to Those of the Question on PC.

| Answer | Distance | Posted | Overlap |
|--------|----------|--------|---------|
| A04    | 0.445    |        | ( C )   |
| A07    | 0.520    |        | ( D )   |
| Others | 0.608    |        |         |
| A04    | 0.694    |        | ( C )   |
| Others | 0.713    |        |         |
| Others | 0.734    |        |         |
| Others | 0.736    |        |         |
| Others | 0.774    |        |         |
| Others | 0.783    |        |         |
| Others | 0.783    |        |         |
| Others | 0.783    |        |         |
| Others | 0.788    |        |         |
| Others | 0.805    |        |         |
| Others | 0.809    |        |         |
| Others | 0.809    |        |         |
| A07    | 0.820    |        | ( D )   |
| A01    | 0.820    |        | ( B )   |
| A01    | 0.829    |        | ( B )   |
| A01    | 0.831    |        | ( B )   |
| P03    | 0.831    | ⊙      |         |
| Others | 0.832    |        |         |
| A04    | 0.835    |        | ( C )   |
| A01    | 0.837    |        | ( B )   |
| A01    | 0.844    |        | ( B )   |
| Others | 0.845    |        |         |
| Others | 0.847    |        |         |

**Table 5-5:** Answer Statements whose Factor Scores are Close to Those of the Question on Love.

| Answer | Distance | Posted | Overlap |
|--------|----------|--------|---------|
| A01    | 0.565    |        | ( B )   |
| A01    | 0.676    |        | ( B )   |
| A04    | 0.690    |        |         |
| A02    | 0.700    |        | ( E )   |
| A01    | 0.700    |        | ( B )   |
| L05    | 0.705    | ⊙      | ( F )   |
| Others | 0.716    |        |         |
| A01    | 0.727    |        | ( B )   |
| P03    | 0.743    |        |         |
| A07    | 0.743    |        | ( A )   |
| A07    | 0.753    |        | ( A )   |
| L06    | 0.763    | ⊙      | ( F )   |
| A01    | 0.765    |        | ( B )   |
| Others | 0.767    |        |         |
| Others | 0.767    |        |         |
| Others | 0.772    |        |         |
| A01    | 0.779    |        | ( B )   |
| Others | 0.781    |        |         |
| Others | 0.785    |        |         |
| Others | 0.787    |        |         |
| A01    | 0.788    |        | ( B )   |
| A07    | 0.789    |        | ( A )   |
| L04    | 0.793    | ⊙      |         |
| A07    | 0.796    |        | ( A )   |
| A01    | 0.800    |        | ( B )   |
| A01    | 0.802    |        | ( B )   |
| A01    | 0.803    |        | ( B )   |
| A03    | 0.804    |        |         |
| Others | 0.804    |        |         |
| A02    | 0.805    |        | ( E )   |
| A07    | 0.805    |        | ( A )   |
| Others | 0.809    |        |         |
| A01    | 0.810    |        | ( B )   |
| Others | 0.815    |        |         |
| A07    | 0.818    |        | ( A )   |

## Chapter 6

# Finding Appropriate Respondents to Questions

### 6.1. Method

This chapter proposes a method of seeking the type of respondents who would be expected to give the appropriate answers to a question. The proposed method determines the possibly qualified respondents according to the following two criteria:

- 1) The number of times a respondent appears in the top  $N$  rank of ascending order of distance between a set of factor scores of a question and that of an answer.
- 2) The sum of  $Score_{Dis\_k}$  if several respondents appear the same several times, where  $Score_k$  is calculated with Formula (6.1), as follows:

$$Score_{Dis\_k} = \frac{Dis\_A_1}{Dis\_A_k} \quad (1 \leq k \leq N) \quad (6.1)$$

$Dis\_A_k$  indicates the  $k$ th distance of the answer statement in ascending order. Therefore, when the answers of a user are  $A_{k_1}, A_{k_2}, \dots$ , and  $A_{k_n}$ , the user has the score  $S$  calculated with Formula (6.2), as follows:

$$S = \sum_{i=1}^n Score_{Dis\_k_i} \quad (6.2)$$

The proposed method is explained by using an example shown in Table 6-1. Table 6-1 includes appearance times and scores of six respondents. The proposed method firstly orders respondents on the

**Table 6-1:** An Example of Appearance Times and Scores.

| Rank_Proposed | App | S    |
|---------------|-----|------|
| 1             | 28  | 22.6 |
| 2             | 23  | 18.4 |
| 3             | 5   | 4.01 |
| 4             | 3   | 2.40 |
| 5             | 2   | 1.62 |
| 6             | 2   | 1.59 |

basis of the appearance time, which is shown in the column entitled “App.” When respondents have the same appearance time, they are ordered according to the score  $S$ , which is given in the column entitled “S.” In Table 6-1, the appearance time of the fifth and the sixth respondents is two. In this case, the respondents are compared by using their scores. The column entitled “Rank\_Proposed” shows the ranks obtained by the proposed method.

## 6.2. The Number of Answers Used

For the criterion 1) described in Section 6.1., the number of answer statements  $N$  must be determined. The number of unique users among the top  $N$  answer statements is firstly examined. Threshold  $N$  is set as 100, 80, 70, 60, 50, 40, 30, 25, 20, 15, and 10.

The number of unique users is shown in Table 6-2. As threshold  $N$ , which is the number of the top answer statements, is not equal to that of unique users, the answers written by the same user is considered as appearing more than once in the top  $N$  answer statements.

**Table 6-2:** The Number of Unique Users.

| Threshold $N$ | Auction | PC | Love |
|---------------|---------|----|------|
| 10            | 6       | 9  | 7    |
| 15            | 9       | 14 | 9    |
| 20            | 13      | 16 | 13   |
| 25            | 18      | 18 | 14   |
| 30            | 19      | 21 | 16   |
| 40            | 23      | 29 | 19   |
| 50            | 28      | 33 | 23   |
| 60            | 29      | 34 | 26   |
| 70            | 31      | 41 | 31   |
| 80            | 37      | 45 | 35   |
| 100           | 43      | 53 | 42   |

Next, the number of the statements written by users is examined. The number of the statements written by the top fifteen unique users is shown in Table 6-3. It is evident that certain answers written by a few users appear many times. For example, in the case of  $N = 100$  of PC, each number of the answers written by top nine users is more or equal to two. These users are considered as appropriate respondents for the question. From these results, the top 100 answer statements are retained for use because they include the appropriate users are.

The rank of unique respondents, their appearance times, and their scores obtained by the proposed method are shown in Table 6-4, Table 6-5, and Table 6-6 for Auction, PC, and Love, respectively. The respondents are sorted according to their appearance times and scores in descending order. The rank is shown in the column entitled “Rank\_Proposed” in Table 6-4, Table 6-5, and Table 6-6. The column entitled “ID” indicates the unique user ID encoded and provided by NII [92] to identify users. The length of character string of each ID is originally 40. The IDs are shown only for first approximately nine characters due to limited spaced and the aim of preventing the inference of actual users.

## 6.3. Evaluation

### 6.3.1. Evaluation Procedure

The proposed method is compared with two methods: (1) the method using averaged scores and (2) the method using distances.

The method using averaged scores ranks users based on the average score of the answers of each user. An example of the results obtained through this method is shown in Table 6-7. As the average score of the first user is higher than that of the second one, the first user appears at the first rank.

The method using distances ranks users based on the answer that has the smallest distance from a question among the answers of each user. An example of the results obtained through this method is shown in Table 6-8. As the distance between a question and the answer of the first user is smaller than that of the second one, the first user appears at the first rank.

**Table 6-3:** The Number of Answers Written by Fifteen Unique Users for Each Statement.

| (a)Auction |     |    |    |    |    |    |    |    |    |    |    |
|------------|-----|----|----|----|----|----|----|----|----|----|----|
| rank \ N   | 100 | 80 | 70 | 60 | 50 | 40 | 30 | 25 | 20 | 15 | 10 |
| 1          | 28  | 22 | 20 | 17 | 14 | 11 | 8  | 5  | 5  | 5  | 4  |
| 2          | 23  | 18 | 17 | 13 | 9  | 7  | 5  | 4  | 4  | 3  | 2  |
| 3          | 5   | 4  | 3  | 3  | 2  | 2  | 1  | 1  | 1  | 1  | 1  |
| 4          | 3   | 2  | 2  | 2  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 5          | 2   | 2  | 2  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 6          | 2   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 7          | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 8          | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 9          | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 10         | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 11         | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 12         | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 13         | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 14         | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  | -  |
| 15         | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  | -  |

| (b)PC    |     |    |    |    |    |    |    |    |    |    |    |
|----------|-----|----|----|----|----|----|----|----|----|----|----|
| rank \ N | 100 | 80 | 70 | 60 | 50 | 40 | 30 | 25 | 20 | 15 | 10 |
| 1        | 27  | 21 | 19 | 19 | 11 | 8  | 7  | 5  | 3  | 2  | 2  |
| 2        | 8   | 8  | 8  | 7  | 7  | 4  | 3  | 3  | 2  | 1  | 1  |
| 3        | 7   | 3  | 3  | 2  | 2  | 2  | 2  | 2  | 2  | 1  | 1  |
| 4        | 4   | 3  | 2  | 2  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 5        | 2   | 2  | 2  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 6        | 2   | 2  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 7        | 2   | 2  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 8        | 2   | 2  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 9        | 2   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 10       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 11       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 12       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 13       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 14       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 15       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |

| (c)Love  |     |    |    |    |    |    |    |    |    |    |    |
|----------|-----|----|----|----|----|----|----|----|----|----|----|
| rank \ N | 100 | 80 | 70 | 60 | 50 | 40 | 30 | 25 | 20 | 15 | 10 |
| 1        | 32  | 24 | 23 | 20 | 16 | 13 | 10 | 8  | 6  | 5  | 4  |
| 2        | 14  | 10 | 9  | 9  | 8  | 6  | 4  | 4  | 2  | 2  | 1  |
| 3        | 10  | 9  | 5  | 4  | 3  | 3  | 2  | 2  | 2  | 2  | 1  |
| 4        | 3   | 3  | 3  | 3  | 2  | 2  | 2  | 1  | 1  | 1  | 1  |
| 5        | 3   | 3  | 3  | 2  | 2  | 2  | 1  | 1  | 1  | 1  | 1  |
| 6        | 2   | 2  | 2  | 2  | 2  | 1  | 1  | 1  | 1  | 1  | 1  |
| 7        | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  |
| 8        | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 9        | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  |
| 10       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 11       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 12       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 13       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  |
| 14       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  | -  |
| 15       | 1   | 1  | 1  | 1  | 1  | 1  | 1  | -  | -  | -  | -  |

**Table 6-4:** The Rank Based on the Appearance and Score (Auction).

| Rank_Proposed | ID         | App | S     |
|---------------|------------|-----|-------|
| 1             | 098e501c8  | 28  | 22.6  |
| 2             | cdfb2fdfe6 | 23  | 18.4  |
| 3             | 70a3a0724  | 5   | 4.01  |
| 4             | 784e8c895  | 3   | 2.40  |
| 5             | cea54127c  | 2   | 1.62  |
| 6             | 236828431  | 2   | 1.59  |
| 7             | 4fbff0c2e  | 1   | 1.00  |
| 8             | 643a57796  | 1   | 0.988 |
| 9             | 1c66641da  | 1   | 0.916 |
| 10            | 3f9d46879  | 1   | 0.892 |
| 11            | 85a7672b5  | 1   | 0.878 |
| 12            | 0bee3fd0ff | 1   | 0.866 |
| 13            | aadad3fa75 | 1   | 0.866 |
| 14            | 09e17f05d  | 1   | 0.864 |
| 15            | 01d5a605c  | 1   | 0.858 |
| 16            | 5e85e9fc1  | 1   | 0.858 |
| 17            | 2e33f85f2  | 1   | 0.847 |
| 18            | 407095d41  | 1   | 0.846 |
| 19            | 5df301b57  | 1   | 0.836 |
| 20            | 87b0cc8e7  | 1   | 0.815 |
| 21            | 4a2602e4a  | 1   | 0.810 |
| 22            | cd41ee0c4  | 1   | 0.809 |
| 23            | bc7dcbc7ff | 1   | 0.804 |
| 24            | cb4ec718e  | 1   | 0.803 |
| 25            | c4fc56960  | 1   | 0.802 |
| 26            | 43ce7dd64  | 1   | 0.802 |
| 27            | 8d74f2e9a  | 1   | 0.801 |
| 28            | e09a78c7f  | 1   | 0.798 |
| 29            | d9a91beae  | 1   | 0.780 |
| 30            | 3cb0afd25  | 1   | 0.774 |
| 31            | df64410c8  | 1   | 0.767 |
| 32            | 5b4b8d5c0  | 1   | 0.759 |
| 33            | f525447d3  | 1   | 0.759 |
| 34            | 300ddc675  | 1   | 0.755 |
| 35            | dae59927c  | 1   | 0.754 |
| 36            | 27f1f02c2  | 1   | 0.753 |
| 37            | f43b219cd  | 1   | 0.753 |
| 38            | 5c14e325e  | 1   | 0.753 |
| 39            | bf5ab1698  | 1   | 0.751 |
| 40            | 3ddae0799  | 1   | 0.748 |
| 41            | e1dfe8aac  | 1   | 0.748 |
| 42            | 550d8b49d  | 1   | 0.744 |
| 43            | 07e7e7e7e  | 1   | 0.744 |

**Table 6-5:** The Rank Based on the Appearance and Score (PC).

| Rank Proposed | ID         | App | S     |
|---------------|------------|-----|-------|
| 1             | 098e501c8  | 27  | 12.5  |
| 2             | 70a3a0724  | 8   | 4.48  |
| 3             | cdfb2fdfe6 | 7   | 3.55  |
| 4             | 784e8c895  | 4   | 1.76  |
| 5             | 321a61ff3c | 2   | 1.16  |
| 6             | c76247416  | 2   | 1.05  |
| 7             | 643a57796  | 2   | 0.927 |
| 8             | dae59927c  | 2   | 0.892 |
| 9             | 722ab6010  | 2   | 0.869 |
| 10            | df75196dal | 1   | 0.625 |
| 11            | d4f38c4dc  | 1   | 0.607 |
| 12            | ee5a10414  | 1   | 0.575 |
| 13            | 1a9aaa10d  | 1   | 0.569 |
| 14            | e6ed8c56a  | 1   | 0.569 |
| 15            | 6a0a86feb  | 1   | 0.569 |
| 16            | f74f10d90b | 1   | 0.565 |
| 17            | 0f70e02ac  | 1   | 0.553 |
| 18            | b0aecbfc2  | 1   | 0.550 |
| 19            | d608e8881  | 1   | 0.550 |
| 20            | a541e222a  | 1   | 0.536 |
| 21            | 07d595a0a  | 1   | 0.535 |
| 22            | 4a1b1bf5   | 1   | 0.527 |
| 23            | d45b7d6fdb | 1   | 0.526 |
| 24            | f01c35bd8  | 1   | 0.514 |
| 25            | a8a51469a  | 1   | 0.496 |
| 26            | a04f0c42c  | 1   | 0.496 |
| 27            | f9cfb8872f | 1   | 0.494 |
| 28            | 5ddf4f884  | 1   | 0.491 |
| 29            | 657c8347e  | 1   | 0.491 |
| 30            | e71528094  | 1   | 0.487 |
| 31            | 407095d41  | 1   | 0.485 |
| 32            | eb3789475  | 1   | 0.478 |
| 33            | 978b2dcb9  | 1   | 0.477 |
| 34            | bda0163eb  | 1   | 0.468 |
| 35            | bba002046  | 1   | 0.457 |
| 36            | e9183ec38  | 1   | 0.438 |
| 37            | 9e4e64103  | 1   | 0.437 |
| 38            | cea54127c  | 1   | 0.437 |
| 39            | dbc8f79e0  | 1   | 0.436 |
| 40            | ea3d851c5  | 1   | 0.435 |
| 41            | 4d52b7540  | 1   | 0.435 |
| 42            | f41b0a4d9  | 1   | 0.434 |
| 43            | 3eccb4b27  | 1   | 0.434 |
| 44            | 43ce7dd64  | 1   | 0.432 |
| 45            | 4fad7dd68  | 1   | 0.432 |
| 46            | 5d3957fc6  | 1   | 0.431 |
| 47            | 85a7672b5  | 1   | 0.430 |
| 48            | 1334f2ad2  | 1   | 0.427 |
| 49            | 0f3503fa9b | 1   | 0.426 |
| 50            | c4fc56960  | 1   | 0.425 |
| 51            | 902af3fa12 | 1   | 0.424 |
| 52            | 05d6e8180  | 1   | 0.423 |
| 53            | 5107a699b  | 1   | 0.421 |



**Table 6-6:** The Rank Based on the Appearance and Score (Love).

| Rank_Proposed | ID         | App | S     |
|---------------|------------|-----|-------|
| 1             | 098e501c8  | 32  | 22.1  |
| 2             | cdfb2fdfe6 | 14  | 9.51  |
| 3             | 784e8c895  | 10  | 6.72  |
| 4             | 321a61ff3c | 3   | 2.19  |
| 5             | a541e222a  | 3   | 2.10  |
| 6             | 407095d41  | 2   | 1.35  |
| 7             | 70a3a0724  | 1   | 0.820 |
| 8             | 6bda0ddbfa | 1   | 0.790 |
| 9             | b1fc8ee12  | 1   | 0.738 |
| 10            | 975ff1a81c | 1   | 0.738 |
| 11            | c4db6a1d5  | 1   | 0.732 |
| 12            | d9a91beae  | 1   | 0.724 |
| 13            | b0aecbfc2  | 1   | 0.720 |
| 14            | a09a55cfff | 1   | 0.719 |
| 15            | 3cb0afd25  | 1   | 0.713 |
| 16            | 643a57796  | 1   | 0.704 |
| 17            | 4d52b7540  | 1   | 0.703 |
| 18            | 9d65cf5b2  | 1   | 0.699 |
| 19            | b4577db39  | 1   | 0.693 |
| 20            | 09e17f05d  | 1   | 0.678 |
| 21            | aadad3fa75 | 1   | 0.678 |
| 22            | 2ad2f68ca  | 1   | 0.669 |
| 23            | 0eb46f5e4  | 1   | 0.667 |
| 24            | ec361b56a  | 1   | 0.665 |
| 25            | a54b67ee9  | 1   | 0.664 |
| 26            | c76247416  | 1   | 0.656 |
| 27            | 1c66641da  | 1   | 0.654 |
| 28            | 721fb53a9  | 1   | 0.654 |
| 29            | 6a33b0e79  | 1   | 0.652 |
| 30            | 722ab6010  | 1   | 0.651 |
| 31            | 5c2ec798c  | 1   | 0.651 |
| 32            | 91f342c90  | 1   | 0.647 |
| 33            | 55b65f6db  | 1   | 0.645 |
| 34            | f0a20eacb  | 1   | 0.644 |
| 35            | d1e9c5fe9  | 1   | 0.643 |
| 36            | 9be7791b2  | 1   | 0.640 |
| 37            | 45cc07ea5  | 1   | 0.639 |
| 38            | fd4b1b130  | 1   | 0.639 |
| 39            | ee5a10414  | 1   | 0.638 |
| 40            | 378262191  | 1   | 0.637 |
| 41            | 08d830ed8  | 1   | 0.634 |
| 42            | 41855a3e1  | 1   | 0.629 |

**Table 6-7:** An Example of the Result Obtained by the Method Based on Averaged Scores.

| Rank_Ave_Score | Ave_Score |
|----------------|-----------|
| 1              | 1.00      |
| 2              | 0.988     |
| 3              | 0.916     |
| 4              | 0.892     |
| 5              | 0.878     |
| 6              | 0.866     |

**Table 6-8:** An Example of the Result Obtained by the Method Based on Distance.

| Rank_Dis | Dis   |
|----------|-------|
| 1        | 0.760 |
| 2        | 0.770 |
| 3        | 0.805 |
| 4        | 0.830 |
| 5        | 0.852 |
| 6        | 0.853 |

The soundness of these methods is evaluated through precision and recall. Precision and recall are calculated with Formulas (6.3) and (6.4), respectively, as follows:

$$Precision = \frac{\text{The number of retrieved relevant respondents}}{\text{The number of retrieved respondents}} \quad (6.3)$$

$$Recall = \frac{\text{The number of retrieved relevant respondents}}{\text{The number of relevant respondents}} \quad (6.4)$$

To evaluate the methods by using precision and recall, the relevant respondents must first be decided.

### 6.3.2. Obtaining Averaged Fitness Rates toward Determining Relevant Respondents

As relevant respondents cannot be determined automatically, some experiment using subjects must be conducted. There exists a method for determining relevant respondents, by which subjects are asked whether certain answers are suitable for a question. It is, however, difficult for subjects to judge whether answers are suitable because while some answers may seem suitable, they may not be in actuality. Thus, subjects are asked to give a degree of its fitness to a question. This degree is called the fitness rate.

## (1) Procedures

Before the start of the experiment, subjects are given the following instructions on the experimental procedures:

- Experimental materials consist of three sets of question and answer statements. They are printed as a set of books and given to subjects.
- Each set consists of one question and one hundred answers.
- Subjects are asked to read a question statement first and then read answer statements for evaluation.
- The criteria of evaluating answer statements are determined by the following five levels:
  - 5: The respondent who gave the answer statement is highly expected to give an appropriate answer statement to the question.
  - 4: The respondent is expected to give an appropriate answer statement to the question.
  - 3: It is undecided if the respondent is expected to give an appropriate answer statement to the question.
  - 2: The respondent is less expected to give an appropriate answer statement to the question.
  - 1: The respondent is not expected to give an appropriate answer statement to the question at all.
- Evaluation values are provided in a file on the computer.
- The evaluation order of the statements is Auction, PC, and Love.
- Identical answer statements can appear several times in different categories. In such a case, subjects are asked to re-evaluate whether the respondents of these statements are expected to give appropriate answer statements to a question.

The following points are not provided as information to the subjects in order to avoid the evaluation with preoccupation:

- The order of answer statements is shown according to the ascending order of distances, regardless of their categories.
- Several statements are actually provided by the identical respondents.

This is due to the following reasons:

- The contents of answer statements could be more considered and evaluated through human evaluations. In evaluating whether respondents are relevant, syntactic information, e.g. the number of letters/sentences/periods, etc., is not considered so that the preoccupation can be eliminated, and answer statements can be evaluated as they are.
- The evaluation method with using link analysis is partially based on the number of Best Answers of a user and that of votes implemented on Yahoo! Answers [45]. Data provided by NII [92] is so scarce that it is difficult to evaluate in the similar fashion as this prior work. The number of Best Answers of each user is not included in the provided data. In addition, the vote system implemented on Yahoo! Answers is not on Yahoo! Chiebukuro.
- As described in Chapter 2, most of the prior works, particularly on introducing users to answers or estimating Best Answers, have mainly used textual features. Compared with these works, ours does not mainly consider textual features. This is because there could be some limitations to evaluating the contents of answer statements with using mere textual features.

The experimental materials are the statements that have actually been posted on Yahoo! Chiebukuro [1] between 2004 and 2005. The question statements are the same ones used and explained in Chapter 5 [89-91]. The category of the question in each set is Auction, PC, and Love. All the experimental materials are shown in Appendix C.

Twelve subjects (nine males and three females, with ages from 22 to 29) participated in the experiment. As the experiment has several subjects, fitness rates obtained can be averaged. The averaged fitness rates are considered to be objective because taking the average eliminates the subjectivity of the fitness rates given by subjects.

## (2) Averaged Fitness Rates Obtained

In order to examine whether or not gender difference affected the evaluations, *t*-test is applied, with the significance level at 1%, to the answers of nine males and those of three females. This result is shown in Table 6-9. The *t*-test shows that there is a significant difference between the scores of males

and those of females. Therefore, the answer statements of the males and females are separately treated.

The averaged fitness rates for the answer statements are shown in Table 6-10, Table 6-11, and Table 6-12 for Auction, PC, and Love, respectively. The column entitled “AFR” shows each averaged fitness rate. The results obtained by males and those by females are separately shown.

As a respondent has more than one answer, determining the representative fitness rate of the respondent based on a set of answers is required. The best averaged fitness rate is used as the representative fitness rate of the respondent. The one hundred answer statements include those that are in different categories from that of the question. Their averaged fitness rates may be low due to the mismatch of the category. This is the major reason why the best averaged fitness rate is used as the representative one.

The unique respondents and their best averaged fitness rates are shown in Table 6-13, Table 6-14, and Table 6-15 for Auction, PC, and Love, respectively. Here, the respondents are ordered according to their best averaged fitness rates. The ranks are shown in the column entitled “Rank\_Exp” in Table 6-13, Table 6-14, and Table 6-15. The column entitled “BAFR” shows each respondent’s best averaged fitness rate.

### (3) Relevant Respondents

A relevant respondent is defined as “the respondent whose answer statements include the best averaged fitness rate over threshold  $n$ .” By varying threshold  $n$ , different sets of relevant respondents can be obtained. Here, threshold  $n$  is set to 4.0, 3.5, 3.0, 2.5, and 2.0. Thus, five sets of relevant respondents are obtained. For example, when  $n$  is 4.0 (3.5, respectively), the top two (five) respondents shown in the male evaluations of Table 6-13 become relevant respondents because their best averaged fitness rates are higher than 4.0 (3.5). Precision and recall are calculated by using these five sets of relevant respondents.

**Table 6-9:** Results of Significant Difference of Gender.

| Gender | Average | Variance | Value p  |
|--------|---------|----------|----------|
| Male   | 2.679   | 1.350    | 4.68E-06 |
| Female | 2.506   | 0.833    |          |

**Table 6-10: Averaged Fitness Rates (Auction).**

| Answer | ID         | AFR  |        | Answer  | ID         | AFR  |        |
|--------|------------|------|--------|---------|------------|------|--------|
|        |            | Male | Female |         |            | Male | Female |
| Auc-1  | 4fbff0c2e  | 2.67 | 2.33   | Auc-51  | cdfb2fdfe6 | 2.78 | 2.67   |
| Auc-2  | 643a57796  | 4.56 | 3.00   | Auc-52  | 098e501c8  | 2.56 | 2.33   |
| Auc-3  | cdfb2fdfe6 | 3.11 | 2.67   | Auc-53  | 70a3a0724  | 4.00 | 3.67   |
| Auc-4  | cdfb2fdfe6 | 1.78 | 2.00   | Auc-54  | cdfb2fdfe6 | 3.33 | 2.67   |
| Auc-5  | 098e501c8  | 2.56 | 2.00   | Auc-55  | cdfb2fdfe6 | 2.33 | 3.00   |
| Auc-6  | 098e501c8  | 3.78 | 3.33   | Auc-56  | cea54127d  | 2.89 | 3.33   |
| Auc-7  | 1c66641da  | 2.78 | 2.33   | Auc-57  | cdfb2fdfe6 | 2.67 | 3.00   |
| Auc-8  | 70a3a0724  | 2.56 | 3.33   | Auc-58  | 098e501c8  | 2.78 | 3.00   |
| Auc-9  | 098e501c8  | 2.44 | 2.00   | Auc-59  | d9a91bae   | 2.00 | 2.33   |
| Auc-10 | 098e501c8  | 2.67 | 2.33   | Auc-60  | 098e501c8  | 2.56 | 3.00   |
| Auc-11 | 3f9d46879  | 2.44 | 2.00   | Auc-61  | 3cb0afd25  | 2.00 | 2.67   |
| Auc-12 | 784e8c895  | 2.67 | 2.67   | Auc-62  | cdfb2fdfe6 | 3.00 | 3.00   |
| Auc-13 | cdfb2fdfe6 | 1.78 | 2.67   | Auc-63  | df64410c8  | 1.67 | 2.33   |
| Auc-14 | 098e501c8  | 3.67 | 4.00   | Auc-64  | cdfb2fdfe6 | 3.11 | 3.00   |
| Auc-15 | 85a7672b5  | 2.78 | 3.00   | Auc-65  | cdfb2fdfe6 | 3.11 | 3.00   |
| Auc-16 | cdfb2fdfe6 | 2.22 | 3.00   | Auc-66  | 098e501c8  | 2.44 | 2.33   |
| Auc-17 | aadad3fa75 | 1.56 | 1.33   | Auc-67  | 098e501c8  | 2.00 | 2.33   |
| Auc-18 | 0bee3fd0ff | 2.78 | 3.00   | Auc-68  | 784e8c895  | 2.33 | 2.33   |
| Auc-19 | 09e17f05d  | 2.22 | 3.00   | Auc-69  | 098e501c8  | 3.33 | 3.33   |
| Auc-20 | 5e85e9fc1  | 1.44 | 1.67   | Auc-70  | cdfb2fdfe6 | 2.33 | 2.67   |
| Auc-21 | 01d5a605c  | 3.11 | 3.67   | Auc-71  | cdfb2fdfe6 | 2.22 | 2.33   |
| Auc-22 | 236828431  | 1.78 | 1.33   | Auc-72  | 098e501c8  | 2.67 | 2.67   |
| Auc-23 | 2e33f85f2  | 2.00 | 2.33   | Auc-73  | f525447d3  | 1.44 | 1.00   |
| Auc-24 | 407095d41  | 3.44 | 3.67   | Auc-74  | 5b4b8d5c0  | 2.33 | 2.33   |
| Auc-25 | cea54127d  | 2.67 | 3.00   | Auc-75  | 70a3a0724  | 3.44 | 3.00   |
| Auc-26 | 098e501c8  | 2.00 | 1.67   | Auc-76  | 098e501c8  | 2.00 | 2.00   |
| Auc-27 | 5df301b57  | 2.78 | 2.33   | Auc-77  | 300ddc675  | 2.44 | 3.33   |
| Auc-28 | 098e501c8  | 2.78 | 2.67   | Auc-78  | dae59927c  | 2.33 | 2.67   |
| Auc-29 | 098e501c8  | 3.00 | 3.33   | Auc-79  | 27f1f02c2  | 2.33 | 2.67   |
| Auc-30 | cdfb2fdfe6 | 3.00 | 3.33   | Auc-80  | f43b219cd  | 2.22 | 2.67   |
| Auc-31 | cdfb2fdfe6 | 3.44 | 3.67   | Auc-81  | 5c14e325e  | 2.11 | 1.67   |
| Auc-32 | 87b0cc8e7  | 2.00 | 3.33   | Auc-82  | 098e501c8  | 3.11 | 2.67   |
| Auc-33 | 098e501c8  | 2.67 | 3.67   | Auc-83  | bf5ab1698  | 2.67 | 2.67   |
| Auc-34 | 098e501c8  | 2.56 | 3.33   | Auc-84  | 098e501c8  | 2.67 | 2.00   |
| Auc-35 | 4a2602e4a  | 3.67 | 3.33   | Auc-85  | cdfb2fdfe6 | 2.44 | 2.33   |
| Auc-36 | cd41ee0c4  | 1.89 | 2.00   | Auc-86  | e1dfe8aac  | 2.11 | 1.67   |
| Auc-37 | cdfb2fdfe6 | 2.33 | 3.33   | Auc-87  | 3ddae0799  | 2.67 | 2.67   |
| Auc-38 | 70a3a0724  | 4.11 | 4.67   | Auc-88  | 098e501c8  | 3.78 | 3.33   |
| Auc-39 | 098e501c8  | 3.78 | 4.33   | Auc-89  | 098e501c8  | 2.56 | 3.67   |
| Auc-40 | bc7dcbc7f  | 2.00 | 2.00   | Auc-90  | cdfb2fdfe6 | 2.22 | 2.33   |
| Auc-41 | 098e501c8  | 3.22 | 3.33   | Auc-91  | 550d8b49d  | 3.56 | 3.33   |
| Auc-42 | cb4ec718e  | 3.11 | 2.67   | Auc-92  | 07e7e7e7e  | 2.56 | 2.67   |
| Auc-43 | c4fc56960  | 3.22 | 3.67   | Auc-93  | cdfb2fdfe6 | 2.56 | 3.00   |
| Auc-44 | 43ce7dd64  | 1.44 | 1.33   | Auc-94  | 784e8c895  | 1.67 | 2.00   |
| Auc-45 | 8d74f2e9a  | 2.67 | 2.67   | Auc-95  | 70a3a0724  | 3.44 | 3.33   |
| Auc-46 | 098e501c8  | 3.00 | 2.67   | Auc-96  | 098e501c8  | 3.22 | 3.67   |
| Auc-47 | e09a78c7f  | 3.00 | 3.67   | Auc-97  | cdfb2fdfe6 | 2.89 | 3.00   |
| Auc-48 | cdfb2fdfe6 | 3.11 | 3.00   | Auc-98  | 098e501c8  | 2.67 | 2.67   |
| Auc-49 | 098e501c8  | 2.00 | 1.33   | Auc-99  | cdfb2fdfe6 | 2.11 | 2.00   |
| Auc-50 | cdfb2fdfe6 | 2.00 | 3.33   | Auc-100 | 236828431  | 1.78 | 1.67   |

**Table 6-11: Averaged Fitness Rates (PC).**

| Answer | ID         | AFR  |        | Answer | ID         | AFR  |        |
|--------|------------|------|--------|--------|------------|------|--------|
|        |            | Male | Female |        |            | Male | Female |
| PC-1   | 70a3a0724  | 2.22 | 1.67   | PC-51  | 784e8c895  | 1.67 | 2.00   |
| PC-2   | cdfb2fdfe6 | 3.00 | 2.67   | PC-52  | 098e501c8  | 2.89 | 2.33   |
| PC-3   | 321a61ff3c | 2.00 | 2.33   | PC-53  | 098e501c8  | 3.78 | 3.33   |
| PC-4   | 70a3a0724  | 2.56 | 2.67   | PC-54  | 098e501c8  | 3.78 | 3.00   |
| PC-5   | df75196da  | 2.22 | 2.33   | PC-55  | 098e501c8  | 3.78 | 3.00   |
| PC-6   | d4f38c4dc  | 3.11 | 3.00   | PC-56  | 098e501c8  | 3.78 | 3.00   |
| PC-7   | c76247416  | 3.33 | 2.67   | PC-57  | 098e501c8  | 3.78 | 3.00   |
| PC-8   | ee5a10414  | 2.56 | 2.00   | PC-58  | c76247416  | 3.00 | 2.67   |
| PC-9   | 1a9aaa10d  | 2.89 | 3.33   | PC-59  | 098e501c8  | 3.56 | 2.67   |
| PC-10  | e6ed8c56a  | 2.67 | 2.00   | PC-60  | 098e501c8  | 3.44 | 3.00   |
| PC-11  | 6a0a86feb  | 3.22 | 3.67   | PC-61  | 784e8c895  | 2.22 | 2.00   |
| PC-12  | f74f10d90  | 3.00 | 4.00   | PC-62  | 70a3a0724  | 2.44 | 2.00   |
| PC-13  | 0f70e02ac  | 2.89 | 2.33   | PC-63  | 722ab6010  | 3.22 | 3.33   |
| PC-14  | d608e8881  | 1.22 | 2.33   | PC-64  | e9183ec38  | 2.56 | 2.67   |
| PC-15  | b0aecbfc2  | 1.67 | 1.33   | PC-65  | cdfb2fdfe6 | 3.33 | 3.00   |
| PC-16  | cdfb2fdfe6 | 3.22 | 3.00   | PC-66  | 9e4e64103  | 2.89 | 2.67   |
| PC-17  | 098e501c8  | 3.22 | 2.33   | PC-67  | cea54127c  | 3.33 | 2.67   |
| PC-18  | 098e501c8  | 2.78 | 2.67   | PC-68  | dbcf879e0  | 3.00 | 2.67   |
| PC-19  | 098e501c8  | 1.67 | 2.00   | PC-69  | 4d52b7540  | 2.11 | 2.67   |
| PC-20  | a541e222a  | 4.22 | 3.67   | PC-70  | ea3d851c5  | 3.00 | 2.67   |
| PC-21  | 07d595a0a  | 3.00 | 2.67   | PC-71  | 643a57796  | 2.44 | 2.00   |
| PC-22  | 70a3a0724  | 3.33 | 2.33   | PC-72  | f41b0a4d9  | 2.89 | 2.67   |
| PC-23  | 098e501c8  | 3.11 | 2.67   | PC-73  | dae59927c  | 2.67 | 2.67   |
| PC-24  | 098e501c8  | 3.00 | 3.33   | PC-74  | 3eccb4b27  | 2.67 | 2.67   |
| PC-25  | 4a1b1bfb5  | 2.33 | 2.00   | PC-75  | 784e8c895  | 2.22 | 2.00   |
| PC-26  | d45b7d6fd  | 2.44 | 2.33   | PC-76  | 098e501c8  | 2.56 | 2.33   |
| PC-27  | f01c35bd8  | 3.22 | 3.67   | PC-77  | 098e501c8  | 2.78 | 2.33   |
| PC-28  | 098e501c8  | 2.78 | 3.00   | PC-78  | 43ce7dd64  | 3.56 | 3.00   |
| PC-29  | 098e501c8  | 2.44 | 2.67   | PC-79  | 4fad7dd68  | 1.89 | 2.00   |
| PC-30  | a04f0c42c  | 1.33 | 1.33   | PC-80  | 321a61ff3c | 1.78 | 1.67   |
| PC-31  | a8a51469a  | 3.56 | 2.67   | PC-81  | cdfb2fdfe6 | 3.67 | 3.00   |
| PC-32  | f9cfb8872f | 4.00 | 3.00   | PC-82  | 5d3957fc6  | 2.00 | 2.33   |
| PC-33  | 643a57796  | 2.89 | 2.67   | PC-83  | 85a7672b5  | 3.78 | 3.00   |
| PC-34  | 5ddfd4f884 | 3.11 | 2.67   | PC-84  | 784e8c895  | 2.11 | 2.00   |
| PC-35  | 657c8347e  | 3.00 | 3.67   | PC-85  | 098e501c8  | 2.56 | 2.33   |
| PC-36  | e71528094  | 2.33 | 2.33   | PC-86  | 722ab6010  | 3.11 | 2.33   |
| PC-37  | 407095d41  | 2.89 | 2.67   | PC-87  | cdfb2fdfe6 | 3.56 | 3.33   |
| PC-38  | 70a3a0724  | 3.22 | 3.67   | PC-88  | 098e501c8  | 2.44 | 2.00   |
| PC-39  | 098e501c8  | 2.11 | 2.67   | PC-89  | 1334f2ad2  | 1.78 | 2.33   |
| PC-40  | eb3789475  | 3.22 | 3.00   | PC-90  | 098e501c8  | 2.89 | 2.00   |
| PC-41  | 978b2dcb9  | 1.44 | 2.00   | PC-91  | 0f3503fa9  | 3.00 | 3.00   |
| PC-42  | bda0163eb  | 2.78 | 1.67   | PC-92  | 098e501c8  | 2.67 | 2.00   |
| PC-43  | 70a3a0724  | 2.67 | 2.33   | PC-93  | cdfb2fdfe6 | 3.44 | 2.67   |
| PC-44  | 098e501c8  | 3.00 | 2.67   | PC-94  | c4fc56960  | 3.00 | 2.67   |
| PC-45  | 70a3a0724  | 2.67 | 2.33   | PC-95  | 098e501c8  | 2.33 | 2.00   |
| PC-46  | dae59927c  | 2.78 | 3.00   | PC-96  | 902af3fa12 | 3.11 | 3.33   |
| PC-47  | bba002046  | 3.33 | 3.67   | PC-97  | 05d6e8180  | 2.33 | 2.33   |
| PC-48  | 098e501c8  | 2.78 | 3.33   | PC-98  | cdfb2fdfe6 | 2.44 | 2.00   |
| PC-49  | 70a3a0724  | 3.11 | 2.67   | PC-99  | 098e501c8  | 2.67 | 2.33   |
| PC-50  | 098e501c8  | 2.78 | 3.33   | PC-100 | 5107a699b  | 2.33 | 2.00   |

Table 6-12: Averaged Fitness Rates (Love).

| Answer  | ID         | AFR  |        | Answer   | ID         | AFR  |        |
|---------|------------|------|--------|----------|------------|------|--------|
|         |            | Male | Female |          |            | Male | Female |
| Love-1  | 098e501c8  | 3.00 | 2.33   | Love-51  | 784e8c895  | 1.89 | 1.67   |
| Love-2  | 098e501c8  | 2.78 | 2.33   | Love-52  | ec361b56a  | 2.44 | 2.33   |
| Love-3  | 70a3a0724  | 2.89 | 2.33   | Love-53  | cdfb2fdfe6 | 3.11 | 2.00   |
| Love-4  | 321a61ff3c | 2.56 | 2.00   | Love-54  | a54b67ee9  | 2.78 | 1.67   |
| Love-5  | 098e501c8  | 2.89 | 3.00   | Love-55  | 784e8c895  | 2.44 | 1.67   |
| Love-6  | 784e8c895  | 2.78 | 2.00   | Love-56  | 098e501c8  | 2.78 | 2.00   |
| Love-7  | 6bda0ddbfa | 2.78 | 2.33   | Love-57  | 098e501c8  | 2.67 | 2.67   |
| Love-8  | 098e501c8  | 3.00 | 2.33   | Love-58  | 098e501c8  | 2.89 | 2.00   |
| Love-9  | a541e222a  | 2.67 | 2.67   | Love-59  | c76247416  | 2.44 | 2.00   |
| Love-10 | cdfb2fdfe6 | 2.00 | 2.00   | Love-60  | 098e501c8  | 2.78 | 1.67   |
| Love-11 | cdfb2fdfe6 | 2.44 | 2.33   | Love-61  | 1c66641da  | 1.33 | 1.00   |
| Love-12 | 784e8c895  | 2.22 | 3.00   | Love-62  | 721fb53a9  | 3.11 | 2.00   |
| Love-13 | 098e501c8  | 2.78 | 2.33   | Love-63  | 098e501c8  | 2.67 | 1.67   |
| Love-14 | 975ff1a81c | 2.11 | 1.67   | Love-64  | 6a33b0e79  | 2.44 | 2.00   |
| Love-15 | b1fc8ee12  | 2.33 | 1.67   | Love-65  | 722ab6010  | 2.44 | 1.67   |
| Love-16 | c4db6a1d5  | 2.78 | 2.33   | Love-66  | 5c2ec798c  | 2.00 | 1.67   |
| Love-17 | 098e501c8  | 2.33 | 2.00   | Love-67  | 098e501c8  | 3.22 | 3.00   |
| Love-18 | d9a91beae  | 2.78 | 1.67   | Love-68  | 784e8c895  | 2.56 | 2.00   |
| Love-19 | b0aecbfc2  | 2.56 | 2.33   | Love-69  | a541e222a  | 2.56 | 2.00   |
| Love-20 | a09a55cff  | 2.78 | 3.00   | Love-70  | 098e501c8  | 2.67 | 1.67   |
| Love-21 | 098e501c8  | 3.11 | 3.00   | Love-71  | 91f342c90  | 3.11 | 3.00   |
| Love-22 | cdfb2fdfe6 | 2.56 | 2.33   | Love-72  | cdfb2fdfe6 | 3.22 | 3.00   |
| Love-23 | 3cb0afd25  | 1.89 | 1.67   | Love-73  | 098e501c8  | 3.11 | 2.67   |
| Love-24 | cdfb2fdfe6 | 2.89 | 1.67   | Love-74  | 784e8c895  | 1.89 | 1.67   |
| Love-25 | 098e501c8  | 3.22 | 2.33   | Love-75  | 784e8c895  | 2.33 | 1.67   |
| Love-26 | 098e501c8  | 3.00 | 2.00   | Love-76  | 55b65f6db  | 3.56 | 2.67   |
| Love-27 | 098e501c8  | 2.44 | 2.00   | Love-77  | f0a20eacb  | 3.00 | 2.33   |
| Love-28 | 643a57796  | 3.00 | 2.33   | Love-78  | 784e8c895  | 2.44 | 2.00   |
| Love-29 | 4d52b7540  | 3.11 | 3.33   | Love-79  | d1e9c5fe9  | 2.11 | 1.67   |
| Love-30 | 321a61ff3c | 1.78 | 2.33   | Love-80  | 784e8c895  | 2.00 | 1.33   |
| Love-31 | cdfb2fdfe6 | 2.56 | 1.67   | Love-81  | 098e501c8  | 2.33 | 1.67   |
| Love-32 | 9d65cf5b2  | 2.33 | 1.67   | Love-82  | 9be7791b2  | 2.00 | 1.67   |
| Love-33 | 098e501c8  | 2.67 | 2.33   | Love-83  | 098e501c8  | 3.11 | 2.67   |
| Love-34 | b4577db39  | 3.22 | 2.33   | Love-84  | fd4b1b130  | 1.89 | 1.00   |
| Love-35 | cdfb2fdfe6 | 3.11 | 3.00   | Love-85  | 45cc07ea5  | 2.44 | 2.67   |
| Love-36 | a541e222a  | 2.67 | 2.00   | Love-86  | ee5a10414  | 3.22 | 2.67   |
| Love-37 | 407095d41  | 2.22 | 2.33   | Love-87  | 37826219   | 2.00 | 1.33   |
| Love-38 | 098e501c8  | 2.78 | 2.33   | Love-88  | 098e501c8  | 2.22 | 2.33   |
| Love-39 | 321a61ff3c | 1.67 | 2.00   | Love-89  | 08d830ed8  | 3.00 | 3.00   |
| Love-40 | 098e501c8  | 2.22 | 1.67   | Love-90  | cdfb2fdfe6 | 3.22 | 2.67   |
| Love-41 | aadad3fa75 | 1.44 | 1.33   | Love-91  | 098e501c8  | 2.22 | 1.67   |
| Love-42 | 09e17f05d  | 2.00 | 2.00   | Love-92  | cdfb2fdfe6 | 2.44 | 2.00   |
| Love-43 | 098e501c8  | 2.22 | 2.00   | Love-93  | cdfb2fdfe6 | 3.33 | 2.67   |
| Love-44 | 098e501c8  | 1.89 | 1.67   | Love-94  | 098e501c8  | 3.11 | 2.33   |
| Love-45 | cdfb2fdfe6 | 2.67 | 2.00   | Love-95  | 784e8c895  | 2.22 | 2.33   |
| Love-46 | cdfb2fdfe6 | 2.78 | 1.67   | Love-96  | 41855a3e1  | 2.44 | 2.33   |
| Love-47 | 407095d41  | 2.56 | 2.33   | Love-97  | 098e501c8  | 2.11 | 2.67   |
| Love-48 | 2ad2f68ca  | 3.00 | 2.33   | Love-98  | 098e501c8  | 2.78 | 2.33   |
| Love-49 | 0eb46f5e4  | 3.33 | 4.00   | Love-99  | 098e501c8  | 2.78 | 2.33   |
| Love-50 | 098e501c8  | 3.11 | 2.67   | Love-100 | cdfb2fdfe6 | 2.67 | 3.00   |



**Table 6-13: Best Averaged Fitness Rates (Auction).**

| Male     |            |      | Female   |            |      |
|----------|------------|------|----------|------------|------|
| Rank_Exp | ID         | BAFR | Rank_Exp | ID         | BAFR |
| 1        | 643a57796  | 4.56 | 1        | 70a3a0724  | 4.67 |
| 2        | 70a3a0724  | 4.11 | 2        | 098e501c8  | 4.33 |
| 3        | 098e501c8  | 3.78 | 3        | 01d5a605c  | 3.67 |
| 4        | 4a2602e4a  | 3.67 | 4        | 407095d41  | 3.67 |
| 5        | 550d8b49d  | 3.56 | 5        | c4fc56960  | 3.67 |
| 6        | 407095d41  | 3.44 | 6        | cdfb2fdfe6 | 3.67 |
| 7        | cdfb2fdfe6 | 3.44 | 7        | e09a78c7f  | 3.67 |
| 8        | c4fc56960  | 3.22 | 8        | 300ddc675  | 3.33 |
| 9        | 01d5a605c  | 3.11 | 9        | 4a2602e4a  | 3.33 |
| 10       | cb4ec718e  | 3.11 | 10       | 550d8b49d  | 3.33 |
| 11       | e09a78c7f  | 3.00 | 11       | 87b0cc8e7  | 3.33 |
| 12       | cea54127c  | 2.89 | 12       | cea54127c  | 3.33 |
| 13       | 1c66641da  | 2.78 | 13       | 09e17f05d  | 3.00 |
| 14       | 85a7672b5  | 2.78 | 14       | 0bee3fd0ff | 3.00 |
| 15       | 0bee3fd0ff | 2.78 | 15       | 643a57796  | 3.00 |
| 16       | 5df301b57  | 2.78 | 16       | 85a7672b5  | 3.00 |
| 17       | 4fbbff0c2e | 2.67 | 17       | 07e7e7e7e  | 2.67 |
| 18       | 784e8c895  | 2.67 | 18       | 27f1f02c2  | 2.67 |
| 19       | 8d74f2e9a  | 2.67 | 19       | 3cb0afd25  | 2.67 |
| 20       | bf5ab1698  | 2.67 | 20       | 3ddae0799  | 2.67 |
| 21       | 3ddae0799  | 2.67 | 21       | 784e8c895  | 2.67 |
| 22       | 07e7e7e7e  | 2.56 | 22       | 8d74f2e9a  | 2.67 |
| 23       | 3f9d46879  | 2.44 | 23       | bf5ab1698  | 2.67 |
| 24       | 300ddc675  | 2.44 | 24       | cb4ec718e  | 2.67 |
| 25       | 5b4b8d5c0  | 2.33 | 25       | dae59927c  | 2.67 |
| 26       | dae59927c  | 2.33 | 26       | f43b219cd  | 2.67 |
| 27       | 27f1f02c2  | 2.33 | 27       | 1c66641da  | 2.33 |
| 28       | 09e17f05d  | 2.22 | 28       | 2e33f85f2  | 2.33 |
| 29       | f43b219cd  | 2.22 | 29       | 4fbbff0c2e | 2.33 |
| 30       | 5c14e325e  | 2.11 | 30       | 5b4b8d5c0  | 2.33 |
| 31       | e1dfe8aac  | 2.11 | 31       | 5df301b57  | 2.33 |
| 32       | 2e33f85f2  | 2.00 | 32       | d9a91beae  | 2.33 |
| 33       | 87b0cc8e7  | 2.00 | 33       | df64410c8  | 2.33 |
| 34       | bc7dcbc7f  | 2.00 | 34       | 3f9d46879  | 2.00 |
| 35       | d9a91beae  | 2.00 | 35       | bc7dcbc7f  | 2.00 |
| 36       | 3cb0afd25  | 2.00 | 36       | cd41ee0c4  | 2.00 |
| 37       | cd41ee0c4  | 1.89 | 37       | 236828431  | 1.67 |
| 38       | 236828431  | 1.78 | 38       | 5c14e325e  | 1.67 |
| 39       | df64410c8  | 1.67 | 39       | 5e85e9fc1  | 1.67 |
| 40       | aadad3fa75 | 1.56 | 40       | e1dfe8aac  | 1.67 |
| 41       | 5e85e9fc1  | 1.44 | 41       | 43ce7dd64  | 1.33 |
| 42       | 43ce7dd64  | 1.44 | 42       | aadad3fa75 | 1.33 |
| 43       | f525447d3  | 1.44 | 43       | f525447d3  | 1.00 |

**Table 6-14: Best Averaged Fitness Rates (PC).**

| Male |            |      | Female |            |      |
|------|------------|------|--------|------------|------|
| Rank | Exp        | BAFR | Rank   | Exp        | BAFR |
| 1    | a541e222a  | 4.22 | 1      | f74f10d90b | 4.00 |
| 2    | f9cfb8872f | 4.00 | 2      | 657c8347e  | 3.67 |
| 3    | 098e501c8  | 3.78 | 3      | 6a0a86feb3 | 3.67 |
| 4    | 85a7672b5  | 3.78 | 4      | 70a3a0724  | 3.67 |
| 5    | cdfb2fdfe6 | 3.67 | 5      | a541e222a  | 3.67 |
| 6    | a8a51469a  | 3.56 | 6      | bba002046  | 3.67 |
| 7    | 43ce7dd64  | 3.56 | 7      | f01c35bd8  | 3.67 |
| 8    | c76247416  | 3.33 | 8      | 098e501c8  | 3.33 |
| 9    | 70a3a0724  | 3.33 | 9      | 1a9aaa10d  | 3.33 |
| 10   | bba002046  | 3.33 | 10     | 722ab6010  | 3.33 |
| 11   | cea54127c  | 3.33 | 11     | 902af3fa12 | 3.33 |
| 12   | 6a0a86feb3 | 3.22 | 12     | cdfb2fdfe6 | 3.33 |
| 13   | f01c35bd8  | 3.22 | 13     | 0f3503fa9b | 3.00 |
| 14   | eb3789475  | 3.22 | 14     | 43ce7dd64  | 3.00 |
| 15   | 722ab6010  | 3.22 | 15     | 85a7672b5  | 3.00 |
| 16   | d4f38c4dc  | 3.11 | 16     | d4f38c4dc  | 3.00 |
| 17   | 5ddf4f884  | 3.11 | 17     | dae59927c  | 3.00 |
| 18   | 902af3fa12 | 3.11 | 18     | eb3789475  | 3.00 |
| 19   | f74f10d90b | 3.00 | 19     | f9cfb8872f | 3.00 |
| 20   | 07d595a0a  | 3.00 | 20     | 07d595a0a  | 2.67 |
| 21   | 657c8347e  | 3.00 | 21     | 3eccb4b27  | 2.67 |
| 22   | dbc8f79e0  | 3.00 | 22     | 407095d41  | 2.67 |
| 23   | ea3d851c5  | 3.00 | 23     | 4d52b7540  | 2.67 |
| 24   | 0f3503fa9b | 3.00 | 24     | 5ddf4f884  | 2.67 |
| 25   | c4fc56960  | 3.00 | 25     | 643a57796  | 2.67 |
| 26   | 1a9aaa10d  | 2.89 | 26     | 9e4e64103  | 2.67 |
| 27   | 0f70e02ac  | 2.89 | 27     | a8a51469a  | 2.67 |
| 28   | 643a57796  | 2.89 | 28     | c4fc56960  | 2.67 |
| 29   | 407095d41  | 2.89 | 29     | c76247416  | 2.67 |
| 30   | 9e4e64103  | 2.89 | 30     | cea54127c  | 2.67 |
| 31   | f41b0a4d9  | 2.89 | 31     | dbc8f79e0  | 2.67 |
| 32   | bda0163eb  | 2.78 | 32     | e9183ec38  | 2.67 |
| 33   | dae59927c  | 2.78 | 33     | ea3d851c5  | 2.67 |
| 34   | e6ed8c56a  | 2.67 | 34     | f41b0a4d9  | 2.67 |
| 35   | 3eccb4b27  | 2.67 | 35     | 05d6e8180  | 2.33 |
| 36   | ee5a10414  | 2.56 | 36     | 0f70e02ac  | 2.33 |
| 37   | e9183ec38  | 2.56 | 37     | 1334f2ad2  | 2.33 |
| 38   | d45b7d6fd  | 2.44 | 38     | 321a61ff3  | 2.33 |
| 39   | 4a1b1bfb5  | 2.33 | 39     | 5d3957fc6  | 2.33 |
| 40   | e71528094  | 2.33 | 40     | d45b7d6fd  | 2.33 |
| 41   | 05d6e8180  | 2.33 | 41     | d608e8881  | 2.33 |
| 42   | 5107a699b  | 2.33 | 42     | df75196da  | 2.33 |
| 43   | df75196da  | 2.22 | 43     | e71528094  | 2.33 |
| 44   | 784e8c895  | 2.22 | 44     | 4a1b1bfb5  | 2.00 |
| 45   | 4d52b7540  | 2.11 | 45     | 4fad7dd68  | 2.00 |
| 46   | 321a61ff3  | 2.00 | 46     | 5107a699b  | 2.00 |
| 47   | 5d3957fc6  | 2.00 | 47     | 784e8c895  | 2.00 |
| 48   | 4fad7dd68  | 1.89 | 48     | 978b2dcb9  | 2.00 |
| 49   | 1334f2ad2  | 1.78 | 49     | e6ed8c56a  | 2.00 |
| 50   | b0aecbfc2  | 1.67 | 50     | ee5a10414  | 2.00 |
| 51   | 978b2dcb9  | 1.44 | 51     | bda0163eb  | 1.67 |
| 52   | a04f0c42c  | 1.33 | 52     | a04f0c42c  | 1.33 |
| 53   | d608e8881  | 1.22 | 53     | b0aecbfc2  | 1.33 |

**Table 6-15:** Best Averaged Fitness Rates (Love).

| Male     |            |      | Female   |            |      |
|----------|------------|------|----------|------------|------|
| Rank_Exp | ID         | BAFR | Rank_Exp | ID         | BAFR |
| 1        | 55b65f6db5 | 3.56 | 1        | 0eb46f5e4  | 4.00 |
| 2        | 0eb46f5e4  | 3.33 | 2        | 4d52b7540  | 3.33 |
| 3        | cdfb2fdfe6 | 3.33 | 3        | 08d830ed8  | 3.00 |
| 4        | 098e501c8  | 3.22 | 4        | 098e501c8  | 3.00 |
| 5        | b4577db39  | 3.22 | 5        | 784e8c895  | 3.00 |
| 6        | ee5a10414  | 3.22 | 6        | 91f342c90  | 3.00 |
| 7        | 4d52b7540  | 3.11 | 7        | a09a55cfff | 3.00 |
| 8        | 721fb53a9  | 3.11 | 8        | cdfb2fdfe6 | 3.00 |
| 9        | 91f342c90  | 3.11 | 9        | 45cc07ea5  | 2.67 |
| 10       | 643a57796  | 3.00 | 10       | 55b65f6db5 | 2.67 |
| 11       | 2ad2f68ca  | 3.00 | 11       | a541e222a  | 2.67 |
| 12       | f0a20eacb8 | 3.00 | 12       | ee5a10414  | 2.67 |
| 13       | 08d830ed8  | 3.00 | 13       | 2ad2f68ca  | 2.33 |
| 14       | 70a3a0724  | 2.89 | 14       | 321a61ff3d | 2.33 |
| 15       | 784e8c895  | 2.78 | 15       | 407095d41  | 2.33 |
| 16       | 6bda0ddbfa | 2.78 | 16       | 41855a3e1  | 2.33 |
| 17       | c4db6a1d5  | 2.78 | 17       | 643a57796  | 2.33 |
| 18       | d9a91beae  | 2.78 | 18       | 6bda0ddbfa | 2.33 |
| 19       | a09a55cfff | 2.78 | 19       | 70a3a0724  | 2.33 |
| 20       | a54b67ee9  | 2.78 | 20       | b0aecbfc23 | 2.33 |
| 21       | a541e222a  | 2.67 | 21       | b4577db39  | 2.33 |
| 22       | 321a61ff3d | 2.56 | 22       | c4db6a1d5  | 2.33 |
| 23       | b0aecbfc23 | 2.56 | 23       | ec361b56a  | 2.33 |
| 24       | 407095d41  | 2.56 | 24       | f0a20eacb8 | 2.33 |
| 25       | ec361b56a  | 2.44 | 25       | 09e17f05d  | 2.00 |
| 26       | c76247416  | 2.44 | 26       | 6a33b0e79  | 2.00 |
| 27       | 6a33b0e79  | 2.44 | 27       | 721fb53a9  | 2.00 |
| 28       | 722ab6010  | 2.44 | 28       | c76247416  | 2.00 |
| 29       | 45cc07ea5  | 2.44 | 29       | 3cb0afd253 | 1.67 |
| 30       | 41855a3e1  | 2.44 | 30       | 5c2ec798d  | 1.67 |
| 31       | b1fc8ee12  | 2.33 | 31       | 722ab6010  | 1.67 |
| 32       | 9d65cf5b2  | 2.33 | 32       | 975ff1a81d | 1.67 |
| 33       | 975ff1a81d | 2.11 | 33       | 9be7791b2  | 1.67 |
| 34       | d1e9c5fe9  | 2.11 | 34       | 9d65cf5b2  | 1.67 |
| 35       | 09e17f05d  | 2.00 | 35       | a54b67ee9  | 1.67 |
| 36       | 5c2ec798d  | 2.00 | 36       | b1fc8ee12  | 1.67 |
| 37       | 9be7791b2  | 2.00 | 37       | d1e9c5fe9  | 1.67 |
| 38       | 378262191  | 2.00 | 38       | d9a91beae  | 1.67 |
| 39       | 3cb0afd253 | 1.89 | 39       | 378262191  | 1.33 |
| 40       | fd4b1b1309 | 1.89 | 40       | aadad3fa75 | 1.33 |
| 41       | aadad3fa75 | 1.44 | 41       | 1c66641da  | 1.00 |
| 42       | 1c66641da  | 1.33 | 42       | fd4b1b1309 | 1.00 |

#### (4) Usage of Relevant Respondents in Calculating Precision and Recall

The usage of relevant respondents to calculate precision and recall is explained by using an actual result as an example.

A portion of the results for Auction is shown in Table 6-16. These are the results of the proposed method for male evaluations when  $n = 4.0$ . Based on the proposed method, they are ordered according to the appearance times, as shown in the column entitled “App,” and the score calculated with Formulas (6.1) and (6.2), as shown in the column entitled “S.” The column entitled “Rank\_Proposed” shows the ranks based on the proposed method. The best averaged fitness rates are shown in the column entitled “BAFR.”

When threshold  $n$  is 4.0, the respondents whose best averaged fitness rates are over 4.0 are the relevant ones. When the top eight respondents are retrieved, the third and the eighth respondents are judged as relevant respondents because their best averaged fitness rates are over 4.0, as shown in Table 6-16. In this case, the number of retrieved respondents is 8, and that of retrieved relevant respondents is 2. Precision is obtained by calculating 2 divided by 8. In this way, precision and recall are calculated.

**Table 6-16:** Actual Results from Evaluations (Auction, Male, Proposed Method,  $n=4.0$ ).

| Rank_Proposed | ID            | App | S     | BAFR | n=4.0 |       |       |
|---------------|---------------|-----|-------|------|-------|-------|-------|
|               |               |     |       |      | Rel   | Pre   | Rec   |
| 1             | 098e501c8092  | 28  | 22.6  | 3.78 | ×     | 0.000 | 0.000 |
| 2             | cdfb2fdfe676f | 23  | 18.4  | 3.44 | ×     | 0.000 | 0.000 |
| 3             | 70a3a072421d  | 5   | 4.01  | 4.11 | ○     | 0.333 | 0.500 |
| 4             | 784e8c895c39  | 3   | 2.40  | 2.67 | ×     | 0.250 | 0.500 |
| 5             | cea54127d16d  | 2   | 1.62  | 2.89 | ×     | 0.200 | 0.500 |
| 6             | 236828431fa8  | 2   | 1.59  | 1.78 | ×     | 0.167 | 0.500 |
| 7             | 4fbbff0c2ec6f | 1   | 1.00  | 2.67 | ×     | 0.143 | 0.500 |
| 8             | 643a5779661e  | 1   | 0.988 | 4.56 | ○     | 0.250 | 1.00  |

### 6.3.3. Evaluation Results

The answer statements of males and females are separately treated as described in Section 6.3.2. Precision and recall results based on the proposed method for male evaluations only, those based on the average of scores, and those based on the distances are respectively shown in Figure 6-1, 6-2, and 6-3 for Auction, Figures 6-4, 6-5, and 6-6 for PC, and Figures 6-7, 6-8, and 6-9 for Love.

Similarly to the results for males only, precision and recall results based on the proposed method for female evaluations only, those based on the average of scores, and those based on distances are respectively shown in Figures 6-10, 6-11, and 6-12 for Auction, Figures 6-13, 6-14, and 6-15 for PC, and Figures 6-16, 6-17, and 6-18 for Love.

When  $n = 3.5$ , only one relevant respondent is obtained from Love. When  $n = 4.0$ , only two relevant answers are obtained from Auction and PC, and no answer is to be obtained from Love.

Please see Appendix D for further information on the minute results.

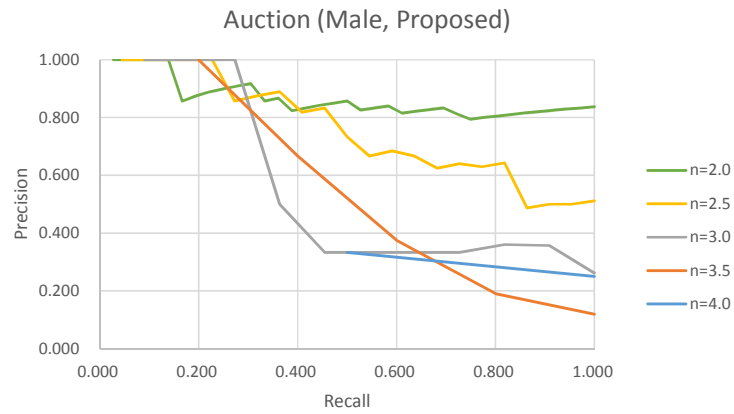
## 6.4. Considerations

As a whole, precision generally improves as threshold  $n$  is set to a smaller figure, except in both the male and female cases of the proposed method for Auction. Regardless of gender, precision is highest when  $n = 2.0$ . This is because the number of relevant respondents increases with the decrease of threshold  $n$ .

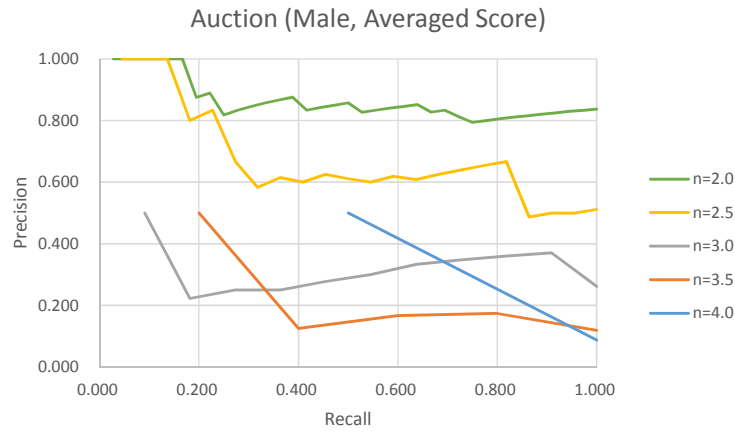
The proposed method can be used to select several top respondents when  $n = 3.5$  and  $n = 3.0$ , whereas not when  $n = 4.0$ . When  $n = 2.5$ , the use of the proposed method is considered to be sufficient for Auction, PC, and Love, as seen in Figure 6-1, 6-4, and 6-7. Therefore, the proposed method could successfully select the respondents that are almost more than averagely appropriate for a question.

Compared with the methods of averaged scores and distances, the proposed method achieves higher precision. It is shown that the proposed method outperforms the other methods.

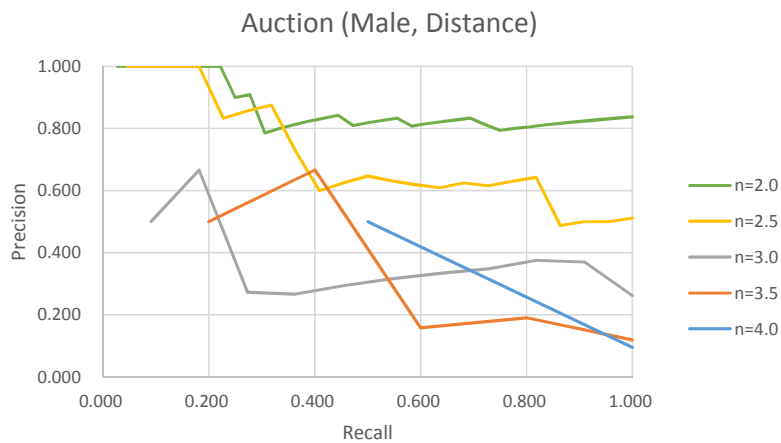
When  $n = 4.0$  for the female subjects, the proposed method shows good performance. This may be



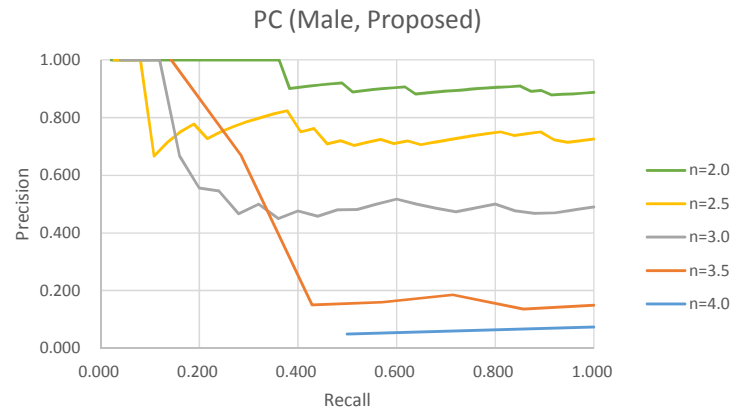
**Figure 6-1: Precision and Recall on Auction (Male, Proposed)**



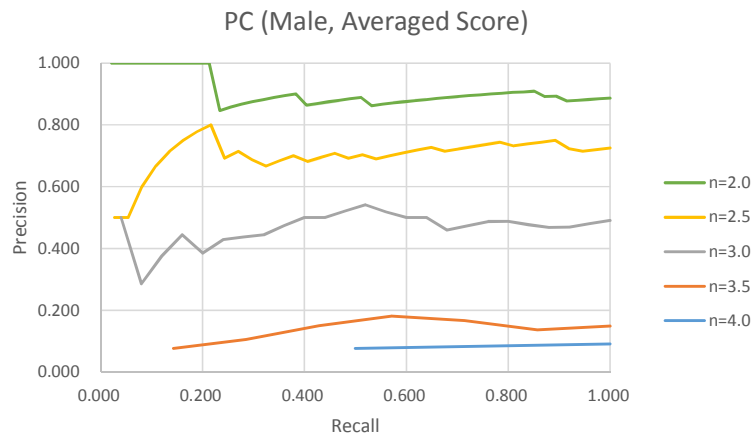
**Figure 6-2: Precision and Recall on Auction (Male, Averaged Score)**



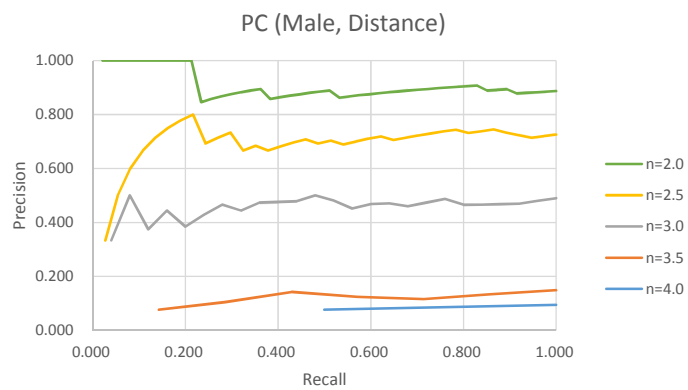
**Figure 6-3: Precision and Recall on Auction (Male, Distance)**



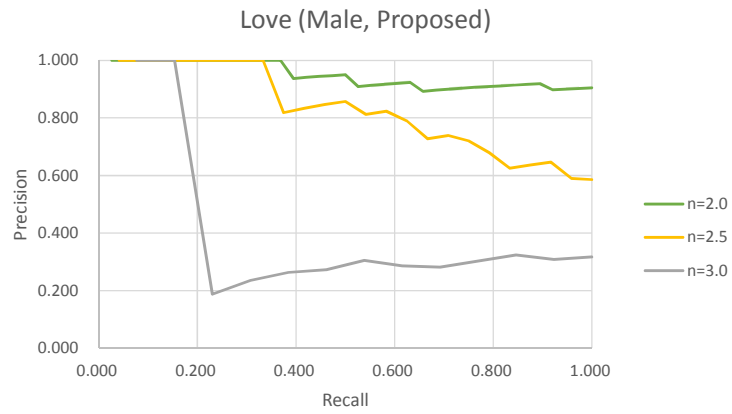
**Figure 6-4:** Precision and Recall on PC (Male, Proposed)



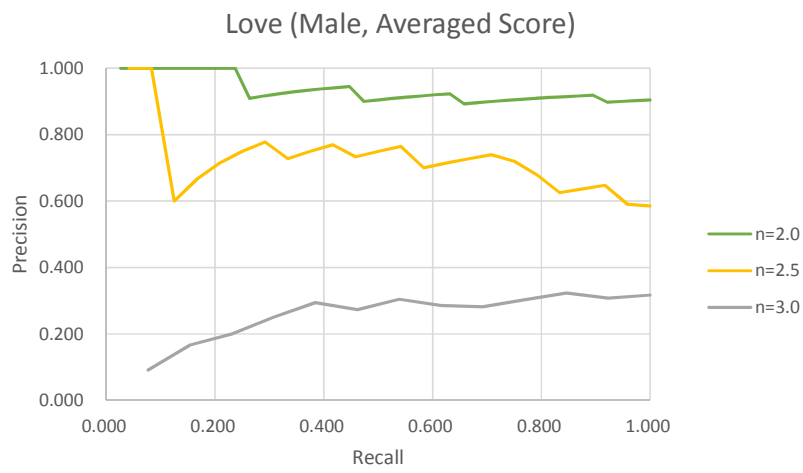
**Figure 6-5:** Precision and Recall on PC (Male, Averaged Score)



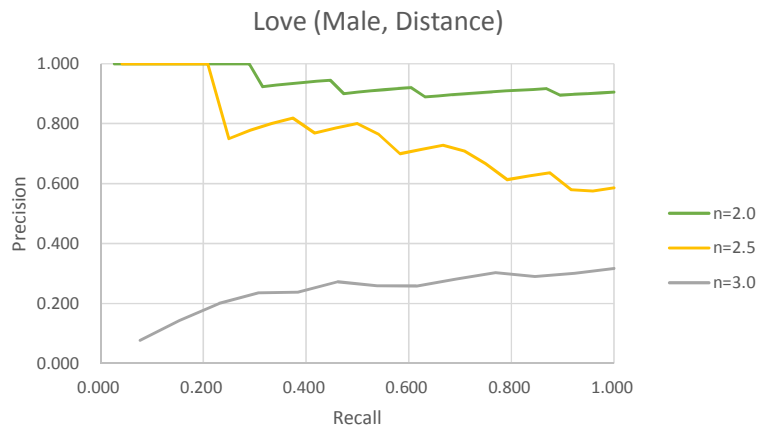
**Figure 6-6:** Precision and Recall on PC (Male, Distance)



**Figure 6-7:** Precision and Recall on Love (Male, Proposed)

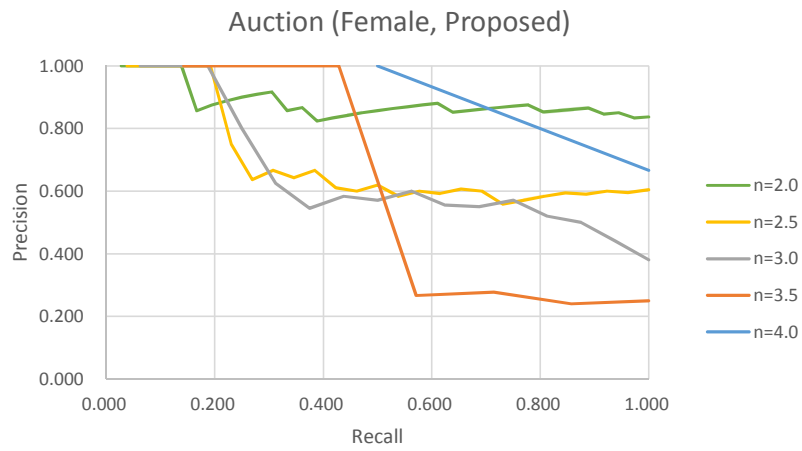


**Figure 6-8:** Precision and Recall on Love (Male, Averaged Score)

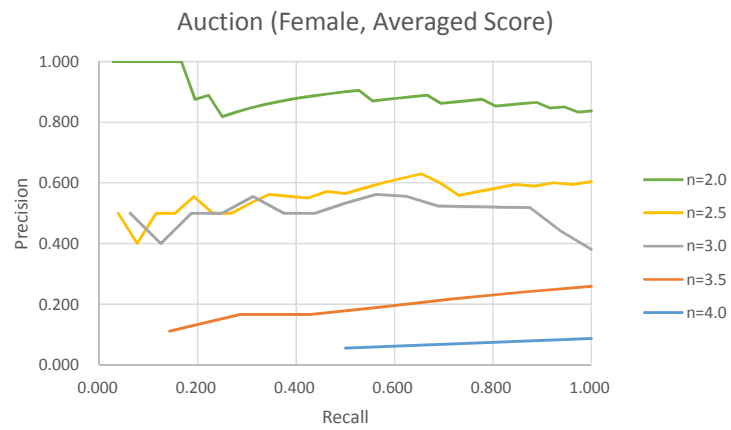


**Figure 6-9:** Precision and Recall on Love (Male, Distance)

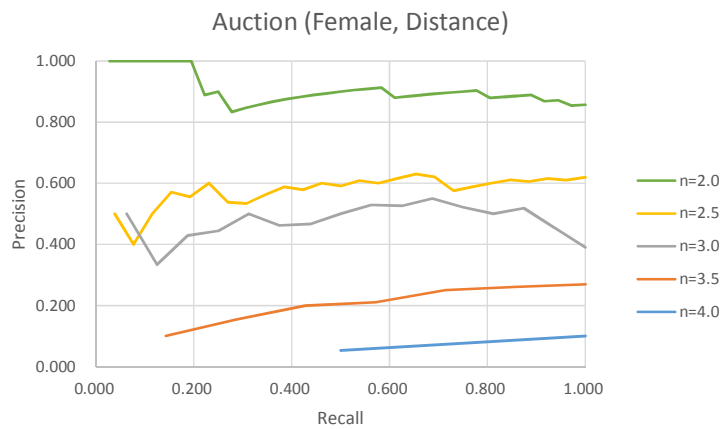




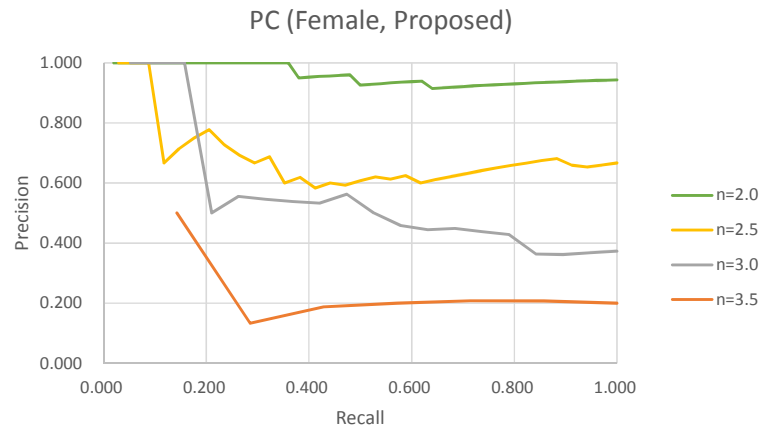
**Figure 6-10:** Precision and Recall on Auction (Female, Proposed)



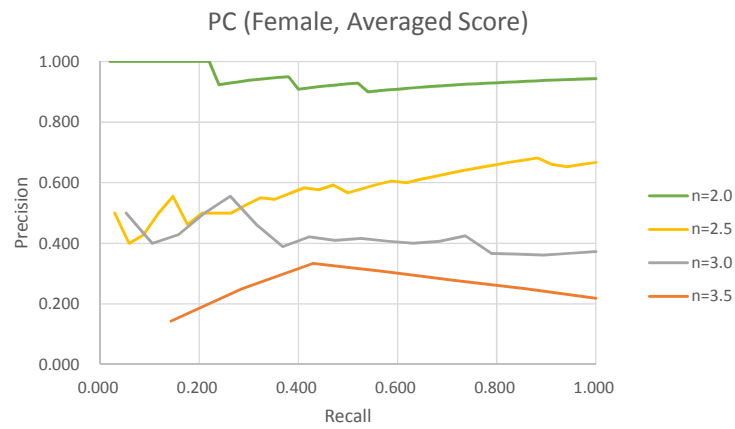
**Figure 6-11:** Precision and Recall on Auction (Female, Averaged Score)



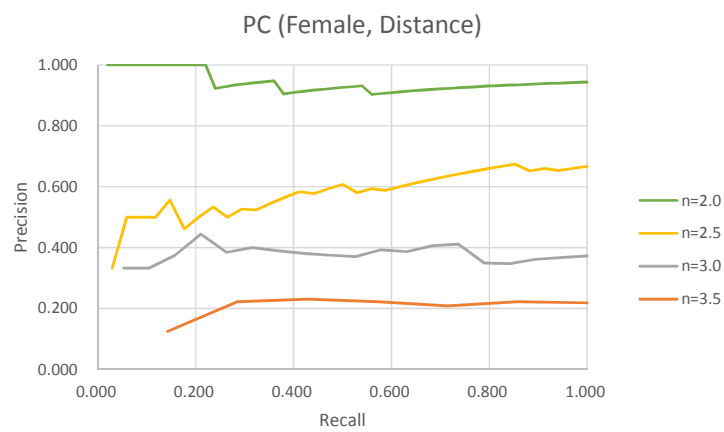
**Figure 6-12:** Precision and Recall on Auction (Female, Distance)



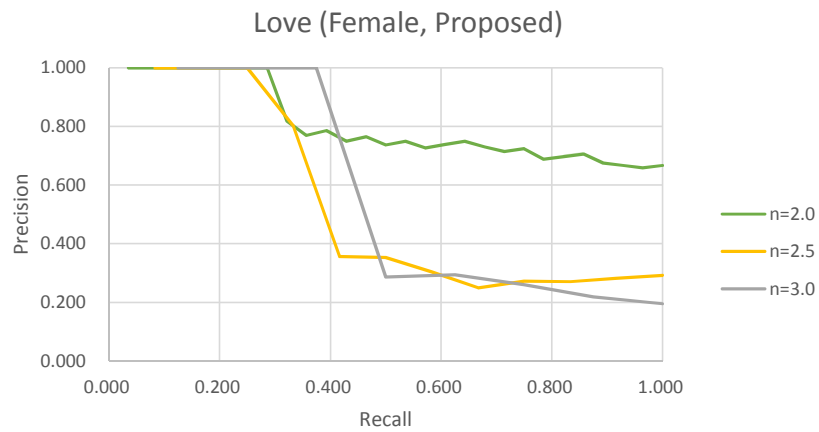
**Figure 6-13:** Precision and Recall on PC (Female, Proposed)



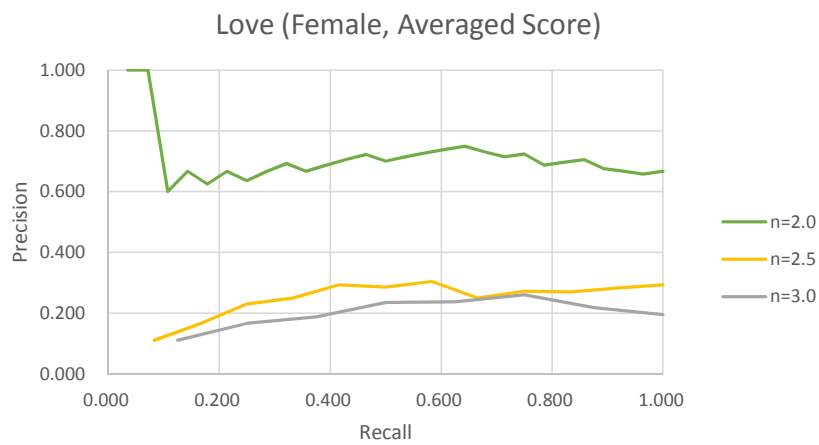
**Figure 6-14:** Precision and Recall on PC (Female, Averaged Score)



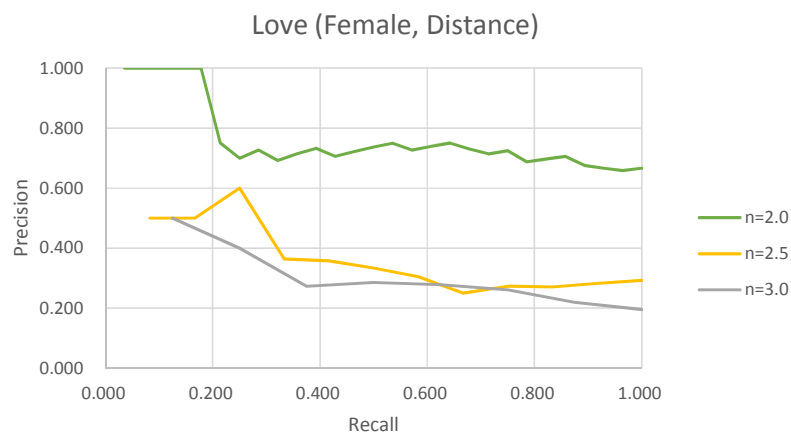
**Figure 6-15:** Precision and Recall on PC (Female, Distance)



**Figure 6-16:** Precision and Recall on Love (Female, Proposed)



**Figure 6-17:** Precision and Recall on Love (Female, Averaged Score)



**Figure 6-18:** Precision and Recall on Love (Female, Distance)

due to the fewer number of subjects, i.e., three. Reevaluation with more female subjects would be required.

Auction shows a good performance when  $n = 3.5$  in the male results for Auction. This is because the Auction category accounts for thirty-eight answers posed by eleven unique users out of the one hundred answer statements used to evaluate fitness rates. On the other hand, PC (Love, respectively) category occupies only two (three) answers posted by two (two) unique users. For PC and Love, the answer statements that are in the same categories as that of the question are not included in the dataset used for the experiment and are thus not considered. A consideration of categories at the stage of inspecting the impression and suitability of the questions and answers, as explained in Chapter 5, would be necessary.

## 6.5. Summary

A new method of seeking the appropriate respondents for questioners was proposed. The proposed method uses the appearance times of respondents and their score based on distances.

The proposed method was compared with the methods of averaged scores and distances through precision and recall. Precision and recall were calculated by using various relevant respondents, which were established by varying the threshold values of the averaged fitness rates of the answer statements to a question in the dataset. Fitness rates were experimentally obtained.

It was shown that the proposed method outperformed the other methods. It was also shown that the proposed method could successfully select the respondents that are almost more than averagely appropriate for a question.

## Chapter 7

### Conclusions

The number of users of Question and Answer (Q&A) sites on the Internet has been increasing. These sites can be regarded as databases including a number of knowledge usable for solving various problems. As the number of people using Q&A sites increases and more questions are posted, however, it becomes more difficult for respondents to select questions suitable for their specialty and interests. Consequently, a question posed by a user cannot be seen or answered by appropriate respondents. Moreover, if an appropriate respondent is not viewed, mismatching can occur. To solve these issues, our objective is to present questions to qualified users who can appropriately answer them, thus avoid the problems described above.

The objective of this research is to present qualified users who can appropriately answer them, thus avoid the problems described in Section 1. To this end, the impressions of question and answer statements were focused on. The impressions of sixty statements posted on Yahoo! Chiebukuro were experimentally clarified. By applying factor analysis to the scores obtained in the experiment, nine factors were obtained. The factor scores of any statements were then estimated through multiple regression analysis from the feature values of the statements. The adopted feature values were the syntactic information of the statements, word imageability, closing sentence expressions, word familiarity, and notation validity. It has been shown that the overall estimation accuracy for all the nine factors is good.

The method of introducing appropriate respondents to questioners was proposed. The proposed method used the number of appearance of respondents and the score based on the distance between the factor scores of a question and an answer already posted. The proposed method was compared with the methods using averaged scores and the distances through precision and recall for various relevant

respondents. It has been shown that the proposed method outperformed the other methods. It was also shown that the proposed method could successfully select the respondents that are almost more than averagely appropriate to a question.

Estimating objective scores of answer statements is required in future work. After the method of estimating objective scores has been established, estimating Best Answers by using the estimated objective scores is also included in future work. Using characteristics of users, i.e., questioners and answerers, for finding appropriate answerers is also included in future work. As most of the feature values of statements used are dependent on the Japanese language, generalization to other languages is also in future work.

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## Appendix A

In factor analysis, an  $n \times p$  matrix  $Z$  is modeled by using the following equation:

$$Z = FA' + E$$

where  $F$  is an  $n \times m$  matrix,  $A'$  is the transposed matrix of a  $p \times m$  matrix  $A$ , and  $E$  is an  $n \times p$  matrix. In order to obtain the matrices  $F$  and  $A$ ,  $m$  is selected to become as small as possible, and  $E$  is decided to become sufficiently small. The matrix  $A$  is called the factor burden matrix. The matrix  $F$  is called the factor score matrix. The matrix  $E$  is called the error matrix.

Several methods are proposed to make the matrix  $E$  sufficiently small. The main factor analysis method makes the sum of the squares of the elements of  $U$  minimum, where  $U$  is a variance and co-variance matrix of  $E$  ( $U = E'E$ ). The Minres method makes the sum of the squares of the non-singular elements of  $U$  minimum.

The factor burden matrix cannot uniquely be decided because this matrix has the freedom on the rotation. The matrix is often rotated in order that the absolute values of some factors of this matrix are large, and those of the other ones are small. This is because the rotated matrix can make the explanation of the phenomena easy. The Varimax rotation is one of the most popular methods of this type of rotation.

The factors which exist in a set of objects or concepts are obtained by applying the factor analysis [93].

## Appendix B

Notations related to the multiple regression analysis are shown in Table B-1 [94]. Multiple linear regression (MLR) is used to fit a model with several explanatory variables. An MLR model can be expressed using matrix notation:

$$\{Y\}_{nx1} = [X]_{nxp} \{\beta\}_{px1} + \{\varepsilon\}_{nx1} \quad (\text{B.1})$$

In fitting lines to a sample data set using MLR, the aim is to find estimations of the coefficients that minimize the error  $\varepsilon$ . Those coefficients are calculated by minimizing the sum of the errors between the observed values and predicted values:

$$\sum \varepsilon_i^2 = \sum (y_i - y'_i)^2 \quad (\text{B.2})$$

The mathematical procedure of multiple regression analysis is performed through using R, a free software.

**Table B-1:** Notation and Their Descriptions.

| Notation        | Description  |
|-----------------|--|
| $y_i$           | respondent variable (dependent), which is random and observable, from the $i$ th observation in sample                       |
| $x_{ij}$        | $j$ th observation in sample $i$ th explanatory variable, which is constant and known, from the $i$ th observation in sample |
| $\beta_j$       | coefficients of a regression model   |
| $\varepsilon_i$ | error between a regression model and the $i$ th observation in sample  |
| $p$             | number of coefficients in a regression model   |
| $\{D\}$         | matrix expression of $d_i$ , $d_i = y_i, p_i$ or $\varepsilon_i$   |
| $[X]$           | matrix expression of $x_{ij}$  |

## Appendix C

Three sets of one question and one hundred answer statements used for the experiment described in Chapter 6 are shown here. A set that includes one Auction (PC, and Love, respectively) question is translated into English and shown in Table C-1 (Table C-3, and Table C-5). Each original sentence in Japanese is shown in Table C-2 (Table C-4, and Table C-6). As explained in Chapter 6.3.2.(1), the categories of answer statements are not taken into consideration.

For a set that includes one Auction (PC, and Love) question, a notation “Category-XX” is given to each question and answer statement. “Category” is substituted for “Auc” (“PC,” and “Love”) for a set shown in Table C-1 and Table C-2 (Table C-3 and Table C-4, and Table C-5, and Table C-6).

**Table C-1:** A Set of Question and Answer Statements (Auction, English Version).

| ID    | Statements  |
|-------|---|
| Auc-Q | How many days did it take you to finish your most recent transactions? I was an exhibitor, and I was in 20th place, but my client placed 17th. I was somewhat anxious, but the current evaluation managed to exceed 70. If anyone has ever experienced this problem, please tell me. I have a problem with a contractor who won the bid, but I haven't been able to contact him. It's been a week.              |
| Auc-1 | The covers of Dengeki Bunko have enough effect in weirding others out. Read your book with a book cover on. It is vital to sense the mood.  |
| Auc-2 | How about designating the user as BL instead of deleting him/her for a while? Thus you could avoid the transactions with him/her if others update to a higher price. It would be difficult if the user is still the highest price bidder when less than one day left. Please delete him/her if you are to avoid the transaction, or expect others to bid instead of deleting it if you hope for a higher price. |
| Auc-3 | The interest is high and dangerous. There is no knowing who will receive by way of endorsement. Discounting means endorsing. If your company does endorsement, it will lead to obligation to making payments from a person who obtains the bill. Terrible people may receive it and invent a pretext for a fight. It is the best to get a discount at bank.   |

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| Auc-4  | Kawaguchi ought to be incompetent as he is a dummy. Komura is similar. I think Masuzoe is qualified.   |
| Auc-5  | The family who suffered a sudden illness perished... Just laugh at it. It is of course a lie. See his/her evaluation. According to many evaluation comments, his/her contact and deposit are late. You could write: funny excuse made transactions later, which is a nuisance.   |
| Auc-6  | It is natural for exhibitors who have IDs to take all the responsibility even in the case of substitute exhibits. Bad attitudes should be revealed in evaluating him/her. It might be a bulwark to irresponsible attitudes from scratch.   |
| Auc-7  | Registrations will not charge you, because your bank account, telephone number and name are not known. It is a fraud, so please be careful.  |
| Auc-8  | Telephone is available. Bank will send inquires to the person you are dealing with. How you are supported depends on banks.  |
| Auc-9  | I will raise as much as possible as I regret what happened. After I do my best, I will give up. That is just about the market rate, isn't it?  |
| Auc-10 | Answers will be mailed. It takes nonstandard-size mails a month to arrive. Although it might end up eventually lost, but please be satisfied with the result.  |
| Auc-11 | Everything has its start. Whatever chances you encounter, it is good to find something you are passionate about.   |
| Auc-12 | Our television roars in the middle of night. It is supposedly due to temperature change. It may get noisy at different parts of the coefficient of thermal expansion...  |
| Auc-13 | I'm living in Tokyo. It depends on stores. Two stores are within 10 minutes from my house, but only one of them is available.  |
| Auc-14 | He/she is a good exhibitor. Mail him/her, "Heavy rain due to typhoon..." He/she will realize your situation. You should take precautions because there is no telling what might happen when you are rushing, even if you take steps to cope with rain. Deposit confirmation might not be verified if receipts are done in the afternoon. |
| Auc-15 | It is Vah. V stands for the volt of a battery, and Ah means how many hours electric current can be allowed to flow.  |
| Auc-16 | Oumi-jima Island is recommendable. Senzaki kamaboko is delicious.  |

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| Auc-17 | Are you talking about me? I meant to write it to say “This kind of answer is also possible,” but did that offend you?   |
| Auc-18 | I set one-yen unit as well. That will train my sense of money. You can save money by being exact instead of lazy! I am doing this on Excel. You will find it interesting when you have saved a lot money. If you don't like to power on PC every time, what about buying Pocket PC? It is very convenient.  |
| Auc-19 | It is good to consult with police. The section is Community Safety Section.   |
| Auc-20 | Is anybody actually doing this? <a href="http://www.kit.hi-ho.ne.jp/non-passport/">http://www.kit.hi-ho.ne.jp/non-passport/</a>   |
| Auc-21 | Many cheap tatami facing do not have equal lines. And even expensive ones have slightly different lines because they are raw. At my friend who chose cheap ones, strings were worn out after half a year and lines were uneven. At my friend who bought expensive ones, a thin carpet is spread on the tatami because he worries too much. Suitable one is the best. Safe store is a tatami maker and a store where a craftsman undertakes interior decoration. Many of them seem to have a policy of not just leaving after selling. |
| Auc-22 | Escaping will drive you into a corner. Let's start persistently stalking, such as telephone, mail, waiting, etc. equally to or more than she did. It might be unexpectedly fun. If she feels painful, she will stop doing so.   |
| Auc-23 | My PC experience is long and I use both Mac and Win. Of course I know a principle, but it is “troublesome,” so I send it as it is. In using DTP, I care more than others. That's the way it is, isn't it?   |
| Auc-24 | Just leave it. Some might do this at a time after a month if there are many exhibits. Evaluations will be done when you least expect them.  |
| Auc-25 | Interpretation and translation. I face PC as I mainly do translation. I am fighting difficult legal terms every day. I have a compendium of laws on the one hand. As I am a free-lance and take ten minutes break per an hour, I post little by little in those times. Instead, I seldom have a whole day-off. Despite this situation, I keep within 10th rank.   |
| Auc-26 | Although contents are similar, please give BA to some of them. Everybody is waiting for that.   |
| Auc-27 | I suppose exhibitors also lack enough knowledge to answer the inquiry to the item. Something given to by somebody? In my opinion, it is similar in meaning as “Please bid if you can tell what  |

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|        | this is by picture.”   |
| Auc-28 | Chasing by number cannot reveal your address. There are many cases where successful bidders cannot get items as already delivered. Mail to yourself and exhibit an item again.   |
| Auc-29 | Send an exhibit at the money over current price. If price is altered, look at the detailed bid history. Automatic bid is done.   |
| Auc-30 | The effect of question is ambiguous. The asset valuation in inheritance tax is determined by National Tax Agency Basic Instructions on Evaluation of Assets. In the case of land, according to its location, some are evaluated by roadside land prices and some are evaluated through valuation by multiplier based on the assessed value of fixed assets. The method of evaluation is so complicated that it is left to specialists.   |
| Auc-31 | Who are the contractor and beneficiary of insurance? If both of them are the identical person other than the deceased, the money will be occasional income of his/her income taxes. After the received insurance are detected from the money of paid insurance, half of the money subtracted from 500,000 yen will be a taxable income. If other earned incomes exist, incomes are calculated by summing them up. As payment records are probably issued, not declaring for income taxes will come to light. |
| Auc-32 | It depends on the colors. Metallic colors are expensive. Please consult with nearby shops.   |
| Auc-33 | The easiest way is to reduce the image size in taking pictures. You can do so with using Paint of Windows. Choose Transformation, Elasticity, and Slant. Then height and width are diminished as a reduced scale. Save the data by choosing Save or Save as.   |
| Auc-34 | It is impossible to make a bank transfer at the ATM of IY Bank. You can use power direct from Sinsei Bank. Please look for Internet cafes etc. and make a bank transfer from PC.   |
| Auc-35 | I’m sure he/she is busy. So the reason why there was no apology is the statements are copied and pasted from those prepared in advance.  |
| Auc-36 | Sanma, Nai-nai, and Yoiko, etc... you can hear on television. I wonder “what I want to know” means by...   |
| Auc-37 | It depends on what degree of relationship passed away. It is absolutely written in a school pocketbook.  |

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| Auc-38 | How is the ID of the person you are dealing with? Under limitation of use? If so it might possibly be a fraud. Anyway, how about getting calm and waiting for your items to arrive for a few days, and sending an e-mail if you are worried? He/she is also a human, so can have urgent business or get ill. Without doing anything, instead of being suspicious of a fraud, get worried only after all you have done everything to confirm. |
| Auc-39 | It is an exhibitor who told you wrong transportation. How about telling him/her that I will pay you but deduct the amount of bank transfer fee. If it seems impossible, please have some money returned. You could also add "Of course this will be revealed in evaluating you."   |
| Auc-40 | I actually use it. Surprisingly the effect is unsure... Oh, instead, getting slower...?  |
| Auc-41 | Write the address of postal office, and "Poste restante" should be written in red. Try to write in red and outstanding style. The address and name of a successful bidder should be written in smaller font. After that, it might be delivered. Your address and name are also written.  |
| Auc-42 | The corners of a pad are dropped by using files. It would be better if corners are lightly rounded. The reason why shave them is that they can be a cause of chipped, uneven ware, and fraud on the disk. The surface of a pad is lightly covered with paper, but it is not necessary because uneven surface might have a bad influence.   |
| Auc-43 | There is no advance notice. On the day, "On when, from when to when, free exhibit campaign" will be displayed at the top page of auction and notification. You only have to check it little by little.   |
| Auc-44 | One vote for Mr.196548. I agree with him.  |
| Auc-45 | It is not your fault. Please come in touch with your kids comfortably. It will get better if the kids themselves feel ashamed. If Mother feels scared, children will notice that at once. So, take a deep breath.  |
| Auc-46 | Evaluate as you feel. I will not do anything if reevaluated to take revenge. Reevaluation has led to a result such as yours.   |
| Auc-47 | I experienced bullying as a student and got trauma and mentally ill by violence from my boyfriend. Why not live positively? You will be diverted from your cares by doing what you like. Now I can forget those days as I live a happy life with another guy and having something to do for my family. Let's do our best as a person of similar experiences. I will support you.   |



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| Auc-48 | It will be white return if you do not do anything. A blue return is admitted only when an application for filling form tax returns is submitted. For a case of blue return, it is fundamentally required to signature in the manner of double-entry bookkeeping. Instead, there are several privileges: special deduction for blue return, wages for family employees of blue return taxpayer, carry-over of loss, settings of allowance for doubtful accounts, necessary expenses of petty sum depreciable assets, etc. Besides these, when tax inquiry, there are remedial actions such as the prohibition of taxation by estimate, which does not admit what is called sloppy accounting, and a notification of reasons, etc. White return will hardly be able to refute. You will be obligated to a tax office. |
| Auc-49 | I am saying this because easy answers will not benefit you. Please make a habit of searching a little bit. That will deepen your understanding. If that degree of answer is enough, your question does not sound serious.   |
| Auc-50 | It depends on departures. Flights to Hawaii will take off at terrible times.  |
| Auc-51 | I actually use it for business, and it is acceptable if you can convince an examiner in tax investigations. There are many such cases. It is mostly acceptable. It would be better to prepare for the details of call history.  |
| Auc-52 | The one sold for auction is the advertisement of an exhibitor. Those who reported the exposure to the police feel satisfaction, feeling that he/she could outwit others.  |
| Auc-53 | I am also an exhibitor, but you need to take steps to cope with water. Especially non-standard-size one will be posted even on rainy or windy days. At least, please put an item in the envelope after putting it into a plastic bag.   |
| Auc-54 | I surely check it. I will quit bidding if an item is something I might buy as I feel is exhibited. Similar as the past histories.   |
| Auc-55 | As for players who got drafted in the higher rank, almost everyone do the same things. This is a patent fact. I consider all the baseball players rather than somebody individual.  |
| Auc-56 | I think in principle you cannot live in public housings without setting your resident's card in the local government. I have checked moving-in conditions of several municipal/prefectural rented housings, but their conditions include "Residents in the district." The conditions depend on local governments, so it is good to ask about corresponding local government in detail.  |

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| Auc-57 | Public prosecutors and jurists are determined by their grades as they are public servants. It depends like designated services etc. Lawyers are diverse when they independently start a business. Even new lawyers are greater than ordinary salary workers.   |
| Auc-58 | You can do so using Paint of Windows. Choose Transformation, Elasticity, and Slant. Then height and width are diminished as a reduced scale. If you are to increase image quality, you just magnify and modify by using Photoshop etc.   |
| Auc-59 | Women in Osaka act like that without hesitation. Well, I just reply, that they do not hesitate even if someone is in the men's bathroom.   |
| Auc-60 | Please tell a counter, "Non-standard-size with delivery recording." Similar as the case when you usually send, please write an address.  |
| Auc-61 | I am also a poor talker. I try to keep in mind that I talk slowly in a loud voice.   |
| Auc-62 | Incomes to your wife is either family employees of blue return taxpayer or deduction for family employees. The former case requires a notification, and there is a limitation of money according to the content of work. The latter case also includes the limitation of money. In both cases, your wife is a full-time worker, it is impossible if she has other work. Your wife cannot be a dependent if the money is below 1,030,000 yen.   |
| Auc-63 | Conversely, how about leaving it everything to that person? He/she will do everything all right as he/she is nagging. Otherwise, just revenge.   |
| Auc-64 | Income classifications are different: self-owned business is business income, and part-time job is earned income. You are to report both for final income tax returns. In that case, please remember to list of withholding taxes. Five percent means otsu-ran withholding. It is deducted more than ko-uran withholding. If the money of business income is less, the amount of taxes for payment can be reduced. Refund is also possible if the money of business income is minus. |
| Auc-65 | It is evaluated by street land value at lands where valuation by road rating is adopted. It is evaluated by the assessed value of fixed assets multiplied by the determined magnifications at areas where valuation by multiplier is adopted. The evaluation method differs according to the place of land, so please confirm it at a tax office. Districts where valuation by road rating is adopted are only the vicinity of urban areas.  |
| Auc-66 | It is less crowded around 3:00 - 4:00 AM. Only questions and answers with jokes are posted,  |

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|        | though... Around 8:00 AM is also less crowded. Few questions are posted.  |
| Auc-67 | It is just that you do not like the same thing as yourself. A person of very big body tends to ride light vehicles. Maybe complexes can be hidden.  |
| Auc-68 | Dog? Did you talk to a dog? Animals can fill the space between you and people. When you take your dog for a walk, you can see many people and dogs. Some have similar troubles as you do.   |
| Auc-69 | You should not buy the item because it is individually exhibited and no return is acceptable. Shops are safer than Rakuten. Rakuten is not so interested as to register shopping and commit frauds.   |
| Auc-70 | It considerably depends on departments. That would be tougher because it is increasing weight as a financial institution  |
| Auc-71 | Such results do not exist. Originally rushing on an escalator is banned. If a person causes an accident due to that, he/she is responsible.   |
| Auc-72 | Sending money from your bank account to others is called transfer. You can do at ATM and PC at home.  |
| Auc-73 | Oh, really! I have wiped from backwards for 26 years... I will be careful from now on.  |
| Auc-74 | As you were strongly kicked in the head, injury to part of your brain could be the cause of "neurosis." I have read at some website that neurosis could happen by the attack of single whip of kung-fu.   |
| Auc-75 | I think it is possible to bid despite BL registration... Let me check... Oh, it is impossible. It is just to refuse the auction held by you, so you can bid.<br><a href="http://help.yahoo.co.jp/help/jp/auct/sell/sell-27.html">Http://help.yahoo.co.jp/help/jp/auct/sell/sell-27.html</a>                     |
| Auc-76 | Various. There would be some expected tolls after visiting some postal offices.   |
| Auc-77 | Please go to a hospital. I am in my second pregnancy, but have experienced termination twice and miscarriages three times. That might effect. I am not sure, but a threatened miscarriage or premature birth might happen... so I am resting. You had better take some measures earlier, if you know the cause. |
| Auc-78 | "Save as" is the fastest way. Printing a whole data... is a waste of resource. I have not tried this, but I think this is OK. Do you want to manage frequently? I am concerned with your reason (I always delete files after finished)  |

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| Auc-79 | Just studying abroad to the U.S. does not necessarily lead to the acquaintance of English conversations. Koga independent Diet member. He has been to study abroad in the U.S. And so does Koizumi Prime Minister. To virtually acquire English conversations with less money is to go “for work” rather than for study.  |
| Auc-80 | The bands named “Sambomaster” and “Fujifabric” are on my mind. Both are Japanese. Probably Sambomaster is indies.   |
| Auc-81 | You can experience through trainings and devices. It is not a psychic phenomenon. Please finish reading “Rinshitaiken” written by Takashi Tachibana, without skipping. Your life can be altered.  |
| Auc-82 | It is rude to write "it is a pity that it is different from what is expected through evaluation." It is also unnecessary to write "I favorite it." You should evaluate whether deals were smoothly done.  |
| Auc-83 | There are several elements for the issues of disconnections according to ADSL environment of a user. You can refer to detailed information at a website of Internet connection service providers.   |
| Auc-84 | You can play the fool as in the case of non-standard-size-mails. Just do not ignore but answer the phone. “What? It has not arrived yet.” This is enough. This will be a fraud if discovered...   |
| Auc-85 | It depends on what guaranty. You might be a guaranty so long as there is limitation of money and the money can be paid. You are a guaranty of a lease contract of the office.   |
| Auc-86 | Children at home cannot manage their home. They will do part-time jobs at home but it is usually pay-as-you-go. A child in the six grade is paid around 5,000 yen.  |
| Auc-87 | I was such a high school girl, but I did not fasten two buttons upwards as I thought I did not care to be seen. Although I knew that would be thought sloppy, but I still think such a look is wonderful. For our generation, I cannot possibly understand a skirt of knee-length. I'm sure elders are thinking similar as us. As there are several trends and different sensitivity among each generation, you cannot declare that the fashions of current youths are wrong. |
| Auc-88 | There is no due. Refusing from secondary bidders means that you do not currently do transactions, so bid fees will not be charged. If you consent in advance, the due date to delete will be at the end of this month. If a transaction is canceled after the session, you are to pay only bid fees. Advance should be done after 21st.   |
| Auc-89 | How about asking “For a user from the second time, is it OK to save your address etc.?” The person you are dealing with may feel reluctant without their agreement.   |

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| Auc-90  | Not limited to intestines, I think smoking makes all organs of a body shrink.   |
| Auc-91  | I found an exhibitor who published my image of items I am exhibiting as if he/she possessed them (he/she was exhibiting as a new ID), so I reported him/her. After a few days, the ID is in the status of “under access control.” Regrettable, annoying really... I can understand your feelings. |
| Auc-92  | I wash out using milk cleansing. First you put it on your face and adapt it to the face, then wash out after like oil form, but it is less dry than oil. It is good to use this with a massaging effect.  |
| Auc-93  | Chiebukuro has something like a wave. Questions that can be answered are posted one by one, and vice versa. In that case, I start again after taking a break for about half an hour.  |
| Auc-94  | I still look them in the eye and say “I like ambitious children, but understand my position.”   |
| Auc-95  | Fundamentally you cannot send it. So, doesn't it mean that shipments are from acquaintances or family? Other cases are also possible, so just ask an exhibitor if you are worried about that before a bid. It is possible to send the same service as non-standard-size from foreign countries.   |
| Auc-96  | The number of bids is certainly diminished. Many cases end up with the initial price. For an item that finishes during golden weeks, an item is exhibited with its initial price set higher than usual.   |
| Auc-97  | That is possible but commission fee can be charged. Besides that, wouldn't it be better to deposit? As receipts might be declined at windows, please deposit money at ATM.  |
| Auc-98  | There is no designating the time of cargo booking. Please just wait for a day. The toll will be known to the person you are dealing with. ** yen will be written.   |
| Auc-99  | It is best to sleep like tuna, be relaxed. Please have him/her experience how troublesome it is to carry a person with relaxed conditions.  |
| Auc-100 | Congratulations. Have her rest and give birth to a healthy baby.  |

**Table C-2: A Set of Question and Answer Statements (Auction, Original Japanese Version).**

| ID    | Statements   |
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| Auc-Q | 取引で最高、何日ぐらいかかったことがありますか？<br>私は、1ヶ月かかりました。<br>その時の私は出品者で評価が20位、相手は17位だったと思います。<br>この先、不安を感じましたが何とか現在の評価は70を越えました。 |

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|        | <p>苦勞したことのある人教えてください。</p> <p>現在、1週間連絡の取れない落札者もいて困っています。</p>  |
| Auc-1  | <p>たしかに電撃文庫の表紙は、人を引かせるには十分な効果があります。ブックカバーをかけて読みましょう。回りの空気を読むことは、とても大切なことですよ。</p>   |
| Auc-2  | <p>当面は削除しないでその方を BL に入れてはどうでしょうか。そうすれば、ほかの方が高値更新すればその方との取引を避けられると思います。残り1日を切ってもその方が最高額入札者の場合は悩ましいです。取引を避けるならその段階で削除、高値をねらうなら削除せずに他の方の入札を期待しましょう。</p> |
| Auc-3  | <p>金利が高いし危険です。裏書により誰の手にわたるかありません。割引するということは裏書をするということです。貴方の会社が裏書をするにより、それ以降にその手形を手にした人からの遡及義務が生じます。ヤバイ人に渡って因縁をつけられるなどということになりかねません。銀行で割り引くに限ります。</p> |
| Auc-4  | <p>川口はダミーですから実力が無いのは当たり前です。高村も同じようなもの。舛添なら適任かと思います。</p>  |
| Auc-5  | <p>急病だった家族が無事眠りにつきました・・・。ちゃんと笑ってあげましょう。うそに決まってるじゃん。評価見てみようよ。連絡・入金が遅いっていっぱい書いてあるさ。あなたも書いてあげてください。おかしな言い訳で、入金を遅らされ迷惑でしたって。</p>                         |
| Auc-6  | <p>代理出品でも IDを持っている出品者がすべての責任を持つのが当然でしょう。対応がわるかったのなら、その旨 評価で明らかにしましょう。無責任な対応に対する最初からの防波堤かも知れませんよ。</p>   |
| Auc-7  | <p>登録されてもお金は取られませんよ。銀行口座、電話番号、名前がわかりませんから。それは詐欺です気をつけましょう。</p>   |
| Auc-8  | <p>電話でも対応してくれますよ。銀行から相手に問い合わせしてくれます。対応は銀行によってまちまちですが。</p>  |
| Auc-9  | <p>悔しいから、出せるぎりぎりまで上げますよ。ベストを尽くしたらあきらめもつきます。大体そのあたりが相場でしょ？</p>  |
| Auc-10 | <p>郵送で回答が送られてきますよ。定形外だと1ヶ月くらいかかります。結局、見つかりませんでした。で、おわるとおもいますが、それで満足しましょう。</p>  |
| Auc-11 | <p>どんなことでも始まりはあります。きっかけがなんであれ、情熱を注ぐものがみつかること</p>   |

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|        | は良いことですよ。  |
| Auc-12 | 我が家の TV も深夜に鳴り出します。温度変化によるものだと思っています。熱膨張率の違う部品が接する所で音が出るのかなあ・・・と。  |
| Auc-13 | 東京です。店によります。自宅から 10 分以内のところに 2 件ありますが、片方しかやっていません。   |
| Auc-14 | よい出品者さんですね。台風で大雨なので・・・とメールをしましょう。相手もわかってくれると思いますよ。雨対策をしていますが、急いでいると何があるかわかりませんから、安全策をとったほうがいいと思います。振込み確認も午後からの入金だと確認できないかもしれません。   |
| Auc-15 | VAh になります。V は乾電池の電圧、Ah はどれだけの電流が何時間流せるかです。(電流の条件により時間は変化します。)  |
| Auc-16 | 青海島はお勧めだと思います。仙崎かまぼこも美味しいですよ。  |
| Auc-17 | 私のことですかね? 「もっとこんな答えもあるよ」というつもりで書いてたんですけど気に障りましたか?  |
| Auc-18 | 私も、1 円単位で、してます。そうすることによって、金銭感覚が鍛えられます。だらだらせず、しっかりした方がお金が貯まりますよ! 今はエクセルで、してます。結構たまり始めるとおもしろいですよ、もし、PC を毎回つけるのがいやなら、Pocket PC を買ってはどうでしょう。かなり便利ですよ。  |
| Auc-19 | 警察に相談するのがよいかと思います。課としては、生活安全課でしょう。   |
| Auc-20 | 実際にやってる方は居ますか? <a href="http://www.kit.hi-ho.ne.jp/non-passport/">http://www.kit.hi-ho.ne.jp/non-passport/</a>   |
| Auc-21 | 安物の畳表は、目が揃っていない物が多いようです。また、高級といわれる物でも、生ものですから微妙に色目が違っていたりします。安いのを選んだ知人宅では、半年で糸が切れて畳の目がバラバラ。高いのを選んだ知人宅では、気を遣いすぎて結局畳の上に薄いカーペットを敷いています。分相応な物にしておくのが一番ですね(^^)安心できるのは、畳屋さんをしている所や、内装を引き受けてくれる職人さんが居るお店です。売りっぱなしにはしないポリシーを持っている方が多い様なので。 |
| Auc-22 | 逃げると余計に追われます。あなたも同等以上につこく電話・メール・待ち伏せ等のストーカー行為を始めてみましょう。案外楽しいかもしれませんよ?それが苦痛なら彼女の方からやめるでしょう。   |

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| Auc-23 | PC 歴は長くて、Mac も Win も使ってます。原則はもちろん知っていますが「面倒」なので、そのまま送信してます。DTP する時は、人より気を使ってます。そんなものでしょ？   |
| Auc-24 | ほっておきます。出品数が多い人だと 1 ヶ月後くらいにまとめて、という人もいるようですから。忘れたところに評価がきます。   |
| Auc-25 | 通訳・翻訳です。翻訳メインなんで PC とにらめっこしています。毎日難解な法律用語と戦ってますよ。今も六法全書片手です。フリーで 1 時間に 10 分休憩をとってるんで、そのスキにサクサク書き込んでます。そのかわり 1 日全休なんてほとんどありません。こんな状態で書き込んででも 10 位以内を保っています。                                 |
| Auc-26 | 似たような内容ばかりでも とりあえず どれかに BA をあげてください。皆さん それを待っています。   |
| Auc-27 | たぶん出品者もその商品の質問に答えるだけの知識が無いのでしょうね。誰かにもらった物とかかなあ。「写真を見て分かる方のみご入札お願いします。」とニュワンスは似ているように思います。  |
| Auc-28 | 番号による追跡も住所までわかるものじゃありません。配達済みとなっていて、落札者に届かないことも多々あります。自分宛に発送して再度出品よ。   |
| Auc-29 | 現在価格以上の金額で入札しましょう。金額がかわったら、詳細な入札履歴を見よう。自動入札されてますよ。   |
| Auc-30 | 質問の趣旨がわかりません。相続税の財産評価は財産評価基本通達によります。土地の場合は、その土地の場所により、路線価で評価するところと固定資産税評価額を基本とした倍率方式で評価するところに分かれます。建物については、固定資産税評価額が基本になります。評価の方法は、大変複雑で専門家でないと無理です。                                       |
| Auc-31 | 保険の契約者と保険金の受取人は誰ですか？両方とも亡くなった方以外で同じ人であればその人の所得税の一時所得になります。受取った保険金からそれまでに払い込まれた保険料の金額を控除してさらに 50 万引いた金額の 1/2 が課税所得になります。他に給与所得等があれば合算されて所得税を計算することになります。恐らく支払い調書が出ていると思いますので申告しないとばれると思います。 |
| Auc-32 | 色によって変わってきます。メタリック系とか高いです。近くのショップに聞いてみてください。   |
| Auc-33 | 一番かんたんなのは、写真を撮る時に画像サイズを小さくすることです。ウインドウズ標準  |



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|        | のペイントでできますよ。変形 - 伸縮と傾き で縦横を同じ縮尺に縮めましょう。上書き保存か、名前をつけて保存しましょう。  |
| Auc-34 | アイワイバンクのATMは、振込みができません。新生からならパワーダイレクトですよ。ネットカフェなどを探して、PCから振り込みましょう。   |
| Auc-35 | 忙しいんでしょうきっと。なのであやまりの言葉がなかったのはメールをあらかじめ作っておいた文章をコピペしてるからです。きっと次くるメールもこんな感じでしょう。私もコピペですが遅くなったり、落札者さんが雑談してきた場合は文章付け加えます。取引やめたらもちろんあなたに非常に悪がつきます。その人の評価みて悪かったらキャンセルしては？ |
| Auc-36 | さんま、ナイナイ、よみことか、テレビを見てればいくらでも聞くことはできます。「知りたい」というのがどういうことなのか…。  |
| Auc-37 | 何親等の方が亡くなったかによって変わってきます。生徒手帳に必ず書いてある筈です。  |
| Auc-38 | あいてのIDってどうなってます？利用制限中？それなら詐欺の可能性もあるかもしれません。とりあえず、落ち着いて、荷物の到着を2・3日待ってみて、心配ならメールでも出してみてもいいでしょうか？相手も人間ですから急用もできれば病気もします。なにもせずに、詐欺を疑うより確認できるだけのことやってから心配しましょう。          |
| Auc-39 | 送料を間違えて連絡したのは、出品者ですよ。支払いますが、振り込み手数料分は引かせていただきます。とでも連絡しましょう。だめなら返金してもらいましょう。もちろんこのことは評価で明らかにさせていただきます。とも、付け加えてあげてください。   |
| Auc-40 | 実際使ってます。驚くぐらい、効果わかりません(;o;)うう…。返って、遅くなったような…？   |
| Auc-41 | 郵便局の住所を大きく書いて 郵便局留め の文字は朱書したほうがいいでしょう。赤字が目立つようにしてください。落札者の住所、氏名は少し小さめに書きましょう。配達されてしまうかもしれません。あとは普通にあなたの住所・氏名もかいておけばOKです。  |
| Auc-42 | パッドの角をヤスリで落とします。角が軽く丸みをおびるぐらいがいいでしょう。何故削るかですが、角が欠けて鳴きの原因や、当りにムラができて編磨耗したりディスクに傷が入る原因になります。パッド面は軽くペーパーかける方がいいですが、平らにしないとかえって悪影響があるので、しなくてもいいでしょう。                    |
| Auc-43 | 事前連絡はありません。当日になってから、突然、オークションのトップページやお知らせのところに、「〇月〇日、〇時～〇時まで無料出品キャンペーン」と表示されます。地道に  |

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|        | チェックするしかないでしょう。   |
| Auc-44 | 196548 さんに一票。賛成だなそれ。  |
| Auc-45 | あなたのせいではありませんよ。もっと気楽に子供と接してあげて♪子ども自身が恥ずかしいなと思えばすぐ治ります。おかあさんがぴりぴりすると子供にはすぐわかりますよ～。ハイ、深呼吸\(*T▽T*)/  |
| Auc-46 | 思ったとおりを評価します。報復で再評価されてもこちらからは何もしません。再度評価するから、あなたのような結果になるんだと思います。   |
| Auc-47 | 私も学生時代にイジメにあい異性では暴力ふるわれてトラウマになり心の病気にもなりました。前向きに過ごしてみませんか・・・何か好きな物やるとかそうすれば気がまぎれますよ。私は今、別な人と幸せにすごし家族のためにやることがあるから忘れることができました。同じ経験者どうし頑張りましょう。応援しています。  |
| Auc-48 | 何もしなければ白色です。青色申告は青色申告承認申請書を提出した場合にのみ認められます。青色は基本的に複式簿記の方法によって記帳しなければなりません。その代わり様々な特典があります。青色申告特別控除、青色専従者給与、損失の繰越控除、貸倒引当金の設定、小額減価償却資産の必要経費算入など。それ以外に、税務調査のときにいわゆるどんぶり勘定による課税を認めない推計課税の禁止、理由の告知等の救済措置があります。白色だと殆ど反論が出来ません。税務署の言いなりです。 |
| Auc-49 | かんたんに回答をしても、あなたのためにはならないから言ってるんですよ。少しは調べる癖をつけましょう。そのほうが、あなたの理解も深まると思います。っていうか、その程度の回答でいいのなら、あなたの質問もまじめな質問とは思えません。   |
| Auc-50 | 行き先によってまちまちです。ハワイ便なんかはめちゃくちゃひどい時間に出ます。  |
| Auc-51 | 実際に事業用に使っていて、税務調査のときに調査官を納得させることが出来れば認められます。そのような事例は非常に多いです。かなりの割合で認められると思います。発信履歴の明細でも用意しておけばなお良いと思います。  |
| Auc-52 | オクで売ってるやつなら、出品者の宣伝ですよ。さらしを見かけて通報する奴も、裏をかいでやったぜって満足感に浸ってます。  |
| Auc-53 | 私も出品者ですが、水対策はしといたほうがいいですよ？特に定形外だと、雨でも風でもポストにポイですから。最低限、ビニールにいれてから封筒に入れてあげましょう。  |
| Auc-54 | 必ず見ます。自分の感覚で引いてしまうようなものが出品されていたら入札はやめます。過   |

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|        | 去の履歴についても同じです。   |
| Auc-55 | ドラフトの上位指名選手については、ほとんどみんな同じことをやっています。それこそ周知の事実です。〇〇個人というより、プロ野球選手全員だと思います。  |
| Auc-56 | 公営住宅は、原則としてその自治体の地域に住民票を置かないと無理だと思います。いくつかの市営住宅・都道府県立住宅の入居条件を調べてみましたが、やっぱり条件に「その土地在住のもの」と書かれています。これは自治体によって条件が違うので、詳しくは該当の地方自治体に聞いてみるといいでしょう。                                      |
| Auc-57 | 検察官、裁判官は国家公務員なのでその等級によって決まっています。指定職とか色々あって一概には言えません。弁護士は独立開業している場合は千差万別です。イソ弁の場合でも一般のサラリーマンよりは上です。   |
| Auc-58 | ウインドウズ標準のペイントでできますよ。変形 - 伸縮と傾き で縦横を同じ縮尺に縮めましょう。きれいにするならフォトショップなどを使って拡大・修正するしかありません。  |
| Auc-59 | 大阪のおばちゃんは何の迷いも無くそのように行動してます。いえ、男子トイレに誰かいても、何の迷いもありません。とだけレスしておきます。。。   |
| Auc-60 | 窓口で「定形外郵便で配達記録をお願いします」といってください。普通に送るときと同じように、あて先も書いておきましょう。  |
| Auc-61 | わたしも 口下手です。とにかく ゆっくり 大きな声で 話すように ころろがけてます。   |
| Auc-62 | 奥さんへの給与は、青色事業専従者給与か事業専従者控除のどちらかです。前者は届出が必要で、仕事の内容により金額に制限があります。後者も限度額計算があります。両者とも奥さんが専従ですから、他に仕事があるようでしたらまず無理です。奥さんは金額がたとえ 103 万以下でも扶養にはなれません。                                     |
| Auc-63 | 逆に、その人に全て任せてしまっただけでは、如何でしょうか。 そんなに口うるさいんだったら、何でもうまくやってくれるでしょう。 そうでなかったら、今度がこっちが復讐しましょう。  |
| Auc-64 | 自営業は事業所得、アルバイトは給与所得で所得分類が異なりますが、確定申告で両方申告することになります。その際、アルバイトの方の源泉徴収税額の記載を忘れずにしてください。5%と言うことは乙欄源泉です。通常の甲欄源泉より多く引かれています。事業所得の金額が少なければ、支払う税金の額が少なくなる可能性があります。事業所得の金額がマイナスなら還付も考えられます。 |

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| Auc-65 | 路線価方式の場所であれば、路線価で評価します。倍率方式の場所では、固定資産税評価額に、場所によって定められた倍率をかけて評価します。その土地の場所によって評価方法は異なりますので税務署で確認してください。路線価で評価するのは、都会近辺のみです。  |
| Auc-66 | AM 3時、4時は空いてますよ。ネタ質問とネタ回答ばかりですが・・・朝の8時ころも空いています。質問もほとんどなくなります。  |
| Auc-67 | とにかく自分と同じものはいやなんでしょう。かなりの巨体の方は、えてして軽自動車に乗っていたりします。コンプレックスをかくすようになるんでしょう。  |
| Auc-68 | 犬は？犬には話してみた？動物は、貴方と人間との間を上手く埋めてくれますよ。散歩に一緒に出かけると、色々な人と犬を見かけます。中には、同じ様な悩みを持ったペアもいたりします。  |
| Auc-69 | 個人出品で返品不可ですからやめておきましょう。楽天なら、ショップのほうが安全ですよ。ここはショップ登録してまで詐欺るほどのうまみはありませんから。   |
| Auc-70 | どういう部署になるかによって全然変わってくると思います。金融機関としての重みが増していますので、そちらの方ではキツイかも。   |
| Auc-71 | そのようなルールはありません。本来エスカレーターを急いで上ることは禁止行為です。それが原因で事故が起きた場合はその人に責任があります。   |
| Auc-72 | 自分の口座から、相手の口座に送金することを振替といいます。ATMでも自宅PCからでも可能ですよ。  |
| Auc-73 | そーなんですか!!!今まで26年間後ろから前に拭いていました・・・今日から気を付けます。  |
| Auc-74 | 頭を強く蹴られたので、脳の一部が損傷を受け「神経症」の状態にあるのではないのでしょうか。中国拳法の単鞭の攻撃によって、そのような状態になる、ということをごくかのホームページで読みました。   |
| Auc-75 | BL登録しても入札はできたような気がするけど・・・。ちと確認し見るかな。あ・・・やっぱりダメですね。自分の開催するオクへの拒否なので、こっちから入札することはできません。 <a href="http://help.yahoo.co.jp/help/jp/auct/sell/sell-27.html">http://help.yahoo.co.jp/help/jp/auct/sell/sell-27.html</a> |
| Auc-76 | いろいろですよ。何軒か郵便局を回ると、思っている料金のところがあります。  |
| Auc-77 | 病院に行ってみましょう。今、二人目の妊娠中ですが、以前、中絶2回・流産3回経験しています。その影響か・・・わかりませんが、切迫流産・早産しそうで・・・安静中です。原因   |

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|        | が分かるなら、少しでも早めに対処したほうが、いいですよ。」  |
| Auc-78 | 「名前を付けて保存」が一番手っ取り早いかな。全部プリントするのもなあ…資源の無駄ですしね。自分でやった事ないけど、これで多分平気。マメに管理したいのかな？理由が凄く気になる（笑←いつも終わると即削除）   |
| Auc-79 | 米国に留学した程度で、英会話ができるようにはなりません。残念ですが。安部自民党幹事長。米国留学の経験があります。古賀無所属国会議員。米国留学の経験があります。小泉首相だって英国留学の経験があります。経験があつて、あの程度なんですから。本当に安く英会話ができるようになるには、留学ではなくて「仕事」で行く事ですね。   |
| Auc-80 | 「サンボマスター」と「フジファブリック」というバンドが気になっています。どちらも邦人です。確かサンボマスターはインディーズだったように思います。   |
| Auc-81 | 訓練や装置で体験できます。心霊現象ではありません。立花隆 著「臨死体験」を全部、最後まで飛ばさないで読んでください。人生変わりますよ。  |
| Auc-82 | 評価には思っていたものと違っていて残念です、なんて書くのは失礼です。同じように気に入りましたも不要だと思いますよ。取引がスムーズに行えたかどうかを評価しましょう。  |
| Auc-83 | 接続が切れると言う問題は、使用者の ADSL 環境によって種々の要素があるようです。契約接続業者のサイトに行くと詳細情報が見れます。当てはまる点がないか参照されてはいかがでしょうか？  |
| Auc-84 | 定形外郵便ならとぼけることも可能です。電話は無視せず、応対しましょう。「え？届いてませんよ。」これだけですみます。これはばれれば詐欺になると思いますが・・・   |
| Auc-85 | 何の保証人なのかによって違います。金額に限度があつてその金額が払える範囲のものであれば、なる可能性もあります。事務所の賃貸借契約の保証人にはなっています。  |
| Auc-86 | 家の子は管理が出来ません家のバイトした分はやりませんが普通はその都度ですだいたい小 6 で 5 千円位になります   |
| Auc-87 | 私自身そういう女子高生でしたが、見られても構わないと思って上二つのボタンをとめてませんでした。だらしがないと思われるのは分かっていたんですが、今でもそういう格好は素敵だと思います。私の世代からすると膝下丈のスカートの何処が良いのかもよく分かりません。きっと上の世代の方も私達と同じように思ってるんでしょうね。でも各世代にさまざまな流行があり、感性も違うので、今の子の格好が間違っているとは言い切れないんじゃないんでしょうか。 |

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| Auc-88 | 期限はありません次点から辞退されたということは、現在取引は誰も行わないようになっていましてこのままなら落札手数料も発生しませんいま繰り上げて同意されたら、削除の期限は今月末です。この期間以降にキャンセルされたら落札手数料だけ支払うこととなります。繰上げは21日になってからにしましょう。 |
| Auc-89 | 2回目以降の方には、住所等こちらで保存しておいてもよろしいでしょうか？ ときいてみましょう。了解を得ずにだと、相手もいやがるかもしれません。  |
| Auc-90 | 腸に限らずタバコを吸うことによって、体の各器官が収縮するからだと思います。   |
| Auc-91 | 私もつい先日 他で出品している私の商品画像を いかにも自分が所有しているかのように掲載している出品者を発見し(新規IDで出品していました) yahooに通報しました。数日してから「利用制限中」となっていました。悔しいと言うか 腹立たしいと言うか. . . 気持ちは良く分かります。    |
| Auc-92 | 私はミルククレンジングで洗い流しています。顔に乗せてからしばらくなじませて、オイル状になってから洗い流すのですがオイルよりも乾燥しません。マッサージ効果もあって良いですよ。  |
| Auc-93 | 知恵袋には波のようなものがあると思います。答えられる質問が続く場合はドンドン行きますが、全く無いときもあります。そういう時は30分くらい休んで再開することにしていきます。   |
| Auc-94 | じっと目を見つめて、「向上心がある子は好きだけど、俺の立場も分かってよ」と言います。  |
| Auc-95 | 基本的には送れません。なので、発送は知り合いや家族からってことなんじゃ？他にも考えられるケースはありますので、それが気になって入札控えてるようなら出品者に質問してみましょう。海外から定形外と同じサービス内容で送ることは可能です。料金は違いますが。                     |
| Auc-96 | 入札数はたしかに減ります。スタート価格で終了ってのが多いです。GW中に終了のあるものは、普段より高めのスタート価格で出品してます。   |
| Auc-97 | 可能ですが手数料を取られることがあります。それよりも預金したほうが良いのでは？窓口だと嫌がられることもありますから、ATMで入金しましょう。  |
| Auc-98 | 集荷の時間指定なんてできません。じっくり1日待っててください。料金は相手にばれますよ。〇〇円ってかかれます。  |
| Auc-99 | 力を抜いて、マグロのように寝ているのが一番。力の抜けた状態の人間を運ぶのがどれだけ大変か、体験してもらいましょう。   |

Auc-100 | おめでとう。安静にさせて、元気な赤ちゃん産んでもらいましょうね。

**Table C-3:** A Set of Question and Answer Statements (PC, English Version).

| ID   | Statements   |
|------|--|
| PC-Q | I taught myself Excel by reading an introductory book. I've finished the book, I'm worried about how much I can do with it, since I don't use it at work and don't have access to it to practice. It will be OK if I can stop worrying. How should I practice?   |
| PC-1 | There's nothing you can do... At most the user will create a new ID and persistently post questions. The police will not listen to you...  |
| PC-2 | To point out exactly, that's not final income tax return but semi-final income tax return. You must carry it out within four months since death. You should do so as tax might be charged. An income tax and a residents' tax is a target of deduction of liabilities for future inheritance tax. Have you finished the procedures of pension? For uncollected portions will affect inheritance. It will not be a problem if you do not have inherited property, though... |
| PC-3 | Some will show straightforwardly the attitude that "I will not give any food for the caught fish." There is one means to combat such a male: not to drop a hint that "You are the only one." If you always have in mind that "I can get any other man anytime," that composure can advance yourself to a better lady. Regardless of gender, "Run away and chase."  |
| PC-4 | Whether it is against guideline and whether it is harmful to you are different. If you are doing auctions as an emissary of justice and Yahoo!, you can treat violation as absolute violation: the person who thinks "I do not care so long as it is harmless to me" like me will end up dealing with the issues by concluding that he/she deviates from "just" what Yahoo! determines.  |
| PC-5 | It is less effective to wash the fingers as they are covered with sebum. How about pasting a cellophane tape by stretching it and holding it at both ends? Then cut off where a fingerprint is. But if a person minds fingerprints...  |
| PC-6 | Have you ever been to the Transportation Museum in Kanda? You can enjoy it with the mind of a child and feel like traveling. "In-flight" section in the aircraft corner makes you enjoyable as if you traveled abroad! However, on Sundays and holidays, a lot of kids are there, so you should avoid it then. And Haneda Airport is a place that does not bore you even if you stay there for a   |

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|       | <p>whole day. There are nice restaurants and shops. I feel embarrassed as if I am a fan of aircrafts, but I can recommend there if you are in Tokyo. There is a profoundness to it that people who usually “only use” aircrafts cannot understand.</p>  |
| PC-7  | <p>Criticisms are classified into two kinds: to improve and to satisfy the desire to attack. I think a questioner is talking about the latter, and in that case two factors are weighed: artificially satisfying the desire to attack by humbling others, and entertainers are suitable for the target. Beginning with the variety shows on TV, most people in the world have this sort of feelings as can be seen in daily lives. In actually degrading someone, unlike politics, science, technology and enterprises that require minute arguments and knowledge, entertainers are easily attacked, e.g. “His face is strange,” “I don’t like him,” “She has undergone plastic surgery,” etc.</p> |
| PC-8  | <p>Sending PM (private message) suddenly is not safe. Though that may not be offensive, you may be seen as a net stalker from the contents. It would be safer to send it to an e-mail address like “[ID]@yahoo.co.jp” etc. (I am not sure if you will get replies)</p>  |
| PC-9  | <p>You will not fail to take photos with gray backgrounds outside on cloudy days. Backgrounds with white or blacks make the exposure inaccurate. If you would like to make the color warmer, you would take shots using light on the flooring inside a room with windows facing south. Windows should be frosted glass on fine days. A fluorescent light should be “palook” neutral white. The light is wholly cast from upper left. If you have no choice but to use a strobe, light-emitting parts should be covered using paper napkins etc.</p>   |
| PC-10 | <p>Long hair seems feminine, while shorter looks lively... I like both. Straight and perm are similar images as those. In short, either one is all right so long as it suits the person, and smooth hair is better than solid hair by spray. How about directly asking a man you love? After a few days, if you change your hairstyle as you said, there is no doubt that he knows you “love” him. Conversely, mere hairstyle does not make him love you.</p>   |
| PC-11 | <p>Similar as yours, my kid too seemed to hate rice porridge as I served it every day, and came to ignore it. It was OK if I thought in an easygoing way that anything was OK so long as taste was thin. And he is nine months old now, he is willing to eat anything such as rice porridge, rice with taste, hodgepodge, etc.</p>  |



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| PC-12 | <p>I also kept two male since they were two months, they looked so good relationships as to sleep with keeping close to each other, and had not any toilet accidents. However, on fifth year, I picked up one female (one month after born) and began to raise her. One day around the time she turned one year old, suddenly males threatened each other with using sprays. Although the female have already experienced contraceptive operation, I do not know why but they came to act like a territorial fight. I referred some knowledge provided by several people, but there was no way but to isolate them, I decided to send one male to a nearby friend as a foster parent. Now one male and female are living peacefully. There is no knowing the reason but to ask the cats, but I imagine that males came to fight each other owing to the sign of a female regardless of contraception... It is said that if a female outside is in estrus, a male within two kilometer radius catches it. I suppose you are having a lot of trouble, but I think making separate spaces for them to live is a method to stop them from spraying.</p> |
| PC-13 | <p>Users cannot bid for your exhibits if they are registered in blacklists. The reason is of course because you do not want to deal with them. Users to be listed are:</p> <ol style="list-style-type: none"> <li>1) Users with a number of negative rates, fundamentally those with bad evaluation over 10% are out of the question, except those whose transactions are less than 10 and whose bad evaluation is only 1.</li> <li>2) Users who talk abusively in the evaluation column.</li> <li>3) Users who had troubles with me, still no one, though.</li> <li>4) Users who are listed below: <a href="http://mentai.2ch.net/yahoo/kako/965/965713090.html">http://mentai.2ch.net/yahoo/kako/965/965713090.html</a></li> </ol>  |
| PC-14 | I love 80kg and fat ladies.   |
| PC-15 | I asked. He cannot forgive those who ordered but left some.   |
| PC-16 | <p>Strictly speaking, it is. Of course it is classified into sales if it has something to do with stores. Otherwise, it is classified into miscellaneous incomes of business incomes, bigger one can be capital gains. The price you bought an exhibit should be recorded. If it is lower than a contract price, aggregation of profit and loss is possible as well. Benefits can lead to the increase of taxes...</p>  |

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| PC-17 | <p>No comments on banning copy in the program, so there is no knowing at the moment. Whether it violates the law is dependent on the TV station. Yahoo! has original intellectual property preservation program. If there are exhibits that defy copyrights, it is immediately required to contact copyright holders. If it is not deleted even after a report, it is not illegal because TV station permits it.</p>   |
| PC-18 | <p>Except Yahoo! Auction, the name and address of successful bidders mostly can be known simultaneously with the end of transactions. Contacting their addresses mutually is omitted unless shipping addresses are changed. When I first made a successful bid, I did not get any contacts. So I mailed several times and got a reply, "Usually I just wait and an item arrives without contact after a successful bid, and pay carriage and charge at a postal office." This is how I found out about cash on delivery for the first time.</p>  |
| PC-19 | <p>Being a fool is OK. Even if I am fool, I can graduate from high school, get work at some company and lead an easy life.</p>   |
| PC-20 | <p>First, you must clarify your aim using Illustrator or Photoshop. For example, you want to draw a picture like an illustrator, edit photos taken by a digital camera, or edit maps using paths. Anyway, I would recommend you using thin books that include only basic operations. And it is also good to use lectures on Website</p>  |
| PC-21 | <p>Yeah, the Labor Standards Act determines to pay at a certain day every month. Therefore, according to office regulations, a payday is set on the **th every month. (I do not think it is written that next business day if **th is Saturday, Sunday or holidays) On that day, wage must be paid. It is illegal even if payment is one day late. Laborers will be troubled if that is often the case. Failing to withdraw money will be a big problem.</p>   |
| PC-22 | <p>Many people including exhibitors have the wrong idea of no claim and no return. This word means no claim for an item "explained," and no other claims must be accepted. I actually checked a little, but "no claim and no return" have virtually a legal binding force within private contracts. And that is within an understanding of a person you are dealing with. For auctions, that's within the answer for the questions and the specification of product descriptions. Therefore, it is a clear right for an exhibit to officially use it. The current way of using it is only fraudulent ...</p> |

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| PC-23 | <p>As is often the case, that includes more danger than auctions. Anyway, it is in violation to the agreement of auction. I do not think it comes to light, though. This is a deal apart from auction, so please deal with caution. The majority of users of Chiebukuro will object to those actions. Please consider it a generalization. If an auction has a bid already, cancelled user will never bid at your auction again. If you know his/her mail address, how about contacting him/her saying that "I will think if a bid is finished?" I would not react... it may depend on money.</p>   |
| PC-24 | <p>Certainly I would refrain from bidding if I see this description. But some might write like that because others do so. Legally, a big flaw (wound, stain, breakdown, etc.) not written on an item description should enable you to return items and refund because no claim and no return itself will be invalid. If an exhibitor has explained well enough in the article description, and is free from troubles in past judging from his/her evaluation, I would bid without thinking too deeply...</p>  |
| PC-25 | <p>You only have to take action. How about kissing, or having intercourse? It is good to make a man himself react instead of words.</p>   |
| PC-26 | <p>I do not think it matters if you love him. A friend of mine has divorced one who has to raise the children, but I always try to cheer him. I cannot help him as he lives far from me...</p>  |
| PC-27 | <p>I suggest you do not evaluate him/her. The reason why he/she does not want to be evaluated can be considered:</p> <ol style="list-style-type: none"> <li>1) A will to resale. In re-exhibition, he/she would get bad impression if past deals (evaluation) are detected and prove to be "resale."</li> <li>2) The case of being unwilling to be known from his/her past deals from ID. If ID is known to friends/family, even though an item is not something to be ashamed of such as adult books, evaluation is declined because dealers does not want to be known.</li> <li>3) The case of delay of deals with others. I was declined to evaluate a user after deals were finished. Reviewing his/her evaluation again, there is a comment of "Please contact me" in his/her latest deals. New evaluations will reveal that he/she did normal deals with me...</li> </ol> |
| PC-28 | <p>There is no explicit rule on packing charge. Somebody needs packing charge even for old brown envelopes. An excuse is possible if it was not written on an item description in advance, so it might be refused and canceled..., but there might be a possibility that you cannot deal. Complaints after the arrival of an item... refund cannot be made.</p>   |

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| PC-29 | It is difficult to deal with each successful bidder, 10 at a time, isn't it? Actually there are only few people who do not evaluate. At most, one out of ten people. 7 of the rest really want to grade "bad." You should reconsider how you deal with others.   |
| PC-30 | Whoever says something, HONDA.   |
| PC-31 | It is in the list of limitations on bidder evaluation, in the page on when displaying. But this system is not very good, is it? The maximum evaluation is set at "5." If a user has kept doing bad and got 95 bad evaluation out of 100 deals and "5," he/she can bid. On the other hand, a user who newly participated and sincerely and gradually got evaluation "4" cannot bid. If you feel an anxiety for deals, why don't you delete the bid itself before getting into a trouble? A user might not feel in a good mood, but it cannot be helped for self-protection to some extent. Of course, you need to check the content of bad evaluation. Some users have got simple retaliation evaluation.   |
| PC-32 | I doubt so because driving schools fundamentally instruct according to textbooks. Under an assumption that you take examinations, though. If you have an automobile and are exempted from written examinations, you only have skills, so you might not understand the property of motorbikes unless you study it by yourself. For my case, I got only a medium-sized motorbike in the old system, when automobiles were not included in the examinations. But when I got a driver license, the system has been altered, and the examination for automobiles and motorbike were common. Thus, when I suddenly took skills classes without taking the automobile classes at all, I was laughed at as I asked an instructor how to move it. Some instructors may talk about his/her own experiences, so in a sense, there is something you can learn only in driving schools. |
| PC-33 | Any item would not be resold among auctions. When an item is resold as soon as it arrives, the final price is thought to be closer to the former one. If you are to resale it, you have to bid in cheap prices. You could benefit from resale if you can bid at half of the quoted price.  |
| PC-34 | You can read it after opening received mails and next manipulation. "Display," "Encode," and "Japanese" is all right. Encode of PC is unstable? But if you choose Japanese twice or so, and then encode will be stable and character corruption will not occur, I suppose. This is my experience, so explanations with more theoretical proof would be better answers... See URL attached because it is helpful. <a href="http://www.kanzaki.com/docs/jis-recover.html">http://www.kanzaki.com/docs/jis-recover.html</a>   |

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| PC-35 | <p>Reit stands for a real estate investment trust. Briefly explaining:</p> <p>1) System: actual things such as office and trust beneficiary rights are bought with the fund gathered by investors. Then investment incomes are gained and distributed by maintaining the estates. In short, if operations (rent incomes and expenses) can benefit, people who own Reit can get dividends.</p> <p>2) Feature: sales are possible at current price, and there is a possibility of dividends.</p> <p>3) Although a dividend is gained, you might lose if the purchase price is lower than selling one. I would recommend you think of your own style and invest.</p> <p>This is how I think. I hope this will help.</p> |
| PC-36 | <p>Yoronjima. Plain, calm? Usual business seems like a lie. Cycle around on an island. It is a good place to wash a life. Last summer, I went to Okinawa, but I then drove around only on the main island. It was also fun.</p>  |
| PC-37 | <p>I suppose it is OK to tell both the mail on payee and that on confirmation of money. The mail on confirmation of payment and that before shipping can be omitted. They might be necessary when a shipping is immediately impossible (around next day), but each mail one by one is a bit too much. I think it is better to put them together if possible.</p>   |
| PC-38 | <p>It depends on money, but the cheaper one... I will think of shopping if I buy something necessary for warranty, such as electric appliances and computers, etc. If you want items other than those for net-shopping, It is also one way to buy them at a time to save shipping cost. As I think the reliability of an item itself does not change very much, cost of items, shipping cost, and warranty are compared.</p>   |
| PC-39 | <p>Make an inquiry from the question list of his/her exhibit items. But his/her next exhibitor might do fraction bid, so fractions might be made by automatic bid. Or how about canceling after the deal is finished? Then evaluate with something like "I am sorry I cancel the deal because I feel doubtful of your way of bidding, although fraction bid is prohibited." He/she may notice that the same person does not make fraction tender/bids.</p>   |
| PC-40 | <p>My children get swollen when bit by bugs and feel hurt. Last night, I attached antipyretic sheets on the affected parts and that temporarily relieved the symptoms. Every year at this season, I go to the doctor and get some antipyretic drugs. They are more effective than marketed drugs... For</p>  |

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|       | <p>a marketed drug, Restamin Kowa ointment is good, with a red and white package... (Not the one for babies)</p> <p>Reference: <a href="http://shop.goo.ne.jp/store/soukai/gds/08396/">http://shop.goo.ne.jp/store/soukai/gds/08396/</a></p>  |
| PC-41 | <p>Then, stop it. Some complain, but what are their points? Why don't you directly negotiate with Yahoo?</p>  |
| PC-42 | <p>I think what the user "61537" says is right. (The last row is on my mind, though...) The user "61369" has the same opinion. Violation to guidelines is not to be forgiven, but there is no legal effect at all. And it will be a problem of whether you are convinced to bid. For my case, I will bid what I really do want... (If I ask on the Q&amp;A list, I might be put into a black list without any replies and become unable to bid. You should be careful of how to deal when you really want. )</p>                      |
| PC-43 | <p>Some may use it as a stamp, and a person who sells gift tokens may have exchange rate. I accepted stamps several times, but stamps for 5,000 yen are soon used up. That is less than 10 times of Yu-Pack...</p>  |
| PC-44 | <p>I always do both exhibit and bid.</p> <p>Exhibit: I hardly contact on sending as an item is sent on the day or next day of the confirmation of receipt. I do contacts only when the shipment is delayed, such as when I take more time from contact of receipt to confirm it, etc.</p>   |
| PC-45 | <p>A user with evaluation below 10 is suspected of fraud and cost increase. Evaluation over 10,000 makes everyone cautious... And what is important is how titles are expressed. The more categories of articles, the less tendency all the pages are seen. Therefore, some articles are overlooked unless searched. You might fall into that tendency so long as you do not think what everyone will search your articles.</p>   |
| PC-46 | <p>General post offices (mostly bigger offices) will accept them regardless of day and time zone. I do not drop into mailboxes due to the prevention of postal accidents, so it would be inconvenient if there would be no nearby general post offices. Yu-pack can be either accepted as collect shipment or brought to agents (ex: convenience stores and stores such as rice stores, stationery stores, vegetable stores, etc.) Don't stores near your house have banners? There is a stationery store near mine that does it.</p> |

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| PC-47 | <p>Cancellation is possible. It would be faster if ABS is written in the equipment list. If not, you will get into trouble. (whether it is written or not) If cancellation is possible, most of the money will be refunded, but maybe not for the cost actually spent for preparation before delivery of a vehicle like registration fee. (e.g. parking certificate, change of name, etc.) I would recommend you fight... oh no, negotiate with the store. If you can overlook the equipment of ABS, you can negotiate with the price, can't you? I would accept with the discount of more than 100,000 yen.</p>  |
| PC-48 | <p>The TV station may have judged it as a program publicity and not a nuisance. There is no illegality on the copyright law. The item might be against Trademark Law, so you can submit offense report after purchasing it if it is sold with the imitation of a package of video or DVD. Though nobody is troubled, what makes everyone angry and why is an exhibitor trapped like a criminal? That seems more illegal.</p>  |
| PC-49 | <p>It is natural for successful bidders to get cheaper, so there is nothing but to ask questions despite such descriptions and to inquire. I am afraid any remarks may not reduce such cases. How about not basically accepting non-standard-size items and answering "For the case of non-standard-size, I cannot assume any responsibility including non-delivery etc. If you agree, I will send non-standard-size," if you get an inquiry? Anyway it is impossible to avoid such questions. If you feel it troublesome to finally reply, such contents should be written on the item descriptions and non-standard-sizes are conditionally accepted...</p> |
| PC-50 | <p>Users under access control should not be displayed on the screen of successful bidders because they have no rights to bid. This may happen if a user becomes under access control after a bid is finished. You can delete the user, as he/she cannot evaluate you at any rate. For the case of runner-up advance, commission fee is equal to 3% of a contract price of the runner-up.</p>  |
| PC-51 | <p>I do not particularly see her, but sometimes wonder if she is leading a happy life.</p>  |
| PC-52 | <p>I do not care because neither inside the house nor a family is being photographed...<br/>&gt; I do not mind resale, but just take a picture by yourself...<br/>Then you should tell him that effect. Copyright is recognized on exhibit image by elaborating its good look and taking pictures. An auction can be deleted after reporting to Yahoo! if used without permission.</p>  |

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| PC-53 | <p>Easy Payment is the payment agency service provided by Co. NetLast. Successful bidders pay to NetLast, not to exhibitors. For the case of banks, send money to NetLast. For the case of credit cards, the credit card company will pay to NetLast after claim occurrence, and money will be withdrawn by the claim from the card company. NetLast will execute payments to exhibitors two days later in either way. And as the payment agency service, it cannot happen that money cannot be paid afterwards due to the short balance of bidders in spite of contracts. In that case, payment will be done if you sue. Such a case cannot occur as their business configuration is that trust is top priority.</p> |
| PC-54 | <p>Easy Payment is the payment agency service provided by Co. NetLast. Successful bidders pay to NetLast, not to exhibitors. For the case of banks, send money to NetLast. For the case of credit cards, the credit card company will pay to NetLast after claim occurrence, and money will be withdrawn by the claim from the card company. NetLast will execute payments to exhibitors two days later in either way. And as the payment agency service, it cannot happen that money cannot be paid afterwards due to the short balance of bidders in spite of contracts. In that case, payment will be done if you sue. Such a case cannot occur as their business configuration is that trust is top priority.</p> |
| PC-55 | <p>Easy Payment is the payment agency service provided by Co. NetLast. Successful bidders pay to NetLast, not to exhibitors. For the case of banks, send money to NetLast. For the case of credit cards, the credit card company will pay to NetLast after claim occurrence, and money will be withdrawn by the claim from the card company. NetLast will execute payments to exhibitors two days later in either way. And as the payment agency service, it cannot happen that money cannot be paid afterwards due to the short balance of bidders in spite of contracts. In that case, payment will be done if you sue. Such a case cannot occur as their business configuration is that trust is top priority.</p> |
| PC-56 | <p>Easy Payment is the payment agency service provided by Co. NetLast. Successful bidders pay to NetLast, not to exhibitors. For the case of banks, send money to NetLast. For the case of credit cards, the credit card company will pay to NetLast after claim occurrence, and money will be withdrawn by the claim from the card company. NetLast will execute payments to exhibitors two days later in either way. And as the payment agency service, it cannot happen that money cannot</p>  |



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|       | <p>be paid afterwards due to the short balance of bidders in spite of contracts. In that case, payment will be done if you sue. Such a case cannot occur as their business configuration is that trust is top priority.</p>   |
| PC-57 | <p>Easy Payment is the payment agency service provided by Co. NetLast. Successful bidders pay to NetLast, not to exhibitors. For the case of banks, send money to NetLast. For the case of credit cards, the credit card company will pay to NetLast after claim occurrence, and money will be withdrawn by the claim from the card company. NetLast will execute payments to exhibitors two days later in either way. And as the payment agency service, it cannot happen that money cannot be paid afterwards due to the short balance of bidders in spite of contracts. In that case, payment will be done if you sue. Such a case cannot occur as their business configuration is that trust is top priority.</p> |
| PC-58 | <p>Explanation may lead to the opposite effect. It will not be a problem so long as you can exactly explain “the interest of novel for junior” such as Dengeki Bunko. But if you explain the outline, you usually get most reactions like “seems geek,” “maniac?” Read them with the covers on. If you insist the “interest of novel for junior” as well, as books published by Otsu Ichi are similar as general novels, they might be effective.</p> <p><a href="http://www.amazon.co.jp/exec/obidos/ASIN/4044253013/qid=1085925474/sr=1-6/ref=sr_1_10_6/249-2398312-4298728">http://www.amazon.co.jp/exec/obidos/ASIN/4044253013/qid=1085925474/sr=1-6/ref=sr_1_10_6/249-2398312-4298728</a></p>                    |
| PC-59 | <p>It might be used as weapons... But basically it is a CPU with special purpose machine on games, its image processing capability is much better than that of Pentium. It bears comparison with current fast PC. If available around 1,000 yen, (with some knowledge) it is suitable for making data processing equipment on images. Recent missiles find targets by themselves through image processing. In that sense, it can be used as parts of weapons.</p>   |
| PC-60 | <p>Easy Payment is the payment agency service provided by Co. NetLast. Successful bidders pay to NetLast, not to exhibitors. For the case of banks, send money to NetLast. For the case of credit cards, the credit card company will pay to NetLast after claim occurrence, and money will be withdrawn by the claim from the card company. NetLast will execute payments to exhibitors two days later in either way. And as the payment agency service, it cannot happen that money cannot be paid afterwards due to the short balance of bidders in spite of contracts. In that case, payment</p>  |

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|       | will be done if you sue, even though the bidder has gone personal bankruptcy. Such a case cannot occur as their business configuration is that trust is top priority.  |
| PC-61 | People's mind are quite mysterious even to themselves. I reported the death of my mother to neighbor ladies, laughing and joking about it... I talked in this way because this story is not interesting to others, but I may be suspected if the police came. (I suppose) she was drowned in the bath...   |
| PC-62 | Warning for 3 days, due for 5 days, and delete for 7 days... When consecutive holidays, absence is possible. So why don't you send a confirmation mail unless you get contract tomorrow night? Usually some comments are left in the question column if you are away from home... usually.   |
| PC-63 | Regretful. You should report it to the police if you have any motivation. It is legally prohibited to sell uncensored products including males. You should bring the following things: An actual video, sent envelop (box), proof of payment, and the content of Yahoo! auction. All the proofs can be used to persuade the police. If you are to purchase an uncensored item in the first place, please feel at ease because you will not be accused of it at all. And please be sure not to threaten him/her like "I will report this to the police." Just doing so will be a possibility seen as extortion. |
| PC-64 | Amagasaki is a place like Kawasaki for Kanto region, a hometown for Downtown, and a democratic place. But Amagasaki seems to have bad image due to its being a factory area, though it is rather changed now. Those who relocated to Amagaski appear to have resistance to living there. There are many high class residents in Tsukaguchi, along the Hankyu rail lines and near the mountains, but everybody calls the area not Amagasaki but Tsukaguchi. I also live in an apartment in Tsukaguchi.  |
| PC-65 | Does anyone succeed in agriculture? If the land is diverted and made into housing, its estimated value leaps up. There might be a risk of being unable to pay inheritance taxes if you do not take measures to deal with it. Recently tax offices do not smoothly accept payments in kind... There are many problems of disposition. First, please decide after consulting with a tax accountant. Maybe it cannot be helped after diversion.   |

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| PC-66 | <p>1, It will be a violation regardless of highways, toll roads, and local streets. For parking etc. on local streets, it should be all right so long as you just get back within the minimum time required.</p> <p>2, You will be arrested if private roads and lands are used as roads or easily intruded. You will not if you cannot enter private roads and lands due to fences etc. However, you might be arrested for other laws when you are not permitted to do them by the owner of a land.</p> <p>These are just my personal impressions. For an answer 2, I remember reading these points in a magazine some time ago.</p> |
| PC-67 | <p>I am also very bad at housekeeping. After I was instructed by my friend how to arrange by dividing times and bought a timer, housekeeping progressed considerably. For example, a timer is set at 10 minutes, I could concentrate on cleaning my room for 10 minutes. During that time, I actually made the condition of no visitors, and thoroughly doing the cleaning without answering phones. Anyone but parcel delivery service was declined, or I was just so devoted to cleaning as to be inaudible the intercom... The cost of a timer is ¥500 at lowest, and ¥1,000 at highest, so please give it a try.</p>              |
| PC-68 | <p>My eldest daughter was born in winter and is sensitive to cold, while the second daughter was born in summer and is sensitive to heat. I do not know if the season in which a person is born has something to do with it, but I wonder maybe I raised the second daughter with leaving air conditioner on... Now the second daughter is less sensitive to heat, although she could not sleep with air conditioner on from March until she was a kindergarten child. (By the way, we live in Osaka.) But that is not disease. If you feel uneasy, firstly how about asking the health center via telephone consultation?</p>        |
| PC-69 | <p>You can see it if you enter Yahoo! ID in the "Search Option."</p>  |
| PC-70 | <p>I am a Japan Post personnel. Please bring what to send to the window of a post office. We can immediately send it if only you fill out necessary information on labels. Neither a seal nor an identification card is necessary.</p>  |
| PC-71 | <p>As someone else have pointed out, I am sure you have got a mail asking if the price is 2,100 yen because he/she does not just want to sell at 1 yen. What about writing questions you mentioned on his/her evaluation? Of course, evaluation is either bad or very bad.</p>  |

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| PC-72 | <p>I had no choice but to change to optical line because my new house had no space for ADSL line. It used to work essentially around 4MB, but now it can regularly connect approximately 80MB. What has changed is only the increased cost. (around twice than before) I cannot realize so at all because I have nothing to download, and I still think it unnecessary. I would like to ask the use of it to people who usually connect (ex: Internet, e-mail, games, etc.) I am to switch to ADSL if space is available. I will reconsider if Flets becomes cheaper.</p>    |
| PC-73 | <p>“Save as” is the fastest way. Printing a whole lot of data... is a waste of resource. I have not tried this, but I think this is OK. Do you want to manage frequently? I am concerned with your reason (I always delete files after finished)</p>   |
| PC-74 | <p>The clothes for dogs I purchased at 300 yen deserve 20,000 yen. I myself am very surprised... I will finish a deal earlier if the clothes are ready to some extent just before the deadline, but actually they were ready two days before when I was not checking. Moreover, a person who competed with a successful bidder was quite a layman. I finished the deal without any problems, but the bidder has not evaluated me yet. I am afraid he/she thinks I used a hired applauder... I will explain if asked, but it is strange to start talking. Feeling gloomy.</p> |
| PC-75 | <p>What a heartless attitude she has! Even though she is not interested in blood types, a woman would reply something so as not to be hated. And is there any possibility that your normal attitudes led to her behavior?</p>  |
| PC-76 | <p>Bad evaluation is OK if you are not to complain with an exhibitor. No claim...but some may accept your claims. Why don't you ask him/her by e-mail? Besides that, reconsider about the evaluation. Although it is possible to immediately confirm how it works with batteries... I cannot feel the exhibitor is sincere.</p>  |
| PC-77 | <p>Don't think whether you cannot evaluate (Ex: He is busy, etc.) or do not want to (Ex: You have bad impression of him/her, but are afraid of them getting revenge), but evaluate what you feel. Your items must have arrived as several months passed. Otherwise, a successful bidder will make a fuss. I think this is fine: “As two months have passed since shipping, I assume that items have already arrived.” I doubt if you would give low evaluation to him/her just because he/she will not evaluate you. Oh, is it possible to evaluate after two months?</p>    |

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| PC-78 | I think it is very difficult to start without special connections. You could visit wholesalers while disregarding profits if you have enough funds, but anyone can actually buy where you can buy for free. You are no match for existing shops that stock clothes in fashion every day at some price per box from foreign countries. For the time being, you engage in apparel business as an employee... Let's start from here.  |
| PC-79 | I think looking grave and turning aggressive are a shortcut to stress reduction.   |
| PC-80 | For 43 years, I have never thought of making a declaration of love because a woman seems to match me. You love her, think she is a good woman, want to talk to her, make a date with her, and see naked (self-control). You ought to be obediently glad with a lady who have admitted your goodness.   |
| PC-81 | Profits money must be listed. The money of public annuity graded deduction subtracted from income is profits. An answer who previously posted also subtracted nursing care insurance as well, which is an obvious mistake. Physically handicapped person allowance must not be subtracted. Considered as it is on the calculation of taxes, as the income is used to judge whether to be a support, total income money on income tax law must be entered. Nursing care and physically handicapped person allowance are subtracted from this total income money. Public annuity graded deduction differs whether a person is 65 and over or below 65. A person who is below 65 (65 and over, respectively) can be a dependent if his/her income is below 1,080,000 yen (1,780,000 yen). A profit will be 380,000 yen and under. |
| PC-82 | I hear a twelve-year old girl was hit in the face by a U.S. army soldier and asked help from a young man. That situation has unnoticeably become a problem of rape. U.S. army forced Iraqi prisoner men to rape Iraqi women. As in Iraq rape is the dirtiest crime that applies the most severe, death penalty, so the U.S. army dare to make Iraqi prisoners to do cruelty. U.S. is crazy.  |
| PC-83 | A cough that has continued for over two months is called chronic cough. It is classified into productive cough and dry cough, whether the cough accompanies sputum or not. In your case, yours seems the latter, so I would like to explain this. First, have a X-ray on the chest filmed at respiratory disease. For causes with abnormal ones in a photo, lung cancer, tuberculosis, pulmonary fibrosis, lung hypersensitivity, etc. For those out of a photo, postnasal drip, respiratory infection after effect, cough variant asthma, nasal polyp, eosinophilic bronchitis,   |

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|       | gastroesophageal reflux disease, etc. Anyway, I recommend you consult with a medical specialist.  |
| PC-84 | As most people are classified into the common in Japan, I think polygamy system leads to fighting. Everybody wants to embrace only good women. It would be OK if it is a privilege only permitted for very a few influential persons.   |
| PC-85 | There are both excitement and fun. You ought to fully enjoy it as it is the pleasure of exhibits. As the price is accepted, your exhibit deserves so. Do not write like unexpected price, or he/she might ask you to reduce carriage fee. You had better deal in a businesslike manner.   |
| PC-86 | It is because the velocity that it is transmitted in the air alters. The velocity the sound runs in helium, due to low density, gets faster. The sound that runs about 330 meters per second in the air will run approximately 970 meters per second in helium. (Because the velocity of conveying sound gets slower)<br><br><a href="http://www2s.biglobe.ne.jp/~n_kawa/science/helium/helium.htm">http://www2s.biglobe.ne.jp/~n_kawa/science/helium/helium.htm</a>  |
| PC-87 | You are a member of the company if paid salary. It means you belong to the company, and income tax is subjected to be the year-end tax adjustment. If you have not done so, you need to do a final return. There are many cases where there is one master in the construction work. One master is a private business and has a duty for a final return. Whether one master or a salaried employee matters a lot. Some person is one master and get money as salary, which he does not declare. It will come to light if a company is investigated. At least five years worth will be traced. First please confirm if the concerning taxation of income taxes are appropriately treated. This year our subcontracts have a lot of trouble on similar problems. |
| PC-88 | A receipt that appears from Fami-port says that A and E are given to the customer. Isn't it OK to input? Afterwards postal offices will do. Only A will lead to the arrival of an item, and if you do not have others Family Mart will be troubled.   |
| PC-89 | You really want to restore? Are you sure? I suggest not... You should look for the next.  |
| PC-90 | > I cannot have a good impression on an exhibitor who writes "The contact of arrival will be in evaluation...."<br><br>Why? Sending an e-mail to inform of arrival and thank, and thanking in evaluation list. Are you dissatisfied with the comments that these two things will be in the evaluation list? The user you  |

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|       | <p>are dealing with must have a number of deals in a day because his/her evaluation is 1,200. I doubt each evaluation will be replied to... It is the usual case that evaluations are copied and submitted at the end of a month.</p>  |
| PC-91 | <p>I deeply understand your feelings. I divorced around three years ago, and I sometimes felt lonely all of a sudden. For some time I took my mind off by exchanging online. But suddenly I got haunted by a mechanical feeling that made me lonelier, so I tried to look outside rather than relying on the Internet. At that time, I was living in my hometown even though I got married, so I had some friends from my childhood, and it was happy to have opportunities to talk with and see those friends anytime. Commonly, it is a way to have your mind arranged to see friends of workplace, neighborhoods, relationships of children at school, hobby, etc.</p>  |
| PC-92 | <p>There is no merit for exhibitors to omit automatic extension. Only merit is a deal is always finished at a designated time... The initial settings of exhibits is No automatic extension. I think many people forget this because the settings have to be set to Yes.</p>   |
| PC-93 | <p>Whether it is done as business or not makes a big difference. Usually incomes on transferring securities is another tax base, which is the money of transferred income related to stock shares. What is your business? To certify the trade of securities as business scale, it is necessary to do professionally only the trade of stocks. In that case, it is classified into another tax base, which is the money of business income etc. related to stocks etc. A sole proprietor who also does the trade of stocks cannot fall into it. It might fall into another tax base, which is interpreted as "the money of miscellaneous income related to stock etc."</p> |
| PC-94 | <p>It is easier to comment than Q&amp;A because of anonymity. ID will not be open to public in the least, either to exhibitors or to visitors. Only comments are visible for reference. There is no notification to exhibitors. It is unknown unless you see your auction page and click the advice from users. At least, it will be information for Yahoo! to delete.</p>   |
| PC-95 | <p>Is it only me that I become unwilling to bid even if common sense is written...?<br/>         &gt;Please contact me within 3 days, and deposit within 5 days. Please contact me when you might be delayed for any reason. Please understand that a person who cannot observe this rule can be deleted due to the matter of a successful bidder.<br/>         Is it also only me who suspects that exhibitors who write like this tend to send delayed mails...?</p>   |

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| PC-96 | <p>A small temple called “Hosenin,” which you can see on the left side after passing by Ohara Sanzenin. After passing a place like normal entrance, you can see a main hall beyond the corridor that looks like normal house. These two have full-scale windows, from which you can command wonderful surrounding scenery. Certainly about ten years ago, the admission fee 500 yen included tea and a tea cake. I was just in a daze, holding my knees. The chief priest there liked cats, and it was a very fine day when I visited there. And I joined him playing with cats, and he served me specially tea in the room with a fireplace. I think maybe spring and fall are suitable for the season, and it is a place only few people know. I thought so, but since the place was introduced on TV before, so it might be famous now...</p>  |
| PC-97 | <p>The probability of determining originally survived person is <math>1/3</math></p> <p>1) The probability that C survives is <math>1/3</math>.</p> <p>(When A is executed) The probability that B will be told as being executed is <math>1/3 * 1 = 1/3</math></p> <p>2) The probability that A survives is <math>1/3</math>.</p> <p>(When A survives) The probability that B will be told as being executed is <math>1/3 * 1/2 = 1/6</math></p> <p>The phenomenon that B will be told as being executed is either (1) or (2), and under that condition the probability that A will be killed is <math>(1/3)/(1/3 + 1/6) = 2/3</math></p> <p>To make this phenomenon easier understood, only 1 out of 100 million wins a lottery. You are saying the same thing like this: as 99,999,999 people but you will be absolutely killed, if the result of 99,999,998 people will be known, the probability of your death will be <math>1/2</math>. There is no knowing if a world after death exists, so that the probability is <math>1/2</math> might be doubtful...</p> |
| PC-98 | <p>A person like you is only a handful. Recently few people leave any comments even if I wrote “in evaluation...” No one would say anything if I do not make any comment. Let alone people seldom send e-mails. At least they should send an e-mail to let me know that an item has arrived. In that sense, I write a statement of “evaluation is fine...”</p>  |
| PC-99 | <p>I feel unwilling to see the auction of other exhibitors...regularly 200 items will be seen as semi-pro. I do not care about the number of evaluations. The number over 1,000 might be focused on, but it cannot be reliable because Yahoo! Auction does not distinguish the evaluation of selling with that of purchase. Semi-pro users have their own rules, run auctions by themselves, and cannot deal with selfishness of customers, which prevents me from dealing with them.</p>   |



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| PC-100 | I want to be a cute old lady even if I get senile. We will be a couple who will go shopping, holding each other's hand. |
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**Table C-4: A Set of Question and Answer Statements (PC, Original Japanese Version).**

| ID   | Statements   |
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| PC-Q | <p>エクセルを入門書を読みながら自分なりに勉強しました。</p> <p>とりあえず、入門書での勉強は終わったのですが、仕事として、実践として使用してる訳ではないので、現状でどれだけ使いこなせるのかが不安です。</p> <p>不安解消になる程度でいいのですが、この後は、どんな練習をすればいいですか？</p>                                 |
| PC-1 | <p>どうにもなりません……。せいぜい別IDつくってしつこく質問するくらい。警察なんて耳も貸さないだろうし……。</p>   |
| PC-2 | <p>正確に言いますと、確定申告ではなく、準確定申告になります。お亡くなりになった日から4ヶ月以内におこなうこととなります。税金の発生の可能性があるのですから申告はしてください。所得税、住民税はその後の相続で債務控除の対象になります。年金の手続きはお済ですか、これについても未収部分が相続に影響します。もっとも相続財産が無いのであれば問題はありますが……</p>      |
| PC-3 | <p>「釣った魚に餌はやらない」とあからさまに態度に出る奴もおるわな。そんな男に対抗する手段は一つ。「私は貴方しかいない」という雰囲気匂わせない事じゃ。「いつだって他にいい男捕まえられる」という気持ちを常に持っていればそれが余裕となってさらにイイ女にステップアップできるぞ。男女限らず「逃げれば追いかけてなくなる」ものじゃ。……………</p> <p>b y 中年汁</p> |
| PC-4 | <p>ガイドラインに違反してるかどうかと、自分に実害があるかは別かな。正義とYahooの使者としてオークションやってるなら違反はすべて違反として対応すればいいし、私みたいな「とりあえず、自分に害がなければいい」人にとっては「たかが」ヤフーの決めたことから若干ずれた人ってことで処理されて終わるだけ。(入札もしないけどね)</p>                       |
| PC-5 | <p>指は皮脂で覆われているのでいくらあってもあんまり効果は……セロテープを長く伸ばし両端をもって張ってみてはどうでしょう？で、指紋のついた場所を切っちゃうwでも、指紋を気にする方がいるとなるとちょっと…</p>   |

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| PC-6  | <p>神田の交通博物館には行かれましたか？ 童心に帰って楽しめますし旅行した気分にもなれます。航空コーナーにある[機内]に入れば気持ちは海外旅行で雰囲気抜群です！ただし日祭日はガキが占拠してるので避けたほうがいいです。あと、一日いても飽きないのは 羽田空港でしょう。気のきいたレストランからショップまで揃っています。飛行機マニアっぽくて恐縮ですが、東京ならではのオススメポイントです。普段飛行機を「利用するだけ」の人には解らない奥深さがあります。</p>   |
| PC-7  | <p>批評には2種類あります。改善を求めるため。自分の攻撃欲求を満たすため。質問者が言っているのは後者だと思いますが、その場合・人や物... 他者をおとしめて擬似的に攻撃欲求を満たす・そのターゲットとして芸能人は最適といった2つの要素が大きいでしょう。上はテレビのバラエティ番組を始めとして、日常でも見かけるパターンで世の中の多くの人がこのような感情を持っています。実際おとしめるにあたって、細かい理屈や知識が必要な政治・科学技術・企業などと違い、芸能人は「顔が変」「なんか気に入らない」「整形してる」などと簡単にそれができてしまいます。</p> |
| PC-8  | <p>いきなり PM (プライベート・メッセージ) はヤバイでしょう。怒る事は無いと思いますが、文面などによってはネットストーカと見られる可能性が・・・。まだ、「[ID]@yahoo.co.jp」などのアドレスへメールを送られた方が良いと思います。(返信が来るかどうかはわかりませんが・・・)</p>  |
| PC-9  | <p>薄曇りの日の屋外でグレー系のバックで撮影すれば失敗しません。白や黒のバックは露出が不正確になります。温かみのある色に仕上げたい場合は南向きの部屋の中でフローリングの上などで撮影します。窓は晴天の場合は曇りガラスが良いでしょう。蛍光灯ならパルック昼白色が良いでしょう。全体に光が左上から当たるようにします。やむなくストロボを使う場合は、紙ナプキン等で発光部をやわらかく覆います。</p>   |
| PC-10 | <p>ロングが女性らしくショートは活発なイメージがあり どっちも好き。ストレートとパーマも上と同じ感覚かな。黒髪と 茶髪も・・・ようは その人に合っていれば なんでも良いどっちにしてもスプレーでパキパキの髪より さらさらが好きお目当ての男性にストレートに聞いてみたら？数日後 言った通りの髪型になっていたら、間違いなく「好かれてる」とわかりますし・・・逆に 髪型だけで 好きになる事は まずありません。</p>   |

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| PC-11 | <p>うちの子も同じ頃、ほぼ毎日白粥にしていたら嫌になったらしくぴいとそっぽを向くようになりました。味が薄ければなんでもいいだろうと気楽に考えてやってみたのが良かったのか9ヶ月の今は白粥も味付きも雑炊も何でも喜んで食べてます。・まとめて作っておいた野菜スープにとろみをつけたあんかけ ・刻み納豆・白身魚やシラス(あんかけにすることもある)・「ごはんOすよ」などの海苔の佃煮をごく少量混ぜたり乗せて のぼしたり。・煮物・おかず・おひたし(味しょうゆ2〜3滴をたらして)海草 を細かく刻んで乗せたり混ぜたり。混ぜれば濃い味のものも薄 まるし濃すぎるものはお湯を足してレンジで2分位チンして煮出 して使用。 お役に立つことができたならうれしいです*^。^*</p>  |
| PC-12 | <p>我が家も生後2ヶ月から飼い始めた雄2匹がいて、2匹でベッタリくっついて寝るほど仲良く見え、粗相は一度もした事なかったんです。でも5年目に雌1匹(生後1ヶ月)を拾って育て始めたところ、雌が1才になった頃にある日突然、雄同士がスプレーしながら威嚇し合いました。雌も避妊手術は済んでいたのに何故か、縄張り争いの様な行動が始まったんです。色んな人の知恵をお借りしましたが、隔離以外方法がなく、近所の友人に雄1匹は里親に出しました。我が家では雄1匹と雌1匹で、今は問題無く過ごしています。本当の理由は当猫のみぞ知るですが、避妊していようと雌の気配で雄同士の戦いが始まってしまったのかな・・・と想像しています。外の雌が発情すると、半径2km以内の雄はそれをキャッチするそうですし。大変だとは思いますが、お互いが別に生活できる空間を作るのがスプレー行為を止めさせる方法だと思います。頑張ってください。</p> |
| PC-13 | <p>ブラックリストにいれると貴方の出品物に対してそ人々は質問、入札ができなくなります。入れる理由は当然その人と取引をしたくないからです。入れる人は①マイナス評価が多い人基本的に悪い評価が1割超えたらアウト。ただし、取引が1桁で悪い評価が1つならいれない。②評価欄で暴言を吐きまくっている人③自分とトラブルった人まあこれはまだいせんが・・・④ここに載っている方々↓<a href="http://mentai.2ch.net/yahoo/kako/965/965713090.html">http://mentai.2ch.net/yahoo/kako/965/965713090.html</a></p>  |
| PC-14 | 80kg 当方デブ専。  |
| PC-15 | 聞きました。自分で頼んでおきながら、残すヤツは許せんそうです。  |
| PC-16 | <p>厳密に言うと対象になります。お店と関係あるのもでしたら当然売り上げになります。そうでなければ事業所得の雑収入か雑所得、大きなものであれば譲渡所得の可能性もあります。出品物の買ったときの値段はちゃんと記録に残しておきましょう。落札代金と比べてマイナスになっているのだったら、損益通算をすることも可能です。利益が出ていたら税金も増え</p>  |

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|       | ますが・・・   |
| PC-17 | 番組中に複製を禁じるようなコメントも出てないと思いますし、この時点ではまだなんとも・・・法に触れるかどうかはテレビ局次第です。ヤフーには独自の知的財産保護プログラムがあります。著作権を無視した出品をみつけたら、すぐに著作権者に連絡をとるようになっています。通報しても削除されなければ、TV局側も黙認ということですから、違法行為とはなりません。  |
| PC-18 | ヤフオク以外は、終了と同時に落札者の氏名や住所がわかるものが多いです。配送先に変更がない限り、お互い住所などを連絡する手間は不要です。楽天ではじめて落札されたとき・・・一向に連絡がなく、数回メールしたところやっと返事があり、「ふだんは落札後は連絡もせず待っていれば商品が届き、郵便屋さん送料・代金を支払っていました。」とのこと。代引きをはじめて知った次第でございました。                                  |
| PC-19 | バカがいいなあバカでも高校ぐらいは出れるだろうし、それで適当な会社に就職してのんびり暮らしたい。   |
| PC-20 | まず、イラレやフォトショで自分が何をしたいのかを明確にしておくこと。たとえばイラストのような絵を描きたいのか、デジカメ写真の編集をしたいのか、パスを使って地図などの編集をしてみたいのかなど（あくまで例です）。目的が定まれば、それに近い本を探すだけ。とりあえず、一週間でどーのこーのといった、基本的な操作しか載っていない薄い本から試していくことをお勧めします。また、Web 上にも講座があつたりしますので、その辺から攻めていくのも手かも。 |
| PC-21 | ↑↑そうそう。労働基準法では、毎月一定の日に支払う事が決められています。ですから就業規則で給料日は毎月××日となっています。（そこに土日祝の場合は翌営業日とは書いていないと思いますが・・・）その日には、賃金が渡っていなければいけません。1日でも遅れた場合は、基準法違反です。それが当たり前になると労働者が困ります。カードの引き落としが出来なかった場合は、大問題です。                                    |
| PC-22 | ノークレノーリタの意味を履き違えてる人が多いです出品者でも・・・。この文句はあくまで「商品説明されている」物に対してのノークレームであり、それ以外のクレームは受け付けなきゃいけないんですよ。実際に少し調べてみましたが、個人売買契約のなかでノークレノーリタは実際に法的な拘束力を持ちますが、あくまでそれは相手が了承した範囲内。オクで言えば商品説明に明記されて質問などで答えた範囲内です。なので、正式に使う分には               |

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|       | 出品者のれっきとした権利だと思います。現在の使い方はただの詐欺まがい・・・。   |
| PC-23 | よくあることですが、オークション以上に危険もはらんでいます。とりあえず、オークションの規約に違反することになります。ばれることもないとおもいますが。オークションから離れての お取引ですから 心して対応してください。知恵袋に来ているかたの大半は、そういう行為に反対されるとおもいます。それが一般論だとお考え下さい。すでに入札のあるオークションなら、取り消された方は2度とあなたのオークションに入札しないでしょう。アドレスを聞いているなら、入札がなく終了しましたら考えてみますとでも連絡してみてもは？私なら応じませんが・・・って金額にもよりますが(^_^;   |
| PC-24 | たしかにこの記載があると入札はひかえますね。でも 他の人も書いているのでそれにならって という人もいるんでしょう。法的には、商品説明にない大きな欠陥（傷や汚れ、故障など）があれば、ノークレーム・ノーリターン自体が無効となり返品・返金もできるはずですが。商品説明が十分にされていて、評価を見て過去にトラブルのない方であれば、あまり深く考えずに入札していますが・・・  |
| PC-25 | 行動するしかないでしょうね。キスして誘ってみては？Hしたいって誘うのはどうかな。言葉でなく、男性自身を反応させてしまえばいいです。  |
| PC-26 | 別に好きになったら構わないと思います。友達にもがんばって子育てしてるバツイチパパさんがいますが、いつも応援しています。遠くに住んでるから、お手伝いはできないけど・・・  |
| PC-27 | 評価はしない方がいいです。評価をされたく無い理由は、次の様な物が考えられます。1. 転売する意志がある時。再出品した際、過去の取り引き内容（評価）を調べられ「転売」とばれたら心証が悪くなるでしょうから。2. IDを元に、過去の取り引きを知られたく無い場合。IDが仲間（家族）内に知られている場合、アダルトなどの恥ずかしいものでなくとも、仲間（家族）に取り引き内容を知られたくないと言う理由で、評価を断っている。3. 他との取り引きを延滞させている人の場合。取引終了後に評価を入れようとしたら、断られました。相手の評価を再度見てみた所、別の最新の取り引きにおいて「連絡を下さい」の旨の書き込みがされてました。新たな評価があると、「そちらはちゃんと取り引きしてた」って事がばれちゃいますからね…… |
| PC-28 | 梱包料なるものに、明確なルールは存在しません。使い古しの茶封筒でも、梱包料の必要人はいます。事前に商品説明になかったものなら、拒否してキャンセルしても言い訳が立ちますが・・・取引が出来なくなる恐れは多々あります。商品到着後のクレームなんて・・・   |

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|       | 返金があるはずもありません。  |
| PC-29 | 1日10個ともなると、落札者一人一人に個別に対応は難しいでしょ？あなたに良い評価はしたくないってことでしょう。評価をしてくれない人は、実際はそんなに多くはありません。いても10人に一人くらいです。残りの7人は、ホントは「悪い」をつけたがっています。対応の仕方を見直されたほうがいいですよ。  |
| PC-30 | 誰がなんと言おうと HONDA   |
| PC-31 | 出品時のページ、入札者評価制限の欄に有ります。でもこれって、ちょっとイマイチですよ。ね。最高制限の「5」にしてみたところで、さんざん悪事を重ねて来て、お取引100の内の95が悪いという評価「5」の人は入札できても、新規で参加して誠実にコツコツ評価を稼いだ「4」の人は入札できない、っていう仕組みなんです。お取引に不安を感じる場合は、トラブルになる前に入札そのものを削除なさってはいかがでしょうか。削除された方はいい気はしますが、自己保身の為ですからある程度は仕方ありません。もちろん、悪い評価の内容もよく見てあげて下さいね。単なる報復評価を貰ってる方も有ります。   |
| PC-32 | 基本的に教習所ではテキスト通りのことをやるのでそういうことはないと思います。ただし学科試験を受ける場合という前提がありますけど……。車持ってて筆記が免除なら、実技だけしかしないのでバイクの特性なんかは独学で勉強しないとわからないかもしれません。私の場合、昔の制度で自動二輪中型限定を取り、そのときは学科に車のことは含まれなかったのですが、車の免許取るときには制度が変わってて車とバイクの学科が共通になってました。なので、車の学科を一度も受けずにいきなり技能に入って、教官にどうやって動かすのか聞いて笑われたことがあります。あと教官によっては自分の体験談等を話してくれたりするので、そういう意味では教習所でしかわからないこともあるかもしれませんね。 |
| PC-33 | どの品物であっても、オークション間転売はうまくいかないでしょう。品物が到着した直後に即転売した場合、最終価格は前の落札価格に近いと思われます。どうしても転売したいのなら、とにかく安く落札するしかありません。相場の半値で落札できれば転売で儲かるでしょう。  |
| PC-34 | 受信したメールを開き次の操作をすると読めます。表示⇒エンコード⇒「日本語」で読めるはずですが。パソコンのエンコードが安定していないから？かもでも、日本語を選択を2回くらいすると安定して、文字化けはしなくなると思いますが……。これは私の経験からで、もっと理論的な裏づけのある説明が回答であるかも……。それから URL も参考になるので添   |

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|       | 付しました。 <a href="http://www.kanzaki.com/docs/jis-recover.html">http://www.kanzaki.com/docs/jis-recover.html</a>  |
| PC-35 | <p>リートとは不動産投資信託の事です。簡単に説明すると下記の通りです。1. 仕組み・・・投資家から集めた資金でオフィス等の現物か 不動産の信託受益権を購入しその不動産を 維持管理しながら運用益を得て分配するものです。</p> <p>要は運用（賃借収入等-経費）により利益があったら リートを持ってる方に分配金として配当されます。2. 特徴・・・随時時価で売却が可能・配当がある可能性あり。3. リスク・・・配当金を得ても購入価格より売却価格が低いと 損が出る可能性があります。 自分の運用スタイルを考え投資されることを勧めします。こんなことろだと思います。ご参考になれば幸いです。</p> |
| PC-36 | <p>与論島。素朴、精神が落ち着く？普段の忙しさがウソみたい。自転車で島内ぐると回ろう。命の洗濯にはいい所。昨夏、沖縄へ行きましたがその時は、本島だけをレンタカーでぐるり。楽しいです。</p>  |
| PC-37 | <p>振込先のメール、金額の確認のメールはいっしょにお伝えしても良いのでは。振込み確認のメール、発送前のメールは省いても良いかな・・・。すぐ(翌日くらい)に発送できないときなどは振込み確認のメール、発送前のメールはあっても良いと思いますが、それぞれ1通ずつはちょっと多いかな。纏められるものは纏めたほうが良いと思いますよ。</p>   |
| PC-38 | <p>金額によりますが安いほう・・・。電化製品やパソコンなどであとあとの保証などが必要なものならショップも考えます。ネットショップでその商品以外にもほしいものがあるならそれらも一緒に購入して送料浮かすのも一手。商品そのものの信頼性はそんなに変わらないと思うのであとは商品価格と送料、保証をてんびんに掛けます。</p>  |
| PC-39 | <p>そいつの出品商品の質問ランから聞いてみよう。でもさ、そいつの下の入札者が端数入札してて、自動入札で端数になってる場合もあるんだけどね・・・っていうか、終了後に取り消してあげたら？端数入札を禁止しているにもかかわらず、ご自信がこういった入札をされることに疑問を感じお取引はご遠慮願いました。って評価してあげよう。端数落札と端数入札は必ずしも同一人物じゃないことに気づくかも・・・</p>   |
| PC-40 | <p>うちの子供たちは、虫に刺されると凄く腫れて、痛がります。夕べは、腫れたところに、熱さまシートを貼って、一時的に症状を和らげてあげました。顔を刺されると、ものすごいです。誰だかわからないくらい腫れてしまいます。毎年、この時期になると医者に行っ、かゆみ止めの薬を処方してもらっています。市販の薬より、効き目がいいですよ・・・。市販薬</p>   |

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|       | <p>でしたら、レスタミンコーワ軟膏がいいです。赤と白のパッケージのほう・・・。(赤ちゃんのパッケージじゃないほう) 参考まで・・・。http://shop.goo.ne.jp/store/soukai/gds/08396/</p>   |
| PC-41 | <p>だったら、辞めなさい。入ってるくせに文句を並べる人っているけど、何がしたいの？ヤフーに直談判すれば？</p>  |
| PC-42 | <p>回答者「61357」の行っていることは、正しいと思います。(ちょっと最後の1行が気になりますが・・・。) 回答者「61369」の方も同じ意見ですよ。ガイドラインへの違反は許せませんが、法的効力は全くありません。あとは、それに納得して入札するかどうかの問題になると思います。私の場合、どうしても欲しい出品物でしたら、入札してしまいますけど・・・。(下手にQ&amp;Aで請求してしまうと、回答も何もなくブラックリストに入れられてしまい、入札すら出来なくなる可能性。本当に欲しい時は、対応に注意した方が良いと思われます。)</p> |
| PC-43 | <p>そのまま切手として使ってる人、商品券などを売ってる人だと換金ルート持ってる人もいるかもしれませんね。私も何度か切手OKにしましたが、5000円分の切手なんてあつという間に使い切りますね・・・。ゆうパック10回分にもなりやしない・・・と、</p>  |
| PC-44 | <p>私も出品・落札ともにしています。出品時：入金確認の当日か翌日には発送していますので、発送の連絡はほとんどしていません。入金連絡から確認までに時間がかかった場合など発送が遅くなった場合のみ連絡しています。評価についてですが、不安を覚えるお取引であったなら「非常に良い」という評価はするべきではないと思いますよ。みなさん報復評価を恐れていらっしゃるようですが・・・評価の前に、「こういう理由でこういう評価にさせていただきます」というメールを送ってみてはどうでしょうか。</p>                            |
| PC-45 | <p>評価で一桁だと詐欺や吊り上げを疑う人もいますね。5桁超えるとみんな慎重になるし・・・。あと重要なのはタイトルのつけ方。出品数の多いカテゴリになればなるほど、全ページは見ませんから検索で引っかけなければ見落とされてしまいます。自分の商品をみんながなんて検索するか考えないと、そーなりがちです。</p>   |
| PC-46 | <p>集配局(大体大きな郵便局です)に持っていくと曜日・時間も関係なく受け付けてくれます。私も郵便事故予防のためにポスト投函しないので、近くに無いと結構大変です。ゆうパックなら集荷もあるし代理店(コンビニ・米屋・文房具屋・八百屋などの商店)に持ち込みでもOKです。↑お近くのお店でのぼり立ってたりしませんか？うちの近くは文房具屋です。</p>  |
| PC-47 | <p>解約は可能でしょう。契約書の装備欄などにABSと書かれていれば、話が早いと思いますよ。もし書かれていない場合には、揉める可能性が高いでしょう(言った、言わないになる</p>  |



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|       | <p>でしょう?) 解約できれば、ほとんどのお金は返ってくると思いますが、登録費用(車庫証明とか名義変更)など納車準備の為に実際にかかった費用は難しいかもしれませんね。出たところ出たら・・・ではなくてそのお店と上手く話しをする事をお勧めします。貴方がもしA B Sの装備にもし、目をつぶれるのなら価格の交渉が出来るでしょう? 私なら10万以上は値引きをしてもらって乗るでしょうね。</p>  |
| PC-48 | <p>テレビ局的には番組宣伝にもなるし、迷惑は被っていないと判断されたんでしょ。著作権法上、違法性はなくなりました。後は、商標法に違反する場合がありますので、実売されているビデオかDVDのパッケージに似せて売っているなら、購入後、被害届けを出すことは可能です。だれも迷惑をしていないのに、なぜ怒っているのか、なぜ出品者を犯罪者に仕立て上げたいのか・・・そっちのほうが違法性がありそうです。</p>  |
| PC-49 | <p>落札者としては少しでも安く考えるのは当然ですからそうは書いてもダメもとで質問したり、要求したりするのは仕方のないこと。どんな言葉並べても減らないと思います。基本的に定形外不可にしておいて、質問などがきたら「定形外の場合、不着なども含めて一切の責任は取りかねます。それでよろしければ定形外で発送します」って形にしては? どちらにしても、質問そのものをなくすのはムリばい。最終的に返答するのがめんどくさいってことなら、そんな内容を商品説明に記載して定形外を条件付OKにするしか・・・。</p> |
| PC-50 | <p>利用制限中の方は、落札の権利がありませんので、落札者として画面に表示はされませんが・・・落札後に、利用制限中となった場合はこうなるのかな。削除してもいいでしょうね。どうせ相手からは評価できませんし。次点繰上げなら、次点者の落札額×3%が手数料です。</p>   |
| PC-51 | <p>別に、会いたくはないがふと、幸せに暮らしているのかなあと思う時もある。</p>  |
| PC-52 | <p>うちの中を写りこませているわけでもなく、家族が写っているわけでもありませんから別に気にしませんが・・・&gt;転売はかまわないのですが、写真くらい自分で撮れよ・・・。ならば、その旨をお伝えしましょう。出品画像には、よく見せるための工夫や上手な撮影方法などで、著作権が認められます。無断で使用されたら、ヤフーに通報すればオクを削除してくれます。</p>  |

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| PC-53 | <p>かんたん決済は株式会社ネットラストの支払い代行サービスです。落札者が支払うのは出品者ではなく、ネットラストにです。銀行の場合は、ネットラストへ送金クレカなら、ネットラストから請求があったらクレカ会社から支払い、カード会社からの請求であなたの口座から引き落としです。どちらの支払方法でも、ネットラストは翌々日には出品者に支払いを実行します。また、支払い代行サービス業ですから、支払いの契約をしておきながら落札者の口座残高不足などで、あとから 支払えません なんてことはありえません。そうなった場合、裁判所に申し立てれば支払いは履行されます。信用が第一の業務形態なので、そういったことは起きる筈もありませんが・・・</p> |
| PC-54 | <p>かんたん決済は株式会社ネットラストの支払い代行サービスです。落札者が支払うのは出品者ではなく、ネットラストにです。銀行の場合は、ネットラストへ送金クレカなら、ネットラストから請求があったらクレカ会社から支払い、カード会社からの請求であなたの口座から引き落としです。どちらの支払方法でも、ネットラストは翌々日には出品者に支払いを実行します。また、支払い代行サービス業ですから、支払いの契約をしておきながら落札者の口座残高不足などで、あとから 支払えません なんてことはありえません。そうなった場合、裁判所に申し立てれば支払いは履行されます。信用が第一の業務形態なので、そういったことは起きる筈もありませんが・・・</p> |
| PC-55 | <p>かんたん決済は株式会社ネットラストの支払い代行サービスです。落札者が支払うのは出品者ではなく、ネットラストにです。銀行の場合は、ネットラストへ送金クレカなら、ネットラストから請求があったらクレカ会社から支払い、カード会社からの請求であなたの口座から引き落としです。どちらの支払方法でも、ネットラストは翌々日には出品者に支払いを実行します。また、支払い代行サービス業ですから、支払いの契約をしておきながら落札者の口座残高不足などで、あとから 支払えません なんてことはありえません。そうなった場合、裁判所に申し立てれば支払いは履行されます。信用が第一の業務形態なので、そういったことは起きる筈もありませんが・・・</p> |
| PC-56 | <p>かんたん決済は株式会社ネットラストの支払い代行サービスです。落札者が支払うのは出品者ではなく、ネットラストにです。銀行の場合は、ネットラストへ送金クレカなら、ネットラストから請求があったらクレカ会社から支払い、カード会社からの請求であなたの口座から引き落としです。どちらの支払方法でも、ネットラストは翌々日には出品者に支払いを実行します。また、支払い代行サービス業ですから、支払いの契約をしておきながら落札者の</p>   |

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|       | <p>口座残高不足などで、あとから 支払えません なんてことはありえません。そうなった場合、裁判所に申し立てれば支払いは履行されます。信用が第一の業務形態なので、そういったことは起きる筈もありませんが・・・</p>  |
| PC-57 | <p>かんたん決済は株式会社ネットラストの支払い代行サービスです。落札者が支払うのは出品者ではなく、ネットラストにです。銀行の場合は、ネットラストへ送金クレカなら、ネットラストから請求があったらクレカ会社から支払い、カード会社からの請求であなたの口座から引き落としです。どちらの支払方法でも、ネットラストは翌々日には出品者に支払いを実行します。また、支払い代行サービス業ですから、支払いの契約をしておきながら落札者の口座残高不足などで、あとから 支払えません なんてことはありえません。そうなった場合、裁判所に申し立てれば支払いは履行されます。信用が第一の業務形態なので、そういったことは起きる筈もありませんが・・・</p>   |
| PC-58 | <p>説明するとおそらく逆効果です。電撃文庫を始めとする「ジュニア小説ならではの面白さ」をきっちり説明できれば問題ありませんが概要を説明するとたいていは「オタクくさい」「マニア？」という反応をされます。カバーをつけるなどして読みましょう。どうしても「ジュニア小説も面白い！」という事を分からせたければ乙一氏の作品などは一般の小説に近く、その効果があるかもしれません。</p> <p><a href="http://www.amazon.co.jp/exec/obidos/ASIN/4044253013/qid=1085925474/sr=1-6/ref=sr_1_10_6/249-2398312-4298728">http://www.amazon.co.jp/exec/obidos/ASIN/4044253013/qid=1085925474/sr=1-6/ref=sr_1_10_6/249-2398312-4298728</a></p> |
| PC-59 | <p>兵器に使えることもないんですが・・・基本的にゲーム専用機のCPUですから画像処理能力はペンティアムなんかより数段上です。現在の高速PCと比べても遜色ありません。1000円程度で手に入るなら、(知識さえあればですが) 画像系の情報処理機を作るにはもってこいですね。いまどきのミサイルは画像処理を的を自分で探します。そういった意味でなら、兵器の部品にもなります。</p>   |
| PC-60 | <p>かんたん決済は株式会社ネットラストの支払い代行サービスです。落札者が支払うのは出品者ではなく、ネットラストにです。銀行の場合は、ネットラストへ送金クレカなら、ネットラストから請求があったらクレカ会社から支払い、カード会社からの請求であなたの口座から引き落としです。どちらの支払方法でも、ネットラストは翌々日には出品者に支払いを実行します。また、支払い代行サービス業ですから、支払いの契約をしておきながら落札者の口座残高不足などで、あとから 支払えません なんてことはありえません。そうなった場合、</p>  |

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|       | <p>裁判所に申し立てれば、仮に落札者が自己破産していても、支払いは履行されます。信用が第一の業務形態なので、そういったことは起きる筈もありませんが・・・</p>   |
| PC-61 | <p>何とも人の心は自分自身にも摩訶不思議だからね。俺なんか、母が亡くなった報告を近所の奥さん達にする時にへらへらと笑い、ジョークを言いながらだった。・・・こんな話は、他人には面白くないだろうとサービスしたつもりだったんだが、警察は来たのかとか・・・疑われた気もする。浴槽での溺死（だと思う）。</p>   |
| PC-62 | <p>3日で警告5日で期日きめて削除メール7日で削除・・・。連休などの場合、不在とかってこともあるので明日の夜に連絡こなかったら確認メールしてみては？普通は、いえあけること分かってれば質問欄からなんかいってきますけどね・・・普通。</p>   |
| PC-63 | <p>悔しいでしょうね。あなたがやる気があれば警察に届け出てください。男性同士の作品でもモザイク無しの作品を売ることは法律で禁止されています。・ビデオの現物・輸送してきた封筒（箱）・送金した証明書（振込み書）・Yahoo オークションの内容のコピーを持っていきましょう。証拠さえそろっていれば間違いなく警察は動きます。あなたがはじめからモザイク無しを求めていたなら、あなたには一切罪に問われることはないので安心してください。間違っても相手を「警察に訴えるぞ」などと脅してはいけませんよ。それだけで恐喝罪になる可能性もありますので。</p> |
| PC-64 | <p>尼崎は関東で言うと川崎みたいなところで、ダウンタウンの出身地でもあり庶民的なところですが、どうも尼崎は工場地帯でイメージが悪いみたいです。今はだいぶ変わってきてるのですが。尼崎に移り住んできた人は尼崎にすんでいるというのに抵抗があるみたいです。山手の阪急沿線沿いの塚口なんかは高級住宅がたくさんあるのですが、みな尼崎といわずに塚口に住んでいるといってます。そういう私も塚口のマンションに住んでますが。</p>   |
| PC-65 | <p>農業を継がれる方はいないのですか？転用して造成をして宅地にすると土地の評価額が一気に跳ね上がります。今のうちから相続税対策をしておかないと相続税が払えない、などという危険性も出てきます。最近では税務署も物納を中々受け付けてくれませんので・・・。譲渡するにも問題が色々あります。まず最初に、税理士に相談してから決めてください。転用してからではどうしようもないこともあります。</p>   |

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| PC-66 | <p>1, 高速道路・有料道路・一般道共に、違反に成ると思います。一般道で駐車等のために必要最低限バックするのなら大丈夫だと思います。2, 私道・私有地が、道路として機能していたり、誰もが簡単に入る事が出来れば検挙される。私道・私有地が、柵などで入る事が出来ない様になっていれば検挙されない。ただし、その土地の所有者に許可を得ていない場合は、他の法律で検挙される可能性があると思います。あくまでも、私感です、2の回答ですが、以前雑誌に、この様な感じに書いてあったのを読んだ気がします。</p> |
| PC-67 | <p>私も整理整頓がすごい苦手です。友達に時間で区切って整理する方法を教えてもらって、タイマーを買ってきてやってみると、かなりはかどりました。例えば、タイマーを10分に設定したら、10分間集中して部屋の片付けに入ります。私はその間事実上面会謝絶状態で、電話も一切取らずに徹底的になっちゃいます。宅急便とか以外は誰が来てもシャットアウト、というかインターホンが聞こえないくらい集中するんで・・・。タイマーは安いのなら500円、高いのでも1000円なんで、一度お試しあれ。</p>         |
| PC-68 | <p>うちは、冬生まれの長女は寒がりなのに、夏生まれの次女は暑がり。生まれた季節に関係あるのかどうかわかりませんが、次女の時は、ずっとクーラーをかけっぱなしで育てたからかな・・・なんて考えてしまいます。今でさえ、次女の暑気りはだいぶましになりましたが、幼稚園ぐらいまでは、3月頃からクーラーを入れないと寝ませんでした。(ちなみに大阪です。)でも別に病気ではありません。どうしても気になるなら、ひとまず保健所の電話相談などに尋ねてみられては?</p>                       |
| PC-69 | <p>「検索オプション」でヤフーIDを入れれば見れます。</p>   |
| PC-70 | <p>郵政公社職員です。郵便局窓口へ送付するものをお持ちください。ラベルに必要事項を書いていただくだけで、すぐに発送出来ます。印鑑も身分証明書もいりません。</p>   |
| PC-71 | <p>ほかの方がご指摘の通り、単に1円で販売したくないから2100円でどうかというメールが来たのだと思います。質問に記載のことは評価に書いてみてはどうでしょうか。もちろん、評価は悪いまたは非常に悪いです。</p>   |
| PC-72 | <p>新居にADSL回線の空きが無く、仕方なく、光に変更した者です。以前は、実質4メガ程度でしたが、今は80メガ程度で常時接続できています。何が変わったか、と言われれば、支払うお金が増えた(以前の倍近く)。だけです。ダウンロードするような物も無く、実感全くわきません。今でも、必要ないなーと思っています。普通に使っている人(たとえばインターネット、メール、ゲーム等)に、使い道あるのか、こっちが聞きたいです。ADSL</p>                                   |

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|       | の空きがでたら、切り替えるつもりです。フレッツ安くなったら考え直しますけど。  |
| PC-73 | 「名前を付けて保存」が一番手っ取り早いかな。全部プリントするのもなあ…資源の無駄ですしね。自分でやった事ないけど、これで多分平気。マメに管理したいのかな？理由が凄く気になる（笑←いつも終わると即削除）  |
| PC-74 | 300円で購入した犬の洋服が約2万円になりました。私自身びっくりしてしまって・・・締めきり間近に上がったなら程よいところで早期終了するのですが、締め切り2日前くらいのウォッチしていない時にあがってしまって。おまけに落札者と競ったのは実績0の人。何事もなく取引を終えたのですが、いまだに落札者からの評価は貰えずじまい。たぶんサクラを使ったと思われるな～聞かれば弁解するのですが、自分から言い出すのもおかしいし。もやもやが残ってます。   |
| PC-75 | ムゲも無い態度ですね。血液型に興味がなくても、女性は相手から嫌われたくないのでそれなりの返答をするものです。また、貴方がそう思われたのには、日頃からの態度もあるのでは？  |
| PC-76 | 出品者にクレームをつける気がないのなら、評価は悪くてもいいでしょう。ノークレーム・・・であっても、クレームを受け付けてくれる方もいらっしゃいますよ。メールで問い合わせしてみても？その上で、あらためて評価は考えましょう。電池付きなので動作確認はすぐに出来る状態にもかわらず・・・出品者には、誠意は感じられませんが(^_^;  |
| PC-77 | 評価できない（都合がつかないなど）か評価したくない（悪いイメージがあるが報復されるのがいや）などかな気にせず、あなたの思ったことを評価にしてください。入金後、かなり経っていますから無事到着しているのは間違いないと思います。届かなければ、その前に落札者が騒ぎます。「発送から2ヶ月が経過しておりますので無事届いているものと解釈させていただきます。今回はお取引ありがとうございました。」でいいのかな。評価をもらえないので・・・という理由で相手の評価を下げるのはどうかと思いますよ。って2ヶ月経っても評価ってできましたっけ？ |
| PC-78 | 特別なつてのない状態で始めるのはかなり難しいと思います。資金が有り余っているなら、採算度外視で問屋廻りをして良いですが、フリーで行って買える所は実際問題誰でも買える、ということです。海外から1箱いくらず、流行のものを毎日仕入れている現存の店舗にはかないませんよ。消費者もなかなかですからね。ひとまず、アパレル業界に従業員として従事する。ここから始めましょう。   |

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| PC-79 | 何でも開き直る・居直ることがストレス解消への近道だと思ってます☆  |
| PC-80 | 自分とつり合いそうだから告白しようなどと思った事は43年生きてきて一度もありやしませへん。好きになったからいい女だと思ったからお話しもしたいからデートもしたいからついでに裸も見（以下自粛）貴方の良さを認めた異性がいる事にもっと素直に喜ぶが良い。・・・・・・・・・・・・・・・・by 中年汁  |
| PC-81 | 所得金額は記載しなければなりません。収入金額から公的年金等控除額を引いた金額が所得金額になります。前の方は介護保険料も引いていますが、明らかな間違いです。障害者控除も引いてはいけません。税金の計算上は考慮しますが、この所得金額は、扶養になれるかどうかの判定に使うものですから、所得税法上の合計所得金額を書かねばなりません。介護保険料、障害者控除は、この合計所得金額から引くものです。公的年金等控除額は、65歳未満と以上で金額が異なります。収入金額が65歳未満でしたら108万以下、65歳以上でしたら178万以下でしたら扶養親族になれます。所得金額は38万以下になります。 |
| PC-82 | 12歳の少女が顔面などにアメリカ軍から暴力を受けてお兄さんに助けを求めたらしいです。それがいつの間にかレイプにすりかわってきたとの事。レイプはアメリカ軍がイラク男性捕虜に無理やりイラク女性をレイプさせたのです。イラクではレイプは最も重い死罪にあてはまる一番卑劣な罪なのであえてアメリカ軍はイラク捕虜に虐待行為としてやらせたのです。アメリカは狂ってます。  |
| PC-83 | 2ヶ月以上続く咳を慢性咳嗽といいます。痰を伴うかどうかで「湿性咳嗽」「乾性咳嗽」に分けられます。あなたの場合は後者と思われるのでこれについて説明します。まず呼吸器科で胸部写真を撮影してもらいましょう。写真で異常がある場合の原因としては、肺癌・肺結核・肺線維症・肺過敏症などがあります。写真で異常が見られないものとして、後鼻漏・気道感染後遺症・咳喘息・鼻ポリープ・好酸球性気管支炎・薬物副作用・胃食道逆流症などがあります。いずれにしろ専門医に相談されることをお勧めします。   |
| PC-84 | 平民がほとんどの日本では多妻制にすると喧嘩が始まると思う。いい女だけを抱えたいのは誰しも同じだから。ごく少数の権力者にのみ許された特権なら良いが。   |
| PC-85 | ドキドキもありますが ワクワクもあります。出品の醍醐味ですから、思う存分楽しんでください。納得されている値段なんですから、あなたの出品物には それだけの価値があったということでしょう。思いがけない値段で・・・などとメールに書かないように。だったら送料負けるとか、いろいろいわれます。事務的に処理したほうがいいですよ。  |

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| PC-86 | <p>空気の伝わるスピードが変わるからです。密度の小さいヘリウム中を進む音の速さは高くなるのです。空気中では1秒間に約330mの速さで伝わる音が、ヘリウム中では1秒間に約970mの速さで伝わることになります。反対に比重の重たいクリプトンガスを吸うと、声が低くなります。（音の伝達スピードが遅くなるから）</p> <p><a href="http://www2s.biglobe.ne.jp/~n_kawa/science/helium/helium.htm">http://www2s.biglobe.ne.jp/~n_kawa/science/helium/helium.htm</a></p>                       |
| PC-87 | <p>給与を貰っているのですでしたら、その会社の社員です。会社に属していることにはなりますが・・・そうであれば、所得税は年末調整をしなくてはなりません。もしそれをやっていないのですでしたら確定申告をする必要があります。建設関係の人は一人親方という立場の人がかなりいます。一人親方であれば個人事業者で確定申告義務があります。一人親方なのか、給与所得者なのかは大変な問題です。一人親方といいながら給与という名のお金を貰って申告をしていない人を見受けられます。会社に調査が入ると必ずばれます。最低でも5年間は遡られます。まず所得税の課税関係が適切に行われているか確認してください。今年うちの下請けさんが同様の問題で大変なことになりました。</p> |
| PC-88 | <p>ファミポートから出てくるレシートみたいなものにも、AとEをお客様にお渡しするように書かれています。適当に入れていいんじゃないの？後は、郵便局がやってくれると思うし、Aだけあれば、荷物は届くわけで、他のがないと困るのはファミマの方なんだし・・・</p>   |
| PC-89 | <p>どうしても修復したい？本当に？やめといたほうが・・・。次さがしたほうがいいよ。</p>   |
| PC-90 | <p>&gt; 「到着の連絡は評価にて・・・」て書いてくる出品者に好感が持てません。これはなぜ？メールで到着連絡&amp;お礼をいう 評価でお礼をいうこの二つを評価で連絡だけでいいと言ってくれてるのが不満ですか？相手の方ですが、評価1200ということは、一日の取引数もかなりあるんでしょう。一件一件評価が来たら、返事の評価・・・なんてしてませんよ。月末にまとめて、コピペの評価が普通です。</p>   |
| PC-91 | <p>お気持ち良くわかります。私も3年程前に離婚しましたが、急に人恋しくなる時がありました。一時期はネットを通じてのやり取りで気を紛らわしたこともありましたが、突然無機質な感覚に襲われ余計に寂しさを感じる時があり、ネットには頼らず外に目を向けました。その点では私は結婚しても故郷に住んでいたもので、近所に子供の頃からの友人がおり、何かと話す機会があり友人といつでも会えることが幸いとなりました。つきなみですが、仕事場・ご近所・子供の学校関係・趣味の場などの友人と会うことが、気持ちの整理がつく一つの方法だと思いますよ。</p>  |



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| PC-92 | <p>出品者にとっては自動延長をつけないメリットなんてありません。指定した時間に必ず終了するってことくらいでしょうか・・・出品時のデフォルトでは、自動延長ナシになっています。あえてアリに変えないといけないので忘れる人がおおいんだと思います。</p>   |
| PC-93 | <p>事業としてやっているのかそうでないのかで全く違います。通常有価証券の譲渡に関する所得は、「株式等にかかる譲渡所得等の金額」という別課税標準になります。事業といいますのが、貴方の事業は何ですか？有価証券の売買が事業的規模といえるためには、株式の売買だけを専門的に行っていることが必要です。その場合は「株式等にかかる事業所得等の金額」という別課税標準になります。通常の個人事業主で株の売買もやるという程度ではこれには該当しません。「株式等にかかる雑所得の金額」という別課税標準になる可能性もないわけではありませんが・・・</p>  |
| PC-94 | <p>匿名ですので、Q&amp;Aよりはツッコミしやすいと思います。IDは一切公開されません。出品者にもわかりませんし、閲覧者にもわかりません。どんな種類のアドバイスなのかと、コメントだけ閲覧可能です。出品者に通知などはありません。自分でオークションページを見て、利用者からのアドバイスをクリックしなければわかりません。一応、ヤフーが削除するか否かの判断材料にするということです。</p>   |
| PC-95 | <p>当たり前のことでも、わざわざ書かれると入札する気がなくなるのは、わたしだけでしょうか・・・&gt;ご連絡は3日以内、ご入金は5日以内でお願い致します。諸事情で遅れる際はご連絡をお願い致します。守って頂けない方は落札者都合で削除することもありますのでご了承下さいこう書いてくる出品者に限って、自分からのメールは遅くなりがちだと思っているのも、わたしだけでしょうか・・・</p>   |
| PC-96 | <p>大原・三千院の門前をそのまま通り過ぎて、突き当たりのすぐ左手にある宝泉院という小さなお寺。普通の玄関みたいどころあがって、普通のおうち風の廊下の突き当たりが本堂。そこの二方が全面窓で、そこからの借景が素晴らしいです。たしか10年くらい前に、参観料500円でお茶とお茶菓子がついていました。ひざを抱えて、ぼーっとしてしまいました。そこのご住職がねこ好きで、訪ねたときとてもいいお天気で、縁側でご住職とねこが遊んでらしたのに加えてもらい、炉辺のある部屋で、特別にお茶をご馳走になりました。多分、季節としては、やはり春と秋がいいんじゃないかと思いますが、穴場です。と思っていたのですが、以前テレビで紹介されてしまいましたので、ひょっとするとメジャーになっちゃったかも・・・</p> |

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| PC-97  | <p>もともと生き残る人を決めるときその確率は <math>1/3</math> である。①C が生き残ることになる確率は <math>1/3</math>。(A 処刑ケース)その前提でBが「処刑されるよ」と言われる確率は <math>1/3 \times 1 = 1/3</math>②A が生き残ることになる確率は <math>1/3</math>。(A 生存ケース)その前提でBが「処刑されるよ」と言われる確率は <math>1/3 \times 1/2 = 1/6</math>B が「処刑されるよ」と言われる事象は上記の①か②のときでありその条件付きのAが死ぬ確率は <math>1/3 / (1/3 + 1/6) = 2/3</math> である。この事象をもっと分かりやすくすると、1億人のうち1人だけ宝くじが当たる。自分以外 99999999 人は絶対死ぬのだから、そのうち 99999998 人を教えてもらえば自分の当たる確率が <math>1/2</math> になる・・・って言うのと一緒。死後の世界はあるかないかだから <math>1/2</math> だっていうのとも・・・</p> |
| PC-98  | <p>貴方のような方は、ホンの一握りになってしまいました。最近は、「評価で・・・」と言っても何も言ってこない人が多すぎます。黙っていれば本当に何も言ってきません。ましてやメールまでくれる人は殆んどいなくなりました。せめて到着しましたくらいのメールは欲しいものです。そういう意味を込めて「評価でかまわないから・・・」と言う文句を入れています。</p>   |
| PC-99  | <p>出品者のほかのオークションを見る気がなくなるくらい・・・常時 200 点もあればセミプロかなあ。評価の数は気にしません。1000 あると おっ って気になりますが、ヤフオクは販売評価と購入評価が分かれていますから区別が付きませんよね。セミプロはマイルールが多い一人で切り盛りしてて、客のわがままに対応しきれないってことだと思いますが、これだから取引もしたくなります。</p>   |
| PC-100 | <p>ポケてもいいから可愛らしいおばあちゃんになりたいです。おじいちゃんおばあちゃんになっても手をつないで買い物に行ったりする。夫婦でありたいと思います。</p>  |

**Table C-5: A Set of Question and Answer Statements (Love, English Version).**

| ID     | Statements   |
|--------|--|
| Love-Q | <p>I'm planning to see a guy I used to date, but I haven't seen him in a long time. It is long time no seeing him and just meet him, I suppose it is the same for him too. I am living in Nagoya, and he is in Tokyo. Is that too far to see him more often?</p>                       |
| Love-1 | <p>As you have mentioned, that will be a benefit for a trader. As mentioned before, there is no recycling site only for pianos. Search for "recycle" and then for a bulletin board for disused articles. There might be a piano among them. It will take you some time to find it.</p> |

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| Love-2  | It will be “very good” if it is packed inside out. Is there any discontent? It is not strange to be asked to pay for packing charge if it is packed with plain cardboard. You should not purchase from individual exhibitors if you hope for such a packing.   |
| Love-3  | Nonstandard-size and normal is the same. Notice of absence is left if bigger than the size of a post box. A young part-time job guy sometimes leave it on the entrance. Recently it is usual to be put into a post box. By the way, do you get mail-order business books or subscription catalogs with vinyl? They are usually packets for booklets. Are some thick books piled near the entrance? |
| Love-4  | How about replying: I’m sorry to tell this but we do not accept prior termination, so please wait until finished.  |
| Love-5  | It is inevitable for you to pay so long as it is written in the article explanation. You will absolutely lose even if you sue. If the article is not something you must purchase from the exhibitor, mail him/her: “I’d like to cancel because transactions might be hindered as it is. This will be revealed in my evaluation of you.” He/she might compromise in that case.                      |
| Love-6  | A successful bidder must be sensible. Is it just you forgot to write about it in the auction page?<br>Half is possible if nothing is written.<br>↑ I was talking about carriage. But it can be a target for claiming, so you should write something.   |
| Love-7  | Regardless of brands, how about buying after you see and touch it, and confirm that it can contain a lot of things. If I am simply asked which is better, Dior or Vuitton, I think Vuitton is better because it looks tougher.   |
| Love-8  | You should write: “I bid at this price because it included the carriage fee. I cannot accept at that price if additional fee is necessary. If necessary, I will cancel the deal.” You should reveal it in the evaluation.  |
| Love-9  | It can express either laughs or a string of hearts. Why don’t you ask her?   |
| Love-10 | There was a user who earned scores by answering “It is difficult.” to all the questions on business categories, which makes ranking meaningless, I suppose.  |
| Love-11 | What about depositing in banks? You can do by using machines. At the windows, you will need to have a written agreement that you will not have any objection to the money counted by banks.  |

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| Love-12 | Can you confirm the receipt of money now? Have all the money refunded with the addition of his/her bank transfer fee. He/she should not complain (except that he/she spent wasteful time). If you think it is not your fault, how about refunding it subtracting your bank transfer fee? And if you can win at court...      |
| Love-13 | There is no merit to making a cash card if you are twenty or over and have a regular occupation. Instead, get a credit card. Neither annual fee nor issue fee is necessary. You cannot make a credit card if you experienced personal bankruptcy within the past five years. In that case, please hold on to your cash card. |
| Love-14 | Nope! I have come to purchase most items from here, from clothes to work-related items. I have no desire to buy high priced items. What will I do if auctions go extinct?  |
| Love-15 | At a school that absolutely bans Walkman, a serious student goes to school listening to it for studying English conversations every day, and it is known to everybody but hidden. Or teachers who are aware of that also overlook it.  |
| Love-16 | It is unclear to say CPU use rate, but you can know it on "Performance" tab as you can execute a task manager by pressing CTRL, ALT, and DEL buttons on Windows XP.  |
| Love-17 | Payment on wallet... I use e-Bank but have got no contacts at all. It has been almost two years. It is actually withdrawn, though.   |
| Love-18 | This is a very troublesome way, but I only come up with handwriting input... Isn't there any free software keyboards? Let's look up a little bit.<br>↓ It was normally attached with IME. I did not know that...   |
| Love-19 | I have heard that pigeons hate vinegars. How about putting each cup at the stores where they do droppings. I hope it works.  |
| Love-20 | If you have any obsessions, I think you ought to find your favorite one by really putting it in a pocket at stores. As it is not a machine, there can be some mistakes like missing 1, so I suppose it is better to put it in a bag or exhibit it again, isn't it?   |
| Love-21 | It is obediently all right to evaluate "bad," isn't it? You should write I cannot contact you.... As for revenge evaluation, you ought to write reasons for the bad evaluation in the reply column. If you write "the revenge for that," others can obviously understand whose fault it was.                                 |

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| Love-22 | It is either business activities or earning contributions. You should request for deletion one by one if you find it. On this business category, there was a user who earned his contributions by copying and pasting answers “It is a very difficult problem.” or “That issue makes me think a lot.” to all the questions.  |
| Love-23 | That you are awake at this time means that you must sleep early as well? Why don’t you do something late at night?   |
| Love-24 | Why do you pour in Tropical Gold? Is something wrong? Pouring in medicine despite no symptoms is equal to giving a poison. Are they teased with other fish? Is there any trace that they eat waterweed? What about consulting with stores?   |
| Love-25 | It is only exhibitors who can manipulate cancellation. This reason will be dealt with the circumstance of the bidder. You would send an-email saying like this: “I made a successful bid with the consideration of shipping charges. You seemed to exhibit under the pretext of the exhibit area on purpose. In evaluating you, I would have to reveal the cancellation due to the circumstance of the bidder, if you deal with it in that way.” |
| Love-26 | The account of a payee? Do you mean you have the person you deal with receipt deposit? If he/she has the account of e-bank, please tell him/her your account number of e-bank. If you do not have it, the account will be deposit money account, but the account holder is not in your name, so you are apt to run into trouble. On the exhibition screen, you should check boxes only on e-bank payment and easy payment.                       |
| Love-27 | Of course. Some throw a lighter with a fire into a post box, and the car that collects from the post box might have an accident. There was an incident that a key to the post was destroyed and stolen. You do not have to worry about the risk if you take it to the window. There could be a possibility of your getting into an accident, which is not counted as a postal accident.  |
| Love-28 | It is also a way to dare to bid. Is a picture attached? How is its background? I think you need not doubt if the picture seems to have been taken by the exhibitor by oneself and the background appears to be his/her home. While there is a risk of a newcomer bidder, an exhibit can be gained at 1,000 yen or below which is usually at 3,000 yen or over.   |
| Love-29 | A digital scale to weigh. It is convenient as to display at 1-gram unit. It is covered with a small/middle/large plastic bag for water proof. Bubble wrap. An envelope according to luggage.   |

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|         | <p>It is sold at hundred-yen stores. Thick paper and corrugated cardboard are needed for items that must not be folded. These are necessary things. I think you should take the same procedure of sending as you did for the successful bid. This order: "Sending a mail of bid, confirmation of receipts, sending items, and then evaluation." You only have to get used to it. Good luck!</p>  |
| Love-30 | <p>It is wrong to send without confirming receipts just because you were in a hurry. You should have been contacted from the evaluation... a good experience, isn't it?</p>  |
| Love-31 | <p>Jacky Satoh (already deceased) and Maki Ueda. I long for them. I suppose on their debuts they were a hurriedly constructed pair as substitutes for a challenger of the title match who could not appear. Then I remember them winning and becoming popular.</p>   |
| Love-32 | <p>It does not matter because "Is it ...?" can convey many meanings, can't it? You can download a driver at websites of the manufacturer for a printer. The name of manufacturer is written in front of the printer, so please look for it.</p> <p><a href="http://knowledge.yahoo.co.jp/service/question_detail.php?queId=18318">http://knowledge.yahoo.co.jp/service/question_detail.php?queId=18318</a></p>   |
| Love-33 | <p>There is no way to distinguish. It is a rule to deposit after confirming the address and contact. You should stop dealing with an exhibitor who does not tell you the information.</p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a></p> <p>The example where the compensation system of Yahoo! is not applied: That where you dealt with the person without confirming his/her name, address and phone number.</p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a></p> |
| Love-34 | <p>"To→Dear→To" means that you reuse one envelope? Anyway, the mailman would be surprised to see that "To" was modified as many as two times. It looks like fighting. How about erasing "To" using a whiteout and rewriting? I think all does not mean so, and rewriting is free from problems. I would rewrite. It is troublesome, but a minimum etiquette, no?</p>   |
| Love-35 | <p>Doesn't it violate shop regulations? If not, it is not a problem. Taxes will be exploited more by the increase of income. A salaried employee would feel more subtracted as withholding taxes are deducted as the money of Otsu column. You must do final return if the income is over 200,000 yen. Final return means automatically reporting resident taxes. There is no problem so long as you join the welfare pension. For the case of national health insurance, a premium next year will increase, accompanied by the increase of incomes.</p>   |

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| Love-36 | <p>Isn't Texteditor enough? There is one with which you can treat a text format and save...<br/> VerticalEditor (Textedit with hierarchy) <a href="http://truestories.hp.infoseek.co.jp/">http://truestories.hp.infoseek.co.jp/</a><br/> BeatWord (word processing software) <a href="http://www.cypac.co.jp/beatword/Vertical">http://www.cypac.co.jp/beatword/Vertical</a><br/> They have little faults. Beatword is a word processing software, but unexpectedly it is light and easy to use. Either one depends on what you like.</p> |
| Love-37 | <p>You just have to confirm when you tell the mailing costs like "Then is it all right to send on Sagawa Express?"</p>  |
| Love-38 | <p>For the time being, just put the user into BL. He/she cannot bid any more if someone hits a new higher price. If he/she still remains at the last moment, next is to delete a bidder. If you delete now, the price may fall at an initial price as it is recalculated without his/her present.</p>   |
| Love-39 | <p>You say the rule is stricter, but you sent an item whose width is originally at most 2 centimeters? That's a rule from the beginning.</p>  |
| Love-40 | <p>That may be a crime to get Yu-pack seals. If you see the luggage that has arrived, carriage discounts might be applied. Please reveal this in the evaluation column.</p>   |
| Love-41 | <p>We cannot use Yahoo! Yu-pack in Hokkaido...</p>  |
| Love-42 | <p>According to a magazine of cell phones at a convenience store, it will be sold at the beginning of June. It is less reliable, though...</p>  |
| Love-43 | <p>He/she tried to sell as he/she came up with an idea of earning some cash. You should try it to see if it is really possible, and that would mean you need not earn small money on auctions, wouldn't it?</p>   |
| Love-44 | <p>&gt;I cannot control a successful bidder who asked me to send by mails despite the width of the item is obviously over 2cm?<br/> Are you a fool? What is it that you cannot control? You just decline the offer.<br/> <a href="http://pt.afl.rakuten.co.jp/c/019b3c3b.334f4a77/?url=http://www.rakuten.co.jp/kamasho/499854/614290/#599433">http://pt.afl.rakuten.co.jp/c/019b3c3b.334f4a77/?url=http://www.rakuten.co.jp/kamasho/499854/614290/#599433</a></p>  |
| Love-45 | <p>It is all right to think that, when it is finished and put on a baggage rack, the right of its possession is abandoned. Originally it was logic that the right of possession would be handed to the railway company afterwards...</p>  |
| Love-46 | <p>I feel sorry for Toyama Commercial High School. The right to protest to umpires should be</p>  |

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|         | allowed. There used to be a case where protests were impossible despite an obvious judgment as a homerun that was actually a ground rule double.   |
| Love-47 | An exhibitor evaluated “good” just because he/she was evaluated “good.” I think he/she has such a sense.   |
| Love-48 | I have heard a blood glucose level measuring instrument can be complementarily lent to those diagnosed as diabetes mellitus at hospitals. What about asking a hospital once?   |
| Love-49 | I understand your feelings, but you will not be trusted. I first just tell my bank account, but I do not tell my address and telephone unless I am asked. I have experienced nuisance phone calls... I will soon answer them if asked, but for the most part I will have my circumstances understood after explanations. You can open a bank account with your favorite name if you feel reluctant to have your actual name known through the name of account holder. (Identification cards are demanded. It is the same as having an account for the name of company.) You can easily do it at the window of banks. |
| Love-50 | Neither dubbing nor copying is prohibited. It is written on the package of videotapes that it is free from problems so long as you personally enjoy, isn't it? You must not sell. You leave a copied version at home and sell the original one. I hope that would not be exposed, but it is illegal according to the effect of a copyright law. Moreover, the copyright holder of a movie can be either a movie director or a production company. Usually a production company.  |
| Love-51 | As I have thrown my life too far, I have trouble looking for it. Where did it go... does anyone know anything?   |
| Love-52 | IDs will not be revealed but anonymous. Give advice one by one. It is a pity that notifications will not be sent to exhibitors. They must see the page. I am afraid mostly they do not...  |
| Love-53 | The location where Hijikata was killed is Hakodate, but it cannot be identified because there are several places. Kondoh was decapitated around the Nagareyama, wasn't he? It is said that his body was buried in front of Itabashi Station five minutes away from my house. There is a tombstone raised by Shinpachi Nagakura. Rebel army is the disparaging term given by the government army. They lost their lives, carrying out their loyalty to the Tokugawa shogunate.  |
| Love-54 | It is so old that I wonder if it works on XP? If another C-language is fine, freeware of C-compiler developed by Borland is recommended. <a href="http://www.borland.co.jp/cppbuilder/freecompiler/">http://www.borland.co.jp/cppbuilder/freecompiler/</a>   |



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| Love-55 | Does GIF has 255 colors...? It cannot be helped because the image with full color is converted into that with 255 colors. Since there is a software that can set the conversion regimes, how about searching for Vector?   |
| Love-56 | I feel more disgusted at those who cannot judge by themselves. Chiebukuro is a place to share knowledge, not a consulting service.<br>> May I do direct dealings?<br>Despite convention violations, you can at your own risk... It's a natural answer.   |
| Love-57 | Advertisement? Put it into a Watch if it is on your mind. The bid cost will be revealed after a deal is finished. And as it will be returned at the auction in session if exhibited again, you can see how much the price goes down.   |
| Love-58 | Yahoo! will send a bid notification saying "Do you agree with carry-over if a bidder deletes an item?" Without the agreement, your e-mail address cannot be known to an exhibitor. Your e-mail address is known to everyone other than the exhibitor if it is yahooID@yahoo.co.jp.   |
| Love-59 | Pour some water in a cup and make bubbles with using a straw for about one minute. If you smell it, that smell is similar to your breath.  |
| Love-60 | The point of your question seems ambiguous, but is the answer OK like this? Cue:<br><b>**You can bid at 1-yen unit if the price is over the sum of "current price" and "the price more than bid unit."</b><br><b>**You cannot bid over 100 times as high as "current price" except at an auction where it has "desirable buyout price" and "minimum buyout price."</b><br><a href="http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html">http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html</a><br><a href="http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html">http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html</a> |
| Love-61 | Oh ... I am sorry I have got excited... age 36 male<br>Disgusting... if a person knows you, she will change trains.  |
| Love-62 | It is "Miracle Landing," isn't it? I remember it being broadcasted on NHK. This takes up an aircraft accident brought by Aloha Airlines in 1988.<br><a href="http://www.airodyssey.net/articles/movie-ml.html">http://www.airodyssey.net/articles/movie-ml.html</a><br><a href="http://www.ntv.co.jp/FERC/research/20021124/kiseki01.html">http://www.ntv.co.jp/FERC/research/20021124/kiseki01.html</a>   |

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| Love-63 | <p>Please read a rule as to selling tickets.</p> <p>&gt; I will not get any complaints if I describe “No complaint is acceptable on seats as they are still undecided.”</p> <p>This way of exhibiting itself violates the guideline.</p>  |
| Love-64 | <p>The definition of “more or less” is a bit unclear, but you cannot do anything if “no claim, no return” is stated. You ought to be more careful next time.</p>  |
| Love-65 | <p>Is the statement true “I would like to stay in Iraq and act, it is the Self-Defense Force mission that is to blame?” If this is true, I would like to give a comment as I feel offended, but I refrain from answering because I have not confirmed the “statement” yet. Answers can be edited, so I will give a reply as soon as the statement is confirmed.</p>   |
| Love-66 | <p>Isn't “Please” for “Excuse me?” Mmm ... I guess...so...</p>  |
| Love-67 | <p>Outlet is basically such a system, but the attitudes of the exhibitor and the item descriptions are far from convincing. If you warn that his/her attitudes will be evaluated instead of evaluating him/her, the revenge evaluation will be weakened.</p>  |
| Love-68 | <p>It has something to do with the capacity of hard disks and vacant spaces. I stare at the screen, but I absolutely fall asleep.</p>   |
| Love-69 | <p>It is called 2ASCII art,” though not limited to 2ch. Human faces etc. can be expressed through using characters. Why don't you look it up with IT terms dictionary e-words or research?</p>  |
| Love-70 | <p>BA will not be decreased. It may be the bug of Yahoo! It can be corrected after pushing the reload button.</p>   |
| Love-71 | <p>I recommend you use cat-guards sold at shops. What about thinking of changing where to put them if possible. Cats like to cling to places.</p>   |
| Love-72 | <p>You cannot be a support on the aspect of taxes. Do you mean a land obtained through inheritance? I think a long-term holding is no doubt due to the unknown acquisition cost. (in case of inheritance, how much the deceased person got) A special deduction that deserves a million yen can be subtracted. As transfer expenses (brokerage fees etc.) can be also subtracted, capital gains should be decreased to some extent. Is the land used for a residence? Isn't there any possibility of a special deduction or a special example on taxation? Please consult with a tax accountant or a tax collector.</p> |

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| Love-73 | It is possible to evaluate it as a revenge despite the circumstances of the bidder... This exhibit violates the user policy. I am afraid those who can unconcernedly break rules cannot handle your deals and obey decent rules. You should stop bidding.   |
| Love-74 | It is easy for you to become jealous, but the person is jealous of you? You are not the person he likes? I cannot understand you.   |
| Love-75 | I think there is also Nenbutsu Odori. It is not bad to dance with sutras, is it? It would be a nuisance at funeral... but at a vigil everybody drinks and makes a fuss.   |
| Love-76 | It is good to have it searched and seen, but what is your point of having it seen? Seen several times? After that you get some order by telephone? The aim to search on the Internet varies. If your objective is to actually gather customers at your restaurant, conventional paper style advertisement is far more effective than that through Internet. It is OK so long as your aim is to update every day and have your site seen several times, but it is a waste to advertise your website using money if it conveys just "the introduction of a restaurant." It would be better to drop flyers in a newspaper to your neighborhood or make a standing signboard. |
| Love-77 | An additional consumption tax may be demanded for exhibits registered on stores, but you cannot additionally charge a consumption tax on the contract price. Some exhibitors intentionally or unintentionally describe "Additional consumption taxes will be charged." or "Please pay a system usage free," which are also violations. You do not need to pay the consumption tax on exhibits for personal registrants.   |
| Love-78 | What happens after pressing a down-pointing triangle right next to Return and selecting it? Do buttons on a mouse normally work?  |
| Love-79 | Similar answers are given because similar questions are posted several times. Sorry. He is sure to get excited immediately after being released and does not know how Japan is now. That's why I think it is unfair to accuse him of the statements at that time.<br><a href="http://f9.aacafe.ne.jp/~laut/iraq.html">http://f9.aacafe.ne.jp/~laut/iraq.html</a>  |
| Love-80 | I will absolutely scream "Yoo-hoo" at mountains too. "Yahoo..." I have heard of "Yahoo! Jin."   |
| Love-81 | Users you worry about should be listed in BL. Let's have a try at apologizing from Q&A. It would be fun.....if you cannot question.....   |
| Love-82 | I would like to introduce you, but unfortunately I have no acquaintances. So how about enlisting  |

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|         | in the U.S. Navy for yourself?   |
| Love-83 | If you are not told his/her address and name even though you ask him/her before deposit as well, writing up these results, you should lower his/her evaluation, saying like "Against my will, I would evaluate this degree due to very unsecure deals." The evaluation system originally must work for these cases.  |
| Love-84 | When I was in the first grade at junior high school (two years ago, it was about 3000).  |
| Love-85 | It does not matter so long as she thinks this is good, but I might feel sorry for men in the world if such girls make a fuss in trains or buses saying "molester." It is the same thing as you are saying "please look at me," isn't it?   |
| Love-86 | It is not always "necessary" to refuse receipt. You do not need to worry about virus while they are stamped out by a software for security measures produced by Symantec. But if there is a possibility that virus mails can affect interfere with your work, you might also think of introducing SPAM filter. (Please execute LiveUpdate little by little. Executable from "Start," "Program," "Norton AntiVirus," and "LiveUpdate.")   |
| Love-87 | For users 217695 and 214406. This is not an answer, but I would like to complain about your hypocritical statement expression. Shouldn't laymen change brake pads? As user 218488 mentioned, mechanic certification is unnecessary. I change pads, fluids, and brake hoses. Many people maintain their bikes and automobiles for their own. Responsibility? Rules for public roads? Those are entirely irrelevant answers for the questioner.  |
| Love-88 | For online payments, credit cards are available so long as you know its card number, name, and expiration date, even though you do not have a card. But I would like to know your intention to think of using online payments in spite of your anxiety.<br><a href="http://pt.afl.rakuten.co.jp/c/019eec7c.3df336ba/?url=http://www.rakuten.co.jp/humanbody/562766/542557/583879/#457248">http://pt.afl.rakuten.co.jp/c/019eec7c.3df336ba/?url=http://www.rakuten.co.jp/humanbody/562766/542557/583879/#457248</a> |
| Love-89 | It might be disadvantageous if compared with those who say "You can enter anytime," but some companies list "Hire date is negotiable" in the help-wanted advertisements. This is case-by-case, so if you have some companies in your mind, what about consulting with them?  |
| Love-90 | You say a feeling like part-time job, but were you hired by someone? The money during hired and that during your own business will fall into separate income classifications. The costs during   |

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|         | the hired period cannot be included in the total. Those related to your own business can be included even before June.   |
| Love-91 | At the end of several evaluations, I comment: "I'm done. I cannot continue writing any more remarks. I wrote sincerely. I would be glad if you laugh."   |
| Love-92 | <p>What the previous answerer points out is right.</p> <p>(1) It is often the case with those with little knowledge as to the peripheral region.</p> <p>(2) It is recently decreasing. I hear it can be possible for the case of additions to tax that are within the discretionary power of tax offices to some extent.</p>   |
| Love-93 | <p>Your income is added as national insurance is paid per family unit. The cost of insurance next year will be raised. It is the same for insurance and tax, but both are not the present prices.</p> <p>Employment income deduction subtracted from total revenue equals to total income. Your take-home wage is 1 million for four months, so your total revenue is much more than that. It is supposedly over 1,030,000 yen, so you cannot claim to be a supporter. Next year resident tax will be charged as well, not for this year.</p>  |
| Love-94 | <p>There is no point in waiting as items will not arrive. You must not pay money to those whose address and telephone number are unknown. You must never fail to ask the contact. This is an exception of the compensation system from Yahoo!: The case you dealt with a person before you confirmed his/her name, address and telephone number. Reference:</p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a><br/> <a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a><br/> <a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/instances/7points.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/instances/7points.html</a></p> |
| Love-95 | Your elbow remains straightened? After a swing, fold your elbow, and it will naturally move to the armpit.   |
| Love-96 | I think it is because the cost of equipment is considerable for the device and system that connect the data of meters with telephone wires and send it. That may be realized in the future.  |
| Love-97 | <p>I do not mind even if it is midnight... Mostly there are only these three types: docomo.ne.jp, ezweb.ne.jp, *.vodafone.ne.jp. And the following are also mail addresses for mobile phones. These are not all, but I just picked some up due to limited space: tkk.ne.jp, tkc.ne.jp, tu-ka.ne.jp, nttpnet.ne.jp, pdx.ne.jp, ido.ne.jp, mozio.ne.jp, phone.ne.jp, e-box.jp, pne.jp, mtne.jp,</p>  |

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|          | 9ne.jp100ne.jp, 55ne.jp, xxne.jp, moco.ne.jp. Are you going to check all of them???  |
| Love-98  | Parking on the right side is considered as illegal parking, isn't it? The police will not arrest you for this, but all the violations will be added in the case of accidents. It may be the violation added for that case.   |
| Love-99  | The cancellation of bid can only be done by exhibitors. Please ask from the question column. Your inquiry will not necessarily be accepted. After the deal is finished, it is possible to delete due to the circumstances of bidders.  |
| Love-100 | The existence of a contract is the matter of proof, but will only that lead directly to return of inherited property? Conversely, even if there is a contract, when it is reported as undivided, the entire property of the inheritee is determined by returning donated property he/she gained in the past... |

**Table C-6: A Set of Question and Answer Statements (Love, Original Japanese Version).**

| ID     | Statements   |
|--------|--|
| Love-Q | 昔付き合っていた人と久しぶりに会いに行こうかと思っています。<br>私は本当に久しぶりで、一目会いたいぐらいの思いで、<br>多分彼もそうだと思います。<br><br>私は名古屋で彼は東京です。ちょっと会うには遠いですか？  |
| Love-1 | おっしゃるとおり、それが業者の利益になります。先ほども書きましたが、ピアノのみのリサイクルサイトは、まずありません。「リサイクル」で検索して、不用品の掲示板を探しましょう。そのなかに、ピアノがあるかもしれません。探すのに、時間はかかるでしょうね。  |
| Love-2 | 裏返しで梱包してくれたんなら 「非常に良い」 でしょう。どこに不満があるのでしょうか？無地のダンボールを使って・・・だったら 梱包料とられてもおかしくないと思いますよ。そういう梱包をお望みなら、個人の出品者から購入するのはやめてくださいね。   |
| Love-3 | 定形外と基本はいっしょです。ポストにはいらなければ不在者通知がはいつてます。バイトのにいちゃんとかだと玄関先にポイしていくこともあるようです。今のところはポストにはいつてるのが普通ですね。ちなみに、通信販売の本とか定期購読のカタログなんかはビニールで送られてくることないですか？あれが大体、冊子小包です。たまーに厚いのとかが玄関 |

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|         | 脇につまれていることあるでしょ？  |
| Love-4  | 申し訳ございませんが、早期終了はしておりませんので、終了までお待ちください。と返事するってのはどうでしょうか？   |
| Love-5  | 商品説明にも書いてあったんなら、払わないとダメでしょう。裁判になってもあなたの負けは目に見えています。どうしてもその出品者から買わなくてはならないものでもなければ、「このままでは、お取引に支障が出そうですのでキャンセルさせていただきます。このことは評価で明らかにさせていただきます。」とでもメールしましょう。折れてくるかもしれません。 |
| Love-6  | 落札者が気を利かせてくれたのでしょうかね。貴方がオークション・ページに書き忘れたのでは？書いてないと、折半もありえます。↑送料の間違いでした・・・でも、クレームの対象になりえますので、書いておいたほうが。  |
| Love-7  | ブランド関係なく、自分で見て触って、物がたくさん入るというのを確認して買ったらどうでしょうか。純粹にブランドでディオールとヴィトンどちら？ときかれた場合、ヴィトンのほうが丈夫そうで良いと思います。  |
| Love-8  | 送料込みの値段でしたのでこの価格で入札しました。別途必要ということであれば、この金額は出せません。どうしても、という場合はキャンセルとさせていただきます。ですね。ちゃんと評価で晒してやってください。   |
| Love-9  | 笑いを表している場合と、連続したハートをあらわしている場合があります。気になるなら、相手に訊いてみたらどうでしょうか。   |
| Love-10 | ちょっと昔のビジネスのカテの質問全てに「むずかしいですね」という回答を入れて点数を稼いでいるやつがいたけど、あんなのを見るとランキングなんて全く無意味だと思います。  |
| Love-11 | 銀行に預金したらどうですか？機械でできますから。窓口を通すとカウントする際に銀行側のカウントした金額に意義を述べませんという承諾書を取られます。  |
| Love-12 | 現在は入金確認が出来たのですか？相手の振り込み手数料を加えて全額返金しなさい。相手は、それで文句はない筈です（無駄な時間を費やした事を除いて）。貴方に非がないと思っているなら貴方の振り込み手数料を引いて返金したら？裁判で勝てると思っているなら・・・  |
| Love-13 | 二十歳以上で定職があれば、キャッシュカードを作るメリットはありません。クレジットにしましょう。年会費・発行手数料も不要です。過去5年以内に 自己破産してたらクレカは作れません。その際はキャッシュカードで我慢してね。   |

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| Love-14 | ない！衣類から仕事道具まで、もうほとんどここから買うようになってしまいましたよ。よそで高い値段出して買う気が全然しません。オークション無くなったらどーしよー！！   |
| Love-15 | ウォークマン絶対禁止の学校でまじめな子が英会話の勉強のために毎日聞きながら学校に来てることみんな知ってるけど秘密にしていること。もしくは、気が付いてる先生も黙って見逃していること。   |
| Love-16 | CPU 動作率という曖昧ですが、WindowsXP であれば、CTRL+ALT+DEL でタスクマネージャが起動できますので、「パフォーマンス」タブで CPU 使用率が分かります。   |
| Love-17 | ウォレットの支払い・・・e-BANK にしましたが何の連絡もありません。もう2年になります。実際に引き落としはされているんですけどね。  |
| Love-18 | ものすごく面倒だとは思いますが、IME パッドで手書き入力していく・・・くらいしか思いつきません。。フリーのソフトウェアキーボードとか無いのですかね。少し調べてみましょう。↓IME に標準についてたんですね。知らなかったです・・・                    |
| Love-19 | ハトは酔を嫌うと聞いたことがあります。フンを落とす店先などにコップ1杯ずつ置いてみてはどうでしょうか？うまくいくといいですね。  |
| Love-20 | そういうこだわりがあるのであれば、店頭で実際にポケットに入れてみて、気に入った物を探すべきだと思います。機械ではありませんので、1 が抜けてしまったり・・・と言うミスはあると思うので、今回はカバンに入れて使うなり、もう1度出品するなりするのがいいんじゃないでしょうか？ |
| Love-21 | 評価は素直に「悪い」でいいのではないのでしょうか？連絡も取れず・・・というのは書いておいたほうがいいですね。報復評価については 返答欄で悪い評価にした理由を書きましょう。その報復かも とでも書いておけば、他のかたにはどちらが悪いのかは一目瞭然でしょうから。       |
| Love-22 | 営業活動か、貢献度稼ぎです。見つけたらどんどん削除依頼をしましょう。このビジネスノカテで、ちょっと前の質問に「とてもむずかしい問題ですね」とか「とても考えさせられます」という回答を全部の質問にコピペして貢献度を稼いでいたやつもいました。                 |
| Love-23 | この時間に起きてるということは、寝るのも早いはずでしょう？あなたが夜遅くになにかしてみたら・？  |
| Love-24 | なぜトロピカルゴールドを入れているのですか？どこか悪いのですか？何も症状が無いのに薬を入れるのは毒を与えるのに等しい行為です。他のと一緒に入れると、いじめられたり  |



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|         | <p>していますか？水草を食べている形跡はありませんか？お店に相談してみたらいかがでしょう。</p>   |
| Love-25 | <p>キャンセルの操作ができるのは、出品者だけです。この理由じゃ落札者都合にさせられるでしょうね。送料をかんがみ落札いたしました。故意に出品地域を偽り出品したとも思えます。落札者都合での取り消しとなるなら、このことは評価で明らかにさせていただきます。とでもメールしてあげてください。</p>  |
| Love-26 | <p>受け取り口座って？取引相手に入金してもらおう話ですか？相手がイーバンクの口座を持っていれば、イーバンクの口座番号を教えてあげてください。持っていなければ、振込み入金口座（イーバンクギンコウ（カのほう）になります）、口座名義人があなたの名前ではありませんので、トラブルになりやすいです。出品画面には、イーバンク決済とかんたん決済のみにチェックを入れておきましょう。</p>                             |
| Love-27 | <p>当たり前です。ポストに日のついたライターを投げ入れる輩もいますし、ポストから回収した車が事故にあうこともあります。ポストの鍵を壊して盗んでいくってのもありましたね。窓口へ持っていけば、その分のリスクはなくなります。あなたが事故にあう可能性もありますが、それは郵便事故にはカウントされません。</p>   |
| Love-28 | <p>思い切って入札するのも1つの方法です。写真はついていますか？写真の背景はどうなっているのでしょうか？自分で撮った写真で背景が自宅と思われるものなら怪しまなくてもいいと思います。新規の方から落札するのはリスクがある一方、相場が3000円以上のものが1000円以下で落札できることもあります。</p>  |
| Love-29 | <p>重さを量るためのデジタルスケール。1グラム単位で表示されるので便利です。水濡れ防止のビニール袋大中小。プチプチ。荷物に応じた封筒。100円ショップで売ってます。折れたりしてはいけない商品には厚紙・ダンボール。必要なものはこれくらいかな。発送の手順は、自分が落札したときにしてもらったことをすればいいと思います。「落札メール送付⇒入金確認⇒商品発送⇒評価」こんな流れかな？あとはなれるしかないですね。頑張ってくださいね。</p> |
| Love-30 | <p>急いでるからって、入金の確認もせずに発送のが間違いです。評価から連絡してみれば……いい勉強になったでしょう？</p>  |
| Love-31 | <p>ジャッキー佐藤(故人)とマキ上田。懐かしいですね。確かデビュー戦が、タイトルマッチの挑戦者が出場不能になって代役で急遽作られたペアだったと思います。そこで勝ってしまっ</p>   |

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|         | てブレイクしたことを記憶しています。   |
| Love-32 | <p>別に、「～ですが？」と言っても、意味は通じるからいいじゃないですか。プリンタのメーカーのサイトでドライバがダウンロードできます。プリンタの正面にメーカー名が書いてあると思うので、それで検索してみてください。</p> <p><a href="http://knowledge.yahoo.co.jp/service/question_detail.php?queId=18318">http://knowledge.yahoo.co.jp/service/question_detail.php?queId=18318</a></p>  |
| Love-33 | <p>見分ける方法はありませんね。住所・連絡先を確認してから入金するのはルールです。教えてくれない出品者との取引はやめましょう。</p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a></p> <p>ヤフーの補償制度の適用されない例・相手方の氏名・住所・電話番号を確認せず取引した場合とあります。</p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a></p> |
| Love-34 | <p>「行」→「御中」→「行」とは1つの封筒を再利用しているのですか？いづれにせよ行が2度も変更されていたら郵便屋さんもびっくりしますね。喧嘩しているみたいで。うまく修正液で消して行を書き直すのはいかがですか？全部が全部そういうわけではないと思いますので、書き直すことに問題は無いと思います。私だったら書き直す。メンドクサイですが一応の礼儀かな？</p>  |
| Love-35 | <p>就業規則違反にならないのでしょうか？それがないのであれば問題はありません。税金は所得が増えた分多く取られるだけです。給与所得者でしたら、源泉税が乙欄の金額で控除されますからやけに多く引かれている感覚になります。所得が20万を超える場合は確定申告をしなければなりません。確定申告をすれば自動的に住民税も申告したと同じことになります。保険は会社の健康保険、厚生年金に入っているのであれば何も問題はありません。国民健康保険の場合には所得の増加に伴って翌年の保険料が増加します。</p>   |
| Love-36 | <p>テキストエディタじゃなきゃ駄目ですか？一応、テキスト形式も扱えて保存もできるっていうのならあるんですけど…。VerticalEditor（階層付きテキストエディタ）</p> <p><a href="http://truestories.hp.infoseek.co.jp/BeatWord">http://truestories.hp.infoseek.co.jp/BeatWord</a>（ワープロソフト）</p> <p><a href="http://www.cypac.co.jp/beatword/Vertical">http://www.cypac.co.jp/beatword/Vertical</a>～はちょっと癖があります。BeatWordはワープロソフトですが、意外に軽くて使いやすいです。どちらにしてもお好みで。</p>  |
| Love-37 | <p>「それでは佐川急便での発送で宜しいでしょうか？」と送料を伝えるついでに確認すればいいのでは。</p>  |

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| Love-38 | とりあえずBLにだけ入れておきましょう。誰かが高値更新してくれれば、もう入札できません。ぎりぎり最後まで残っていたら入札者の削除ですね。いま、削除すると、その人がいない状態で再計算されますから、スタート価格まで落ちる可能性もありますよ。  |
| Love-39 | 厳しくなったって本来は厚さ2センチまでしか送れないものを送ってたんでしょう？もともと規則でしょう  |
| Love-40 | ゆうパックシール欲しさの犯行でしょう。届いた荷物を見ると持ち込み割引になってたりしてね。(爆)評価で思いっきり暴露してあげましょう。  |
| Love-41 | YAHOOゆうパックって北海道じゃ できないんだよなあ・・・(ぼそっ)   |
| Love-42 | コンビニで携帯の雑誌を見たら、六月初旬に発売だそうです。当てにはなりません・・・  |
| Love-43 | 稼げるかもしれないことを思いついたので売ってみたってことでしょう。ホントに稼げるなら、実践してればいいわけで、オクで小銭を稼ぐ必要もないってことでしょ？  |
| Love-44 | >明らかに2センチ超えてるのにメール便での発送を懇願してくる落札者にほとんど手を焼いています。あんたはばか？手を焼くところはどこな？ふつうにお断りすればいいだけじゃん。<br><a href="http://pt.af1.rakuten.co.jp/c/019b3c3b.334f4a77/?url=http://www.rakuten.co.jp/kamasho/499854/614290/#599433">http://pt.af1.rakuten.co.jp/c/019b3c3b.334f4a77/?url=http://www.rakuten.co.jp/kamasho/499854/614290/#599433</a> |
| Love-45 | 所有者が読み終わって網棚に置いた時点で、占有、所有権を放棄していると考えて良いのではないのでしょうか。本来ならその後鉄道会社の所有物になるというのが理屈ではありますが・・・  |
| Love-46 | 富山商業は可哀想だったですね。もっと審判に抗議をする権利を認めるべきだったと思います。以前エンタイトルベースを本塁打と判定され、全員が誤審だとわかっていても抗議できなかったことがあります。  |
| Love-47 | 「良い」で評価されたから「良い」で返したんでしょうね。そういう感覚の出品者なんだと思います。  |
| Love-48 | 血糖測定器でしたら糖尿病と診断されている人なら病院で無料で貸してくれると聞いたことがあります。一度病院で聞いてみてはいかがでしょうか？   |
| Love-49 | 気持ちは分かりますが信頼されなくなってしまうですね。私は最初振込先などは普通にお教えして住所や電話番号は聞かれるまではお教えしません。悪戯電話などの被害にあったので…。聞かれたらすぐお答えしますが大抵その事情を説明すれば理解して頂けます。口座名義   |

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|         | で本名を知られるのが嫌ならば好きな名前で口座は開けます。(身分証明書は必要です。会社名義で口座をもつと同じことですね) 銀行の窓口などで簡単に出来ますよ。   |
| Love-50 | ダビングもコピーも禁止はされていません。個人で楽しむ場合は大丈夫って、ビデオテープのパッケージにも書いてあるでしょ? 売ったらダメなんです。コピーを自宅において、オリジナルを売る。ばれなきゃいいと思いますが、著作権法の趣旨からすれば違反行為です。もうひとつ、映画の著作権者は映画監督の場合と製作会社の場合があります。普通は製作会社です。  |
| Love-51 | 私は、自分の人生を遠くに投げすぎたので、探すのに苦労しています。どこへいったのだろう・・・どなたか知りませんか?  |
| Love-52 | IDは知らされません。匿名です。 どしどし、アドバイスしましょう。 残念なことに出品者さんに通知はいきません。 出品者さんがそのページをみないといけません。 たいてい、見てないと思いますが・・・。  |
| Love-53 | 土方の戦死の場所は函館ですが数箇所あって特定できません。近藤は流山あたりで斬首されたのではなかったでしょうか? 胴体部分は我が家から 5 分の板橋の駅前に埋められたと言うことです。永倉新八が立てた碑が残っています。賊軍と言うのは官軍がつけた蔑称です。徳川幕府への忠誠を貫いて亡くなった人たちです。                      |
| Love-54 | そうとう古いので XP で動くかどうか? 他の C 言語でもいいならボーランドのフリーC コンパイラがお勧めです。 <a href="http://www.borland.co.jp/cppbuilder/freecompile/">http://www.borland.co.jp/cppbuilder/freecompile/</a> |
| Love-55 | GIF は 255 色でしたっけ・・・フルカラーのを 255 色に変換するんだから仕方がないです。変換方法を設定できるソフトもあるので Vector で探したら?   |
| Love-56 | 自分で何も判断できない人のほうがムカつきます。知恵袋は、知恵を出す場であって、相談窓口ではありません。一直接取引はしてもいいですか? 規約に違反しますが、やりたければ自己責任で・・・当然の回答です。   |
| Love-57 | 宣伝ですか? 気になるなら、ウォッチに入れておきましょう。終了したら落札価格がわかるし、再出品されれば開催中のオークションに戻ってきますから、価格が下げたところまでバッチリわかりますよ。   |
| Love-58 | 落札者を削除した場合は、繰上げを承諾しますか? とヤフーから落札通知が来ます。これに承諾しないと、出品者にはメールアドレスも知らされません。あなたのメールが yahoo ID @yahoo.co.jp なら、出品者以外にでも、メールアドレスはばれればです。  |

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| Love-59 | コップに水を入れ、ストローで1分程「ぶくぶくぶくぶくぶく」します。それを匂えば、自分の口臭に近いそうです。  |
| Love-60 | <p>質問の趣旨がぼやけていますが、回答はこれでいいのでしょうか？ ●ヒント ・ [現在の価格] + [入札単位] 以上の価格であれば、1円単位で入札できます。 ・ 「希望落札価格」や [最低落札価格] が設定されているオークションを除き、 [現在の価格] の100倍を超える価格では入札できません。</p> <p><a href="http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html">http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html</a><a href="http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html">http://help.yahoo.co.jp/help/jp/auct/bid/bid-13.html</a></p> |
| Love-61 | ハアハア・・・興奮してしまって申し訳ありません。。。36歳男 きもい・・・多分相手が知ったら電車を帰るでしょう。   |
| Love-62 | <p>『奇跡の243便 (Miracle Landing) 』ではないでしょうか。NHKで放送されたと記憶しています。1988年に起こったアロハ航空の事故を取り上げたものですね。</p> <p><a href="http://www.airodyssey.net/articles/movie-ml.html">http://www.airodyssey.net/articles/movie-ml.html</a></p> <p><a href="http://www.ntv.co.jp/FERC/research/20021124/kiseki01.html">http://www.ntv.co.jp/FERC/research/20021124/kiseki01.html</a></p>  |
| Love-63 | チケット販売に関するルールをちゃんと読みましょう。>「座席はまだわからないので、それに関するクレームは受けません」と書いてしまえば文句は言われなわけですし。この出品方法自体が、ガイドラインに違反しています。  |
| Love-64 | 多少の定義が良く分かりませんが、ノークレームノーリターンと書かれていれば泣き寝入りするしか無さそうですね、次回からは気をつけましょう。  |
| Love-65 | 本当に「イラクに残って活動したい、悪いのは自衛隊派遣だ」と言ったのですか???もし言ったのであれば腹立たしいので意見しますが、「発言」の確認が出来ていないので回答は控えさせていただきます。回答については編集できますので、発言が確認次第お答えします。   |
| Love-66 | 「失礼します」に対しては、「どうぞ」ではないでしょうか?ふう・・・む・・・たぶん・・・そうだと・・・。  |
| Love-67 | 基本的にアウトレットはそういうものですが、出品者の対応と商品説明には納得いきませんね。いきなり評価ではなく、評価で明らかに致しますと、予告しておいたほうが報復評価はおとなしいものになると思います。   |
| Love-68 | ハードディスクの容量や空きスペースにも関係するでしょうね。私は、ジーッと見ていますが間違いなく眠りにつきます。  |

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| Love-69 | 2ch に限ったことではないのですが、「アスキーアート」といいます。文字で人の顔などを表現するものですね。IT用語辞典 e-words や、検索で調べてみては？   |
| Love-70 | BAは減ったりしません。yahoo!独自のバグでしょう。更新ボタンを押すと戻ることがあります。  |
| Love-71 | ショップで売られているネコ除けを使ってみる事をお勧めします。可能であれば、置き場所を変えることも検討してみてはいかがでしょうか。ネコは場所に執着しますから。   |
| Love-72 | 税金の面では扶養になれません。相続で取得した土地ですか？取得費不明(相続でしたら亡くなった方がいくらで取得したか)とのことです。長期保有は間違いのないと思います。特別控除の100万は引けるはず。譲渡経費(仲介手数料等)も引けますのでいくら譲渡益は減るはず。居住用として使っていたのではありませんか？特別控除や、課税の特例の可能性はありませんか？申告の際は税理士か税務職員によく相談してください。  |
| Love-73 | 落札者都合でも仕返しに評価をいえることは可能ですが・・・この出品は利用規約に違反しています。ルールを平気で破ることのできる人は、あなたとの取引もまともなルールは通用しない可能性があります。入札はやめましょう。   |
| Love-74 | 貴方がヤキモチをやくのは簡単ですが、なんで相手が貴方に？好きでもない貴方に？分からん、貴方が。  |
| Love-75 | 念仏踊り？ってのもあったと思う。お経で踊るのは、悪い事ではないのでは？葬式でつのは、困るが・・・通夜なら酒も飲むし騒ぐし。  |
| Love-76 | 検索して見てもらうのはいいのですが、見てもらってどうするのでしょうか？何度も見てもらう？それを見て電話注文をもらう？その辺で、インターネットでの検索をしてもらう意味が変わってきます。実際に店に来てもらうのが目的ならば、インターネットでの宣伝よりは、従来の紙媒体の宣伝の方が、はるかに効果的です。毎日更新して、何度も繰り返し見てもらうことが目的ならばいいのですが、単なる「お店紹介」程度なら、お金をかけてHPを宣伝すること自体、無駄です。近所に折り込みチラシでも撒いたり、看板でも立てた方がいいと思います。 |
| Love-77 | ストア登録出品は別途消費税が必要な場合もありますが、個人出品であれば「当方ショップです」としていても、落札額に消費税の上乗せ請求は出来ません。なかには知ってか知らずか「別途消費税を請求します。」や「システム利用料を負担ください。」記載の出品がありますが、これも違反です。個人登録者出品にかかる消費税は不要です。  |



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|         | しよ。   |
| Love-88 | <p>ネット決済の場合、クレジットカードは、カードがなくてもカード番号、名義、有効期限がわかれば利用可能です。キャッシュカードは実際に暗証番号を知っている必要があります。</p> <p>でもそんなに不安なのに、ネット決済の利用を検討するあなたの真意が知りたいですね。</p> <p><a href="http://pt.af1.rakuten.co.jp/c/019eec7c.3df336ba/?url=http://www.rakuten.co.jp/humanbody/562766/542557/583879/#457248">http://pt.af1.rakuten.co.jp/c/019eec7c.3df336ba/?url=http://www.rakuten.co.jp/humanbody/562766/542557/583879/#457248</a></p>  |
| Love-89 | <p>「いつでも入社できます」と言う人と比較されれば不利になるかも知れませんが、中には求人広告に「入社日応談」と記載している会社もあります。ケースバイケースだと思われるので、意中の会社があるのなら相談してみてもいいでしょうか。</p>   |
| Love-90 | <p>アルバイト感覚といいます、誰かに雇われていたのですか？雇われていたのと、自分で事業をしていたのは別の所得分類になります。雇われていたときの経費は計上できません。自分で事業をしたものにかかるものは6月以前であっても経費に計上できます。</p>   |
| Love-91 | <p>複数の評価の最後には、「もう限界です。これ以上、言葉が続けられません。一生賢明書きました。笑っていただけましたら光栄です。」と、コメントしています。</p>   |
| Love-92 | <p>↑のおっしゃるとおりです。①周辺領域の知識でさえないことが多いです。②最近は少なくなってきました。税務署である程度裁量権のある付帯税等についてはそういうこともありえると聞いています。</p>  |
| Love-93 | <p>国保だと世帯単位ですので、貴方の収入が加算されます。来年の保険料は上がります。保険でも税金でも同じですが、手取り金額ではありません。総収入金額から給与所得控除額を引いた金額が所得金額になります。4ヶ月で手取り100万ですから総収入はもっと多いことになります。103万円を超えていると思いますので、扶養にはなれません。住民税も来年はとられます。今年はとられません。</p>  |
| Love-94 | <p>もう待っても商品は届きません。住所 電話番号のわからない人には入金しちゃだめです。連絡先は必ず聞いてください。ヤフーの補償制度の補償の対象とならない例です・相手方の氏名・住所・電話番号を確認せずに取引した場合参考：</p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a></p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/compensation/compensation.html</a></p> <p><a href="http://auctions.yahoo.co.jp/phtml/auc/jp/notice/instances/7points.html">http://auctions.yahoo.co.jp/phtml/auc/jp/notice/instances/7points.html</a></p> |
| Love-95 | <p>肘を伸ばしたままでしょ？打った後に、肘をたたみましょう。そうすれば、素直に左脇に向</p>  |



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|          | かいます。  |
| Love-96  | メーターのデーターを電話線に接続して送信する装置やシステムに大きな設備費用が掛かるからだと思います。将来はその方向へ進むでしょうね。   |
| Love-97  | 夜中でも気にしませんが・・docomo. ne. jpezweb. ne. jp*. vodafone. ne. jp ほぼこの3つだけだと思いますが、以下もケータイアドです。これが全部ではありませんが、書ききれないのでこれくらいにします。<br>tkk. ne. jptkc. ne. jptu-ka. ne. jpnttpnet. ne. jppdx. ne. jpido. ne. jpmozio. ne. jpphone. ne. jpe-box. jppne. jpmtne. jp9ne. jp100ne. jp55ne. jpxxne. jpmoco. ne. jp すべてチェックされているのでしょうか??? |
| Love-98  | 右に止まっているのは、駐車方法違反ってやつにならなかったかな？わざわざこれで捕まえるおまわりさんもいませんが、事故の時には、違反はすべて加算されます。そのときのプラス分に設けた違反でしょうね。   |
| Love-99  | 入札の取り消しは出品者にしかできません。質問欄からお願いしましょう。聞き入れてくれるとは限りません。終了後に、落札者都合で削除もあります。  |
| Love-100 | 契約書のあるなしは、証拠の問題で、それだけで相続財産の持ち戻しに直結するものでしょうか？ 逆に契約書があっても、未分割で申告するときなどは、過去に受けた贈与財産を、持ち戻して被相続人の全体財産を確定するという作業をしますが・・・   |

## Appendix D

The minute evaluation results explained in Section 6 are shown. The results shown here are explained by taking experimental results on Auction evaluated by only males as an example. Each row indicates a unique user.

The rank based on the proposed method (the rank based on experimental results, the figure of best averaged fitness rate, appearance, and score, respectively) is shown in the column entitled “Rank\_Proposed” (“Rank\_Exp,” “BAFR,” “App,” and “S.”) in Table D-1. The rank based on proposed method (appearance and score, respectively) is (are) substituted for that based on averaged score (averaged score), which is (is) shown in the column entitled “Rank\_Ave\_Score” (“Ave\_Score”) in Table D-2. The rank based on proposed method (appearance and score, respectively) is (are) substituted for the rank based on distance (distance), which is (are) shown in the column entitled “Rank\_Dis” (“Dis”) in Table D-3.

How to judge a relevant respondent is briefly explained in Section 6.3.2.(3). The column entitled “Rel” indicates whether relevant respondents are detected. The column is given “○” if a relevant respondent is detected. The column is given “×” if a relevant respondent is not detected. A set of the columns is given “–” if a user is beyond the scope of detection.

The analysis condition shown on PC (Love, respectively) in Table D-4 (Table D-7), Table D-5 (Table D-8), and Table D-6 (Table D-9) correspond to that shown in Table D-1, Table D-2 and Table D-3.

Similar as the results evaluated by males, those evaluated by females are shown in Table D-10 to Table D-18. The analysis condition shown in from Table D-10 to Table D-18 correspond to those shown in from Table D-1 to Table D-9.

Table D-1: Precision and Recall on Auction (Male, Proposed).

| Rank_<br>Proposed | Rank_<br>Exp | ID   | BAFR | App | S     | n=4.0 |       |       | n=3.5 |        |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|-------------------|--------------|------|------|-----|-------|-------|-------|-------|-------|--------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|                   |              |      |      |     |       | Rel   | Pre   | Rec   | Rel   | Pre    | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1                 | 3            | 098e | 3.78 | 28  | 22.6  | ×     | 0.000 | 0.000 | ○     | 1.00   | 0.200 | ○     | 1.00  | 0.0909 | ○     | 1.00  | 0.0455 | ○     | 1.00  | 0.0278 |
| 2                 | 7            | cdfb | 3.44 | 23  | 18.4  | ×     | 0.000 | 0.000 | ×     | 0.500  | 0.200 | ○     | 1.00  | 0.182  | ○     | 1.00  | 0.0909 | ○     | 1.00  | 0.0556 |
| 3                 | 2            | 70a3 | 4.11 | 5   | 4.01  | ○     | 0.333 | 0.500 | ○     | 0.667  | 0.400 | ○     | 1.00  | 0.273  | ○     | 1.00  | 0.136  | ○     | 1.00  | 0.0833 |
| 4                 | 18           | 784e | 2.67 | 3   | 2.40  | ×     | 0.250 | 0.500 | ×     | 0.500  | 0.400 | ×     | 0.750 | 0.273  | ○     | 1.00  | 0.182  | ○     | 1.00  | 0.111  |
| 5                 | 12           | cea5 | 2.89 | 2   | 1.62  | ×     | 0.200 | 0.500 | ×     | 0.400  | 0.400 | ×     | 0.600 | 0.273  | ○     | 1.00  | 0.227  | ○     | 1.00  | 0.139  |
| 6                 | 38           | 2368 | 1.78 | 2   | 1.59  | ×     | 0.167 | 0.500 | ×     | 0.333  | 0.400 | ×     | 0.500 | 0.273  | ×     | 0.833 | 0.227  | ×     | 0.833 | 0.139  |
| 7                 | 17           | 4fbb | 2.67 | 1   | 1.00  | ×     | 0.143 | 0.500 | ×     | 0.286  | 0.400 | ×     | 0.429 | 0.273  | ○     | 0.857 | 0.273  | ○     | 0.857 | 0.167  |
| 8                 | 1            | 643a | 4.56 | 1   | 0.988 | ○     | 0.250 | 1.00  | ○     | 0.375  | 0.600 | ○     | 0.500 | 0.364  | ○     | 0.875 | 0.318  | ○     | 0.875 | 0.194  |
| 9                 | 13           | 1c66 | 2.78 | 1   | 0.916 | -     | -     | -     | ×     | 0.333  | 0.600 | ×     | 0.444 | 0.364  | ○     | 0.889 | 0.364  | ○     | 0.889 | 0.222  |
| 10                | 23           | 3f9d | 2.44 | 1   | 0.892 | -     | -     | -     | ×     | 0.300  | 0.600 | ×     | 0.400 | 0.364  | ×     | 0.800 | 0.364  | ○     | 0.900 | 0.250  |
| 11                | 14           | 85a7 | 2.78 | 1   | 0.878 | -     | -     | -     | ×     | 0.273  | 0.600 | ×     | 0.364 | 0.364  | ○     | 0.818 | 0.409  | ○     | 0.909 | 0.278  |
| 12                | 15           | 0bec | 2.78 | 1   | 0.866 | -     | -     | -     | ×     | 0.250  | 0.600 | ×     | 0.333 | 0.364  | ○     | 0.833 | 0.455  | ○     | 0.917 | 0.306  |
| 13                | 40           | aada | 1.56 | 1   | 0.866 | -     | -     | -     | ×     | 0.231  | 0.600 | ×     | 0.308 | 0.364  | ×     | 0.769 | 0.455  | ×     | 0.846 | 0.306  |
| 14                | 28           | 09e1 | 2.22 | 1   | 0.864 | -     | -     | -     | ×     | 0.214  | 0.600 | ×     | 0.286 | 0.364  | ×     | 0.714 | 0.455  | ○     | 0.857 | 0.333  |
| 15                | 9            | 01d5 | 3.11 | 1   | 0.858 | -     | -     | -     | ×     | 0.200  | 0.600 | ○     | 0.333 | 0.455  | ○     | 0.733 | 0.500  | ○     | 0.867 | 0.361  |
| 16                | 41           | 5e85 | 1.44 | 1   | 0.858 | -     | -     | -     | ×     | 0.188  | 0.600 | ×     | 0.313 | 0.455  | ×     | 0.688 | 0.500  | ×     | 0.813 | 0.361  |
| 17                | 32           | 2e33 | 2.00 | 1   | 0.847 | -     | -     | -     | ×     | 0.176  | 0.600 | ×     | 0.294 | 0.455  | ×     | 0.647 | 0.500  | ○     | 0.824 | 0.389  |
| 18                | 6            | 4070 | 3.44 | 1   | 0.846 | -     | -     | -     | ×     | 0.167  | 0.600 | ○     | 0.333 | 0.545  | ○     | 0.667 | 0.545  | ○     | 0.833 | 0.417  |
| 19                | 16           | 5df3 | 2.78 | 1   | 0.836 | -     | -     | -     | ×     | 0.158  | 0.600 | ×     | 0.316 | 0.545  | ○     | 0.684 | 0.591  | ○     | 0.842 | 0.444  |
| 20                | 33           | 87b0 | 2.00 | 1   | 0.815 | -     | -     | -     | ×     | 0.150  | 0.600 | ×     | 0.300 | 0.545  | ×     | 0.650 | 0.591  | ○     | 0.850 | 0.472  |
| 21                | 4            | 4a26 | 3.67 | 1   | 0.810 | -     | -     | -     | ○     | 0.190  | 0.800 | ○     | 0.333 | 0.636  | ○     | 0.667 | 0.636  | ○     | 0.857 | 0.500  |
| 22                | 37           | cd41 | 1.89 | 1   | 0.809 | -     | -     | -     | ×     | 0.182  | 0.800 | ×     | 0.318 | 0.636  | ×     | 0.636 | 0.636  | ×     | 0.818 | 0.500  |
| 23                | 34           | bc7d | 2.00 | 1   | 0.804 | -     | -     | -     | ×     | 0.174  | 0.800 | ×     | 0.304 | 0.636  | ×     | 0.609 | 0.636  | ○     | 0.826 | 0.528  |
| 24                | 10           | cb4e | 3.11 | 1   | 0.803 | -     | -     | -     | ×     | 0.167  | 0.800 | ○     | 0.333 | 0.727  | ○     | 0.625 | 0.682  | ○     | 0.833 | 0.556  |
| 25                | 8            | c4fc | 3.22 | 1   | 0.802 | -     | -     | -     | ×     | 0.160  | 0.800 | ○     | 0.360 | 0.818  | ○     | 0.640 | 0.727  | ○     | 0.840 | 0.583  |
| 26                | 42           | 43ce | 1.44 | 1   | 0.802 | -     | -     | -     | ×     | 0.154  | 0.800 | ×     | 0.346 | 0.818  | ×     | 0.615 | 0.727  | ×     | 0.808 | 0.583  |
| 27                | 19           | 8d74 | 2.67 | 1   | 0.801 | -     | -     | -     | ×     | 0.148  | 0.800 | ×     | 0.333 | 0.818  | ○     | 0.630 | 0.773  | ○     | 0.815 | 0.611  |
| 28                | 11           | e09a | 3.00 | 1   | 0.798 | -     | -     | -     | ×     | 0.143  | 0.800 | ○     | 0.357 | 0.909  | ○     | 0.643 | 0.818  | ○     | 0.821 | 0.639  |
| 29                | 35           | d9a9 | 2.00 | 1   | 0.780 | -     | -     | -     | ×     | 0.138  | 0.800 | ×     | 0.345 | 0.909  | ×     | 0.621 | 0.818  | ○     | 0.828 | 0.667  |
| 30                | 36           | 3cb0 | 2.00 | 1   | 0.774 | -     | -     | -     | ×     | 0.133  | 0.800 | ×     | 0.333 | 0.909  | ×     | 0.600 | 0.818  | ○     | 0.833 | 0.694  |
| 31                | 39           | df64 | 1.67 | 1   | 0.767 | -     | -     | -     | ×     | 0.129  | 0.800 | ×     | 0.323 | 0.909  | ×     | 0.581 | 0.818  | ×     | 0.806 | 0.694  |
| 32                | 25           | 5b4b | 2.33 | 1   | 0.759 | -     | -     | -     | ×     | 0.125  | 0.800 | ×     | 0.313 | 0.909  | ×     | 0.563 | 0.818  | ○     | 0.813 | 0.722  |
| 33                | 43           | f525 | 1.44 | 1   | 0.759 | -     | -     | -     | ×     | 0.121  | 0.800 | ×     | 0.303 | 0.909  | ×     | 0.545 | 0.818  | ×     | 0.788 | 0.722  |
| 34                | 24           | 300d | 2.44 | 1   | 0.755 | -     | -     | -     | ×     | 0.118  | 0.800 | ×     | 0.294 | 0.909  | ×     | 0.529 | 0.818  | ○     | 0.794 | 0.750  |
| 35                | 26           | dae5 | 2.33 | 1   | 0.754 | -     | -     | -     | ×     | 0.114  | 0.800 | ×     | 0.286 | 0.909  | ×     | 0.514 | 0.818  | ○     | 0.800 | 0.778  |
| 36                | 27           | 27f1 | 2.33 | 1   | 0.753 | -     | -     | -     | ×     | 0.111  | 0.800 | ×     | 0.278 | 0.909  | ×     | 0.500 | 0.818  | ○     | 0.806 | 0.806  |
| 37                | 29           | f43b | 2.22 | 1   | 0.753 | -     | -     | -     | ×     | 0.108  | 0.800 | ×     | 0.270 | 0.909  | ×     | 0.486 | 0.818  | ○     | 0.811 | 0.833  |
| 38                | 30           | 5c14 | 2.11 | 1   | 0.753 | -     | -     | -     | ×     | 0.105  | 0.800 | ×     | 0.263 | 0.909  | ×     | 0.474 | 0.818  | ○     | 0.816 | 0.861  |
| 39                | 20           | bf5a | 2.67 | 1   | 0.751 | -     | -     | -     | ×     | 0.103  | 0.800 | ×     | 0.256 | 0.909  | ○     | 0.487 | 0.864  | ○     | 0.821 | 0.889  |
| 40                | 21           | 3dda | 2.67 | 1   | 0.748 | -     | -     | -     | ×     | 0.100  | 0.800 | ×     | 0.250 | 0.909  | ○     | 0.500 | 0.909  | ○     | 0.825 | 0.917  |
| 41                | 31           | eldf | 2.11 | 1   | 0.748 | -     | -     | -     | ×     | 0.0976 | 0.800 | ×     | 0.244 | 0.909  | ×     | 0.488 | 0.909  | ×     | 0.829 | 0.944  |
| 42                | 5            | 550c | 3.56 | 1   | 0.744 | -     | -     | -     | ○     | 0.119  | 1.00  | ○     | 0.262 | 1.00   | ○     | 0.500 | 0.955  | ○     | 0.833 | 0.972  |
| 43                | 22           | 07e7 | 2.56 | 1   | 0.744 | -     | -     | -     | -     | -      | -     | -     | -     | -      | ○     | 0.512 | 1.00   | ○     | 0.837 | 1.00   |

**Table D-2: Precision and Recall on Auction (Male, Averaged Score).**

| Rank_<br>Ave_Score | Rank_<br>Exp | ID   | BAFR | Ave_<br>Score | n=4.0 |        |       | n=3.5 |        |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|--------------------|--------------|------|------|---------------|-------|--------|-------|-------|--------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|                    |              |      |      |               | Rel   | Pre    | Rec   | Rel   | Pre    | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1                  | 17           | 4fbb | 2.67 | 1.00          | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0455 | ○     | 1.00  | 0.0278 |
| 2                  | 1            | 643a | 4.56 | 0.988         | ○     | 0.500  | 0.500 | ○     | 0.500  | 0.200 | ○     | 0.500 | 0.0909 | ○     | 1.00  | 0.0909 | ○     | 1.00  | 0.0556 |
| 3                  | 13           | 1c66 | 2.78 | 0.916         | ×     | 0.333  | 0.500 | ×     | 0.333  | 0.200 | ×     | 0.333 | 0.0909 | ○     | 1.00  | 0.136  | ○     | 1.00  | 0.0833 |
| 4                  | 23           | 3f9d | 2.44 | 0.892         | ×     | 0.250  | 0.500 | ×     | 0.250  | 0.200 | ×     | 0.250 | 0.0909 | ×     | 0.750 | 0.136  | ○     | 1.00  | 0.111  |
| 5                  | 14           | 85a7 | 2.78 | 0.878         | ×     | 0.200  | 0.500 | ×     | 0.200  | 0.200 | ×     | 0.200 | 0.0909 | ○     | 0.800 | 0.182  | ○     | 1.00  | 0.139  |
| 6                  | 15           | 0bee | 2.78 | 0.866         | ×     | 0.167  | 0.500 | ×     | 0.167  | 0.200 | ×     | 0.167 | 0.0909 | ○     | 0.833 | 0.227  | ○     | 1.00  | 0.167  |
| 7                  | 40           | aada | 1.56 | 0.866         | ×     | 0.143  | 0.500 | ×     | 0.143  | 0.200 | ×     | 0.143 | 0.0909 | ×     | 0.714 | 0.227  | ×     | 0.857 | 0.167  |
| 8                  | 28           | 09e1 | 2.22 | 0.864         | ×     | 0.125  | 0.500 | ×     | 0.125  | 0.200 | ×     | 0.125 | 0.0909 | ×     | 0.625 | 0.227  | ○     | 0.875 | 0.194  |
| 9                  | 9            | 01d5 | 3.11 | 0.858         | ×     | 0.111  | 0.500 | ×     | 0.111  | 0.200 | ○     | 0.222 | 0.182  | ○     | 0.667 | 0.273  | ○     | 0.889 | 0.222  |
| 10                 | 41           | 5e85 | 1.44 | 0.858         | ×     | 0.100  | 0.500 | ×     | 0.100  | 0.200 | ×     | 0.200 | 0.182  | ×     | 0.600 | 0.273  | ×     | 0.800 | 0.222  |
| 11                 | 32           | 2e33 | 2.00 | 0.847         | ×     | 0.0909 | 0.500 | ×     | 0.0909 | 0.200 | ×     | 0.182 | 0.182  | ×     | 0.545 | 0.273  | ○     | 0.818 | 0.250  |
| 12                 | 6            | 4070 | 3.44 | 0.846         | ×     | 0.0833 | 0.500 | ×     | 0.0833 | 0.200 | ○     | 0.250 | 0.273  | ○     | 0.583 | 0.318  | ○     | 0.833 | 0.278  |
| 13                 | 16           | 5df3 | 2.78 | 0.836         | ×     | 0.0769 | 0.500 | ×     | 0.0769 | 0.200 | ×     | 0.231 | 0.273  | ○     | 0.615 | 0.364  | ○     | 0.846 | 0.306  |
| 14                 | 33           | 87b0 | 2.00 | 0.815         | ×     | 0.0714 | 0.500 | ×     | 0.0714 | 0.200 | ×     | 0.214 | 0.273  | ×     | 0.571 | 0.364  | ○     | 0.857 | 0.333  |
| 15                 | 12           | cea5 | 2.89 | 0.811         | ×     | 0.0667 | 0.500 | ×     | 0.0667 | 0.200 | ×     | 0.200 | 0.273  | ○     | 0.600 | 0.409  | ○     | 0.867 | 0.361  |
| 16                 | 4            | 4a26 | 3.67 | 0.810         | ×     | 0.0625 | 0.500 | ○     | 0.125  | 0.400 | ○     | 0.250 | 0.364  | ○     | 0.625 | 0.455  | ○     | 0.875 | 0.389  |
| 17                 | 37           | cd41 | 1.89 | 0.809         | ×     | 0.0588 | 0.500 | ×     | 0.118  | 0.400 | ×     | 0.235 | 0.364  | ×     | 0.588 | 0.455  | ×     | 0.824 | 0.389  |
| 18                 | 3            | 098e | 3.78 | 0.806         | ×     | 0.0556 | 0.500 | ○     | 0.167  | 0.600 | ○     | 0.278 | 0.455  | ○     | 0.611 | 0.500  | ○     | 0.833 | 0.417  |
| 19                 | 34           | bc7d | 2.00 | 0.804         | ×     | 0.0526 | 0.500 | ×     | 0.158  | 0.600 | ×     | 0.263 | 0.455  | ×     | 0.579 | 0.500  | ○     | 0.842 | 0.444  |
| 20                 | 10           | cb4e | 3.11 | 0.803         | ×     | 0.0500 | 0.500 | ×     | 0.150  | 0.600 | ○     | 0.300 | 0.545  | ○     | 0.600 | 0.545  | ○     | 0.850 | 0.472  |
| 21                 | 8            | c4fc | 3.22 | 0.802         | ×     | 0.0476 | 0.500 | ○     | 0.143  | 0.600 | ○     | 0.333 | 0.636  | ○     | 0.619 | 0.591  | ○     | 0.857 | 0.500  |
| 22                 | 42           | 43ce | 1.44 | 0.802         | ×     | 0.0455 | 0.500 | ×     | 0.136  | 0.600 | ×     | 0.318 | 0.636  | ×     | 0.591 | 0.591  | ×     | 0.818 | 0.500  |
| 23                 | 2            | 70a3 | 4.11 | 0.801         | ○     | 0.0870 | 1.00  | ○     | 0.174  | 0.800 | ○     | 0.348 | 0.727  | ○     | 0.609 | 0.636  | ○     | 0.826 | 0.528  |
| 24                 | 19           | 8d74 | 2.67 | 0.801         | -     | -      | -     | ×     | 0.167  | 0.800 | ×     | 0.333 | 0.727  | ○     | 0.625 | 0.682  | ○     | 0.833 | 0.556  |
| 25                 | 7            | cdfb | 3.44 | 0.800         | -     | -      | -     | ×     | 0.160  | 0.800 | ○     | 0.360 | 0.818  | ○     | 0.640 | 0.727  | ○     | 0.840 | 0.583  |
| 26                 | 18           | 784e | 2.67 | 0.800         | -     | -      | -     | ×     | 0.154  | 0.800 | ×     | 0.346 | 0.818  | ○     | 0.654 | 0.773  | ○     | 0.846 | 0.611  |
| 27                 | 11           | e09a | 3.00 | 0.798         | -     | -      | -     | ×     | 0.148  | 0.800 | ○     | 0.370 | 0.909  | ○     | 0.667 | 0.818  | ○     | 0.852 | 0.639  |
| 28                 | 38           | 2368 | 1.78 | 0.797         | -     | -      | -     | ×     | 0.143  | 0.800 | ×     | 0.357 | 0.909  | ×     | 0.643 | 0.818  | ×     | 0.821 | 0.639  |
| 29                 | 35           | d9a9 | 2.00 | 0.780         | -     | -      | -     | ×     | 0.138  | 0.800 | ×     | 0.345 | 0.909  | ×     | 0.621 | 0.818  | ○     | 0.828 | 0.667  |
| 30                 | 36           | 3cb0 | 2.00 | 0.774         | -     | -      | -     | ×     | 0.133  | 0.800 | ×     | 0.333 | 0.909  | ×     | 0.600 | 0.818  | ○     | 0.833 | 0.694  |
| 31                 | 39           | df64 | 1.67 | 0.767         | -     | -      | -     | ×     | 0.129  | 0.800 | ×     | 0.323 | 0.909  | ×     | 0.581 | 0.818  | ×     | 0.806 | 0.694  |
| 32                 | 25           | 5b4b | 2.33 | 0.759         | -     | -      | -     | ×     | 0.125  | 0.800 | ×     | 0.313 | 0.909  | ×     | 0.563 | 0.818  | ○     | 0.813 | 0.722  |
| 33                 | 43           | f525 | 1.44 | 0.759         | -     | -      | -     | ×     | 0.121  | 0.800 | ×     | 0.303 | 0.909  | ×     | 0.545 | 0.818  | ×     | 0.788 | 0.722  |
| 34                 | 24           | 300c | 2.44 | 0.755         | -     | -      | -     | ×     | 0.118  | 0.800 | ×     | 0.294 | 0.909  | ×     | 0.529 | 0.818  | ○     | 0.794 | 0.750  |
| 35                 | 26           | dae5 | 2.33 | 0.754         | -     | -      | -     | ×     | 0.114  | 0.800 | ×     | 0.286 | 0.909  | ×     | 0.514 | 0.818  | ○     | 0.800 | 0.778  |
| 36                 | 27           | 27f1 | 2.33 | 0.753         | -     | -      | -     | ×     | 0.111  | 0.800 | ×     | 0.278 | 0.909  | ×     | 0.500 | 0.818  | ○     | 0.806 | 0.806  |
| 37                 | 29           | f43b | 2.22 | 0.753         | -     | -      | -     | ×     | 0.108  | 0.800 | ×     | 0.270 | 0.909  | ×     | 0.486 | 0.818  | ○     | 0.811 | 0.833  |
| 38                 | 30           | 5c14 | 2.11 | 0.753         | -     | -      | -     | ×     | 0.105  | 0.800 | ×     | 0.263 | 0.909  | ×     | 0.474 | 0.818  | ○     | 0.816 | 0.861  |
| 39                 | 20           | bf5a | 2.67 | 0.751         | -     | -      | -     | ×     | 0.103  | 0.800 | ×     | 0.256 | 0.909  | ○     | 0.487 | 0.864  | ○     | 0.821 | 0.889  |
| 40                 | 21           | 3dda | 2.67 | 0.748         | -     | -      | -     | ×     | 0.100  | 0.800 | ×     | 0.250 | 0.909  | ○     | 0.500 | 0.909  | ○     | 0.825 | 0.917  |
| 41                 | 31           | e1df | 2.11 | 0.748         | -     | -      | -     | ×     | 0.0976 | 0.800 | ×     | 0.244 | 0.909  | ×     | 0.488 | 0.909  | ○     | 0.829 | 0.944  |
| 42                 | 5            | 550c | 3.56 | 0.744         | -     | -      | -     | ○     | 0.119  | 1.00  | ○     | 0.262 | 1.00   | ○     | 0.500 | 0.955  | ○     | 0.833 | 0.972  |
| 43                 | 22           | 07e7 | 2.56 | 0.744         | -     | -      | -     | -     | -      | -     | -     | -     | -      | ○     | 0.512 | 1.00   | ○     | 0.837 | 1.00   |

Table D-3: Precision and Recall on Auction (Male, Distance).

| Rank<br>Dis | Rank<br>Exp | ID   | BAFR | Dis   | n=4.0 |        |       | n=3.5 |        |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|-------------|-------------|------|------|-------|-------|--------|-------|-------|--------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|             |             |      |      |       | Rel   | Pre    | Rec   | Rel   | Pre    | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1           | 17          | 4fbb | 2.67 | 0.760 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0455 | ○     | 1.00  | 0.0278 |
| 2           | 1           | 643a | 4.56 | 0.770 | ○     | 0.500  | 0.500 | ○     | 0.500  | 0.200 | ○     | 0.500 | 0.0909 | ○     | 1.00  | 0.0909 | ○     | 1.00  | 0.0556 |
| 3           | 3           | 098e | 3.78 | 0.805 | ×     | 0.333  | 0.500 | ○     | 0.667  | 0.400 | ○     | 0.667 | 0.182  | ○     | 1.00  | 0.136  | ○     | 1.00  | 0.0833 |
| 4           | 13          | 1c66 | 2.78 | 0.830 | ×     | 0.250  | 0.500 | ×     | 0.500  | 0.400 | ×     | 0.500 | 0.182  | ○     | 1.00  | 0.182  | ○     | 1.00  | 0.111  |
| 5           | 23          | 3f9d | 2.44 | 0.852 | ×     | 0.200  | 0.500 | ×     | 0.400  | 0.400 | ×     | 0.400 | 0.182  | ×     | 0.800 | 0.182  | ○     | 1.00  | 0.139  |
| 6           | 18          | 784e | 2.67 | 0.853 | ×     | 0.167  | 0.500 | ×     | 0.333  | 0.400 | ×     | 0.333 | 0.182  | ○     | 0.833 | 0.227  | ○     | 1.00  | 0.167  |
| 7           | 14          | 85a7 | 2.78 | 0.867 | ×     | 0.143  | 0.500 | ×     | 0.286  | 0.400 | ×     | 0.286 | 0.182  | ○     | 0.857 | 0.273  | ○     | 1.00  | 0.194  |
| 8           | 15          | 0bee | 2.78 | 0.878 | ×     | 0.125  | 0.500 | ×     | 0.250  | 0.400 | ×     | 0.250 | 0.182  | ○     | 0.875 | 0.318  | ○     | 1.00  | 0.222  |
| 9           | 40          | aada | 1.56 | 0.878 | ×     | 0.111  | 0.500 | ×     | 0.222  | 0.400 | ×     | 0.222 | 0.182  | ×     | 0.778 | 0.318  | ○     | 0.889 | 0.222  |
| 10          | 28          | 09e1 | 2.22 | 0.880 | ×     | 0.100  | 0.500 | ×     | 0.200  | 0.400 | ×     | 0.200 | 0.182  | ×     | 0.700 | 0.318  | ○     | 0.900 | 0.250  |
| 11          | 9           | 01d5 | 3.11 | 0.887 | ×     | 0.091  | 0.500 | ×     | 0.182  | 0.400 | ○     | 0.273 | 0.273  | ○     | 0.727 | 0.364  | ○     | 0.909 | 0.278  |
| 12          | 41          | 5e85 | 1.44 | 0.887 | ×     | 0.083  | 0.500 | ×     | 0.167  | 0.400 | ×     | 0.250 | 0.273  | ×     | 0.667 | 0.364  | ×     | 0.833 | 0.278  |
| 13          | 38          | 2368 | 1.78 | 0.891 | ×     | 0.0769 | 0.500 | ×     | 0.154  | 0.400 | ×     | 0.231 | 0.273  | ×     | 0.615 | 0.364  | ×     | 0.769 | 0.278  |
| 14          | 32          | 2e33 | 2.00 | 0.898 | ×     | 0.0714 | 0.500 | ×     | 0.143  | 0.400 | ×     | 0.214 | 0.273  | ×     | 0.571 | 0.364  | ○     | 0.786 | 0.306  |
| 15          | 6           | 4070 | 3.44 | 0.899 | ×     | 0.0667 | 0.500 | ×     | 0.133  | 0.400 | ○     | 0.267 | 0.364  | ○     | 0.600 | 0.409  | ○     | 0.800 | 0.333  |
| 16          | 16          | 5df3 | 2.78 | 0.910 | ×     | 0.0625 | 0.500 | ×     | 0.125  | 0.400 | ×     | 0.250 | 0.364  | ○     | 0.625 | 0.455  | ○     | 0.813 | 0.361  |
| 17          | 7           | cdfb | 3.44 | 0.932 | ×     | 0.0588 | 0.500 | ×     | 0.118  | 0.400 | ○     | 0.294 | 0.455  | ○     | 0.647 | 0.500  | ○     | 0.824 | 0.389  |
| 18          | 33          | 87b0 | 2.00 | 0.933 | ×     | 0.0556 | 0.500 | ×     | 0.111  | 0.400 | ×     | 0.278 | 0.455  | ×     | 0.611 | 0.500  | ○     | 0.833 | 0.417  |
| 19          | 4           | 4a26 | 3.67 | 0.939 | ×     | 0.0526 | 0.500 | ○     | 0.158  | 0.600 | ○     | 0.316 | 0.545  | ○     | 0.632 | 0.545  | ○     | 0.842 | 0.444  |
| 20          | 37          | cd41 | 1.89 | 0.940 | ×     | 0.0500 | 0.500 | ×     | 0.150  | 0.600 | ×     | 0.300 | 0.545  | ×     | 0.600 | 0.545  | ×     | 0.800 | 0.444  |
| 21          | 2           | 70a3 | 4.11 | 0.943 | ○     | 0.0952 | 1.00  | ○     | 0.190  | 0.800 | ○     | 0.333 | 0.636  | ○     | 0.619 | 0.591  | ○     | 0.810 | 0.472  |
| 22          | 34          | bc7d | 2.00 | 0.946 | -     | -      | -     | ×     | 0.182  | 0.800 | ×     | 0.318 | 0.636  | ×     | 0.591 | 0.591  | ○     | 0.818 | 0.500  |
| 23          | 10          | cb4e | 3.11 | 0.947 | -     | -      | -     | ×     | 0.174  | 0.800 | ○     | 0.348 | 0.727  | ○     | 0.609 | 0.636  | ○     | 0.826 | 0.528  |
| 24          | 8           | c4fc | 3.22 | 0.948 | -     | -      | -     | ×     | 0.167  | 0.800 | ○     | 0.375 | 0.818  | ○     | 0.625 | 0.682  | ○     | 0.833 | 0.556  |
| 25          | 42          | 43ce | 1.44 | 0.948 | -     | -      | -     | ×     | 0.160  | 0.800 | ×     | 0.360 | 0.818  | ×     | 0.600 | 0.682  | ×     | 0.800 | 0.556  |
| 26          | 19          | 8d74 | 2.67 | 0.950 | -     | -      | -     | ×     | 0.154  | 0.800 | ×     | 0.346 | 0.818  | ○     | 0.615 | 0.727  | ○     | 0.808 | 0.583  |
| 27          | 11          | e09a | 3.00 | 0.952 | -     | -      | -     | ×     | 0.148  | 0.800 | ○     | 0.370 | 0.909  | ○     | 0.630 | 0.773  | ○     | 0.815 | 0.611  |
| 28          | 12          | cea5 | 2.89 | 0.973 | -     | -      | -     | ×     | 0.143  | 0.800 | ×     | 0.357 | 0.909  | ○     | 0.643 | 0.818  | ○     | 0.821 | 0.639  |
| 29          | 35          | d9a9 | 2.00 | 0.975 | -     | -      | -     | ×     | 0.138  | 0.800 | ×     | 0.345 | 0.909  | ×     | 0.621 | 0.818  | ○     | 0.828 | 0.667  |
| 30          | 36          | 3cb0 | 2.00 | 0.982 | -     | -      | -     | ×     | 0.133  | 0.800 | ×     | 0.333 | 0.909  | ×     | 0.600 | 0.818  | ○     | 0.833 | 0.694  |
| 31          | 39          | df64 | 1.67 | 0.991 | -     | -      | -     | ×     | 0.129  | 0.800 | ×     | 0.323 | 0.909  | ×     | 0.581 | 0.818  | ×     | 0.806 | 0.694  |
| 32          | 25          | 5b4b | 2.33 | 1.002 | -     | -      | -     | ×     | 0.125  | 0.800 | ×     | 0.313 | 0.909  | ×     | 0.563 | 0.818  | ○     | 0.813 | 0.722  |
| 33          | 43          | f525 | 1.44 | 1.002 | -     | -      | -     | ×     | 0.121  | 0.800 | ×     | 0.303 | 0.909  | ×     | 0.545 | 0.818  | ×     | 0.788 | 0.722  |
| 34          | 24          | 300d | 2.44 | 1.008 | -     | -      | -     | ×     | 0.118  | 0.800 | ×     | 0.294 | 0.909  | ×     | 0.529 | 0.818  | ○     | 0.794 | 0.750  |
| 35          | 26          | dae5 | 2.33 | 1.008 | -     | -      | -     | ×     | 0.114  | 0.800 | ×     | 0.286 | 0.909  | ×     | 0.514 | 0.818  | ○     | 0.800 | 0.778  |
| 36          | 27          | 27f1 | 2.33 | 1.010 | -     | -      | -     | ×     | 0.111  | 0.800 | ×     | 0.278 | 0.909  | ×     | 0.500 | 0.818  | ○     | 0.806 | 0.806  |
| 37          | 29          | f43b | 2.22 | 1.010 | -     | -      | -     | ×     | 0.108  | 0.800 | ×     | 0.270 | 0.909  | ×     | 0.486 | 0.818  | ○     | 0.811 | 0.833  |
| 38          | 30          | 5c14 | 2.11 | 1.010 | -     | -      | -     | ×     | 0.105  | 0.800 | ×     | 0.263 | 0.909  | ×     | 0.474 | 0.818  | ○     | 0.816 | 0.861  |
| 39          | 20          | bf5a | 2.67 | 1.013 | -     | -      | -     | ×     | 0.103  | 0.800 | ×     | 0.256 | 0.909  | ×     | 0.487 | 0.864  | ○     | 0.821 | 0.889  |
| 40          | 21          | 3dda | 2.67 | 1.017 | -     | -      | -     | ×     | 0.100  | 0.800 | ×     | 0.250 | 0.909  | ×     | 0.500 | 0.909  | ○     | 0.825 | 0.917  |
| 41          | 31          | e1df | 2.11 | 1.017 | -     | -      | -     | ×     | 0.0976 | 0.800 | ×     | 0.244 | 0.909  | ×     | 0.488 | 0.909  | ○     | 0.829 | 0.944  |
| 42          | 5           | 550d | 3.56 | 1.021 | -     | -      | -     | ○     | 0.119  | 1.00  | ○     | 0.262 | 1.00   | ○     | 0.500 | 0.955  | ○     | 0.833 | 0.972  |
| 43          | 22          | 07e7 | 2.56 | 1.022 | -     | -      | -     | -     | -      | -     | -     | -     | -      | ○     | 0.512 | 1.00   | ○     | 0.837 | 1.00   |

Table D-4: Precision and Recall on PC (Male, Proposed).

| Rank Proposed | Rank Exp | ID   | BAFR | App | S     | n=4.0 |        |       | n=3.5 |       |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|---------------|----------|------|------|-----|-------|-------|--------|-------|-------|-------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|               |          |      |      |     |       | Rel   | Pre    | Rec   | Rel   | Pre   | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1             | 3        | 098e | 3.78 | 27  | 12.5  | ×     | 0.000  | 0.000 | ○     | 1.00  | 0.143 | ○     | 1.00  | 0.0400 | ○     | 1.00  | 0.0270 | ○     | 1.00  | 0.0213 |
| 2             | 9        | 70a3 | 3.33 | 8   | 4.48  | ×     | 0.000  | 0.000 | ×     | 0.500 | 0.143 | ○     | 1.00  | 0.0800 | ○     | 1.00  | 0.0541 | ○     | 1.00  | 0.0426 |
| 3             | 5        | cdfb | 3.67 | 7   | 3.55  | ×     | 0.000  | 0.000 | ○     | 0.667 | 0.286 | ○     | 1.00  | 0.120  | ○     | 1.00  | 0.0811 | ○     | 1.00  | 0.0638 |
| 4             | 44       | 784e | 2.22 | 4   | 1.76  | ×     | 0.000  | 0.000 | ×     | 0.500 | 0.286 | ×     | 0.750 | 0.120  | ×     | 0.750 | 0.0811 | ○     | 1.00  | 0.0851 |
| 5             | 46       | 321a | 2.00 | 2   | 1.16  | ×     | 0.000  | 0.000 | ×     | 0.400 | 0.286 | ×     | 0.600 | 0.120  | ×     | 0.600 | 0.0811 | ○     | 1.00  | 0.106  |
| 6             | 8        | c762 | 3.33 | 2   | 1.05  | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.286 | ○     | 0.667 | 0.160  | ○     | 0.667 | 0.108  | ○     | 1.00  | 0.128  |
| 7             | 28       | 643a | 2.89 | 2   | 0.927 | ×     | 0.000  | 0.000 | ×     | 0.286 | 0.286 | ×     | 0.571 | 0.160  | ○     | 0.714 | 0.135  | ○     | 1.00  | 0.149  |
| 8             | 33       | dae5 | 2.78 | 2   | 0.892 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.286 | ×     | 0.500 | 0.160  | ○     | 0.750 | 0.162  | ○     | 1.00  | 0.170  |
| 9             | 15       | 722a | 3.22 | 2   | 0.869 | ×     | 0.000  | 0.000 | ×     | 0.222 | 0.286 | ○     | 0.556 | 0.200  | ○     | 0.778 | 0.189  | ○     | 1.00  | 0.191  |
| 10            | 43       | df75 | 2.22 | 1   | 0.625 | ×     | 0.000  | 0.000 | ×     | 0.200 | 0.286 | ×     | 0.500 | 0.200  | ×     | 0.700 | 0.189  | ○     | 1.00  | 0.213  |
| 11            | 16       | d4f3 | 3.11 | 1   | 0.607 | ×     | 0.000  | 0.000 | ×     | 0.182 | 0.286 | ○     | 0.545 | 0.240  | ○     | 0.727 | 0.216  | ○     | 1.00  | 0.234  |
| 12            | 36       | ee5a | 2.56 | 1   | 0.575 | ×     | 0.000  | 0.000 | ×     | 0.167 | 0.286 | ×     | 0.500 | 0.240  | ○     | 0.750 | 0.243  | ○     | 1.00  | 0.255  |
| 13            | 26       | 1a9a | 2.89 | 1   | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.154 | 0.286 | ×     | 0.462 | 0.240  | ○     | 0.769 | 0.270  | ○     | 1.00  | 0.277  |
| 14            | 34       | e6ed | 2.67 | 1   | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.143 | 0.286 | ×     | 0.429 | 0.240  | ○     | 0.786 | 0.297  | ○     | 1.00  | 0.298  |
| 15            | 12       | 6a0a | 3.22 | 1   | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.133 | 0.286 | ○     | 0.467 | 0.280  | ○     | 0.800 | 0.324  | ○     | 1.00  | 0.319  |
| 16            | 19       | f74f | 3.00 | 1   | 0.565 | ×     | 0.000  | 0.000 | ×     | 0.125 | 0.286 | ○     | 0.500 | 0.320  | ○     | 0.813 | 0.351  | ○     | 1.00  | 0.340  |
| 17            | 27       | 0f70 | 2.89 | 1   | 0.553 | ×     | 0.000  | 0.000 | ×     | 0.118 | 0.286 | ×     | 0.471 | 0.320  | ○     | 0.824 | 0.378  | ○     | 1.00  | 0.362  |
| 18            | 50       | b0ae | 1.67 | 1   | 0.550 | ×     | 0.000  | 0.000 | ×     | 0.111 | 0.286 | ×     | 0.444 | 0.320  | ×     | 0.778 | 0.378  | ×     | 0.944 | 0.362  |
| 19            | 53       | d608 | 1.22 | 1   | 0.550 | ×     | 0.000  | 0.000 | ×     | 0.105 | 0.286 | ×     | 0.421 | 0.320  | ×     | 0.737 | 0.378  | ×     | 0.895 | 0.362  |
| 20            | 1        | a541 | 4.22 | 1   | 0.536 | ○     | 0.0500 | 0.500 | ○     | 0.150 | 0.429 | ○     | 0.450 | 0.360  | ○     | 0.750 | 0.405  | ○     | 0.900 | 0.383  |
| 21            | 20       | 07d5 | 3.00 | 1   | 0.535 | ×     | 0.0476 | 0.500 | ×     | 0.143 | 0.429 | ○     | 0.476 | 0.400  | ○     | 0.762 | 0.432  | ○     | 0.905 | 0.404  |
| 22            | 39       | 4a1b | 2.33 | 1   | 0.527 | ×     | 0.0455 | 0.500 | ×     | 0.136 | 0.429 | ×     | 0.455 | 0.400  | ×     | 0.727 | 0.432  | ○     | 0.909 | 0.426  |
| 23            | 38       | d45b | 2.44 | 1   | 0.526 | ×     | 0.0435 | 0.500 | ×     | 0.130 | 0.429 | ×     | 0.435 | 0.400  | ×     | 0.696 | 0.432  | ○     | 0.913 | 0.447  |
| 24            | 13       | f01c | 3.22 | 1   | 0.514 | ×     | 0.0417 | 0.500 | ×     | 0.125 | 0.429 | ○     | 0.458 | 0.440  | ○     | 0.708 | 0.459  | ○     | 0.917 | 0.468  |
| 25            | 6        | a8a5 | 3.56 | 1   | 0.496 | ×     | 0.0400 | 0.500 | ○     | 0.160 | 0.571 | ○     | 0.480 | 0.480  | ○     | 0.720 | 0.486  | ○     | 0.920 | 0.489  |
| 26            | 52       | a04f | 1.33 | 1   | 0.496 | ×     | 0.0385 | 0.500 | ×     | 0.154 | 0.571 | ×     | 0.462 | 0.480  | ×     | 0.692 | 0.486  | ×     | 0.885 | 0.489  |
| 27            | 2        | f9cf | 4.00 | 1   | 0.494 | ○     | 0.0741 | 1.00  | ○     | 0.185 | 0.714 | ○     | 0.481 | 0.520  | ○     | 0.704 | 0.514  | ○     | 0.889 | 0.511  |
| 28            | 17       | 5ddf | 3.11 | 1   | 0.491 | -     | -      | -     | ×     | 0.179 | 0.714 | ○     | 0.500 | 0.560  | ○     | 0.714 | 0.541  | ○     | 0.893 | 0.532  |
| 29            | 21       | 657c | 3.00 | 1   | 0.491 | -     | -      | -     | ×     | 0.172 | 0.714 | ○     | 0.517 | 0.600  | ○     | 0.724 | 0.568  | ○     | 0.897 | 0.553  |
| 30            | 40       | e715 | 2.33 | 1   | 0.487 | -     | -      | -     | ×     | 0.167 | 0.714 | ×     | 0.500 | 0.600  | ×     | 0.700 | 0.568  | ○     | 0.900 | 0.574  |
| 31            | 29       | 4070 | 2.89 | 1   | 0.485 | -     | -      | -     | ×     | 0.161 | 0.714 | ×     | 0.484 | 0.600  | ○     | 0.710 | 0.595  | ○     | 0.903 | 0.596  |
| 32            | 14       | eb37 | 3.22 | 1   | 0.478 | -     | -      | -     | ×     | 0.156 | 0.714 | ○     | 0.500 | 0.640  | ○     | 0.719 | 0.622  | ○     | 0.906 | 0.617  |
| 33            | 51       | 978b | 1.44 | 1   | 0.477 | -     | -      | -     | ×     | 0.152 | 0.714 | ×     | 0.485 | 0.640  | ×     | 0.697 | 0.622  | ×     | 0.879 | 0.617  |
| 34            | 32       | bda0 | 2.78 | 1   | 0.468 | -     | -      | -     | ×     | 0.147 | 0.714 | ×     | 0.471 | 0.640  | ○     | 0.706 | 0.649  | ○     | 0.882 | 0.638  |
| 35            | 10       | bba0 | 3.33 | 1   | 0.457 | -     | -      | -     | ×     | 0.143 | 0.714 | ○     | 0.486 | 0.680  | ○     | 0.714 | 0.676  | ○     | 0.886 | 0.660  |
| 36            | 37       | e918 | 2.56 | 1   | 0.438 | -     | -      | -     | ×     | 0.139 | 0.714 | ×     | 0.472 | 0.680  | ○     | 0.722 | 0.703  | ○     | 0.889 | 0.681  |
| 37            | 30       | 9e4e | 2.89 | 1   | 0.437 | -     | -      | -     | ×     | 0.135 | 0.714 | ×     | 0.459 | 0.680  | ○     | 0.730 | 0.730  | ○     | 0.892 | 0.702  |
| 38            | 11       | cea5 | 3.33 | 1   | 0.437 | -     | -      | -     | ×     | 0.132 | 0.714 | ○     | 0.474 | 0.720  | ○     | 0.737 | 0.757  | ○     | 0.895 | 0.723  |
| 39            | 22       | dbcf | 3.00 | 1   | 0.436 | -     | -      | -     | ×     | 0.128 | 0.714 | ○     | 0.487 | 0.760  | ○     | 0.744 | 0.784  | ○     | 0.897 | 0.745  |
| 40            | 23       | ea3d | 3.00 | 1   | 0.435 | -     | -      | -     | ×     | 0.125 | 0.714 | ○     | 0.500 | 0.800  | ○     | 0.750 | 0.811  | ○     | 0.900 | 0.766  |
| 41            | 45       | 4d52 | 2.11 | 1   | 0.435 | -     | -      | -     | ×     | 0.122 | 0.714 | ×     | 0.488 | 0.800  | ×     | 0.732 | 0.811  | ○     | 0.902 | 0.787  |
| 42            | 31       | f41b | 2.89 | 1   | 0.434 | -     | -      | -     | ×     | 0.119 | 0.714 | ×     | 0.476 | 0.800  | ○     | 0.738 | 0.838  | ○     | 0.905 | 0.809  |
| 43            | 35       | 3ecc | 2.67 | 1   | 0.434 | -     | -      | -     | ×     | 0.116 | 0.714 | ×     | 0.465 | 0.800  | ○     | 0.744 | 0.865  | ○     | 0.907 | 0.830  |
| 44            | 7        | 43ce | 3.56 | 1   | 0.432 | -     | -      | -     | ○     | 0.136 | 0.857 | ○     | 0.477 | 0.840  | ○     | 0.750 | 0.892  | ○     | 0.909 | 0.851  |
| 45            | 48       | 4fad | 1.89 | 1   | 0.432 | -     | -      | -     | ×     | 0.133 | 0.857 | ×     | 0.467 | 0.840  | ×     | 0.733 | 0.892  | ×     | 0.889 | 0.851  |
| 46            | 47       | 5d39 | 2.00 | 1   | 0.431 | -     | -      | -     | ×     | 0.130 | 0.857 | ×     | 0.457 | 0.840  | ×     | 0.717 | 0.892  | ○     | 0.891 | 0.872  |
| 47            | 4        | 85a7 | 3.78 | 1   | 0.430 | -     | -      | -     | ○     | 0.149 | 1.00  | ○     | 0.468 | 0.880  | ○     | 0.723 | 0.919  | ○     | 0.894 | 0.894  |
| 48            | 49       | 133a | 1.78 | 1   | 0.427 | -     | -      | -     | -     | -     | -     | ×     | 0.458 | 0.880  | ×     | 0.708 | 0.919  | ×     | 0.875 | 0.894  |
| 49            | 24       | 0f35 | 3.00 | 1   | 0.426 | -     | -      | -     | -     | -     | -     | ○     | 0.469 | 0.920  | ○     | 0.714 | 0.946  | ○     | 0.878 | 0.915  |
| 50            | 25       | c4fc | 3.00 | 1   | 0.425 | -     | -      | -     | -     | -     | -     | ○     | 0.480 | 0.960  | ○     | 0.720 | 0.973  | ○     | 0.880 | 0.936  |
| 51            | 18       | 902a | 3.11 | 1   | 0.424 | -     | -      | -     | -     | -     | -     | ○     | 0.490 | 1.00   | ○     | 0.725 | 1.00   | ○     | 0.882 | 0.957  |
| 52            | 41       | 05d6 | 2.33 | 1   | 0.423 | -     | -      | -     | -     | -     | -     | -     | -     | -      | -     | -     | -      | ○     | 0.885 | 0.979  |
| 53            | 42       | 5107 | 2.33 | 1   | 0.421 | -     | -      | -     | -     | -     | -     | -     | -     | -      | -     | -     | -      | ○     | 0.887 | 1.00   |

Table D-5: Precision and Recall on PC (Male, Averaged Score).

| Rank_ | Rank_ | ID    | BAFR | Ave_  | n=4.0 |        |       | n=3.5 |        |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|-------|-------|-------|------|-------|-------|--------|-------|-------|--------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|       |       |       |      |       | Rel   | Pre    | Rec   | Rel   | Pre    | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1     | 43    | df75  | 2.22 | 0.625 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000 | 0.000  | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0213 |
| 2     | 16    | d4f3  | 3.11 | 0.607 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.500 | 0.0400 | ○     | 0.500 | 0.0270 | ○     | 1.00  | 0.0426 |
| 3     | 46    | 321a  | 2.00 | 0.582 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.0400 | ×     | 0.333 | 0.0270 | ○     | 1.00  | 0.0638 |
| 4     | 36    | ee5a  | 2.56 | 0.575 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.0400 | ○     | 0.500 | 0.0541 | ○     | 1.00  | 0.0851 |
| 5     | 26    | 1a9a  | 2.89 | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.200 | 0.0400 | ○     | 0.600 | 0.0811 | ○     | 1.00  | 0.106  |
| 6     | 34    | e6ed  | 2.67 | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.167 | 0.0400 | ○     | 0.667 | 0.108  | ○     | 1.00  | 0.128  |
| 7     | 12    | 6a0a  | 3.22 | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.286 | 0.0800 | ○     | 0.714 | 0.135  | ○     | 1.00  | 0.149  |
| 8     | 19    | f74f  | 3.00 | 0.565 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.375 | 0.120  | ○     | 0.750 | 0.162  | ○     | 1.00  | 0.170  |
| 9     | 9     | 70a3  | 3.33 | 0.560 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.444 | 0.160  | ○     | 0.778 | 0.189  | ○     | 1.00  | 0.191  |
| 10    | 27    | 0f70  | 2.89 | 0.553 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.400 | 0.160  | ○     | 0.800 | 0.216  | ○     | 1.00  | 0.213  |
| 11    | 50    | b0ae  | 1.67 | 0.550 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.364 | 0.160  | ×     | 0.727 | 0.216  | ×     | 0.909 | 0.213  |
| 12    | 53    | d608  | 1.22 | 0.550 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.160  | ×     | 0.667 | 0.216  | ×     | 0.833 | 0.213  |
| 13    | 1     | a541  | 4.22 | 0.536 | ○     | 0.0769 | 0.500 | ○     | 0.0769 | 0.143 | ○     | 0.385 | 0.200  | ○     | 0.692 | 0.243  | ○     | 0.846 | 0.234  |
| 14    | 20    | 07d5  | 3.00 | 0.535 | ×     | 0.0714 | 0.500 | ×     | 0.0714 | 0.143 | ○     | 0.429 | 0.240  | ○     | 0.714 | 0.270  | ○     | 0.857 | 0.255  |
| 15    | 39    | 4a1b  | 2.33 | 0.527 | ×     | 0.0667 | 0.500 | ×     | 0.0667 | 0.143 | ×     | 0.400 | 0.240  | ×     | 0.667 | 0.270  | ○     | 0.867 | 0.277  |
| 16    | 8     | e762  | 3.33 | 0.526 | ×     | 0.0625 | 0.500 | ×     | 0.0625 | 0.143 | ○     | 0.438 | 0.280  | ○     | 0.688 | 0.297  | ○     | 0.875 | 0.298  |
| 17    | 38    | d45b  | 2.44 | 0.526 | ×     | 0.0588 | 0.500 | ×     | 0.0588 | 0.143 | ×     | 0.412 | 0.280  | ×     | 0.647 | 0.297  | ○     | 0.882 | 0.319  |
| 18    | 13    | f01c  | 3.22 | 0.514 | ×     | 0.0556 | 0.500 | ×     | 0.0556 | 0.143 | ○     | 0.444 | 0.320  | ○     | 0.667 | 0.324  | ○     | 0.889 | 0.340  |
| 19    | 5     | cdtb  | 3.67 | 0.506 | ×     | 0.0526 | 0.500 | ○     | 0.105  | 0.286 | ○     | 0.474 | 0.360  | ○     | 0.684 | 0.351  | ○     | 0.895 | 0.362  |
| 20    | 6     | a8a5  | 3.56 | 0.496 | ×     | 0.0500 | 0.500 | ○     | 0.150  | 0.429 | ○     | 0.500 | 0.400  | ○     | 0.700 | 0.378  | ○     | 0.900 | 0.383  |
| 21    | 52    | a04f  | 1.33 | 0.496 | ×     | 0.0476 | 0.500 | ×     | 0.143  | 0.429 | ×     | 0.476 | 0.400  | ×     | 0.667 | 0.378  | ×     | 0.857 | 0.383  |
| 22    | 2     | f9cft | 4.00 | 0.494 | ○     | 0.0909 | 1.00  | ○     | 0.182  | 0.571 | ○     | 0.500 | 0.440  | ○     | 0.682 | 0.405  | ○     | 0.864 | 0.404  |
| 23    | 17    | 5ddf  | 3.11 | 0.491 | -     | -      | -     | ×     | 0.174  | 0.571 | ○     | 0.522 | 0.480  | ○     | 0.696 | 0.432  | ○     | 0.870 | 0.426  |
| 24    | 21    | 657c  | 3.00 | 0.491 | -     | -      | -     | ×     | 0.167  | 0.571 | ○     | 0.542 | 0.520  | ○     | 0.708 | 0.459  | ○     | 0.875 | 0.447  |
| 25    | 40    | e715  | 2.33 | 0.487 | -     | -      | -     | ×     | 0.160  | 0.571 | ×     | 0.520 | 0.520  | ×     | 0.680 | 0.459  | ○     | 0.880 | 0.468  |
| 26    | 29    | 4070  | 2.89 | 0.485 | -     | -      | -     | ×     | 0.154  | 0.571 | ×     | 0.500 | 0.520  | ○     | 0.692 | 0.486  | ○     | 0.885 | 0.489  |
| 27    | 14    | eb37  | 3.22 | 0.478 | -     | -      | -     | ×     | 0.148  | 0.571 | ○     | 0.519 | 0.560  | ○     | 0.704 | 0.514  | ○     | 0.889 | 0.511  |
| 28    | 51    | 978b  | 1.44 | 0.477 | -     | -      | -     | ×     | 0.143  | 0.571 | ×     | 0.500 | 0.560  | ×     | 0.679 | 0.514  | ×     | 0.857 | 0.511  |
| 29    | 32    | bda0  | 2.78 | 0.468 | -     | -      | -     | ×     | 0.138  | 0.571 | ×     | 0.483 | 0.560  | ○     | 0.690 | 0.541  | ○     | 0.862 | 0.532  |
| 30    | 3     | 098e  | 3.78 | 0.464 | -     | -      | -     | ○     | 0.167  | 0.714 | ○     | 0.500 | 0.600  | ○     | 0.700 | 0.568  | ○     | 0.867 | 0.553  |
| 31    | 28    | 643a  | 2.89 | 0.464 | -     | -      | -     | ×     | 0.161  | 0.714 | ×     | 0.484 | 0.600  | ○     | 0.710 | 0.595  | ○     | 0.871 | 0.574  |
| 32    | 10    | bba0  | 3.33 | 0.457 | -     | -      | -     | ×     | 0.156  | 0.714 | ○     | 0.500 | 0.640  | ○     | 0.719 | 0.622  | ○     | 0.875 | 0.596  |
| 33    | 33    | dae5  | 2.78 | 0.446 | -     | -      | -     | ×     | 0.152  | 0.714 | ×     | 0.485 | 0.640  | ○     | 0.727 | 0.649  | ○     | 0.879 | 0.617  |
| 34    | 44    | 784e  | 2.22 | 0.440 | -     | -      | -     | ×     | 0.147  | 0.714 | ×     | 0.471 | 0.640  | ×     | 0.706 | 0.649  | ○     | 0.882 | 0.638  |
| 35    | 37    | e918  | 2.56 | 0.438 | -     | -      | -     | ×     | 0.143  | 0.714 | ×     | 0.457 | 0.640  | ○     | 0.714 | 0.676  | ○     | 0.886 | 0.660  |
| 36    | 30    | 9e4e  | 2.89 | 0.437 | -     | -      | -     | ×     | 0.139  | 0.714 | ×     | 0.444 | 0.640  | ○     | 0.722 | 0.703  | ○     | 0.889 | 0.681  |
| 37    | 11    | cea5  | 3.33 | 0.437 | -     | -      | -     | ×     | 0.135  | 0.714 | ○     | 0.459 | 0.680  | ○     | 0.730 | 0.730  | ○     | 0.892 | 0.702  |
| 38    | 22    | dbcf  | 3.00 | 0.436 | -     | -      | -     | ×     | 0.132  | 0.714 | ○     | 0.474 | 0.720  | ○     | 0.737 | 0.757  | ○     | 0.895 | 0.723  |
| 39    | 23    | ea3d  | 3.00 | 0.435 | -     | -      | -     | ×     | 0.128  | 0.714 | ○     | 0.487 | 0.760  | ○     | 0.744 | 0.784  | ○     | 0.897 | 0.745  |
| 40    | 45    | 4d52  | 2.11 | 0.435 | -     | -      | -     | ×     | 0.125  | 0.714 | ×     | 0.475 | 0.760  |       | 0.725 | 0.784  | ○     | 0.900 | 0.766  |
| 41    | 15    | 722a  | 3.22 | 0.434 | -     | -      | -     | ×     | 0.122  | 0.714 | ○     | 0.488 | 0.800  | ○     | 0.732 | 0.811  | ○     | 0.902 | 0.787  |
| 42    | 31    | f41b  | 2.89 | 0.434 | -     | -      | -     | ×     | 0.119  | 0.714 | ×     | 0.476 | 0.800  | ○     | 0.738 | 0.838  | ○     | 0.905 | 0.809  |
| 43    | 35    | 3ecc  | 2.67 | 0.434 | -     | -      | -     | ×     | 0.116  | 0.714 | ×     | 0.465 | 0.800  | ○     | 0.744 | 0.865  | ○     | 0.907 | 0.830  |
| 44    | 7     | 43ce  | 3.56 | 0.432 | -     | -      | -     | ○     | 0.136  | 0.857 | ○     | 0.477 | 0.840  | ○     | 0.750 | 0.892  | ○     | 0.909 | 0.851  |
| 45    | 48    | 4fad  | 1.89 | 0.432 | -     | -      | -     | ×     | 0.133  | 0.857 | ×     | 0.467 | 0.840  | ×     | 0.733 | 0.892  | ×     | 0.889 | 0.851  |
| 46    | 47    | 5d39  | 2.00 | 0.431 | -     | -      | -     | ×     | 0.130  | 0.857 | ×     | 0.457 | 0.840  | ×     | 0.717 | 0.892  | ○     | 0.891 | 0.872  |
| 47    | 4     | 85a7  | 3.78 | 0.430 | -     | -      | -     | ○     | 0.149  | 1.00  | ○     | 0.468 | 0.880  | ○     | 0.723 | 0.919  | ○     | 0.894 | 0.894  |
| 48    | 49    | 1334  | 1.78 | 0.427 | -     | -      | -     | -     | -      | -     | ○     | 0.458 | 0.880  | ×     | 0.708 | 0.919  | ×     | 0.875 | 0.894  |
| 49    | 24    | 0f35  | 3.00 | 0.426 | -     | -      | -     | -     | -      | -     | ○     | 0.469 | 0.920  | ○     | 0.714 | 0.946  | ○     | 0.878 | 0.915  |
| 50    | 25    | c4fe  | 3.00 | 0.425 | -     | -      | -     | -     | -      | -     | ○     | 0.480 | 0.960  | ○     | 0.720 | 0.973  | ○     | 0.880 | 0.936  |
| 51    | 18    | 902a  | 3.11 | 0.424 | -     | -      | -     | -     | -      | -     | ○     | 0.490 | 1.00   | ○     | 0.725 | 1.00   | ○     | 0.882 | 0.957  |
| 52    | 41    | 05d6  | 2.33 | 0.423 | -     | -      | -     | -     | -      | -     | -     | -     | -      | -     | -     | -      | ○     | 0.885 | 0.979  |
| 53    | 42    | 5107  | 2.33 | 0.421 | -     | -      | -     | -     | -      | -     | -     | -     | -      | -     | -     | -      | ○     | 0.887 | 1.00   |

**Table D-6: Precision and Recall on PC (Over 4.0, Male, Distance).**

| Rank<br>Dis | Rank<br>Exp | ID   | BAFR | Dis   | n=4.0 |        |       | n=3.5 |        |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|-------------|-------------|------|------|-------|-------|--------|-------|-------|--------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|             |             |      |      |       | Rel   | Pre    | Rec   | Rel   | Pre    | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1           | 46          | 321a | 2.00 | 0.608 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000 | 0.000  | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0213 |
| 2           | 43          | df75 | 2.22 | 0.713 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000 | 0.000  | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0426 |
| 3           | 16          | d4f3 | 3.11 | 0.734 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.333 | 0.0400 | ○     | 0.333 | 0.0270 | ○     | 1.00  | 0.0638 |
| 4           | 8           | c762 | 3.33 | 0.736 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.500 | 0.0800 | ○     | 0.500 | 0.0541 | ○     | 1.00  | 0.0851 |
| 5           | 36          | ee5a | 2.56 | 0.774 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.400 | 0.0800 | ○     | 0.600 | 0.0811 | ○     | 1.00  | 0.106  |
| 6           | 26          | 1a9a | 2.89 | 0.783 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.0800 | ○     | 0.667 | 0.108  | ○     | 1.00  | 0.128  |
| 7           | 34          | e6ed | 2.67 | 0.783 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.286 | 0.0800 | ○     | 0.714 | 0.135  | ○     | 1.00  | 0.149  |
| 8           | 12          | 6a0a | 3.22 | 0.783 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.375 | 0.120  | ○     | 0.750 | 0.162  | ○     | 1.00  | 0.170  |
| 9           | 19          | f74f | 3.00 | 0.788 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 0.444 | 0.160  | ○     | 0.778 | 0.189  | ○     | 1.00  | 0.191  |
| 10          | 27          | 0f70 | 2.89 | 0.805 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.400 | 0.160  | ○     | 0.800 | 0.216  | ○     | 1.00  | 0.213  |
| 11          | 50          | b0ae | 1.67 | 0.809 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.364 | 0.160  | ×     | 0.727 | 0.216  | ×     | 0.909 | 0.213  |
| 12          | 53          | d608 | 1.22 | 0.809 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.160  | ×     | 0.667 | 0.216  | ×     | 0.833 | 0.213  |
| 13          | 1           | a541 | 4.22 | 0.831 | ○     | 0.0769 | 0.500 | ○     | 0.0769 | 0.143 | ○     | 0.385 | 0.200  | ○     | 0.692 | 0.243  | ○     | 0.846 | 0.234  |
| 14          | 20          | 07d5 | 3.00 | 0.832 | ×     | 0.0714 | 0.500 | ×     | 0.0714 | 0.143 | ○     | 0.429 | 0.240  | ○     | 0.714 | 0.270  | ○     | 0.857 | 0.255  |
| 15          | 9           | 70a3 | 3.33 | 0.835 | ×     | 0.0667 | 0.500 | ×     | 0.0667 | 0.143 | ○     | 0.467 | 0.280  | ○     | 0.733 | 0.297  | ○     | 0.867 | 0.277  |
| 16          | 39          | 4a1b | 2.33 | 0.845 | ×     | 0.0625 | 0.500 | ×     | 0.0625 | 0.143 | ×     | 0.438 | 0.280  | ×     | 0.688 | 0.297  | ○     | 0.875 | 0.298  |
| 17          | 38          | d45b | 2.44 | 0.847 | ×     | 0.0588 | 0.500 | ×     | 0.0588 | 0.143 | ×     | 0.412 | 0.280  | ×     | 0.647 | 0.297  | ○     | 0.882 | 0.319  |
| 18          | 13          | f01c | 3.22 | 0.866 | ×     | 0.0556 | 0.500 | ×     | 0.0556 | 0.143 | ○     | 0.444 | 0.320  | ○     | 0.667 | 0.324  | ○     | 0.889 | 0.340  |
| 19          | 6           | a8a5 | 3.56 | 0.899 | ×     | 0.0526 | 0.500 | ○     | 0.105  | 0.286 | ○     | 0.474 | 0.360  | ○     | 0.684 | 0.351  | ○     | 0.895 | 0.362  |
| 20          | 52          | a04f | 1.33 | 0.899 | ×     | 0.0500 | 0.500 | ×     | 0.100  | 0.286 | ×     | 0.450 | 0.360  | ×     | 0.650 | 0.351  | ×     | 0.850 | 0.362  |
| 21          | 2           | f9cf | 4.00 | 0.902 | ○     | 0.0952 | 1.00  | ○     | 0.143  | 0.429 | ○     | 0.476 | 0.400  | ○     | 0.667 | 0.378  | ○     | 0.857 | 0.383  |
| 22          | 28          | 643a | 2.89 | 0.904 | -     | -      | -     | ×     | 0.136  | 0.429 | ×     | 0.455 | 0.400  | ○     | 0.682 | 0.405  | ○     | 0.864 | 0.404  |
| 23          | 17          | 5ddf | 3.11 | 0.907 | -     | -      | -     | ×     | 0.130  | 0.429 | ○     | 0.478 | 0.440  | ○     | 0.696 | 0.432  | ○     | 0.870 | 0.426  |
| 24          | 21          | 657c | 3.00 | 0.908 | -     | -      | -     | ×     | 0.125  | 0.429 | ○     | 0.500 | 0.480  | ○     | 0.708 | 0.459  | ○     | 0.875 | 0.447  |
| 25          | 40          | e715 | 2.33 | 0.915 | -     | -      | -     | ×     | 0.120  | 0.429 | ×     | 0.480 | 0.480  | ×     | 0.680 | 0.459  | ○     | 0.880 | 0.468  |
| 26          | 29          | 4070 | 2.89 | 0.917 | -     | -      | -     | ×     | 0.115  | 0.429 | ×     | 0.462 | 0.480  | ×     | 0.692 | 0.486  | ○     | 0.885 | 0.489  |
| 27          | 14          | eb37 | 3.22 | 0.933 | -     | -      | -     | ×     | 0.111  | 0.429 | ○     | 0.481 | 0.520  | ○     | 0.704 | 0.514  | ○     | 0.889 | 0.511  |
| 28          | 51          | 978b | 1.44 | 0.934 | -     | -      | -     | ×     | 0.107  | 0.429 | ×     | 0.464 | 0.520  | ×     | 0.679 | 0.514  | ×     | 0.857 | 0.511  |
| 29          | 32          | bda0 | 2.78 | 0.952 | -     | -      | -     | ×     | 0.103  | 0.429 | ×     | 0.448 | 0.520  | ○     | 0.690 | 0.541  | ○     | 0.862 | 0.532  |
| 30          | 33          | dae5 | 2.78 | 0.972 | -     | -      | -     | ×     | 0.100  | 0.429 | ×     | 0.433 | 0.520  | ○     | 0.700 | 0.568  | ○     | 0.867 | 0.553  |
| 31          | 10          | bba0 | 3.33 | 0.975 | -     | -      | -     | ×     | 0.0968 | 0.429 | ○     | 0.452 | 0.560  | ○     | 0.710 | 0.595  | ○     | 0.871 | 0.574  |
| 32          | 3           | 098e | 3.78 | 0.991 | -     | -      | -     | ○     | 0.125  | 0.571 | ○     | 0.469 | 0.600  | ○     | 0.719 | 0.622  | ○     | 0.875 | 0.596  |
| 33          | 44          | 784e | 3.22 | 1.001 | -     | -      | -     | ×     | 0.121  | 0.571 | ×     | 0.455 | 0.600  | ×     | 0.697 | 0.622  | ○     | 0.879 | 0.617  |
| 34          | 15          | 722a | 2.22 | 1.013 | -     | -      | -     | ×     | 0.118  | 0.571 | ○     | 0.471 | 0.640  | ○     | 0.706 | 0.649  | ○     | 0.882 | 0.638  |
| 35          | 37          | e918 | 2.56 | 1.017 | -     | -      | -     | ×     | 0.114  | 0.571 | ×     | 0.457 | 0.640  | ○     | 0.714 | 0.676  | ○     | 0.886 | 0.660  |
| 36          | 30          | 9e4e | 2.89 | 1.018 | -     | -      | -     | ×     | 0.111  | 0.571 | ×     | 0.444 | 0.640  | ○     | 0.722 | 0.703  | ○     | 0.889 | 0.681  |
| 37          | 11          | cea5 | 3.33 | 1.020 | -     | -      | -     | ×     | 0.108  | 0.571 | ○     | 0.459 | 0.680  | ○     | 0.730 | 0.730  | ○     | 0.892 | 0.702  |
| 38          | 22          | dbcf | 3.00 | 1.023 | -     | -      | -     | ×     | 0.105  | 0.571 | ○     | 0.474 | 0.720  | ○     | 0.737 | 0.757  | ○     | 0.895 | 0.723  |
| 39          | 23          | ea3d | 3.00 | 1.023 | -     | -      | -     | ×     | 0.103  | 0.571 | ○     | 0.487 | 0.760  | ○     | 0.744 | 0.784  | ○     | 0.897 | 0.745  |
| 40          | 45          | 4d52 | 2.11 | 1.023 | -     | -      | -     | ×     | 0.100  | 0.571 | ×     | 0.475 | 0.760  | ×     | 0.725 | 0.784  | ○     | 0.900 | 0.766  |
| 41          | 31          | f41b | 2.89 | 1.026 | -     | -      | -     | ×     | 0.0976 | 0.571 | ×     | 0.463 | 0.760  | ○     | 0.732 | 0.811  | ○     | 0.902 | 0.787  |
| 42          | 35          | 3ecc | 2.67 | 1.026 | -     | -      | -     | ×     | 0.0952 | 0.571 | ×     | 0.452 | 0.760  | ○     | 0.738 | 0.838  | ○     | 0.905 | 0.809  |
| 43          | 7           | 43ce | 3.56 | 1.031 | -     | -      | -     | ○     | 0.116  | 0.714 | ○     | 0.465 | 0.800  | ○     | 0.744 | 0.865  | ○     | 0.907 | 0.830  |
| 44          | 48          | 4fad | 1.89 | 1.031 | -     | -      | -     | ×     | 0.114  | 0.714 | ×     | 0.455 | 0.800  | ×     | 0.727 | 0.865  | ×     | 0.886 | 0.830  |
| 45          | 5           | cdfb | 3.67 | 1.032 | -     | -      | -     | ○     | 0.133  | 0.857 | ○     | 0.467 | 0.840  | ○     | 0.733 | 0.892  | ○     | 0.889 | 0.851  |
| 46          | 47          | 5d39 | 2.00 | 1.034 | -     | -      | -     | ×     | 0.130  | 0.857 | ×     | 0.457 | 0.840  | ×     | 0.717 | 0.892  | ○     | 0.891 | 0.872  |
| 47          | 4           | 85a7 | 3.78 | 1.036 | -     | -      | -     | ○     | 0.149  | 1.00  | ○     | 0.468 | 0.880  | ○     | 0.723 | 0.919  | ○     | 0.894 | 0.894  |
| 48          | 49          | 1334 | 1.78 | 1.044 | -     | -      | -     | -     | -      | -     | ×     | 0.458 | 0.880  | ×     | 0.708 | 0.919  | ×     | 0.875 | 0.894  |
| 49          | 24          | 0f35 | 3.00 | 1.046 | -     | -      | -     | -     | -      | -     | ○     | 0.469 | 0.920  | ○     | 0.714 | 0.946  | ○     | 0.878 | 0.915  |
| 50          | 25          | e4fc | 3.00 | 1.047 | -     | -      | -     | -     | -      | -     | ○     | 0.480 | 0.960  | ○     | 0.720 | 0.973  | ○     | 0.880 | 0.936  |
| 51          | 18          | 902a | 3.11 | 1.051 | -     | -      | -     | -     | -      | -     | ○     | 0.490 | 1.00   | ○     | 0.725 | 1.00   | ○     | 0.882 | 0.957  |
| 52          | 41          | 05d6 | 2.33 | 1.054 | -     | -      | -     | -     | -      | -     | -     | -     | -      | -     | -     | -      | ○     | 0.885 | 0.979  |
| 53          | 42          | 5107 | 2.33 | 1.058 | -     | -      | -     | -     | -      | -     | -     | -     | -      | -     | -     | -      | ○     | 0.887 | 1.00   |



Table D-7: Precision and Recall on Love (Male, Proposed).

| Rank_Proposed | Rank_Exp | ID   | BAFR | App | S     | n=3.5 |        |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|---------------|----------|------|------|-----|-------|-------|--------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|               |          |      |      |     |       | Rel   | Pre    | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1             | 4        | 098e | 3.22 | 32  | 22.1  | ×     | 0.000  | 0.000 | ○     | 1.00  | 0.0769 | ○     | 1.00  | 0.0417 | ○     | 1.00  | 0.0263 |
| 2             | 3        | cdfb | 3.33 | 14  | 9.51  | ×     | 0.000  | 0.000 | ○     | 1.00  | 0.154  | ○     | 1.00  | 0.0833 | ○     | 1.00  | 0.0526 |
| 3             | 15       | 784e | 2.78 | 10  | 6.72  | ×     | 0.000  | 0.000 | ×     | 0.667 | 0.154  | ○     | 1.00  | 0.125  | ○     | 1.00  | 0.0789 |
| 4             | 22       | 321a | 2.56 | 3   | 2.19  | ×     | 0.000  | 0.000 | ×     | 0.500 | 0.154  | ○     | 1.00  | 0.167  | ○     | 1.00  | 0.105  |
| 5             | 21       | a541 | 2.67 | 3   | 2.10  | ×     | 0.000  | 0.000 | ×     | 0.400 | 0.154  | ○     | 1.00  | 0.208  | ○     | 1.00  | 0.132  |
| 6             | 24       | 4070 | 2.56 | 2   | 1.35  | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.154  | ○     | 1.00  | 0.250  | ○     | 1.00  | 0.158  |
| 7             | 14       | 70a3 | 2.89 | 1   | 0.820 | ×     | 0.000  | 0.000 | ×     | 0.286 | 0.154  | ○     | 1.00  | 0.292  | ○     | 1.00  | 0.184  |
| 8             | 16       | 6bda | 2.78 | 1   | 0.790 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.154  | ○     | 1.00  | 0.333  | ○     | 1.00  | 0.211  |
| 9             | 31       | b1fc | 2.33 | 1   | 0.738 | ×     | 0.000  | 0.000 | ×     | 0.222 | 0.154  | ×     | 0.889 | 0.333  | ○     | 1.00  | 0.237  |
| 10            | 33       | 975f | 2.11 | 1   | 0.738 | ×     | 0.000  | 0.000 | ×     | 0.200 | 0.154  | ×     | 0.800 | 0.333  | ○     | 1.00  | 0.263  |
| 11            | 17       | c4db | 2.78 | 1   | 0.732 | ×     | 0.000  | 0.000 | ×     | 0.182 | 0.154  | ○     | 0.818 | 0.375  | ○     | 1.00  | 0.289  |
| 12            | 18       | d9a9 | 2.78 | 1   | 0.724 | ×     | 0.000  | 0.000 | ×     | 0.167 | 0.154  | ○     | 0.833 | 0.417  | ○     | 1.00  | 0.316  |
| 13            | 23       | b0ae | 2.56 | 1   | 0.720 | ×     | 0.000  | 0.000 | ×     | 0.154 | 0.154  | ○     | 0.846 | 0.458  | ○     | 1.00  | 0.342  |
| 14            | 19       | a09a | 2.78 | 1   | 0.719 | ×     | 0.000  | 0.000 | ×     | 0.143 | 0.154  | ○     | 0.857 | 0.500  | ○     | 1.00  | 0.368  |
| 15            | 39       | 3cb0 | 1.89 | 1   | 0.713 | ×     | 0.000  | 0.000 | ×     | 0.133 | 0.154  | ×     | 0.800 | 0.500  | ×     | 0.933 | 0.368  |
| 16            | 10       | 643a | 3.00 | 1   | 0.704 | ×     | 0.000  | 0.000 | ○     | 0.188 | 0.231  | ○     | 0.813 | 0.542  | ○     | 0.938 | 0.395  |
| 17            | 7        | 4d52 | 3.11 | 1   | 0.703 | ×     | 0.000  | 0.000 | ○     | 0.235 | 0.308  | ○     | 0.824 | 0.583  | ○     | 0.941 | 0.421  |
| 18            | 32       | 9d65 | 2.33 | 1   | 0.699 | ×     | 0.000  | 0.000 | ×     | 0.222 | 0.308  | ×     | 0.778 | 0.583  | ○     | 0.944 | 0.447  |
| 19            | 5        | b457 | 3.22 | 1   | 0.693 | ×     | 0.000  | 0.000 | ○     | 0.263 | 0.385  | ○     | 0.789 | 0.625  | ○     | 0.947 | 0.474  |
| 20            | 35       | 09e1 | 2.00 | 1   | 0.678 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.385  | ×     | 0.750 | 0.625  | ○     | 0.950 | 0.500  |
| 21            | 41       | aada | 1.44 | 1   | 0.678 | ×     | 0.000  | 0.000 | ×     | 0.238 | 0.385  | ×     | 0.714 | 0.625  | ×     | 0.905 | 0.500  |
| 22            | 11       | 2ad2 | 3.00 | 1   | 0.669 | ×     | 0.000  | 0.000 | ○     | 0.273 | 0.462  | ○     | 0.727 | 0.667  | ○     | 0.909 | 0.526  |
| 23            | 2        | 0eb4 | 3.33 | 1   | 0.667 | ×     | 0.000  | 0.000 | ○     | 0.304 | 0.538  | ○     | 0.739 | 0.708  | ○     | 0.913 | 0.553  |
| 24            | 25       | ec36 | 2.44 | 1   | 0.665 | ×     | 0.000  | 0.000 | ×     | 0.292 | 0.538  | ×     | 0.708 | 0.708  | ○     | 0.917 | 0.579  |
| 25            | 20       | a54b | 2.78 | 1   | 0.664 | ×     | 0.000  | 0.000 | ×     | 0.280 | 0.538  | ○     | 0.720 | 0.750  | ○     | 0.920 | 0.605  |
| 26            | 26       | c762 | 2.44 | 1   | 0.656 | ×     | 0.000  | 0.000 | ×     | 0.269 | 0.538  | ×     | 0.692 | 0.750  | ○     | 0.923 | 0.632  |
| 27            | 42       | 1c66 | 1.33 | 1   | 0.654 | ×     | 0.000  | 0.000 | ×     | 0.259 | 0.538  | ×     | 0.667 | 0.750  | ×     | 0.889 | 0.632  |
| 28            | 8        | 721f | 3.11 | 1   | 0.654 | ×     | 0.000  | 0.000 | ○     | 0.286 | 0.615  | ○     | 0.679 | 0.792  | ○     | 0.893 | 0.658  |
| 29            | 27       | 6a33 | 2.44 | 1   | 0.652 | ×     | 0.000  | 0.000 | ×     | 0.276 | 0.615  | ×     | 0.655 | 0.792  | ○     | 0.897 | 0.684  |
| 30            | 28       | 722a | 2.44 | 1   | 0.651 | ×     | 0.000  | 0.000 | ×     | 0.267 | 0.615  | ×     | 0.633 | 0.792  | ○     | 0.900 | 0.711  |
| 31            | 36       | 5c2e | 2.00 | 1   | 0.651 | ×     | 0.000  | 0.000 | ×     | 0.258 | 0.615  | ×     | 0.613 | 0.792  | ○     | 0.903 | 0.737  |
| 32            | 9        | 91f3 | 3.11 | 1   | 0.647 | ×     | 0.000  | 0.000 | ○     | 0.281 | 0.692  | ○     | 0.625 | 0.833  | ○     | 0.906 | 0.763  |
| 33            | 1        | 55b6 | 3.56 | 1   | 0.645 | ○     | 0.0303 | 1.00  | ○     | 0.303 | 0.769  | ○     | 0.636 | 0.875  | ○     | 0.909 | 0.789  |
| 34            | 12       | f0a2 | 3.00 | 1   | 0.644 | -     | -      | -     | ○     | 0.324 | 0.846  | ○     | 0.647 | 0.917  | ○     | 0.912 | 0.816  |
| 35            | 34       | d1e9 | 2.11 | 1   | 0.643 | -     | -      | -     | ×     | 0.314 | 0.846  | ×     | 0.629 | 0.917  | ○     | 0.914 | 0.842  |
| 36            | 37       | 9be7 | 2.00 | 1   | 0.640 | -     | -      | -     | ×     | 0.306 | 0.846  | ×     | 0.611 | 0.917  | ○     | 0.917 | 0.868  |
| 37            | 29       | 45cc | 2.44 | 1   | 0.639 | -     | -      | -     | ×     | 0.297 | 0.846  | ×     | 0.595 | 0.917  | ○     | 0.919 | 0.895  |
| 38            | 40       | fd4b | 1.89 | 1   | 0.639 | -     | -      | -     | ×     | 0.289 | 0.846  | ×     | 0.579 | 0.917  | ×     | 0.895 | 0.895  |
| 39            | 6        | ee5a | 3.22 | 1   | 0.638 | -     | -      | -     | ○     | 0.308 | 0.923  | ○     | 0.590 | 0.958  | ○     | 0.897 | 0.921  |
| 40            | 38       | 3782 | 2.00 | 1   | 0.637 | -     | -      | -     | ×     | 0.300 | 0.923  | ×     | 0.575 | 0.958  | ○     | 0.900 | 0.947  |
| 41            | 13       | 08d8 | 3.00 | 1   | 0.634 | -     | -      | -     | ○     | 0.317 | 1.00   | ○     | 0.585 | 1.00   | ○     | 0.902 | 0.974  |
| 42            | 30       | 4185 | 2.44 | 1   | 0.629 | -     | -      | -     | -     | -     | -      | -     | -     | -      | ○     | 0.905 | 1.00   |

**Table D-8: Precision and Recall on Love (Male, Averaged Score).**

| Rank_<br>Ave_Score | Rank_<br>Exp | ID    | BAFR | Ave_<br>Score | n=3.5 |        |       | n=3.0 |        |        | n=2.5 |       |        | n=2.0 |       |        |
|--------------------|--------------|-------|------|---------------|-------|--------|-------|-------|--------|--------|-------|-------|--------|-------|-------|--------|
|                    |              |       |      |               | Rel   | Pre    | Rec   | Rel   | Pre    | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1                  | 14           | 70a3  | 2.89 | 0.820         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.0417 | ○     | 1.00  | 0.0263 |
| 2                  | 16           | 6bda  | 2.78 | 0.790         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.0833 | ○     | 1.00  | 0.0526 |
| 3                  | 31           | b1fc  | 2.33 | 0.738         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.667 | 0.0833 | ○     | 1.00  | 0.0789 |
| 4                  | 33           | 975f  | 2.11 | 0.738         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.500 | 0.0833 | ○     | 1.00  | 0.105  |
| 5                  | 17           | c4db  | 2.78 | 0.732         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.600 | 0.125  | ○     | 1.00  | 0.132  |
| 6                  | 22           | 321a  | 2.56 | 0.730         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.667 | 0.167  | ○     | 1.00  | 0.158  |
| 7                  | 18           | d9a9  | 2.78 | 0.724         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.714 | 0.208  | ○     | 1.00  | 0.184  |
| 8                  | 23           | b0ac  | 2.56 | 0.720         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.750 | 0.250  | ○     | 1.00  | 0.211  |
| 9                  | 19           | a09a  | 2.78 | 0.719         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.778 | 0.292  | ○     | 1.00  | 0.237  |
| 10                 | 39           | 3cb0  | 1.89 | 0.713         | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.700 | 0.292  | ×     | 0.900 | 0.237  |
| 11                 | 10           | 643a  | 3.00 | 0.704         | ×     | 0.000  | 0.000 | ○     | 0.0909 | 0.0769 | ○     | 0.727 | 0.333  | ○     | 0.909 | 0.263  |
| 12                 | 7            | 4d52  | 3.11 | 0.703         | ×     | 0.000  | 0.000 | ○     | 0.167  | 0.154  | ○     | 0.750 | 0.375  | ○     | 0.917 | 0.289  |
| 13                 | 21           | a541  | 2.67 | 0.699         | ×     | 0.000  | 0.000 | ×     | 0.154  | 0.154  | ○     | 0.769 | 0.417  | ○     | 0.923 | 0.316  |
| 14                 | 32           | 9d65  | 2.33 | 0.699         | ×     | 0.000  | 0.000 | ×     | 0.143  | 0.154  | ×     | 0.714 | 0.417  | ○     | 0.929 | 0.342  |
| 15                 | 5            | b457  | 3.22 | 0.693         | ×     | 0.000  | 0.000 | ○     | 0.200  | 0.231  | ○     | 0.733 | 0.458  | ○     | 0.933 | 0.368  |
| 16                 | 4            | 098e  | 3.22 | 0.690         | ×     | 0.000  | 0.000 | ○     | 0.250  | 0.308  | ○     | 0.750 | 0.500  | ○     | 0.938 | 0.395  |
| 17                 | 3            | cdfb  | 3.33 | 0.679         | ×     | 0.000  | 0.000 | ○     | 0.294  | 0.385  | ○     | 0.765 | 0.542  | ○     | 0.941 | 0.421  |
| 18                 | 35           | 09e1  | 2.00 | 0.678         | ×     | 0.000  | 0.000 | ×     | 0.278  | 0.385  | ×     | 0.722 | 0.542  | ○     | 0.944 | 0.447  |
| 19                 | 41           | aada  | 1.44 | 0.678         | ×     | 0.000  | 0.000 | ×     | 0.263  | 0.385  | ×     | 0.684 | 0.542  | ×     | 0.895 | 0.447  |
| 20                 | 24           | 4070  | 2.56 | 0.676         | ×     | 0.000  | 0.000 | ×     | 0.250  | 0.385  | ○     | 0.700 | 0.583  | ○     | 0.900 | 0.474  |
| 21                 | 15           | 784e  | 2.78 | 0.672         | ×     | 0.000  | 0.000 | ×     | 0.238  | 0.385  | ○     | 0.714 | 0.625  | ○     | 0.905 | 0.500  |
| 22                 | 11           | 2ad2  | 3.00 | 0.669         | ×     | 0.000  | 0.000 | ○     | 0.273  | 0.462  | ○     | 0.727 | 0.667  | ○     | 0.909 | 0.526  |
| 23                 | 2            | 0eb4  | 3.33 | 0.667         | ×     | 0.000  | 0.000 | ○     | 0.304  | 0.538  | ○     | 0.739 | 0.708  | ○     | 0.913 | 0.553  |
| 24                 | 25           | ec36  | 2.44 | 0.665         | ×     | 0.000  | 0.000 | ×     | 0.292  | 0.538  | ×     | 0.708 | 0.708  | ○     | 0.917 | 0.579  |
| 25                 | 20           | a54b  | 2.78 | 0.664         | ×     | 0.000  | 0.000 | ×     | 0.280  | 0.538  | ○     | 0.720 | 0.750  | ○     | 0.920 | 0.605  |
| 26                 | 26           | c762  | 2.44 | 0.656         | ×     | 0.000  | 0.000 | ×     | 0.269  | 0.538  | ×     | 0.692 | 0.750  | ○     | 0.923 | 0.632  |
| 27                 | 42           | 1c66  | 1.33 | 0.654         | ×     | 0.000  | 0.000 | ×     | 0.259  | 0.538  | ×     | 0.667 | 0.750  | ×     | 0.889 | 0.632  |
| 28                 | 8            | 721f  | 3.11 | 0.654         | ×     | 0.000  | 0.000 | ○     | 0.286  | 0.615  | ○     | 0.679 | 0.792  | ○     | 0.893 | 0.658  |
| 29                 | 27           | 6a33  | 2.44 | 0.652         | ×     | 0.000  | 0.000 | ×     | 0.276  | 0.615  | ×     | 0.655 | 0.792  | ○     | 0.897 | 0.684  |
| 30                 | 28           | 722a  | 2.44 | 0.651         | ×     | 0.000  | 0.000 | ×     | 0.267  | 0.615  | ×     | 0.633 | 0.792  | ○     | 0.900 | 0.711  |
| 31                 | 36           | 5c2e  | 2.00 | 0.651         | ×     | 0.000  | 0.000 | ×     | 0.258  | 0.615  | ×     | 0.613 | 0.792  | ○     | 0.903 | 0.737  |
| 32                 | 9            | 91f3  | 3.11 | 0.647         | ×     | 0.000  | 0.000 | ○     | 0.281  | 0.692  | ○     | 0.625 | 0.833  | ○     | 0.906 | 0.763  |
| 33                 | 1            | 55b6  | 3.56 | 0.645         | ○     | 0.0303 | 1.00  | ○     | 0.303  | 0.769  | ○     | 0.636 | 0.875  | ○     | 0.909 | 0.789  |
| 34                 | 12           | f0a2f | 3.00 | 0.644         | -     | -      | -     | ○     | 0.324  | 0.846  | ○     | 0.647 | 0.917  | ○     | 0.912 | 0.816  |
| 35                 | 34           | d1e9  | 2.11 | 0.643         | -     | -      | -     | ×     | 0.314  | 0.846  | ×     | 0.629 | 0.917  | ○     | 0.914 | 0.842  |
| 36                 | 37           | 9be7  | 2.00 | 0.640         | -     | -      | -     | ×     | 0.306  | 0.846  | ×     | 0.611 | 0.917  | ○     | 0.917 | 0.868  |
| 37                 | 29           | 45cc  | 2.44 | 0.639         | -     | -      | -     | ×     | 0.297  | 0.846  | ×     | 0.595 | 0.917  | ○     | 0.919 | 0.895  |
| 38                 | 40           | fd4b  | 1.89 | 0.639         | -     | -      | -     | ×     | 0.289  | 0.846  | ×     | 0.579 | 0.917  | ×     | 0.895 | 0.895  |
| 39                 | 6            | ee5a  | 3.22 | 0.638         | -     | -      | -     | ○     | 0.308  | 0.923  | ○     | 0.590 | 0.958  | ○     | 0.897 | 0.921  |
| 40                 | 38           | 3782  | 2.00 | 0.637         | -     | -      | -     | ×     | 0.300  | 0.923  | ×     | 0.575 | 0.958  | ○     | 0.900 | 0.947  |
| 41                 | 13           | 08d8  | 3.00 | 0.634         | -     | -      | -     | ○     | 0.317  | 1.00   | ○     | 0.585 | 1.00   | ○     | 0.902 | 0.974  |
| 42                 | 30           | 4185  | 2.44 | 0.629         | -     | -      | -     | -     | -      | -      | -     | -     | -      | ○     | 0.905 | 1.00   |

**Table D-9: Precision and Recall on Love (Male, Distance).**

| Rank_<br>Dis | Rank_<br>Exp | ID   | BAFR | Dis   | n=3.5 |        |       | n=3.0 |        |        | n=2.5 |       |        | n=2.0 |       |        |
|--------------|--------------|------|------|-------|-------|--------|-------|-------|--------|--------|-------|-------|--------|-------|-------|--------|
|              |              |      |      |       | Rel   | Pre    | Rec   | Rel   | Pre    | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1            | 14           | 70a3 | 2.89 | 0.690 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.0417 | ○     | 1.00  | 0.0263 |
| 2            | 22           | 321a | 2.56 | 0.700 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.0833 | ○     | 1.00  | 0.0526 |
| 3            | 15           | 784e | 2.78 | 0.705 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.125  | ○     | 1.00  | 0.079  |
| 4            | 16           | 6bda | 2.78 | 0.716 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.167  | ○     | 1.00  | 0.105  |
| 5            | 21           | a541 | 2.67 | 0.743 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.208  | ○     | 1.00  | 0.132  |
| 6            | 31           | b1fc | 2.33 | 0.767 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.833 | 0.208  | ○     | 1.00  | 0.158  |
| 7            | 33           | 975f | 2.11 | 0.767 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.714 | 0.208  | ○     | 1.00  | 0.184  |
| 8            | 17           | c4db | 2.78 | 0.772 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.750 | 0.250  | ○     | 1.00  | 0.211  |
| 9            | 18           | d9a9 | 2.78 | 0.781 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.778 | 0.292  | ○     | 1.00  | 0.237  |
| 10           | 23           | b0ae | 2.56 | 0.785 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.800 | 0.333  | ○     | 1.00  | 0.263  |
| 11           | 19           | a09a | 2.78 | 0.787 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.818 | 0.375  | ○     | 1.00  | 0.289  |
| 12           | 39           | 3cb0 | 1.89 | 0.793 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.750 | 0.375  | ×     | 0.917 | 0.289  |
| 13           | 4            | 098e | 3.22 | 0.800 | ×     | 0.000  | 0.000 | ○     | 0.0769 | 0.0769 | ○     | 0.769 | 0.417  | ○     | 0.923 | 0.316  |
| 14           | 10           | 643a | 3.00 | 0.804 | ×     | 0.000  | 0.000 | ○     | 0.143  | 0.154  | ○     | 0.786 | 0.458  | ○     | 0.929 | 0.342  |
| 15           | 7            | 4d52 | 3.11 | 0.804 | ×     | 0.000  | 0.000 | ○     | 0.200  | 0.231  | ○     | 0.800 | 0.500  | ○     | 0.933 | 0.368  |
| 16           | 32           | 9d65 | 2.33 | 0.809 | ×     | 0.000  | 0.000 | ×     | 0.188  | 0.231  | ×     | 0.750 | 0.500  | ×     | 0.938 | 0.395  |
| 17           | 5            | b457 | 3.22 | 0.815 | ×     | 0.000  | 0.000 | ○     | 0.235  | 0.308  | ○     | 0.765 | 0.542  | ○     | 0.941 | 0.421  |
| 18           | 35           | 09e1 | 2.00 | 0.834 | ×     | 0.000  | 0.000 | ×     | 0.222  | 0.308  | ×     | 0.722 | 0.542  | ○     | 0.944 | 0.447  |
| 19           | 41           | aada | 1.44 | 0.834 | ×     | 0.000  | 0.000 | ×     | 0.211  | 0.308  | ×     | 0.684 | 0.542  | ×     | 0.895 | 0.447  |
| 20           | 24           | 4070 | 2.56 | 0.843 | ×     | 0.000  | 0.000 | ×     | 0.200  | 0.308  | ○     | 0.700 | 0.583  | ○     | 0.900 | 0.474  |
| 21           | 11           | 2ad2 | 3.00 | 0.845 | ×     | 0.000  | 0.000 | ○     | 0.238  | 0.385  | ○     | 0.714 | 0.625  | ○     | 0.905 | 0.500  |
| 22           | 2            | 0eb4 | 3.33 | 0.848 | ×     | 0.000  | 0.000 | ○     | 0.273  | 0.462  | ○     | 0.727 | 0.667  | ○     | 0.909 | 0.526  |
| 23           | 25           | ec36 | 2.44 | 0.850 | ×     | 0.000  | 0.000 | ×     | 0.261  | 0.462  | ×     | 0.696 | 0.667  | ○     | 0.913 | 0.553  |
| 24           | 20           | a54b | 2.78 | 0.852 | ×     | 0.000  | 0.000 | ×     | 0.250  | 0.462  | ○     | 0.708 | 0.708  | ○     | 0.917 | 0.579  |
| 25           | 26           | c762 | 2.44 | 0.862 | ×     | 0.000  | 0.000 | ×     | 0.240  | 0.462  | ×     | 0.680 | 0.708  | ○     | 0.920 | 0.605  |
| 26           | 42           | 1c66 | 1.33 | 0.864 | ×     | 0.000  | 0.000 | ×     | 0.231  | 0.462  | ×     | 0.654 | 0.708  | ×     | 0.885 | 0.605  |
| 27           | 8            | 721f | 3.11 | 0.864 | ×     | 0.000  | 0.000 | ○     | 0.259  | 0.538  | ○     | 0.667 | 0.750  | ○     | 0.889 | 0.632  |
| 28           | 27           | 6a33 | 2.44 | 0.868 | ×     | 0.000  | 0.000 | ×     | 0.250  | 0.538  | ×     | 0.643 | 0.750  | ○     | 0.893 | 0.658  |
| 29           | 28           | 722a | 2.44 | 0.868 | ×     | 0.000  | 0.000 | ×     | 0.241  | 0.538  | ×     | 0.621 | 0.750  | ○     | 0.897 | 0.684  |
| 30           | 36           | 5c2e | 2.00 | 0.869 | ×     | 0.000  | 0.000 | ×     | 0.233  | 0.538  | ×     | 0.600 | 0.750  | ○     | 0.900 | 0.711  |
| 31           | 9            | 91f3 | 3.11 | 0.874 | ×     | 0.000  | 0.000 | ○     | 0.258  | 0.615  | ○     | 0.613 | 0.792  | ○     | 0.903 | 0.737  |
| 32           | 1            | 55b6 | 3.56 | 0.877 | ○     | 0.0313 | 1.00  | ○     | 0.281  | 0.692  | ○     | 0.625 | 0.833  | ○     | 0.906 | 0.763  |
| 33           | 12           | f0a2 | 3.00 | 0.877 | -     | -      | -     | ○     | 0.303  | 0.769  | ○     | 0.636 | 0.875  | ○     | 0.909 | 0.789  |
| 34           | 34           | d1e9 | 2.11 | 0.880 | -     | -      | -     | ×     | 0.294  | 0.769  | ×     | 0.618 | 0.875  | ○     | 0.912 | 0.816  |
| 35           | 37           | 9be7 | 2.00 | 0.884 | -     | -      | -     | ×     | 0.286  | 0.769  | ×     | 0.600 | 0.875  | ○     | 0.914 | 0.842  |
| 36           | 29           | 45cc | 2.44 | 0.885 | -     | -      | -     | ×     | 0.278  | 0.769  | ×     | 0.583 | 0.875  | ○     | 0.917 | 0.868  |
| 37           | 40           | fd4b | 1.89 | 0.885 | -     | -      | -     | ×     | 0.270  | 0.769  | ×     | 0.568 | 0.875  | ×     | 0.892 | 0.868  |
| 38           | 6            | ee5a | 3.22 | 0.886 | -     | -      | -     | ○     | 0.289  | 0.846  | ○     | 0.579 | 0.917  | ○     | 0.895 | 0.895  |
| 39           | 38           | 3782 | 2.00 | 0.888 | -     | -      | -     | ×     | 0.282  | 0.846  | ×     | 0.564 | 0.917  | ○     | 0.897 | 0.921  |
| 40           | 13           | 08d8 | 3.00 | 0.892 | -     | -      | -     | ○     | 0.300  | 0.923  | ○     | 0.575 | 0.958  | ○     | 0.900 | 0.947  |
| 41           | 3            | cdfb | 3.33 | 0.895 | -     | -      | -     | ○     | 0.317  | 1.00   | ○     | 0.585 | 1.00   | ○     | 0.902 | 0.974  |
| 42           | 30           | 4185 | 2.44 | 0.899 | -     | -      | -     | -     | -      | -      | -     | -     | -      | ○     | 0.905 | 1.00   |

**Table D-10: Precision and Recall on Auction (Female, Proposed).**

| Rank_<br>Proposed | Rank_<br>Exp | ID   | BAFR | App | S     | n=4.0 |       |       | n=3.5 |       |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|-------------------|--------------|------|------|-----|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|                   |              |      |      |     |       | Rel   | Pre   | Rec   | Rel   | Pre   | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1                 | 2            | 098e | 4.33 | 28  | 22.6  | ○     | 1.000 | 0.500 | ○     | 1.00  | 0.143 | ○     | 1.00  | 0.0625 | ○     | 1.00  | 0.0385 | ○     | 1.00  | 0.0278 |
| 2                 | 6            | cdfb | 3.67 | 23  | 18.4  | ×     | 0.500 | 0.500 | ○     | 1.00  | 0.286 | ○     | 1.00  | 0.125  | ○     | 1.00  | 0.0769 | ○     | 1.00  | 0.0556 |
| 3                 | 1            | 70a3 | 4.67 | 5   | 4.01  | ○     | 0.667 | 1.000 | ○     | 1.00  | 0.429 | ○     | 1.00  | 0.188  | ○     | 1.00  | 0.115  | ○     | 1.00  | 0.0833 |
| 4                 | 21           | 784e | 2.67 | 3   | 2.40  | -     | -     | -     | ×     | 0.750 | 0.429 | ×     | 0.750 | 0.188  | ○     | 1.00  | 0.154  | ○     | 1.00  | 0.111  |
| 5                 | 12           | cea5 | 3.33 | 2   | 1.62  | -     | -     | -     | ×     | 0.600 | 0.429 | ○     | 0.800 | 0.250  | ○     | 1.00  | 0.192  | ○     | 1.00  | 0.139  |
| 6                 | 37           | 2368 | 1.67 | 2   | 1.59  | -     | -     | -     | ×     | 0.500 | 0.429 | ×     | 0.667 | 0.250  | ×     | 0.833 | 0.192  | ×     | 0.833 | 0.139  |
| 7                 | 29           | 4fbb | 2.33 | 1   | 1.00  | -     | -     | -     | ×     | 0.429 | 0.429 | ×     | 0.571 | 0.250  | ×     | 0.714 | 0.192  | ○     | 0.857 | 0.167  |
| 8                 | 15           | 643a | 3.00 | 1   | 0.988 | -     | -     | -     | ×     | 0.375 | 0.429 | ○     | 0.625 | 0.313  | ○     | 0.750 | 0.231  | ○     | 0.875 | 0.194  |
| 9                 | 27           | 1c66 | 2.33 | 1   | 0.916 | -     | -     | -     | ×     | 0.333 | 0.429 | ×     | 0.556 | 0.313  | ×     | 0.667 | 0.231  | ○     | 0.889 | 0.222  |
| 10                | 34           | 3f9d | 2.00 | 1   | 0.892 | -     | -     | -     | ×     | 0.300 | 0.429 | ×     | 0.500 | 0.313  | ×     | 0.600 | 0.231  | ○     | 0.900 | 0.250  |
| 11                | 16           | 85a7 | 3.00 | 1   | 0.878 | -     | -     | -     | ×     | 0.273 | 0.429 | ○     | 0.545 | 0.375  | ○     | 0.636 | 0.269  | ○     | 0.909 | 0.278  |
| 12                | 14           | 0bee | 3.00 | 1   | 0.866 | -     | -     | -     | ×     | 0.250 | 0.429 | ○     | 0.583 | 0.438  | ○     | 0.667 | 0.308  | ○     | 0.917 | 0.306  |
| 13                | 42           | aada | 1.33 | 1   | 0.866 | -     | -     | -     | ×     | 0.231 | 0.429 | ×     | 0.538 | 0.438  | ×     | 0.615 | 0.308  | ×     | 0.846 | 0.306  |
| 14                | 13           | 09e1 | 3.00 | 1   | 0.864 | -     | -     | -     | ×     | 0.214 | 0.429 | ○     | 0.571 | 0.500  | ○     | 0.643 | 0.346  | ○     | 0.857 | 0.333  |
| 15                | 3            | 01d5 | 3.67 | 1   | 0.858 | -     | -     | -     | ○     | 0.267 | 0.571 | ○     | 0.600 | 0.563  | ○     | 0.667 | 0.385  | ○     | 0.867 | 0.361  |
| 16                | 39           | 5e85 | 1.67 | 1   | 0.858 | -     | -     | -     | ×     | 0.250 | 0.571 | ×     | 0.563 | 0.563  | ×     | 0.625 | 0.385  | ×     | 0.813 | 0.361  |
| 17                | 28           | 2e33 | 2.33 | 1   | 0.847 | -     | -     | -     | ×     | 0.235 | 0.571 | ×     | 0.529 | 0.563  | ×     | 0.588 | 0.385  | ○     | 0.824 | 0.389  |
| 18                | 4            | 4070 | 3.67 | 1   | 0.846 | -     | -     | -     | ○     | 0.278 | 0.714 | ○     | 0.556 | 0.625  | ○     | 0.611 | 0.423  | ○     | 0.833 | 0.417  |
| 19                | 31           | 5df3 | 2.33 | 1   | 0.836 | -     | -     | -     | ×     | 0.263 | 0.714 | ×     | 0.526 | 0.625  | ×     | 0.579 | 0.423  | ○     | 0.842 | 0.444  |
| 20                | 11           | 87b0 | 3.33 | 1   | 0.815 | -     | -     | -     | ×     | 0.250 | 0.714 | ○     | 0.550 | 0.688  | ○     | 0.600 | 0.462  | ○     | 0.850 | 0.472  |
| 21                | 9            | 4a26 | 3.33 | 1   | 0.810 | -     | -     | -     | ×     | 0.238 | 0.714 | ○     | 0.571 | 0.750  | ○     | 0.619 | 0.500  | ○     | 0.857 | 0.500  |
| 22                | 36           | cd41 | 2.00 | 1   | 0.809 | -     | -     | -     | ×     | 0.227 | 0.714 | ×     | 0.545 | 0.750  | ×     | 0.591 | 0.500  | ○     | 0.864 | 0.528  |
| 23                | 35           | bc7d | 2.00 | 1   | 0.804 | -     | -     | -     | ×     | 0.217 | 0.714 | ×     | 0.522 | 0.750  | ×     | 0.565 | 0.500  | ○     | 0.870 | 0.556  |
| 24                | 24           | cb4e | 2.67 | 1   | 0.803 | -     | -     | -     | ×     | 0.208 | 0.714 | ×     | 0.500 | 0.750  | ○     | 0.583 | 0.538  | ○     | 0.875 | 0.583  |
| 25                | 5            | e4fc | 3.67 | 1   | 0.802 | -     | -     | -     | ○     | 0.240 | 0.857 | ○     | 0.520 | 0.813  | ○     | 0.600 | 0.577  | ○     | 0.880 | 0.611  |
| 26                | 41           | 43ce | 1.33 | 1   | 0.802 | -     | -     | -     | ×     | 0.231 | 0.857 | ×     | 0.500 | 0.813  | ×     | 0.577 | 0.577  | ×     | 0.846 | 0.611  |
| 27                | 22           | 8d74 | 2.67 | 1   | 0.801 | -     | -     | -     | ×     | 0.222 | 0.857 | ×     | 0.481 | 0.813  | ○     | 0.593 | 0.615  | ○     | 0.852 | 0.639  |
| 28                | 7            | e09a | 3.67 | 1   | 0.798 | -     | -     | -     | ○     | 0.250 | 1.00  | ○     | 0.500 | 0.875  | ○     | 0.607 | 0.654  | ○     | 0.857 | 0.667  |
| 29                | 32           | d9a9 | 2.33 | 1   | 0.780 | -     | -     | -     | -     | -     | -     | ×     | 0.483 | 0.875  | ×     | 0.586 | 0.654  | ○     | 0.862 | 0.694  |
| 30                | 19           | 3cb0 | 2.67 | 1   | 0.774 | -     | -     | -     | -     | -     | -     | ×     | 0.467 | 0.875  | ○     | 0.600 | 0.692  | ○     | 0.867 | 0.722  |
| 31                | 33           | df64 | 2.33 | 1   | 0.767 | -     | -     | -     | -     | -     | -     | ×     | 0.452 | 0.875  | ×     | 0.581 | 0.692  | ○     | 0.871 | 0.750  |
| 32                | 30           | 5b4b | 2.33 | 1   | 0.759 | -     | -     | -     | -     | -     | -     | ×     | 0.438 | 0.875  | ×     | 0.563 | 0.692  | ○     | 0.875 | 0.778  |
| 33                | 43           | f525 | 1.00 | 1   | 0.759 | -     | -     | -     | -     | -     | -     | ×     | 0.424 | 0.875  | ×     | 0.545 | 0.692  | ×     | 0.848 | 0.778  |
| 34                | 8            | 300c | 3.33 | 1   | 0.755 | -     | -     | -     | -     | -     | -     | ○     | 0.441 | 0.938  | ○     | 0.559 | 0.731  | ○     | 0.853 | 0.806  |
| 35                | 25           | dae5 | 2.67 | 1   | 0.754 | -     | -     | -     | -     | -     | -     | ×     | 0.429 | 0.938  | ○     | 0.571 | 0.769  | ○     | 0.857 | 0.833  |
| 36                | 18           | 27f1 | 2.67 | 1   | 0.753 | -     | -     | -     | -     | -     | -     | ×     | 0.417 | 0.938  | ○     | 0.583 | 0.808  | ○     | 0.861 | 0.861  |
| 37                | 26           | f43b | 2.67 | 1   | 0.753 | -     | -     | -     | -     | -     | -     | ×     | 0.405 | 0.938  | ○     | 0.595 | 0.846  | ○     | 0.865 | 0.889  |
| 38                | 38           | 5c14 | 1.67 | 1   | 0.753 | -     | -     | -     | -     | -     | -     | ×     | 0.395 | 0.938  | ×     | 0.579 | 0.846  | ×     | 0.842 | 0.889  |
| 39                | 23           | bf5a | 2.67 | 1   | 0.751 | -     | -     | -     | -     | -     | -     | ×     | 0.385 | 0.938  | ○     | 0.590 | 0.885  | ○     | 0.846 | 0.917  |
| 40                | 20           | 3dda | 2.67 | 1   | 0.748 | -     | -     | -     | -     | -     | -     | ×     | 0.375 | 0.938  | ○     | 0.600 | 0.923  | ○     | 0.850 | 0.944  |
| 41                | 40           | e1df | 1.67 | 1   | 0.748 | -     | -     | -     | -     | -     | -     | ×     | 0.366 | 0.938  | ×     | 0.585 | 0.923  | ×     | 0.829 | 0.944  |
| 42                | 10           | 550c | 3.33 | 1   | 0.744 | -     | -     | -     | -     | -     | -     | ○     | 0.381 | 1.00   | ○     | 0.595 | 0.962  | ○     | 0.833 | 0.972  |
| 43                | 17           | 07e7 | 2.67 | 1   | 0.744 | -     | -     | -     | -     | -     | -     | -     | -     | -      | ○     | 0.605 | 1.00   | ○     | 0.837 | 1.00   |

**Table D-11: Precision and Recall on Auction (Female, Averaged Score).**

| Rank_ | Ave_Score | Rank_Exp | ID   | BAFR  | Ave_Score | n=4.0  |       |     | n=3.5  |       |     | n=3.0 |        |     | n=2.5 |        |     | n=2.0 |        |     |
|-------|-----------|----------|------|-------|-----------|--------|-------|-----|--------|-------|-----|-------|--------|-----|-------|--------|-----|-------|--------|-----|
|       |           |          |      |       |           | Rel    | Pre   | Rec | Rel    | Pre   | Rec | Rel   | Pre    | Rec | Rel   | Pre    | Rec | Rel   | Pre    | Rec |
| 1     | 29        | 4fb      | 2.33 | 1.00  | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ×   | 0.000 | 0.000  | ×   | 0.000 | 0.000  | ○   | 1.00  | 0.0278 |     |
| 2     | 15        | 643a     | 3.00 | 0.988 | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ○   | 0.500 | 0.0625 | ○   | 0.500 | 0.0385 | ○   | 1.00  | 0.0556 |     |
| 3     | 27        | 1c66     | 2.33 | 0.916 | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ×   | 0.333 | 0.0625 | ×   | 0.333 | 0.0385 | ○   | 1.00  | 0.0833 |     |
| 4     | 34        | 3f9d     | 2.00 | 0.892 | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ×   | 0.250 | 0.0625 | ×   | 0.250 | 0.0385 | ○   | 1.00  | 0.111  |     |
| 5     | 16        | 85a7     | 3.00 | 0.878 | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ○   | 0.400 | 0.125  | ○   | 0.400 | 0.0769 | ○   | 1.00  | 0.139  |     |
| 6     | 14        | 0bee     | 3.00 | 0.866 | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ○   | 0.500 | 0.188  | ○   | 0.500 | 0.115  | ○   | 1.00  | 0.167  |     |
| 7     | 42        | aada     | 1.33 | 0.866 | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ×   | 0.429 | 0.188  | ×   | 0.429 | 0.115  | ×   | 0.857 | 0.167  |     |
| 8     | 13        | 09e1     | 3.00 | 0.864 | ×         | 0.000  | 0.000 | ×   | 0.000  | 0.000 | ○   | 0.500 | 0.250  | ○   | 0.500 | 0.154  | ○   | 0.875 | 0.194  |     |
| 9     | 3         | 01d5     | 3.67 | 0.858 | ×         | 0.000  | 0.000 | ○   | 0.111  | 0.143 | ○   | 0.556 | 0.313  | ○   | 0.556 | 0.192  | ○   | 0.889 | 0.222  |     |
| 10    | 39        | 5e85     | 1.67 | 0.858 | ×         | 0.000  | 0.000 | ×   | 0.100  | 0.143 | ×   | 0.500 | 0.313  | ×   | 0.500 | 0.192  | ×   | 0.800 | 0.222  |     |
| 11    | 28        | 2e33     | 2.33 | 0.847 | ×         | 0.000  | 0.000 | ×   | 0.0909 | 0.143 | ×   | 0.455 | 0.313  | ×   | 0.455 | 0.192  | ○   | 0.818 | 0.250  |     |
| 12    | 4         | 4070     | 3.67 | 0.846 | ×         | 0.000  | 0.000 | ○   | 0.167  | 0.286 | ○   | 0.500 | 0.375  | ○   | 0.500 | 0.231  | ○   | 0.833 | 0.278  |     |
| 13    | 31        | 5df3     | 2.33 | 0.836 | ×         | 0.000  | 0.000 | ×   | 0.154  | 0.286 | ×   | 0.462 | 0.375  | ×   | 0.462 | 0.231  | ○   | 0.846 | 0.306  |     |
| 14    | 11        | 87b0     | 3.33 | 0.815 | ×         | 0.000  | 0.000 | ×   | 0.143  | 0.286 | ○   | 0.500 | 0.438  | ○   | 0.500 | 0.269  | ○   | 0.857 | 0.333  |     |
| 15    | 12        | cea5     | 3.33 | 0.811 | ×         | 0.000  | 0.000 | ×   | 0.133  | 0.286 | ○   | 0.533 | 0.500  | ○   | 0.533 | 0.308  | ○   | 0.867 | 0.361  |     |
| 16    | 9         | 4a26     | 3.33 | 0.810 | ×         | 0.000  | 0.000 | ×   | 0.125  | 0.286 | ○   | 0.563 | 0.563  | ○   | 0.563 | 0.346  | ○   | 0.875 | 0.389  |     |
| 17    | 36        | cd41     | 2.00 | 0.809 | ×         | 0.000  | 0.000 | ×   | 0.118  | 0.286 | ×   | 0.529 | 0.563  | ×   | 0.529 | 0.346  | ○   | 0.882 | 0.417  |     |
| 18    | 2         | 098e     | 4.33 | 0.806 | ○         | 0.0556 | 0.500 | ○   | 0.167  | 0.429 | ○   | 0.556 | 0.625  | ○   | 0.556 | 0.385  | ○   | 0.889 | 0.444  |     |
| 19    | 35        | bc7d     | 2.00 | 0.804 | ×         | 0.0526 | 0.500 | ×   | 0.158  | 0.429 | ×   | 0.526 | 0.625  | ×   | 0.526 | 0.385  | ○   | 0.895 | 0.472  |     |
| 20    | 24        | cb4e     | 2.67 | 0.803 | ×         | 0.0500 | 0.500 | ×   | 0.150  | 0.429 | ×   | 0.500 | 0.625  | ○   | 0.550 | 0.423  | ○   | 0.900 | 0.500  |     |
| 21    | 5         | e4fc     | 3.67 | 0.802 | ×         | 0.0476 | 0.500 | ○   | 0.190  | 0.571 | ○   | 0.524 | 0.688  | ○   | 0.571 | 0.462  | ○   | 0.905 | 0.528  |     |
| 22    | 41        | 43ce     | 1.33 | 0.802 | ×         | 0.0455 | 0.500 | ×   | 0.182  | 0.571 | ×   | 0.500 | 0.688  | ×   | 0.545 | 0.462  | ×   | 0.864 | 0.528  |     |
| 23    | 1         | 70a3     | 4.67 | 0.801 | ○         | 0.0870 | 1.00  | ○   | 0.217  | 0.714 | ○   | 0.522 | 0.750  | ○   | 0.565 | 0.500  | ○   | 0.870 | 0.556  |     |
| 24    | 22        | 8d74     | 2.67 | 0.801 | -         | -      | -     | ×   | 0.208  | 0.714 | ×   | 0.500 | 0.750  | ○   | 0.583 | 0.538  | ○   | 0.875 | 0.583  |     |
| 25    | 6         | cdfb     | 3.67 | 0.800 | -         | -      | -     | ○   | 0.240  | 0.857 | ○   | 0.520 | 0.813  | ○   | 0.600 | 0.577  | ○   | 0.880 | 0.611  |     |
| 26    | 21        | 784e     | 2.67 | 0.800 | -         | -      | -     | ×   | 0.231  | 0.857 | ×   | 0.500 | 0.813  | ○   | 0.615 | 0.615  | ○   | 0.885 | 0.639  |     |
| 27    | 7         | e09a     | 3.67 | 0.798 | -         | -      | -     | ○   | 0.259  | 1.00  | ○   | 0.519 | 0.875  | ○   | 0.630 | 0.654  | ○   | 0.889 | 0.667  |     |
| 28    | 37        | 2368     | 1.67 | 0.797 | -         | -      | -     | -   | -      | -     | ×   | 0.500 | 0.875  | ×   | 0.607 | 0.654  | ×   | 0.857 | 0.667  |     |
| 29    | 32        | d9a9     | 2.33 | 0.780 | -         | -      | -     | -   | -      | -     | ×   | 0.483 | 0.875  | ×   | 0.586 | 0.654  | ○   | 0.862 | 0.694  |     |
| 30    | 19        | 3cb0     | 2.67 | 0.774 | -         | -      | -     | -   | -      | -     | ×   | 0.467 | 0.875  | ○   | 0.600 | 0.692  | ○   | 0.867 | 0.722  |     |
| 31    | 33        | df64     | 2.33 | 0.767 | -         | -      | -     | -   | -      | -     | ×   | 0.452 | 0.875  | ×   | 0.581 | 0.692  | ○   | 0.871 | 0.750  |     |
| 32    | 30        | 5b4b     | 2.33 | 0.759 | -         | -      | -     | -   | -      | -     | ×   | 0.438 | 0.875  | ×   | 0.563 | 0.692  | ○   | 0.875 | 0.778  |     |
| 33    | 43        | f525     | 1.00 | 0.759 | -         | -      | -     | -   | -      | -     | ×   | 0.424 | 0.875  | ×   | 0.545 | 0.692  | ×   | 0.848 | 0.778  |     |
| 34    | 8         | 300d     | 3.33 | 0.755 | -         | -      | -     | -   | -      | -     | ○   | 0.441 | 0.938  | ○   | 0.559 | 0.731  | ○   | 0.853 | 0.806  |     |
| 35    | 25        | dae5     | 2.67 | 0.754 | -         | -      | -     | -   | -      | -     | ×   | 0.429 | 0.938  | ○   | 0.571 | 0.769  | ○   | 0.857 | 0.833  |     |
| 36    | 18        | 27f1     | 2.67 | 0.753 | -         | -      | -     | -   | -      | -     | ×   | 0.417 | 0.938  | ○   | 0.583 | 0.808  | ○   | 0.861 | 0.861  |     |
| 37    | 26        | f43b     | 2.67 | 0.753 | -         | -      | -     | -   | -      | -     | ×   | 0.405 | 0.938  | ○   | 0.595 | 0.846  | ○   | 0.865 | 0.889  |     |
| 38    | 38        | 5c14     | 1.67 | 0.753 | -         | -      | -     | -   | -      | -     | ×   | 0.395 | 0.938  | ×   | 0.579 | 0.846  | ×   | 0.842 | 0.889  |     |
| 39    | 23        | bf5a     | 2.67 | 0.751 | -         | -      | -     | -   | -      | -     | ×   | 0.385 | 0.938  | ○   | 0.590 | 0.885  | ○   | 0.846 | 0.917  |     |
| 40    | 20        | 3dda     | 2.67 | 0.748 | -         | -      | -     | -   | -      | -     | ×   | 0.375 | 0.938  | ○   | 0.600 | 0.923  | ○   | 0.850 | 0.944  |     |
| 41    | 40        | e1df     | 1.67 | 0.748 | -         | -      | -     | -   | -      | -     | ×   | 0.366 | 0.938  | ×   | 0.585 | 0.923  | ×   | 0.829 | 0.944  |     |
| 42    | 10        | 550d     | 3.33 | 0.744 | -         | -      | -     | -   | -      | -     | ○   | 0.381 | 1.00   | ○   | 0.595 | 0.962  | ○   | 0.833 | 0.972  |     |
| 43    | 17        | 07e7     | 2.67 | 0.744 | -         | -      | -     | -   | -      | -     | -   | -     | -      | ○   | 0.605 | 1.00   | ○   | 0.837 | 1.00   |     |



Table D-13: Precision and Recall on PC (Female, Proposed).

| Rank_<br>Proposed | Rank_<br>Exp | ID   | BAFR | App | S     | n=4.0 |        |       | n=3.5 |        |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|-------------------|--------------|------|------|-----|-------|-------|--------|-------|-------|--------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|                   |              |      |      |     |       | Rel   | Pre    | Rec   | Rel   | Pre    | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1                 | 8            | 098e | 3.33 | 27  | 12.5  | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ○     | 1.00  | 0.0526 | ○     | 1.00  | 0.0294 | ○     | 1.00  | 0.0200 |
| 2                 | 4            | 70a3 | 3.67 | 8   | 4.48  | ×     | 0.000  | 0.000 | ○     | 0.500  | 0.143 | ○     | 1.00  | 0.105  | ○     | 1.00  | 0.0588 | ○     | 1.00  | 0.0400 |
| 3                 | 12           | cdfb | 3.33 | 7   | 3.55  | ×     | 0.000  | 0.000 | ×     | 0.333  | 0.143 | ○     | 1.00  | 0.158  | ○     | 1.00  | 0.0882 | ○     | 1.00  | 0.0600 |
| 4                 | 47           | 784e | 2.00 | 4   | 1.76  | ×     | 0.000  | 0.000 | ×     | 0.250  | 0.143 | ×     | 0.750 | 0.158  | ×     | 0.750 | 0.0882 | ○     | 1.00  | 0.0800 |
| 5                 | 38           | 321a | 2.33 | 2   | 1.16  | ×     | 0.000  | 0.000 | ×     | 0.200  | 0.143 | ×     | 0.600 | 0.158  | ×     | 0.600 | 0.0882 | ○     | 1.00  | 0.100  |
| 6                 | 29           | e762 | 2.67 | 2   | 1.05  | ×     | 0.000  | 0.000 | ×     | 0.167  | 0.143 | ×     | 0.500 | 0.158  | ○     | 0.667 | 0.118  | ○     | 1.00  | 0.120  |
| 7                 | 25           | 643a | 2.67 | 2   | 0.927 | ×     | 0.000  | 0.000 | ×     | 0.143  | 0.143 | ×     | 0.429 | 0.158  | ○     | 0.714 | 0.147  | ○     | 1.00  | 0.140  |
| 8                 | 17           | dae5 | 3.00 | 2   | 0.892 | ×     | 0.000  | 0.000 | ×     | 0.125  | 0.143 | ○     | 0.500 | 0.211  | ○     | 0.750 | 0.176  | ○     | 1.00  | 0.160  |
| 9                 | 10           | 722a | 3.33 | 2   | 0.869 | ×     | 0.000  | 0.000 | ×     | 0.111  | 0.143 | ○     | 0.556 | 0.263  | ○     | 0.778 | 0.206  | ○     | 1.00  | 0.180  |
| 10                | 42           | d775 | 2.33 | 1   | 0.625 | ×     | 0.000  | 0.000 | ×     | 0.100  | 0.143 | ×     | 0.500 | 0.263  | ×     | 0.700 | 0.206  | ○     | 1.00  | 0.200  |
| 11                | 16           | d4f3 | 3.00 | 1   | 0.607 | ×     | 0.000  | 0.000 | ×     | 0.0909 | 0.143 | ○     | 0.545 | 0.316  | ○     | 0.727 | 0.235  | ○     | 1.00  | 0.220  |
| 12                | 50           | ee5a | 2.00 | 1   | 0.575 | ×     | 0.000  | 0.000 | ×     | 0.0833 | 0.143 | ×     | 0.500 | 0.316  | ×     | 0.667 | 0.235  | ○     | 1.00  | 0.240  |
| 13                | 9            | 1a9a | 3.33 | 1   | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.0769 | 0.143 | ○     | 0.538 | 0.368  | ○     | 0.692 | 0.265  | ○     | 1.00  | 0.260  |
| 14                | 49           | e6ed | 2.00 | 1   | 0.569 | ×     | 0.000  | 0.000 | ×     | 0.0714 | 0.143 | ×     | 0.500 | 0.368  | ×     | 0.643 | 0.265  | ○     | 1.00  | 0.280  |
| 15                | 3            | 6a0a | 3.67 | 1   | 0.569 | ×     | 0.000  | 0.000 | ○     | 0.133  | 0.286 | ○     | 0.533 | 0.421  | ○     | 0.667 | 0.294  | ○     | 1.00  | 0.300  |
| 16                | 1            | f74f | 4.00 | 1   | 0.565 | ○     | 0.0625 | 1.00  | ○     | 0.188  | 0.429 | ○     | 0.563 | 0.474  | ○     | 0.688 | 0.324  | ○     | 1.00  | 0.320  |
| 17                | 36           | 0f70 | 2.33 | 1   | 0.553 | -     | -      | -     | ×     | 0.176  | 0.429 | ×     | 0.529 | 0.474  | ×     | 0.647 | 0.324  | ○     | 1.00  | 0.340  |
| 18                | 41           | d608 | 2.33 | 1   | 0.550 | -     | -      | -     | ×     | 0.167  | 0.429 | ×     | 0.500 | 0.474  | ×     | 0.611 | 0.324  | ○     | 1.00  | 0.360  |
| 19                | 53           | b0ae | 1.33 | 1   | 0.550 | -     | -      | -     | ×     | 0.158  | 0.429 | ×     | 0.474 | 0.474  | ×     | 0.579 | 0.324  | ×     | 0.947 | 0.360  |
| 20                | 5            | a541 | 3.67 | 1   | 0.536 | -     | -      | -     | ○     | 0.200  | 0.571 | ○     | 0.500 | 0.526  | ○     | 0.600 | 0.353  | ○     | 0.950 | 0.380  |
| 21                | 20           | 07d5 | 2.67 | 1   | 0.535 | -     | -      | -     | ×     | 0.190  | 0.571 | ×     | 0.476 | 0.526  | ○     | 0.619 | 0.382  | ○     | 0.952 | 0.400  |
| 22                | 44           | 4a1b | 2.00 | 1   | 0.527 | -     | -      | -     | ×     | 0.182  | 0.571 | ×     | 0.455 | 0.526  | ×     | 0.591 | 0.382  | ○     | 0.955 | 0.420  |
| 23                | 40           | d45b | 2.33 | 1   | 0.526 | -     | -      | -     | ×     | 0.174  | 0.571 | ×     | 0.435 | 0.526  | ×     | 0.565 | 0.382  | ○     | 0.957 | 0.440  |
| 24                | 7            | f01c | 3.67 | 1   | 0.514 | -     | -      | -     | ○     | 0.208  | 0.714 | ○     | 0.458 | 0.579  | ○     | 0.583 | 0.412  | ○     | 0.958 | 0.460  |
| 25                | 27           | a8a5 | 2.67 | 1   | 0.496 | -     | -      | -     | ×     | 0.200  | 0.714 | ×     | 0.440 | 0.579  | ○     | 0.600 | 0.441  | ○     | 0.960 | 0.480  |
| 26                | 52           | a04f | 1.33 | 1   | 0.496 | -     | -      | -     | ×     | 0.192  | 0.714 | ×     | 0.423 | 0.579  | ×     | 0.577 | 0.441  | ×     | 0.923 | 0.480  |
| 27                | 19           | f9cf | 3.00 | 1   | 0.494 | -     | -      | -     | ×     | 0.185  | 0.714 | ○     | 0.444 | 0.632  | ○     | 0.593 | 0.471  | ○     | 0.926 | 0.500  |
| 28                | 24           | 5ddf | 2.67 | 1   | 0.491 | -     | -      | -     | ×     | 0.179  | 0.714 | ×     | 0.429 | 0.632  | ○     | 0.607 | 0.500  | ○     | 0.929 | 0.520  |
| 29                | 2            | 657c | 3.67 | 1   | 0.491 | -     | -      | -     | ○     | 0.207  | 0.857 | ○     | 0.448 | 0.684  | ○     | 0.621 | 0.529  | ○     | 0.931 | 0.540  |
| 30                | 43           | e715 | 2.33 | 1   | 0.487 | -     | -      | -     | ×     | 0.200  | 0.857 | ×     | 0.433 | 0.684  | ×     | 0.600 | 0.529  | ○     | 0.933 | 0.560  |
| 31                | 22           | 4070 | 2.67 | 1   | 0.485 | -     | -      | -     | ×     | 0.194  | 0.857 | ×     | 0.419 | 0.684  | ○     | 0.613 | 0.559  | ○     | 0.935 | 0.580  |
| 32                | 18           | eb37 | 3.00 | 1   | 0.478 | -     | -      | -     | ×     | 0.188  | 0.857 | ○     | 0.438 | 0.737  | ○     | 0.625 | 0.588  | ○     | 0.938 | 0.600  |
| 33                | 48           | 978b | 2.00 | 1   | 0.477 | -     | -      | -     | ×     | 0.182  | 0.857 | ×     | 0.424 | 0.737  | ×     | 0.606 | 0.588  | ○     | 0.939 | 0.620  |
| 34                | 51           | bda0 | 1.67 | 1   | 0.468 | -     | -      | -     | ×     | 0.176  | 0.857 | ×     | 0.412 | 0.737  | ×     | 0.588 | 0.588  | ×     | 0.912 | 0.620  |
| 35                | 6            | bba0 | 3.67 | 1   | 0.457 | -     | -      | -     | ○     | 0.200  | 1.00  | ○     | 0.429 | 0.789  | ○     | 0.600 | 0.618  | ○     | 0.914 | 0.640  |
| 36                | 32           | e918 | 2.67 | 1   | 0.438 | -     | -      | -     | -     | -      | -     | ×     | 0.417 | 0.789  | ○     | 0.611 | 0.647  | ○     | 0.917 | 0.660  |
| 37                | 26           | 9e4e | 2.67 | 1   | 0.437 | -     | -      | -     | -     | -      | -     | ×     | 0.405 | 0.789  | ○     | 0.622 | 0.676  | ○     | 0.919 | 0.680  |
| 38                | 30           | cea5 | 2.67 | 1   | 0.437 | -     | -      | -     | -     | -      | -     | ×     | 0.395 | 0.789  | ○     | 0.632 | 0.706  | ○     | 0.921 | 0.700  |
| 39                | 31           | dbef | 2.67 | 1   | 0.436 | -     | -      | -     | -     | -      | -     | ×     | 0.385 | 0.789  | ○     | 0.641 | 0.735  | ○     | 0.923 | 0.720  |
| 40                | 23           | 4d52 | 2.67 | 1   | 0.435 | -     | -      | -     | -     | -      | -     | ×     | 0.375 | 0.789  | ○     | 0.650 | 0.765  | ○     | 0.925 | 0.740  |
| 41                | 33           | ea3d | 2.67 | 1   | 0.435 | -     | -      | -     | -     | -      | -     | ×     | 0.366 | 0.789  | ○     | 0.659 | 0.794  | ○     | 0.927 | 0.760  |
| 42                | 34           | f41b | 2.67 | 1   | 0.434 | -     | -      | -     | -     | -      | -     | ×     | 0.357 | 0.789  | ○     | 0.667 | 0.824  | ○     | 0.929 | 0.780  |
| 43                | 21           | 3ecc | 2.67 | 1   | 0.434 | -     | -      | -     | -     | -      | -     | ×     | 0.349 | 0.789  | ○     | 0.674 | 0.853  | ○     | 0.930 | 0.800  |
| 44                | 14           | 43ce | 3.00 | 1   | 0.432 | -     | -      | -     | -     | -      | -     | ○     | 0.364 | 0.842  | ○     | 0.682 | 0.882  | ○     | 0.932 | 0.820  |
| 45                | 45           | 4fad | 2.00 | 1   | 0.432 | -     | -      | -     | -     | -      | -     | ×     | 0.356 | 0.842  | ×     | 0.667 | 0.882  | ○     | 0.933 | 0.840  |
| 46                | 39           | 5d39 | 2.33 | 1   | 0.431 | -     | -      | -     | -     | -      | -     | ×     | 0.348 | 0.842  | ×     | 0.652 | 0.882  | ○     | 0.935 | 0.860  |
| 47                | 15           | 85a7 | 3.00 | 1   | 0.430 | -     | -      | -     | -     | -      | -     | ○     | 0.362 | 0.895  | ○     | 0.660 | 0.912  | ○     | 0.936 | 0.880  |
| 48                | 37           | 1334 | 2.33 | 1   | 0.427 | -     | -      | -     | -     | -      | -     | ×     | 0.354 | 0.895  | ×     | 0.646 | 0.912  | ○     | 0.938 | 0.900  |
| 49                | 13           | 0f35 | 3.00 | 1   | 0.426 | -     | -      | -     | -     | -      | -     | ○     | 0.367 | 0.947  | ○     | 0.653 | 0.941  | ○     | 0.939 | 0.920  |
| 50                | 28           | e4fc | 2.67 | 1   | 0.425 | -     | -      | -     | -     | -      | -     | ×     | 0.360 | 0.947  | ○     | 0.660 | 0.971  | ○     | 0.940 | 0.940  |
| 51                | 11           | 902a | 3.33 | 1   | 0.424 | -     | -      | -     | -     | -      | -     | ○     | 0.373 | 1.00   | ○     | 0.667 | 1.00   | ○     | 0.941 | 0.960  |
| 52                | 35           | 05d6 | 2.33 | 1   | 0.423 | -     | -      | -     | -     | -      | -     | -     | -     | -      | -     | -     | -      | ○     | 0.942 | 0.980  |
| 53                | 46           | 5107 | 2.00 | 1   | 0.421 | -     | -      | -     | -     | -      | -     | -     | -     | -      | -     | -     | -      | ○     | 0.943 | 1.00   |

**Table D-14: Precision and Recall on PC (Female, Averaged Score).**

| Rank_Ave_Score | Rank_Exp | ID    | BAFR | Ave_Score | n=4.0 |       |       | n=3.5 |       |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|----------------|----------|-------|------|-----------|-------|-------|-------|-------|-------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|                |          |       |      |           | Rel   | Pre   | Rec   | Rel   | Pre   | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1              | 42       | df75  | 2.33 | 0.625     | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000  | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0200 |
| 2              | 16       | d4f3  | 3.00 | 0.607     | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ○     | 0.500 | 0.0526 | ×     | 0.500 | 0.0294 | ○     | 1.00  | 0.0400 |
| 3              | 38       | 321a  | 2.33 | 0.582     | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.333 | 0.0526 | ×     | 0.333 | 0.0294 | ○     | 1.00  | 0.0600 |
| 4              | 50       | ee5a  | 2.00 | 0.575     | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.250 | 0.0526 | ×     | 0.250 | 0.0294 | ○     | 1.00  | 0.0800 |
| 5              | 9        | 1a9a  | 3.33 | 0.569     | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ○     | 0.400 | 0.105  | ○     | 0.400 | 0.0588 | ○     | 1.00  | 0.100  |
| 6              | 49       | e6ed  | 2.00 | 0.569     | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.333 | 0.105  | ×     | 0.333 | 0.0588 | ○     | 1.00  | 0.120  |
| 7              | 3        | 6a0a  | 3.67 | 0.569     | ×     | 0.000 | 0.000 | ○     | 0.143 | 0.143 | ○     | 0.429 | 0.158  | ○     | 0.429 | 0.0882 | ○     | 1.00  | 0.140  |
| 8              | 1        | f74f  | 4.00 | 0.565     | ○     | 0.125 | 1.00  | ○     | 0.250 | 0.286 | ○     | 0.500 | 0.211  | ○     | 0.500 | 0.118  | ○     | 1.00  | 0.160  |
| 9              | 4        | 70a3  | 3.67 | 0.560     | -     | -     | -     | ○     | 0.333 | 0.429 | ○     | 0.556 | 0.263  | ○     | 0.556 | 0.147  | ○     | 1.00  | 0.180  |
| 10             | 36       | 0f70  | 2.33 | 0.553     | -     | -     | -     | ×     | 0.300 | 0.429 | ×     | 0.500 | 0.263  | ×     | 0.500 | 0.147  | ○     | 1.00  | 0.200  |
| 11             | 41       | d608  | 2.33 | 0.550     | -     | -     | -     | ×     | 0.273 | 0.429 | ×     | 0.455 | 0.263  | ×     | 0.455 | 0.147  | ○     | 1.00  | 0.220  |
| 12             | 53       | b0ae  | 1.33 | 0.550     | -     | -     | -     | ×     | 0.250 | 0.429 | ×     | 0.417 | 0.263  | ×     | 0.417 | 0.147  | ×     | 0.917 | 0.220  |
| 13             | 5        | a541  | 3.67 | 0.536     | -     | -     | -     | ○     | 0.308 | 0.571 | ○     | 0.462 | 0.316  | ○     | 0.462 | 0.176  | ○     | 0.923 | 0.240  |
| 14             | 20       | 07d5  | 2.67 | 0.535     | -     | -     | -     | ×     | 0.286 | 0.571 | ×     | 0.429 | 0.316  | ○     | 0.500 | 0.206  | ○     | 0.929 | 0.260  |
| 15             | 44       | 4a1b  | 2.00 | 0.527     | -     | -     | -     | ×     | 0.267 | 0.571 | ×     | 0.400 | 0.316  | ×     | 0.467 | 0.206  | ○     | 0.933 | 0.280  |
| 16             | 29       | e762  | 2.67 | 0.526     | -     | -     | -     | ×     | 0.250 | 0.571 | ×     | 0.375 | 0.316  | ○     | 0.500 | 0.235  | ○     | 0.938 | 0.300  |
| 17             | 40       | d45t  | 2.33 | 0.526     | -     | -     | -     | ×     | 0.235 | 0.571 | ×     | 0.353 | 0.316  | ×     | 0.471 | 0.235  | ○     | 0.941 | 0.320  |
| 18             | 7        | f01c  | 3.67 | 0.514     | -     | -     | -     | ○     | 0.278 | 0.714 | ○     | 0.389 | 0.368  | ○     | 0.500 | 0.265  | ○     | 0.944 | 0.340  |
| 19             | 12       | cdfb  | 3.33 | 0.506     | -     | -     | -     | ×     | 0.263 | 0.714 | ○     | 0.421 | 0.421  | ○     | 0.526 | 0.294  | ○     | 0.947 | 0.360  |
| 20             | 27       | a8a5  | 2.67 | 0.496     | -     | -     | -     | ×     | 0.250 | 0.714 | ×     | 0.400 | 0.421  | ○     | 0.550 | 0.324  | ○     | 0.950 | 0.380  |
| 21             | 52       | a04f  | 1.33 | 0.496     | -     | -     | -     | ×     | 0.238 | 0.714 | ×     | 0.381 | 0.421  | ×     | 0.524 | 0.324  | ×     | 0.905 | 0.380  |
| 22             | 19       | f9cft | 3.00 | 0.494     | -     | -     | -     | ×     | 0.227 | 0.714 | ○     | 0.409 | 0.474  | ○     | 0.545 | 0.353  | ○     | 0.909 | 0.400  |
| 23             | 24       | 5ddf  | 2.67 | 0.491     | -     | -     | -     | ×     | 0.217 | 0.714 | ×     | 0.391 | 0.474  | ○     | 0.565 | 0.382  | ○     | 0.913 | 0.420  |
| 24             | 2        | 657c  | 3.67 | 0.491     | -     | -     | -     | ○     | 0.250 | 0.857 | ○     | 0.417 | 0.526  | ○     | 0.583 | 0.412  | ○     | 0.917 | 0.440  |
| 25             | 43       | e715  | 2.33 | 0.487     | -     | -     | -     | ×     | 0.240 | 0.857 | ×     | 0.400 | 0.526  | ×     | 0.560 | 0.412  | ○     | 0.920 | 0.460  |
| 26             | 22       | 4070  | 2.67 | 0.485     | -     | -     | -     | ×     | 0.231 | 0.857 | ×     | 0.385 | 0.526  | ○     | 0.577 | 0.441  | ○     | 0.923 | 0.480  |
| 27             | 18       | eb37  | 3.00 | 0.478     | -     | -     | -     | ×     | 0.222 | 0.857 | ○     | 0.407 | 0.579  | ○     | 0.593 | 0.471  | ○     | 0.926 | 0.500  |
| 28             | 48       | 978t  | 2.00 | 0.477     | -     | -     | -     | ×     | 0.214 | 0.857 | ×     | 0.393 | 0.579  | ×     | 0.571 | 0.471  | ○     | 0.929 | 0.520  |
| 29             | 51       | bda0  | 1.67 | 0.468     | -     | -     | -     | ×     | 0.207 | 0.857 | ×     | 0.379 | 0.579  | ×     | 0.552 | 0.471  | ×     | 0.897 | 0.520  |
| 30             | 8        | 098e  | 3.33 | 0.464     | -     | -     | -     | ×     | 0.200 | 0.857 | ○     | 0.400 | 0.632  | ○     | 0.567 | 0.500  | ○     | 0.900 | 0.540  |
| 31             | 25       | 643a  | 2.67 | 0.464     | -     | -     | -     | ×     | 0.194 | 0.857 | ×     | 0.387 | 0.632  | ○     | 0.581 | 0.529  | ○     | 0.903 | 0.560  |
| 32             | 6        | bba0  | 3.67 | 0.457     | -     | -     | -     | ○     | 0.219 | 1.00  | ○     | 0.406 | 0.684  | ○     | 0.594 | 0.559  | ○     | 0.906 | 0.580  |
| 33             | 17       | dae5  | 3.00 | 0.446     | -     | -     | -     | -     | -     | -     | ○     | 0.424 | 0.737  | ○     | 0.606 | 0.588  | ○     | 0.909 | 0.600  |
| 34             | 47       | 784e  | 2.00 | 0.440     | -     | -     | -     | -     | -     | -     | ×     | 0.412 | 0.737  | ×     | 0.588 | 0.588  | ○     | 0.912 | 0.620  |
| 35             | 32       | e918  | 2.67 | 0.438     | -     | -     | -     | -     | -     | -     | ×     | 0.400 | 0.737  | ○     | 0.600 | 0.618  | ○     | 0.914 | 0.640  |
| 36             | 26       | 9e4e  | 2.67 | 0.437     | -     | -     | -     | -     | -     | -     | ×     | 0.389 | 0.737  | ○     | 0.611 | 0.647  | ○     | 0.917 | 0.660  |
| 37             | 30       | cea5  | 2.67 | 0.437     | -     | -     | -     | -     | -     | -     | ×     | 0.378 | 0.737  | ○     | 0.622 | 0.676  | ○     | 0.919 | 0.680  |
| 38             | 31       | dbcf  | 2.67 | 0.436     | -     | -     | -     | -     | -     | -     | ×     | 0.368 | 0.737  | ○     | 0.632 | 0.706  | ○     | 0.921 | 0.700  |
| 39             | 23       | 4d52  | 2.67 | 0.435     | -     | -     | -     | -     | -     | -     | ×     | 0.359 | 0.737  | ○     | 0.641 | 0.735  | ○     | 0.923 | 0.720  |
| 40             | 33       | ea3d  | 2.67 | 0.435     | -     | -     | -     | -     | -     | -     | ×     | 0.350 | 0.737  | ○     | 0.650 | 0.765  | ○     | 0.925 | 0.740  |
| 41             | 10       | 722a  | 3.33 | 0.434     | -     | -     | -     | -     | -     | -     | ○     | 0.366 | 0.789  | ○     | 0.659 | 0.794  | ○     | 0.927 | 0.760  |
| 42             | 34       | f41b  | 2.67 | 0.434     | -     | -     | -     | -     | -     | -     | ×     | 0.357 | 0.789  | ○     | 0.667 | 0.824  | ○     | 0.929 | 0.780  |
| 43             | 21       | 3ecc  | 2.67 | 0.434     | -     | -     | -     | -     | -     | -     | ×     | 0.349 | 0.789  | ○     | 0.674 | 0.853  | ○     | 0.930 | 0.800  |
| 44             | 14       | 43ce  | 3.00 | 0.432     | -     | -     | -     | -     | -     | -     | ○     | 0.364 | 0.842  | ○     | 0.682 | 0.882  | ○     | 0.932 | 0.820  |
| 45             | 45       | 4fad  | 2.00 | 0.432     | -     | -     | -     | -     | -     | -     | ×     | 0.356 | 0.842  | ×     | 0.667 | 0.882  | ○     | 0.933 | 0.840  |
| 46             | 39       | 5d39  | 2.33 | 0.431     | -     | -     | -     | -     | -     | -     | ×     | 0.348 | 0.842  | ×     | 0.652 | 0.882  | ○     | 0.935 | 0.860  |
| 47             | 15       | 85a7  | 3.00 | 0.430     | -     | -     | -     | -     | -     | -     | ○     | 0.362 | 0.895  | ○     | 0.660 | 0.912  | ○     | 0.936 | 0.880  |
| 48             | 37       | 1334  | 2.33 | 0.427     | -     | -     | -     | -     | -     | -     | ×     | 0.354 | 0.895  | ×     | 0.646 | 0.912  | ○     | 0.938 | 0.900  |
| 49             | 13       | 0f35  | 3.00 | 0.426     | -     | -     | -     | -     | -     | -     | ○     | 0.367 | 0.947  | ○     | 0.653 | 0.941  | ○     | 0.939 | 0.920  |
| 50             | 28       | e4fc  | 2.67 | 0.425     | -     | -     | -     | -     | -     | -     | ×     | 0.360 | 0.947  | ○     | 0.660 | 0.971  | ○     | 0.940 | 0.940  |
| 51             | 11       | 902a  | 3.33 | 0.424     | -     | -     | -     | -     | -     | -     | ○     | 0.373 | 1.00   | ○     | 0.667 | 1.00   | ○     | 0.941 | 0.960  |
| 52             | 35       | 05d6  | 2.33 | 0.423     | -     | -     | -     | -     | -     | -     | -     | -     | -      | -     | -     | -      | ○     | 0.942 | 0.980  |
| 53             | 46       | 5107  | 2.00 | 0.421     | -     | -     | -     | -     | -     | -     | -     | -     | -      | -     | -     | -      | ○     | 0.943 | 1.00   |



**Table D-15: Precision and Recall on PC (Female, Distance).**

| Rank_<br>Dis | Rank_<br>Exp | ID   | BAFR | Dis   | n=4.0 |       |       | n=3.5 |       |       | n=3.0 |       |        | n=2.5 |       |        | n=2.0 |       |        |
|--------------|--------------|------|------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------|-------|-------|--------|-------|-------|--------|
|              |              |      |      |       | Rel   | Pre   | Rec   | Rel   | Pre   | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1            | 38           | 321a | 2.33 | 0.608 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000  | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0200 |
| 2            | 42           | df75 | 2.33 | 0.713 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000  | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0400 |
| 3            | 16           | d4f3 | 3.00 | 0.734 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ○     | 0.333 | 0.0526 | ○     | 0.333 | 0.0294 | ○     | 1.00  | 0.0600 |
| 4            | 29           | c762 | 2.67 | 0.736 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.250 | 0.0526 | ○     | 0.500 | 0.0588 | ○     | 1.00  | 0.0800 |
| 5            | 50           | ee5a | 2.00 | 0.774 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.200 | 0.0526 | ×     | 0.400 | 0.0588 | ○     | 1.00  | 0.100  |
| 6            | 9            | 1a9a | 3.33 | 0.783 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ○     | 0.333 | 0.105  | ○     | 0.500 | 0.0882 | ○     | 1.00  | 0.120  |
| 7            | 49           | e6ed | 2.00 | 0.783 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.286 | 0.105  | ×     | 0.429 | 0.0882 | ○     | 1.00  | 0.140  |
| 8            | 3            | 6a0a | 3.67 | 0.783 | ×     | 0.000 | 0.000 | ○     | 0.125 | 0.143 | ○     | 0.375 | 0.158  | ○     | 0.500 | 0.118  | ○     | 1.00  | 0.160  |
| 9            | 1            | f74f | 4.00 | 0.788 | ○     | 0.111 | 1.00  | ○     | 0.222 | 0.286 | ○     | 0.444 | 0.211  | ○     | 0.556 | 0.147  | ○     | 1.00  | 0.180  |
| 10           | 36           | 0f70 | 2.33 | 0.805 | -     | -     | -     | ×     | 0.200 | 0.286 | ×     | 0.400 | 0.211  | ×     | 0.500 | 0.147  | ○     | 1.00  | 0.200  |
| 11           | 41           | d608 | 2.33 | 0.809 | -     | -     | -     | ×     | 0.182 | 0.286 | ×     | 0.364 | 0.211  | ×     | 0.455 | 0.147  | ○     | 1.00  | 0.220  |
| 12           | 53           | b0ae | 1.33 | 0.809 | -     | -     | -     | ×     | 0.167 | 0.286 | ×     | 0.333 | 0.211  | ×     | 0.417 | 0.147  | ×     | 0.917 | 0.220  |
| 13           | 5            | a541 | 3.67 | 0.831 | -     | -     | -     | ○     | 0.231 | 0.429 | ○     | 0.385 | 0.263  | ○     | 0.462 | 0.176  | ○     | 0.923 | 0.240  |
| 14           | 20           | 07d5 | 2.67 | 0.832 | -     | -     | -     | ×     | 0.214 | 0.429 | ×     | 0.357 | 0.263  | ○     | 0.500 | 0.206  | ○     | 0.929 | 0.260  |
| 15           | 8            | 098e | 3.33 | 0.844 | -     | -     | -     | ×     | 0.200 | 0.429 | ○     | 0.400 | 0.316  | ○     | 0.533 | 0.235  | ○     | 0.933 | 0.280  |
| 16           | 44           | 4a1b | 2.00 | 0.845 | -     | -     | -     | ×     | 0.188 | 0.429 | ×     | 0.375 | 0.316  | ×     | 0.500 | 0.235  | ○     | 0.938 | 0.300  |
| 17           | 40           | d45b | 2.33 | 0.847 | -     | -     | -     | ×     | 0.176 | 0.429 | ×     | 0.353 | 0.316  | ×     | 0.471 | 0.235  | ○     | 0.941 | 0.320  |
| 18           | 7            | f01c | 3.67 | 0.866 | -     | -     | -     | ○     | 0.222 | 0.571 | ○     | 0.389 | 0.368  | ○     | 0.500 | 0.265  | ○     | 0.944 | 0.340  |
| 19           | 27           | a8a5 | 2.67 | 0.899 | -     | -     | -     | ×     | 0.211 | 0.571 | ×     | 0.368 | 0.368  | ○     | 0.526 | 0.294  | ○     | 0.947 | 0.360  |
| 20           | 52           | a04f | 1.33 | 0.899 | -     | -     | -     | ×     | 0.200 | 0.571 | ×     | 0.350 | 0.368  | ×     | 0.500 | 0.294  | ×     | 0.900 | 0.360  |
| 21           | 19           | f9cf | 3.00 | 0.902 | -     | -     | -     | ×     | 0.190 | 0.571 | ○     | 0.381 | 0.421  | ○     | 0.524 | 0.324  | ○     | 0.905 | 0.380  |
| 22           | 25           | 643a | 2.67 | 0.904 | -     | -     | -     | ×     | 0.182 | 0.571 | ×     | 0.364 | 0.421  | ○     | 0.545 | 0.353  | ○     | 0.909 | 0.400  |
| 23           | 24           | 5ddf | 2.67 | 0.907 | -     | -     | -     | ×     | 0.174 | 0.571 | ×     | 0.348 | 0.421  | ○     | 0.565 | 0.382  | ○     | 0.913 | 0.420  |
| 24           | 2            | 657c | 3.67 | 0.908 | -     | -     | -     | ○     | 0.208 | 0.714 | ○     | 0.375 | 0.474  | ○     | 0.583 | 0.412  | ○     | 0.917 | 0.440  |
| 25           | 43           | e715 | 2.33 | 0.915 | -     | -     | -     | ×     | 0.200 | 0.714 | ×     | 0.360 | 0.474  | ×     | 0.560 | 0.412  | ○     | 0.920 | 0.460  |
| 26           | 22           | 4070 | 2.67 | 0.917 | -     | -     | -     | ×     | 0.192 | 0.714 | ×     | 0.346 | 0.474  | ○     | 0.577 | 0.441  | ○     | 0.923 | 0.480  |
| 27           | 4            | 70a3 | 3.67 | 0.923 | -     | -     | -     | ○     | 0.222 | 0.857 | ○     | 0.370 | 0.526  | ○     | 0.593 | 0.471  | ○     | 0.926 | 0.500  |
| 28           | 18           | eb37 | 3.00 | 0.933 | -     | -     | -     | ×     | 0.214 | 0.857 | ○     | 0.393 | 0.579  | ○     | 0.607 | 0.500  | ○     | 0.929 | 0.520  |
| 29           | 48           | 978b | 2.00 | 0.934 | -     | -     | -     | ×     | 0.207 | 0.857 | ×     | 0.379 | 0.579  | ×     | 0.586 | 0.500  | ○     | 0.931 | 0.540  |
| 30           | 51           | bda0 | 1.67 | 0.952 | -     | -     | -     | ×     | 0.200 | 0.857 | ×     | 0.367 | 0.579  | ×     | 0.567 | 0.500  | ×     | 0.900 | 0.540  |
| 31           | 17           | dae5 | 3.00 | 0.972 | -     | -     | -     | ×     | 0.194 | 0.857 | ○     | 0.387 | 0.632  | ○     | 0.581 | 0.529  | ○     | 0.903 | 0.560  |
| 32           | 6            | bba0 | 3.67 | 0.975 | -     | -     | -     | ○     | 0.219 | 1.00  | ○     | 0.406 | 0.684  | ○     | 0.594 | 0.559  | ○     | 0.906 | 0.580  |
| 33           | 47           | 784e | 2.00 | 0.988 | -     | -     | -     | -     | -     | -     | ×     | 0.394 | 0.684  | ×     | 0.576 | 0.559  | ○     | 0.909 | 0.600  |
| 34           | 10           | 722a | 3.33 | 1.013 | -     | -     | -     | -     | -     | -     | ○     | 0.412 | 0.737  | ○     | 0.588 | 0.588  | ○     | 0.912 | 0.620  |
| 35           | 32           | e918 | 2.67 | 1.017 | -     | -     | -     | -     | -     | -     | ×     | 0.400 | 0.737  | ○     | 0.600 | 0.618  | ○     | 0.914 | 0.640  |
| 36           | 26           | 9e4e | 2.67 | 1.018 | -     | -     | -     | -     | -     | -     | ×     | 0.389 | 0.737  | ○     | 0.611 | 0.647  | ○     | 0.917 | 0.660  |
| 37           | 30           | cea5 | 2.67 | 1.020 | -     | -     | -     | -     | -     | -     | ×     | 0.378 | 0.737  | ○     | 0.622 | 0.676  | ○     | 0.919 | 0.680  |
| 38           | 31           | dbcf | 2.67 | 1.023 | -     | -     | -     | -     | -     | -     | ×     | 0.368 | 0.737  | ○     | 0.632 | 0.706  | ○     | 0.921 | 0.700  |
| 39           | 23           | 4d52 | 2.67 | 1.023 | -     | -     | -     | -     | -     | -     | ×     | 0.359 | 0.737  | ○     | 0.641 | 0.735  | ○     | 0.923 | 0.720  |
| 40           | 33           | ea3d | 2.67 | 1.023 | -     | -     | -     | -     | -     | -     | ×     | 0.350 | 0.737  | ○     | 0.650 | 0.765  | ○     | 0.925 | 0.740  |
| 41           | 34           | f41b | 2.67 | 1.026 | -     | -     | -     | -     | -     | -     | ×     | 0.341 | 0.737  | ○     | 0.659 | 0.794  | ○     | 0.927 | 0.760  |
| 42           | 21           | 3ecc | 2.67 | 1.026 | -     | -     | -     | -     | -     | -     | ×     | 0.333 | 0.737  | ○     | 0.667 | 0.824  | ○     | 0.929 | 0.780  |
| 43           | 14           | 43ce | 3.00 | 1.031 | -     | -     | -     | -     | -     | -     | ○     | 0.349 | 0.789  | ○     | 0.674 | 0.853  | ○     | 0.930 | 0.800  |
| 44           | 45           | 4fad | 2.00 | 1.031 | -     | -     | -     | -     | -     | -     | ×     | 0.341 | 0.789  | ×     | 0.659 | 0.853  | ○     | 0.932 | 0.820  |
| 45           | 39           | 5d39 | 2.33 | 1.034 | -     | -     | -     | -     | -     | -     | ×     | 0.333 | 0.789  | ×     | 0.644 | 0.853  | ○     | 0.933 | 0.840  |
| 46           | 15           | 85a7 | 3.00 | 1.036 | -     | -     | -     | -     | -     | -     | ○     | 0.348 | 0.842  | ○     | 0.652 | 0.882  | ○     | 0.935 | 0.860  |
| 47           | 12           | cdfb | 3.33 | 1.041 | -     | -     | -     | -     | -     | -     | ○     | 0.362 | 0.895  | ○     | 0.660 | 0.912  | ○     | 0.936 | 0.880  |
| 48           | 37           | 1334 | 2.33 | 1.044 | -     | -     | -     | -     | -     | -     | ×     | 0.354 | 0.895  | ×     | 0.646 | 0.912  | ○     | 0.938 | 0.900  |
| 49           | 13           | 0f35 | 3.00 | 1.046 | -     | -     | -     | -     | -     | -     | ○     | 0.367 | 0.947  | ○     | 0.653 | 0.941  | ○     | 0.939 | 0.920  |
| 50           | 28           | c4fc | 2.67 | 1.047 | -     | -     | -     | -     | -     | -     | ×     | 0.360 | 0.947  | ○     | 0.660 | 0.971  | ○     | 0.940 | 0.940  |
| 51           | 11           | 902a | 3.33 | 1.051 | -     | -     | -     | -     | -     | -     | ○     | 0.373 | 1.00   | ○     | 0.667 | 1.00   | ○     | 0.941 | 0.960  |
| 52           | 35           | 05d6 | 2.33 | 1.054 | -     | -     | -     | -     | -     | -     | -     | -     | -      | -     | -     | -      | ○     | 0.942 | 0.980  |
| 53           | 46           | 5107 | 2.00 | 1.058 | -     | -     | -     | -     | -     | -     | -     | -     | -      | -     | -     | -      | ○     | 0.943 | 1.00   |

**Table D-16: Precision and Recall on Love (Female, Proposed).**

| Rank_Proposed | Rank_Exp | ID   | BAFR | App | S     | n=3.5 |        |       | n=3.0 |       |       | n=2.5 |       |        | n=2.0 |       |        |
|---------------|----------|------|------|-----|-------|-------|--------|-------|-------|-------|-------|-------|-------|--------|-------|-------|--------|
|               |          |      |      |     |       | Rel   | Pre    | Rec   | Rel   | Pre   | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1             | 4        | 098e | 3.00 | 32  | 22.1  | ×     | 0.000  | 0.000 | ○     | 1.00  | 0.125 | ○     | 1.00  | 0.0833 | ○     | 1.00  | 0.0357 |
| 2             | 8        | cdfb | 3.00 | 14  | 9.51  | ×     | 0.000  | 0.000 | ○     | 1.00  | 0.250 | ○     | 1.00  | 0.167  | ○     | 1.00  | 0.0714 |
| 3             | 5        | 784e | 3.00 | 10  | 6.72  | ×     | 0.000  | 0.000 | ○     | 1.00  | 0.375 | ○     | 1.00  | 0.250  | ○     | 1.00  | 0.107  |
| 4             | 14       | 321a | 2.33 | 3   | 2.19  | ×     | 0.000  | 0.000 | ×     | 0.750 | 0.375 | ×     | 0.750 | 0.250  | ○     | 1.00  | 0.143  |
| 5             | 11       | a541 | 2.67 | 3   | 2.10  | ×     | 0.000  | 0.000 | ×     | 0.600 | 0.375 | ○     | 0.800 | 0.333  | ○     | 1.00  | 0.179  |
| 6             | 15       | 4070 | 2.33 | 2   | 1.35  | ×     | 0.000  | 0.000 | ×     | 0.500 | 0.375 | ×     | 0.667 | 0.333  | ○     | 1.00  | 0.214  |
| 7             | 19       | 70a3 | 2.33 | 1   | 0.820 | ×     | 0.000  | 0.000 | ×     | 0.429 | 0.375 | ×     | 0.571 | 0.333  | ○     | 1.00  | 0.250  |
| 8             | 18       | 6bda | 2.33 | 1   | 0.790 | ×     | 0.000  | 0.000 | ×     | 0.375 | 0.375 | ×     | 0.500 | 0.333  | ○     | 1.00  | 0.286  |
| 9             | 32       | 975f | 1.67 | 1   | 0.738 | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.375 | ×     | 0.444 | 0.333  | ×     | 0.889 | 0.286  |
| 10            | 36       | b1fc | 1.67 | 1   | 0.738 | ×     | 0.000  | 0.000 | ×     | 0.300 | 0.375 | ×     | 0.400 | 0.333  | ×     | 0.800 | 0.286  |
| 11            | 22       | c4db | 2.33 | 1   | 0.732 | ×     | 0.000  | 0.000 | ×     | 0.273 | 0.375 | ×     | 0.364 | 0.333  | ○     | 0.818 | 0.321  |
| 12            | 38       | d9a9 | 1.67 | 1   | 0.724 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.375 | ×     | 0.333 | 0.333  | ×     | 0.750 | 0.321  |
| 13            | 20       | b0ac | 2.33 | 1   | 0.720 | ×     | 0.000  | 0.000 | ×     | 0.231 | 0.375 | ×     | 0.308 | 0.333  | ○     | 0.769 | 0.357  |
| 14            | 7        | a09a | 3.00 | 1   | 0.719 | ×     | 0.000  | 0.000 | ○     | 0.286 | 0.500 | ○     | 0.357 | 0.417  | ○     | 0.786 | 0.393  |
| 15            | 29       | 3cb0 | 1.67 | 1   | 0.713 | ×     | 0.000  | 0.000 | ×     | 0.267 | 0.500 | ×     | 0.333 | 0.417  | ×     | 0.733 | 0.393  |
| 16            | 17       | 643a | 2.33 | 1   | 0.704 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.500 | ×     | 0.313 | 0.417  | ○     | 0.750 | 0.429  |
| 17            | 2        | 4d52 | 3.33 | 1   | 0.703 | ×     | 0.000  | 0.000 | ○     | 0.294 | 0.625 | ○     | 0.353 | 0.500  | ○     | 0.765 | 0.464  |
| 18            | 34       | 9d65 | 1.67 | 1   | 0.699 | ×     | 0.000  | 0.000 | ×     | 0.278 | 0.625 | ×     | 0.333 | 0.500  | ×     | 0.722 | 0.464  |
| 19            | 21       | b457 | 2.33 | 1   | 0.693 | ×     | 0.000  | 0.000 | ×     | 0.263 | 0.625 | ×     | 0.316 | 0.500  | ○     | 0.737 | 0.500  |
| 20            | 25       | 09e1 | 2.00 | 1   | 0.678 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.625 | ×     | 0.300 | 0.500  | ○     | 0.750 | 0.536  |
| 21            | 40       | aada | 1.33 | 1   | 0.678 | ×     | 0.000  | 0.000 | ×     | 0.238 | 0.625 | ×     | 0.286 | 0.500  | ×     | 0.714 | 0.536  |
| 22            | 13       | 2ad2 | 2.33 | 1   | 0.669 | ×     | 0.000  | 0.000 | ×     | 0.227 | 0.625 | ×     | 0.273 | 0.500  | ○     | 0.727 | 0.571  |
| 23            | 1        | 0eb4 | 4.00 | 1   | 0.667 | ○     | 0.0435 | 1.00  | ○     | 0.261 | 0.750 | ○     | 0.304 | 0.583  | ○     | 0.739 | 0.607  |
| 24            | 23       | ec36 | 2.33 | 1   | 0.665 | -     | -      | -     | ×     | 0.250 | 0.750 | ×     | 0.292 | 0.583  | ○     | 0.750 | 0.643  |
| 25            | 35       | a54b | 1.67 | 1   | 0.664 | -     | -      | -     | ×     | 0.240 | 0.750 | ×     | 0.280 | 0.583  | ×     | 0.720 | 0.643  |
| 26            | 28       | c762 | 2.00 | 1   | 0.656 | -     | -      | -     | ×     | 0.231 | 0.750 | ×     | 0.269 | 0.583  | ○     | 0.731 | 0.679  |
| 27            | 41       | 1c66 | 1.00 | 1   | 0.654 | -     | -      | -     | ×     | 0.222 | 0.750 | ×     | 0.259 | 0.583  | ×     | 0.704 | 0.679  |
| 28            | 27       | 721f | 2.00 | 1   | 0.654 | -     | -      | -     | ×     | 0.214 | 0.750 | ×     | 0.250 | 0.583  | ○     | 0.714 | 0.714  |
| 29            | 26       | 6a33 | 2.00 | 1   | 0.652 | -     | -      | -     | ×     | 0.207 | 0.750 | ×     | 0.241 | 0.583  | ○     | 0.724 | 0.750  |
| 30            | 31       | 722a | 1.67 | 1   | 0.651 | -     | -      | -     | ×     | 0.200 | 0.750 | ×     | 0.233 | 0.583  | ×     | 0.700 | 0.750  |
| 31            | 30       | 5c2e | 1.67 | 1   | 0.651 | -     | -      | -     | ×     | 0.194 | 0.750 | ×     | 0.226 | 0.583  | ×     | 0.677 | 0.750  |
| 32            | 6        | 91f3 | 3.00 | 1   | 0.647 | -     | -      | -     | ○     | 0.219 | 0.875 | ○     | 0.250 | 0.667  | ○     | 0.688 | 0.786  |
| 33            | 10       | 55b6 | 2.67 | 1   | 0.645 | -     | -      | -     | ×     | 0.212 | 0.875 | ○     | 0.273 | 0.750  | ○     | 0.697 | 0.821  |
| 34            | 24       | f0a2 | 2.33 | 1   | 0.644 | -     | -      | -     | ×     | 0.206 | 0.875 | ×     | 0.265 | 0.750  | ○     | 0.706 | 0.857  |
| 35            | 37       | d1e9 | 1.67 | 1   | 0.643 | -     | -      | -     | ×     | 0.200 | 0.875 | ×     | 0.257 | 0.750  | ×     | 0.686 | 0.857  |
| 36            | 33       | 9be7 | 1.67 | 1   | 0.640 | -     | -      | -     | ×     | 0.194 | 0.875 | ×     | 0.250 | 0.750  | ×     | 0.667 | 0.857  |
| 37            | 9        | 45cc | 2.67 | 1   | 0.639 | -     | -      | -     | ×     | 0.189 | 0.875 | ○     | 0.270 | 0.833  | ○     | 0.676 | 0.893  |
| 38            | 42       | fd4b | 1.00 | 1   | 0.639 | -     | -      | -     | ×     | 0.184 | 0.875 | ×     | 0.263 | 0.833  | ×     | 0.658 | 0.893  |
| 39            | 12       | ee5a | 2.67 | 1   | 0.638 | -     | -      | -     | ×     | 0.179 | 0.875 | ○     | 0.282 | 0.917  | ○     | 0.667 | 0.929  |
| 40            | 39       | 3782 | 1.33 | 1   | 0.637 | -     | -      | -     | ×     | 0.175 | 0.875 | ×     | 0.275 | 0.917  | ×     | 0.650 | 0.929  |
| 41            | 3        | 08d8 | 3.00 | 1   | 0.634 | -     | -      | -     | ○     | 0.195 | 1.00  | ○     | 0.293 | 1.00   | ○     | 0.659 | 0.964  |
| 42            | 16       | 4185 | 2.33 | 1   | 0.629 | -     | -      | -     | -     | -     | -     | -     | -     | -      | ○     | 0.667 | 1.00   |

**Table D-17: Precision and Recall on Love (Female, Averaged Score).**

| Rank_Ave_Score | Rank_Exp | ID   | BAFR | Ave_Score | n=3.5 |        |       | n=3.0 |        |       | n=2.5 |        |        | n=2.0 |       |        |
|----------------|----------|------|------|-----------|-------|--------|-------|-------|--------|-------|-------|--------|--------|-------|-------|--------|
|                |          |      |      |           | Rel   | Pre    | Rec   | Rel   | Pre    | Rec   | Rel   | Pre    | Rec    | Rel   | Pre   | Rec    |
| 1              | 19       | 70a3 | 2.33 | 0.820     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.0357 |
| 2              | 18       | 6bda | 2.33 | 0.790     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 1.00  | 0.0714 |
| 3              | 32       | 975f | 1.67 | 0.738     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.667 | 0.0714 |
| 4              | 36       | b1fc | 1.67 | 0.738     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.500 | 0.0714 |
| 5              | 22       | e4db | 2.33 | 0.732     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.600 | 0.107  |
| 6              | 14       | 321a | 2.33 | 0.730     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.667 | 0.143  |
| 7              | 38       | d9a9 | 1.67 | 0.724     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ×     | 0.571 | 0.143  |
| 8              | 20       | b0ae | 2.33 | 0.720     | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000 | ×     | 0.000  | 0.000  | ○     | 0.625 | 0.179  |
| 9              | 7        | a09a | 3.00 | 0.719     | ×     | 0.000  | 0.000 | ○     | 0.111  | 0.125 | ○     | 0.111  | 0.0833 | ○     | 0.667 | 0.214  |
| 10             | 29       | 3cb0 | 1.67 | 0.713     | ×     | 0.000  | 0.000 | ×     | 0.100  | 0.125 | ×     | 0.100  | 0.0833 | ×     | 0.600 | 0.214  |
| 11             | 17       | 643a | 2.33 | 0.704     | ×     | 0.000  | 0.000 | ×     | 0.0909 | 0.125 | ×     | 0.0909 | 0.0833 | ○     | 0.636 | 0.250  |
| 12             | 2        | 4d52 | 3.33 | 0.703     | ×     | 0.000  | 0.000 | ○     | 0.167  | 0.250 | ○     | 0.167  | 0.167  | ○     | 0.667 | 0.286  |
| 13             | 11       | a541 | 2.67 | 0.699     | ×     | 0.000  | 0.000 | ×     | 0.154  | 0.250 | ○     | 0.231  | 0.250  | ○     | 0.692 | 0.321  |
| 14             | 34       | 9d65 | 1.67 | 0.699     | ×     | 0.000  | 0.000 | ×     | 0.143  | 0.250 | ×     | 0.214  | 0.250  | ×     | 0.643 | 0.321  |
| 15             | 21       | b457 | 2.33 | 0.693     | ×     | 0.000  | 0.000 | ×     | 0.133  | 0.250 | ×     | 0.200  | 0.250  | ○     | 0.667 | 0.357  |
| 16             | 4        | 098e | 3.00 | 0.690     | ×     | 0.000  | 0.000 | ○     | 0.188  | 0.375 | ○     | 0.250  | 0.333  | ○     | 0.688 | 0.393  |
| 17             | 8        | cdfb | 3.00 | 0.679     | ×     | 0.000  | 0.000 | ○     | 0.235  | 0.500 | ○     | 0.294  | 0.417  | ○     | 0.706 | 0.429  |
| 18             | 25       | 09e1 | 2.00 | 0.678     | ×     | 0.000  | 0.000 | ×     | 0.222  | 0.500 | ×     | 0.278  | 0.417  | ○     | 0.722 | 0.464  |
| 19             | 40       | aada | 1.33 | 0.678     | ×     | 0.000  | 0.000 | ×     | 0.211  | 0.500 | ×     | 0.263  | 0.417  | ×     | 0.684 | 0.464  |
| 20             | 15       | 4070 | 2.33 | 0.676     | ×     | 0.000  | 0.000 | ×     | 0.200  | 0.500 | ×     | 0.250  | 0.417  | ○     | 0.700 | 0.500  |
| 21             | 5        | 784e | 3.00 | 0.672     | ×     | 0.000  | 0.000 | ○     | 0.238  | 0.625 | ○     | 0.286  | 0.500  | ○     | 0.714 | 0.536  |
| 22             | 13       | 2ad2 | 2.33 | 0.669     | ×     | 0.000  | 0.000 | ×     | 0.227  | 0.625 | ×     | 0.273  | 0.500  | ○     | 0.727 | 0.571  |
| 23             | 1        | 0eb4 | 4.00 | 0.667     | ○     | 0.0435 | 1.00  | ○     | 0.261  | 0.750 | ○     | 0.304  | 0.583  | ○     | 0.739 | 0.607  |
| 24             | 23       | ec36 | 2.33 | 0.665     | -     | -      | -     | ×     | 0.250  | 0.750 | ×     | 0.292  | 0.583  | ○     | 0.750 | 0.643  |
| 25             | 35       | a54b | 1.67 | 0.664     | -     | -      | -     | ×     | 0.240  | 0.750 | ×     | 0.280  | 0.583  | ×     | 0.720 | 0.643  |
| 26             | 28       | e762 | 2.00 | 0.656     | -     | -      | -     | ×     | 0.231  | 0.750 | ×     | 0.269  | 0.583  | ○     | 0.731 | 0.679  |
| 27             | 41       | 1c66 | 1.00 | 0.654     | -     | -      | -     | ×     | 0.222  | 0.750 | ×     | 0.259  | 0.583  | ×     | 0.704 | 0.679  |
| 28             | 27       | 721f | 2.00 | 0.654     | -     | -      | -     | ×     | 0.214  | 0.750 | ×     | 0.250  | 0.583  | ○     | 0.714 | 0.714  |
| 29             | 26       | 6a33 | 2.00 | 0.652     | -     | -      | -     | ×     | 0.207  | 0.750 | ×     | 0.241  | 0.583  | ○     | 0.724 | 0.750  |
| 30             | 31       | 722a | 1.67 | 0.651     | -     | -      | -     | ×     | 0.200  | 0.750 | ×     | 0.233  | 0.583  | ×     | 0.700 | 0.750  |
| 31             | 30       | 5c2e | 1.67 | 0.651     | -     | -      | -     | ×     | 0.194  | 0.750 | ×     | 0.226  | 0.583  | ×     | 0.677 | 0.750  |
| 32             | 6        | 91f3 | 3.00 | 0.647     | -     | -      | -     | ○     | 0.219  | 0.875 | ○     | 0.250  | 0.667  | ○     | 0.688 | 0.786  |
| 33             | 10       | 55b6 | 2.67 | 0.645     | -     | -      | -     | ×     | 0.212  | 0.875 | ○     | 0.273  | 0.750  | ○     | 0.697 | 0.821  |
| 34             | 24       | f0a2 | 2.33 | 0.644     | -     | -      | -     | ×     | 0.206  | 0.875 | ×     | 0.265  | 0.750  | ○     | 0.706 | 0.857  |
| 35             | 37       | d1e9 | 1.67 | 0.643     | -     | -      | -     | ×     | 0.200  | 0.875 | ×     | 0.257  | 0.750  | ×     | 0.686 | 0.857  |
| 36             | 33       | 9be7 | 1.67 | 0.640     | -     | -      | -     | ×     | 0.194  | 0.875 | ×     | 0.250  | 0.750  | ×     | 0.667 | 0.857  |
| 37             | 9        | 45cc | 2.67 | 0.639     | -     | -      | -     | ×     | 0.189  | 0.875 | ○     | 0.270  | 0.833  | ○     | 0.676 | 0.893  |
| 38             | 42       | fd4b | 1.00 | 0.639     | -     | -      | -     | ×     | 0.184  | 0.875 | ×     | 0.263  | 0.833  | ×     | 0.658 | 0.893  |
| 39             | 12       | ee5a | 2.67 | 0.638     | -     | -      | -     | ×     | 0.179  | 0.875 | ○     | 0.282  | 0.917  | ○     | 0.667 | 0.929  |
| 40             | 39       | 3782 | 1.33 | 0.637     | -     | -      | -     | ×     | 0.175  | 0.875 | ×     | 0.275  | 0.917  | ×     | 0.650 | 0.929  |
| 41             | 3        | 08d8 | 3.00 | 0.634     | -     | -      | -     | ○     | 0.195  | 1.00  | ○     | 0.293  | 1.00   | ○     | 0.659 | 0.964  |
| 42             | 16       | 4185 | 2.33 | 0.629     | -     | -      | -     | -     | -      | -     | -     | -      | -      | ○     | 0.667 | 1.00   |

**Table D-18: Precision and Recall on Love (Female, Distance).**

| Rank_<br>Dis | Rank_<br>Exp | ID   | BAFR | Dis   | n=3.5 |        |       | n=3.0 |       |       | n=2.5 |       |        | n=2.0 |       |        |
|--------------|--------------|------|------|-------|-------|--------|-------|-------|-------|-------|-------|-------|--------|-------|-------|--------|
|              |              |      |      |       | Rel   | Pre    | Rec   | Rel   | Pre   | Rec   | Rel   | Pre   | Rec    | Rel   | Pre   | Rec    |
| 1            | 19           | 70a3 | 2.33 | 0.690 | ×     | 0.000  | 0.000 | ×     | 0.000 | 0.000 | ×     | 0.000 | 0.000  | ○     | 1.00  | 0.0357 |
| 2            | 4            | 098e | 3.00 | 0.700 | ×     | 0.000  | 0.000 | ○     | 0.500 | 0.125 | ○     | 0.500 | 0.0833 | ○     | 1.00  | 0.0714 |
| 3            | 18           | 6bda | 2.33 | 0.716 | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.125 | ×     | 0.333 | 0.0833 | ○     | 1.00  | 0.107  |
| 4            | 11           | a541 | 2.67 | 0.743 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.125 | ○     | 0.500 | 0.167  | ○     | 1.00  | 0.143  |
| 5            | 5            | 784e | 3.00 | 0.763 | ×     | 0.000  | 0.000 | ○     | 0.400 | 0.250 | ○     | 0.600 | 0.250  | ○     | 1.00  | 0.179  |
| 6            | 32           | 975f | 1.67 | 0.767 | ×     | 0.000  | 0.000 | ×     | 0.333 | 0.250 | ×     | 0.500 | 0.250  | ×     | 0.833 | 0.179  |
| 7            | 36           | b1fc | 1.67 | 0.767 | ×     | 0.000  | 0.000 | ×     | 0.286 | 0.250 | ×     | 0.429 | 0.250  | ×     | 0.714 | 0.179  |
| 8            | 22           | c4db | 2.33 | 0.772 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.250 | ×     | 0.375 | 0.250  | ○     | 0.750 | 0.214  |
| 9            | 38           | d9a9 | 1.67 | 0.781 | ×     | 0.000  | 0.000 | ×     | 0.222 | 0.250 | ×     | 0.333 | 0.250  | ×     | 0.667 | 0.214  |
| 10           | 20           | b0ae | 2.33 | 0.785 | ×     | 0.000  | 0.000 | ×     | 0.200 | 0.250 | ×     | 0.300 | 0.250  | ○     | 0.700 | 0.250  |
| 11           | 7            | a09a | 3.00 | 0.787 | ×     | 0.000  | 0.000 | ○     | 0.273 | 0.375 | ○     | 0.364 | 0.333  | ○     | 0.727 | 0.286  |
| 12           | 29           | 3cb0 | 1.67 | 0.793 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.375 | ×     | 0.333 | 0.333  | ×     | 0.667 | 0.286  |
| 13           | 17           | 643a | 2.33 | 0.804 | ×     | 0.000  | 0.000 | ×     | 0.231 | 0.375 | ×     | 0.308 | 0.333  | ○     | 0.692 | 0.321  |
| 14           | 2            | 4d52 | 3.33 | 0.804 | ×     | 0.000  | 0.000 | ○     | 0.286 | 0.500 | ○     | 0.357 | 0.417  | ○     | 0.714 | 0.357  |
| 15           | 14           | 321a | 2.33 | 0.805 | ×     | 0.000  | 0.000 | ×     | 0.267 | 0.500 | ×     | 0.333 | 0.417  | ○     | 0.733 | 0.393  |
| 16           | 34           | 9d65 | 1.67 | 0.809 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.500 | ×     | 0.313 | 0.417  | ×     | 0.688 | 0.393  |
| 17           | 21           | b457 | 2.33 | 0.815 | ×     | 0.000  | 0.000 | ×     | 0.235 | 0.500 | ×     | 0.294 | 0.417  | ○     | 0.706 | 0.429  |
| 18           | 8            | cdfb | 3.00 | 0.818 | ×     | 0.000  | 0.000 | ○     | 0.278 | 0.625 | ○     | 0.333 | 0.500  | ○     | 0.722 | 0.464  |
| 19           | 15           | 4070 | 2.33 | 0.831 | ×     | 0.000  | 0.000 | ×     | 0.263 | 0.625 | ×     | 0.316 | 0.500  | ○     | 0.737 | 0.500  |
| 20           | 25           | 09e1 | 2.00 | 0.834 | ×     | 0.000  | 0.000 | ×     | 0.250 | 0.625 | ×     | 0.300 | 0.500  | ○     | 0.750 | 0.536  |
| 21           | 40           | aada | 1.33 | 0.834 | ×     | 0.000  | 0.000 | ×     | 0.238 | 0.625 | ×     | 0.286 | 0.500  | ×     | 0.714 | 0.536  |
| 22           | 13           | 2ad2 | 2.33 | 0.845 | ×     | 0.000  | 0.000 | ×     | 0.227 | 0.625 | ×     | 0.273 | 0.500  | ○     | 0.727 | 0.571  |
| 23           | 1            | 0eb4 | 4.00 | 0.848 | ○     | 0.0435 | 1.00  | ○     | 0.261 | 0.750 | ○     | 0.304 | 0.583  | ○     | 0.739 | 0.607  |
| 24           | 23           | ec36 | 2.33 | 0.850 | -     | -      | -     | ×     | 0.250 | 0.750 | ×     | 0.292 | 0.583  | ○     | 0.750 | 0.643  |
| 25           | 35           | a54b | 1.67 | 0.852 | -     | -      | -     | ×     | 0.240 | 0.750 | ×     | 0.280 | 0.583  | ×     | 0.720 | 0.643  |
| 26           | 28           | e762 | 2.00 | 0.862 | -     | -      | -     | ×     | 0.231 | 0.750 | ×     | 0.269 | 0.583  | ○     | 0.731 | 0.679  |
| 27           | 41           | 1c66 | 1.00 | 0.864 | -     | -      | -     | ×     | 0.222 | 0.750 | ×     | 0.259 | 0.583  | ×     | 0.704 | 0.679  |
| 28           | 27           | 721f | 2.00 | 0.864 | -     | -      | -     | ×     | 0.214 | 0.750 | ×     | 0.250 | 0.583  | ○     | 0.714 | 0.714  |
| 29           | 26           | 6a33 | 2.00 | 0.868 | -     | -      | -     | ×     | 0.207 | 0.750 | ×     | 0.241 | 0.583  | ○     | 0.724 | 0.750  |
| 30           | 31           | 722a | 1.67 | 0.868 | -     | -      | -     | ×     | 0.200 | 0.750 | ×     | 0.233 | 0.583  | ×     | 0.700 | 0.750  |
| 31           | 30           | 5c2e | 1.67 | 0.869 | -     | -      | -     | ×     | 0.194 | 0.750 | ×     | 0.226 | 0.583  | ×     | 0.677 | 0.750  |
| 32           | 6            | 91f3 | 3.00 | 0.874 | -     | -      | -     | ○     | 0.219 | 0.875 | ○     | 0.250 | 0.667  | ○     | 0.688 | 0.786  |
| 33           | 10           | 55b6 | 2.67 | 0.877 | -     | -      | -     | ×     | 0.212 | 0.875 | ○     | 0.273 | 0.750  | ○     | 0.697 | 0.821  |
| 34           | 24           | f0a2 | 2.33 | 0.877 | -     | -      | -     | ×     | 0.206 | 0.875 | ×     | 0.265 | 0.750  | ○     | 0.706 | 0.857  |
| 35           | 37           | d1e9 | 1.67 | 0.880 | -     | -      | -     | ×     | 0.200 | 0.875 | ×     | 0.257 | 0.750  | ×     | 0.686 | 0.857  |
| 36           | 33           | 9be7 | 1.67 | 0.884 | -     | -      | -     | ×     | 0.194 | 0.875 | ×     | 0.250 | 0.750  | ×     | 0.667 | 0.857  |
| 37           | 9            | 45cc | 2.67 | 0.885 | -     | -      | -     | ×     | 0.189 | 0.875 | ○     | 0.270 | 0.833  | ○     | 0.676 | 0.893  |
| 38           | 42           | fd4b | 1.00 | 0.885 | -     | -      | -     | ×     | 0.184 | 0.875 | ×     | 0.263 | 0.833  | ×     | 0.658 | 0.893  |
| 39           | 12           | ee5a | 2.67 | 0.886 | -     | -      | -     | ×     | 0.179 | 0.875 | ○     | 0.282 | 0.917  | ○     | 0.667 | 0.929  |
| 40           | 39           | 3782 | 1.33 | 0.888 | -     | -      | -     | ×     | 0.175 | 0.875 | ×     | 0.275 | 0.917  | ×     | 0.650 | 0.929  |
| 41           | 3            | 08d8 | 3.00 | 0.892 | -     | -      | -     | ○     | 0.195 | 1.00  | ○     | 0.293 | 1.00   | ○     | 0.659 | 0.964  |
| 42           | 16           | 4185 | 2.33 | 0.899 | -     | -      | -     | -     | -     | -     | -     | -     | -      | ○     | 0.667 | 1.00   |

## Publication List

### Journal

1. 横山友也, 宝珍輝尚, 野宮浩揮, 佐藤哲司, “質問回答サイトの質問文と回答文の印象評価とベストアンサーの推定,” 日本感性工学会論文誌, Vol.10, No.2, pp.221-230, 2011.
2. 横山友也, 宝珍輝尚, 野宮浩揮, 佐藤哲司, “文章の特徴量を用いた質問回答文の印象の因子得点の推定,” 日本感性工学会論文誌, Vol.12, No.1, pp.1-10, 2013.
3. Yuya Yokoyama, Teruhisa Hochin, Hiroki Nomiya, and Tetsuji Satoh, “Obtaining Factors Describing Impression of Questions and Answers and Estimation of their Scores from Feature Values of Statements,” *Studies in Computational Intelligence*, Vol.413, pp.1-13, Springer, 2012.
4. Yuya Yokoyama, Teruhisa Hochin and Hiroki Nomiya, “Using Feature Values of Statements to Improve the Estimation Accuracy of Factor Scores of Impressions of Question and Answer Statements,” *International Journal of Affective Engineering*, Vol. 13, No. 1, Special Issue on ISAE 2013, pp.19-26, 2014.

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1. Yuya Yokoyama, Teruhisa Hochin, Hiroki Nomiya and Tetsuji Satoh, “Improvement of Estimation Accuracy of Factor Scores from Feature Values of Statements,” *Proceedings of IIAI/ACIS International Symposium on Innovative E-Services and Information Systems (IEIS 2012)*, pp.300-305, 2012.
2. Yuya Yokoyama, Teruhisa Hochin, Hiroki Nomiya and Tetsuji Satoh, “Explaining Estimation of Factor Scores of Question and Answer Statements,” *Proceedings of 13th ACIS International Conference on Software, Engineering, Artificial Intelligence, Networking and Parallel/Distributed Computing (SNPD2012)*, pp.779-784, 2012.
3. Yuya Yokoyama, Teruhisa Hochin and Hiroki Nomiya, “Estimation of Objective Scores of Answer Statements Posted at Q&A Sites,” *Proceedings of 14th IEEE/ACIS International Conference on Software, Engineering, Artificial Intelligence, Networking and Parallel/Distributed Computing (SNPD2013)*, pp.426-431, 2013.
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5. Yuya Yokoyama, Teruhisa Hochin and Hiroki Nomiya, “Towards Detecting Appropriate Respondents to Questions Posted at Q&A Sites,” *Proceedings of International Symposium on Affective Science and Engineering 2015*

(ISASE2015), B2-1, 2015.

## Oral Presentations

1. 横山友也, 宝珍輝尚, 野宮浩揮, 佐藤哲司, “質問回答サイトの質問文と回答文の印象評価,” 第2回データ工学と情報マネジメントに関するフォーラム (DEIM2010), C4-2, 2010.
2. 横山友也, 宝珍輝尚, 野宮浩揮, 佐藤哲司, “文章の特徴量を用いた質問回答文の因子得点の推定,” 第6回日本感性工学春季大会, 22D-2, 2011.
3. 横山友也, 宝珍輝尚, 野宮浩揮, 佐藤哲司, “文章の特徴量を用いた質問回答文の因子得点の推定精度の向上,” 宝塚大学宝塚キャンパス, 日本感性工学会関西支部大会, 2011.
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5. 横山友也, 宝珍輝尚, 野宮浩揮, 佐藤哲司, “文末表現を考慮した文章の特徴量を用いた質問回答文の因子得点の推定,” 第17回 公開シンポジウム「人文科学とデータベース」, pp.9-20, 2012.
6. 横山友也, 宝珍輝尚, 野宮浩揮, 佐藤哲司, “文章の特徴量を用いた質問回答文の印象の因子得点の推定精度の向上,” 第18回 公開シンポジウム「人文科学とデータベース」, pp.25-32, 2012.
7. 横山友也, 宝珍輝尚, 野宮浩揮, “質問回答サイトに投稿された回答文の客観的評価値の推定,” 第15回日本感性工学会大会, 2013.
8. 横山友也, 宝珍輝尚, 野宮浩揮, “質問回答サイトにおける回答文の客観的評価の推定,” 2013年度情報処理学会関西支部 支部大会, G-05, 2013.
9. 横山友也, 宝珍輝尚, 野宮浩揮, “質問回答サイトに投稿された回答文の客観的評価値の推定精度の向上～質問文と回答文の共通名詞を用いて～,” 第158回データベースシステム研究発表会, A1-3, 2013.
10. 横山友也, 宝珍輝尚, 野宮浩揮, “Finding Appropriate Respondents to Questions at Question and Answer Sites,” 第7回データ工学と情報マネジメントに関するフォーラム (DEIM2015), A4-4, 2015.
11. 横山友也, 宝珍輝尚, 野宮浩揮, “質問回答サイトにおける質問文への適切な回答者の妥当性の検証,” 情報処理学会第77回全国大会, 5B-3, 2015.