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UNIVERSITAS
SEBELAS MARET

**ICOSETH
2019**

Certificate

No. 16399/UN27.02/PP/2019

This certificate is presented to

Lutfi Rahmatuti Maghfiroh

as

Speaker

in The International Conference on Science Education and Technology (ICOSETH) 2019

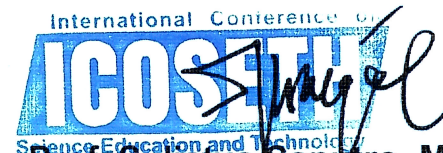
*“Facing Industrial Revolution 4.0 and Society 5.0
on Science Education and Technology”*

Surakarta, 23 November 2019



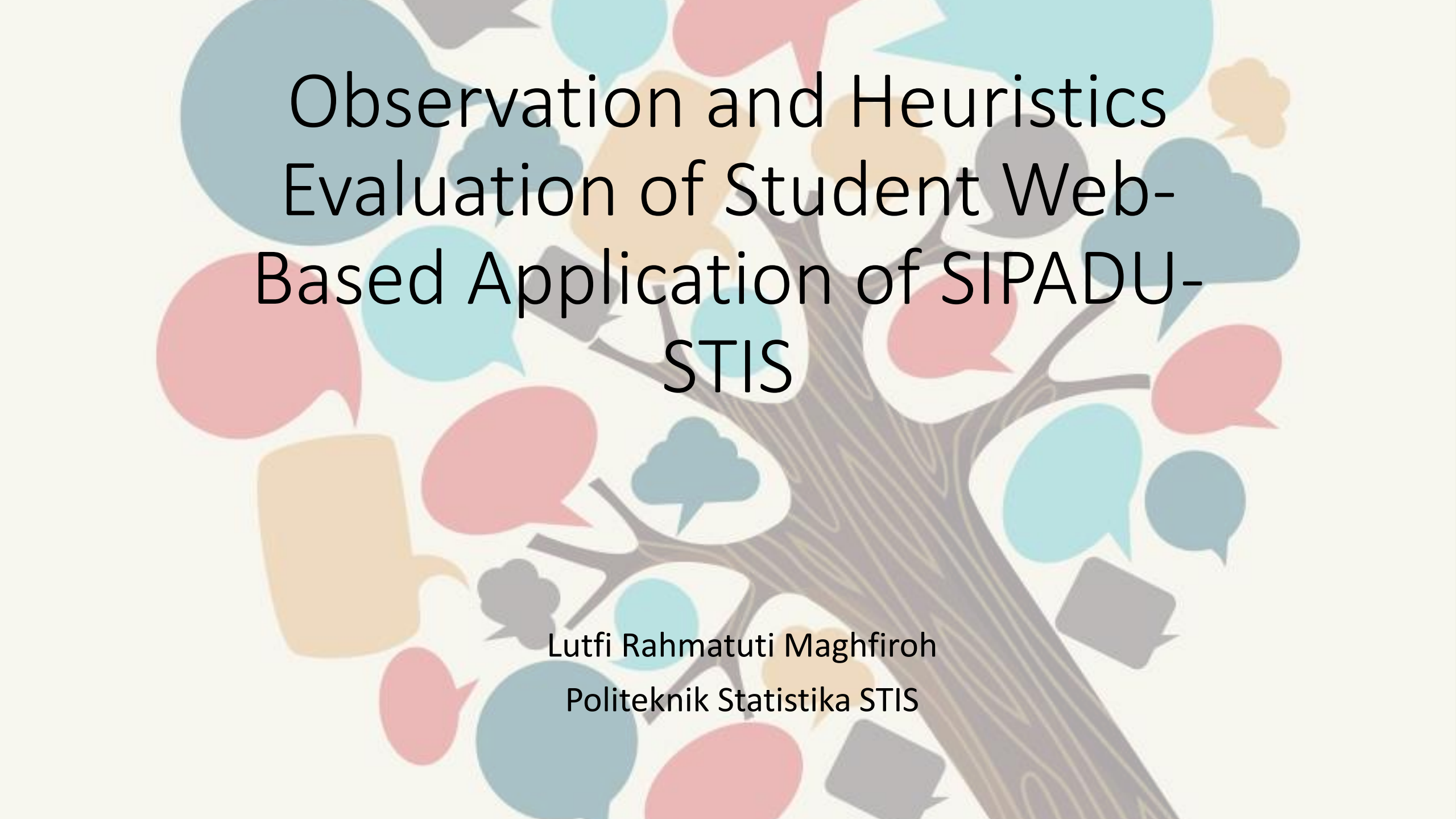
Dr. Mardiyana, M.Si.

Dean of Teacher Training and Education Faculty
Universitas Sebelas Maret



Prof. Sulistyso Saputro, M.Si., Ph.D.

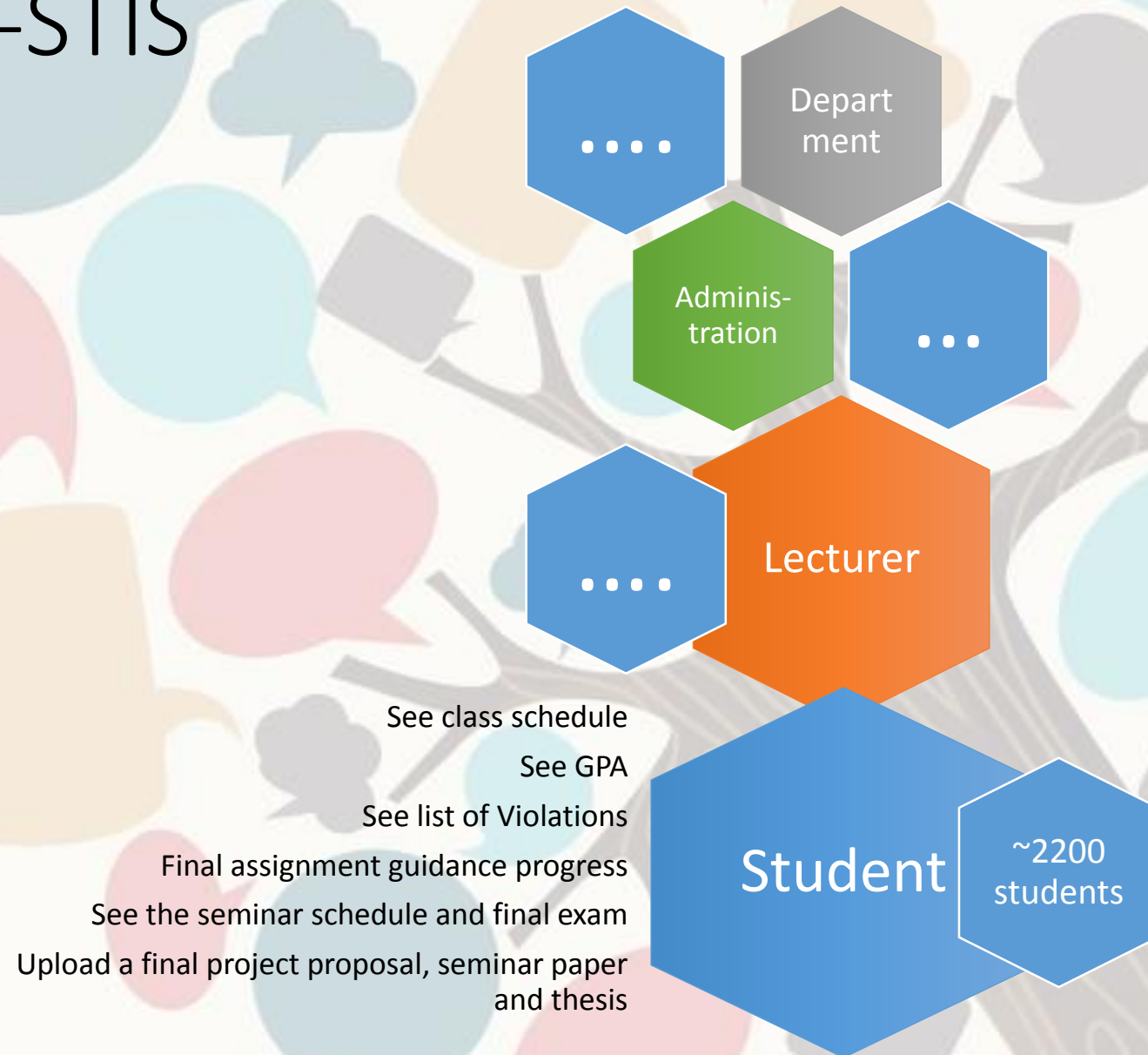
Chairman of ICOSETH 2019



Observation and Heuristics Evaluation of Student Web- Based Application of SIPADU- STIS

Lutfi Rahmatuti Maghfiroh
Politeknik Statistika STIS

SIPADU-STIS

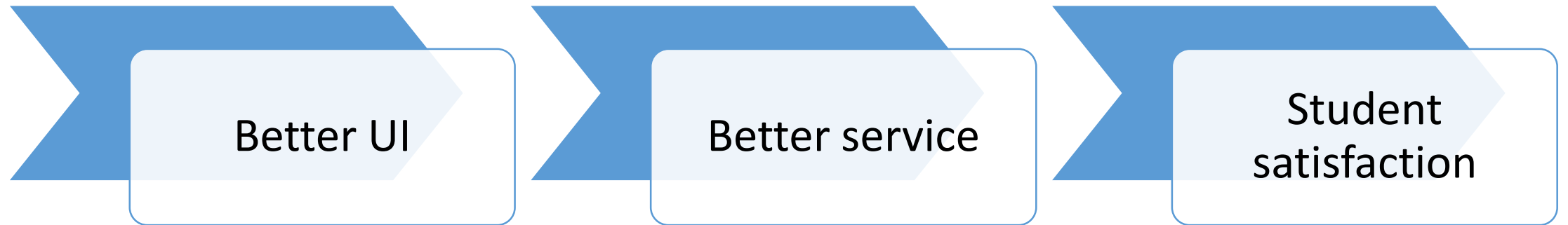


Previous System Evaluation



Blackbox
Testing

SUS



Better UI

Better service

Student
satisfaction

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graph LR; A((UI review)) --> B((Heuristic Evaluation)); B --> C((UI redesign));
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UI
review

Heuristic
Evaluation

UI
redesign

Rais, Nendy Akbar Rozaq, Hari Agustiyo, Moch. Arfian Ardiansyah. 2018. *Evaluasi Heuristic Study Kasus Tiket.com*. Seminar Nasional Teknologi Informasi dan Multimedia 2018. ISSN : 2302-3805.

Aziza, Rifda Fatcha Alfa, Yahya Taufiq Hidayat. *Analisa Usability Desain User Interface Pada Website Tokopedia Menggunakan Metode Heuristics Evaluation*. Jurnal TEKNOKOMPAK, Vol. 13, No. 1, 2019, 7-11. ISSN 1412-9663

Almarashdeh, Ibrahim, Mutasem, Alsmadi. *Heuristic Evaluation of Mobile Government Portal Services: An Experts' Review*. The 11th International Conference for Internet Technology and Secured Transactions (ICITST-2016). 978-1-908320/73/5/\$31.00 © 2016 IEEE

Yusoh, Suweena, Sureena Matayong. *Heuristic Evaluation of Online Satisfaction Survey System for Public Healthcare Service: Applying Analytical Hierarchical Process*. 2017 2nd International Conferences on Information Technology, Information Systems and Elect

Salvado, Valeria Farinazzo Martins, Lincoln de Assis Moura Jr. *Heuristic Evaluation For Automatic Radiology Reporting Transcription Systems*. 10th International Conference on Information Science, Signal Processing and their Applications (ISSPA 2010)

Paz, Freddy, Freddy A. Paz, Daniela Villanueva, Jos'e Antonio Pow-Sang. *Heuristic Evaluation as a Complement to Usability Testing: A Case Study in Web Domain*. 2015 12th International Conference on Information Technology - New Generations

Subbian, Vignesh, Philip A. Wilsey, and Fred R. Beyette, Jr., *Heuristic Evaluation of User Interface for Point-of-Care Diagnosis and Rehabilitation of Mild Traumatic Brain Injury*. 6th Annual International IEEE EMBS Conference on Neural Engineering San Diego, California

Borovina Nihad. *Heuristic based evaluation of mobile services web portal usability*. 22nd telecommunications forum TELFOR 2014

Salgado, Andr'e de Lima, Renata Pontin de Mattos Fortes. *Heuristic Evaluation for Novice Evaluators*. Springer International Publishing Switzerland 2016. A. Marcus (Ed.): DUXU 2016, Part I, LNCS 9746, pp. 387–398, 2016. DOI: 10.1007/978-3-319-40409-7_37

Botella, Federico, Jose A. Gallud, and Ricardo Tesoreiro. *Using Interaction Patterns in Heuristic Evaluation*. A. Marcus (Ed.): *Design, User Experience, and Usability*, Pt I, HCII 2011, LNCS 6769, pp. 23–32, 2011. © Springer-Verlag Berlin Heidelberg 2011

Jakob Nielsen on April 24, 1994. <https://www.nngroup.com/articles/ten-usability-heuristics/>. Accessed on October 15, 2019

Methods



Questionnaire

Heuristic Aspect
of Nielsen

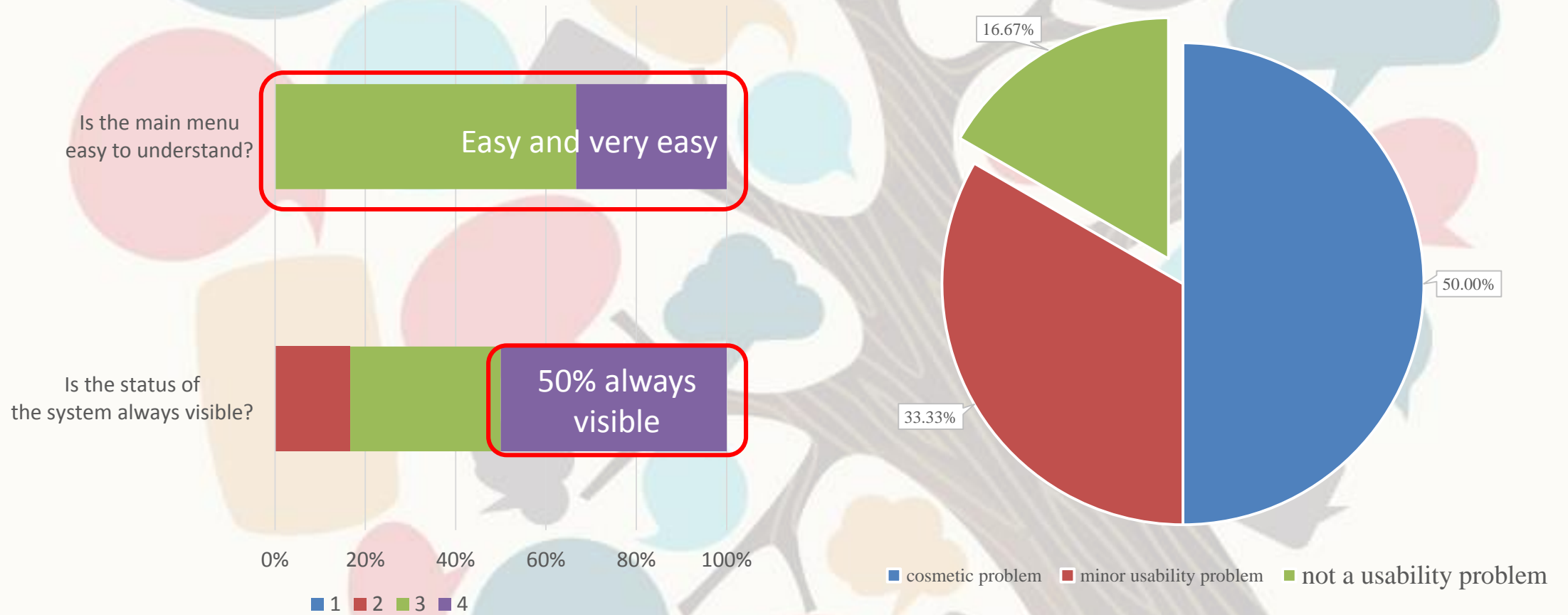
- Visibility of System Status
- Match between the system and the real world
- User control and freedom
- Consistency and standards
- Recognition rather than recall
- Error prevention
- Flexibility and efficiency of use
- Aesthetic and minimalist design
- Help users recognize, diagnose, and recover from errors
- Help and documentation

10 Aspect
assessment

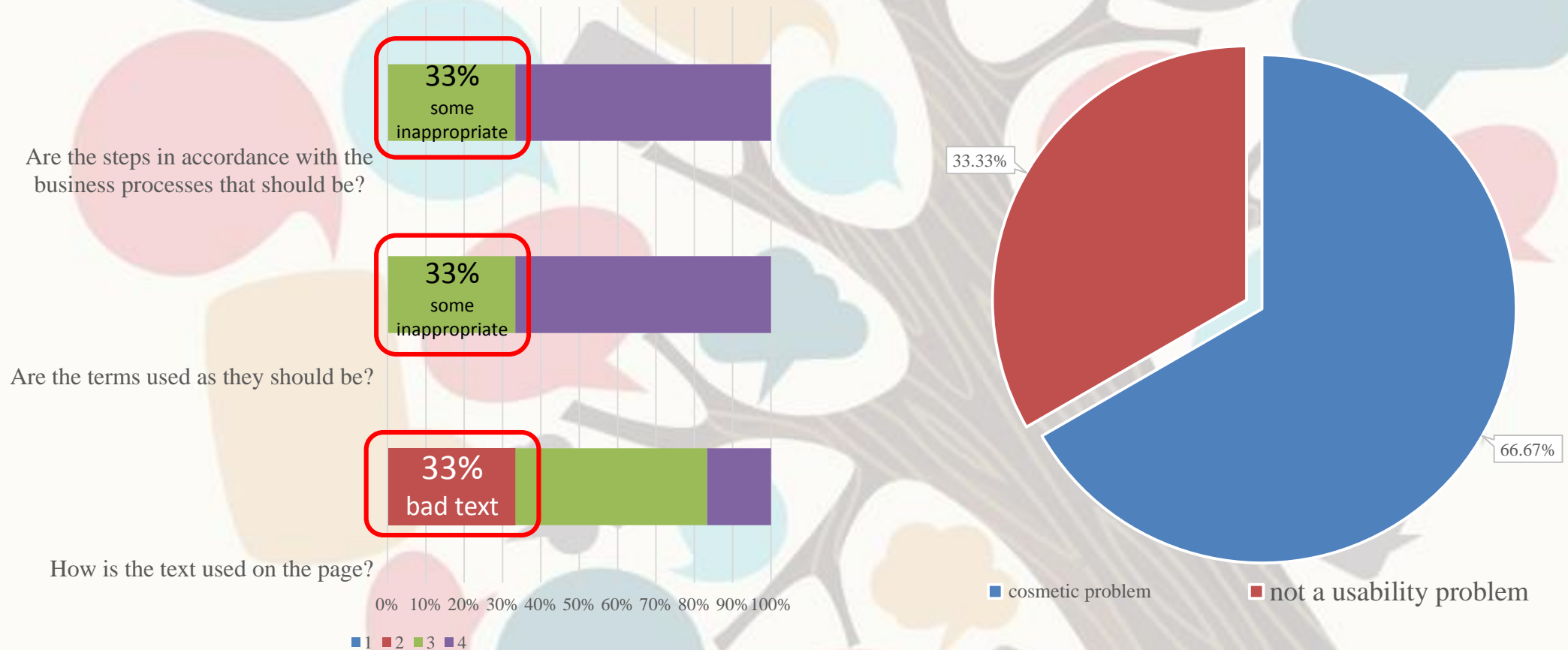
Usability
problem
level

- not a usability problems,
- cosmetic problems,
- minor usability problems,
- major usability problems,
- usability catastrophes

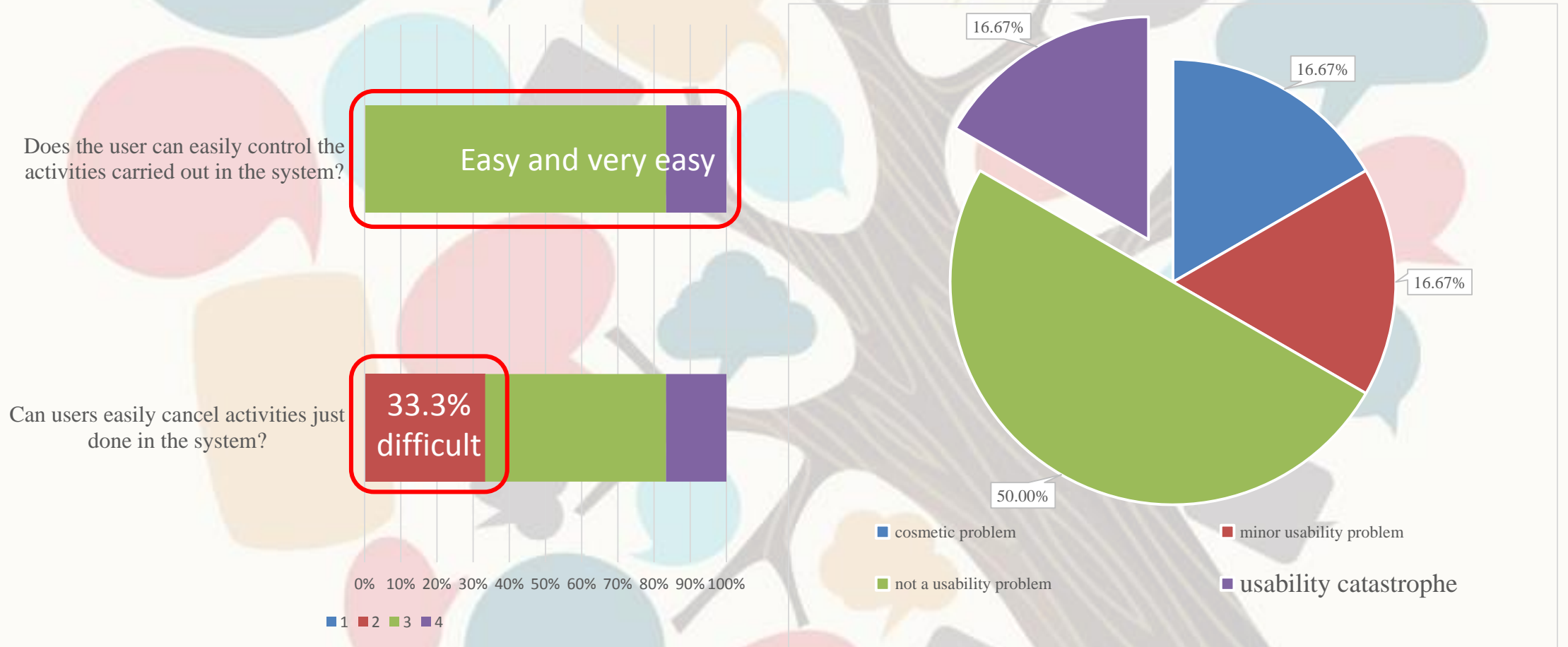
Visibility of System Status



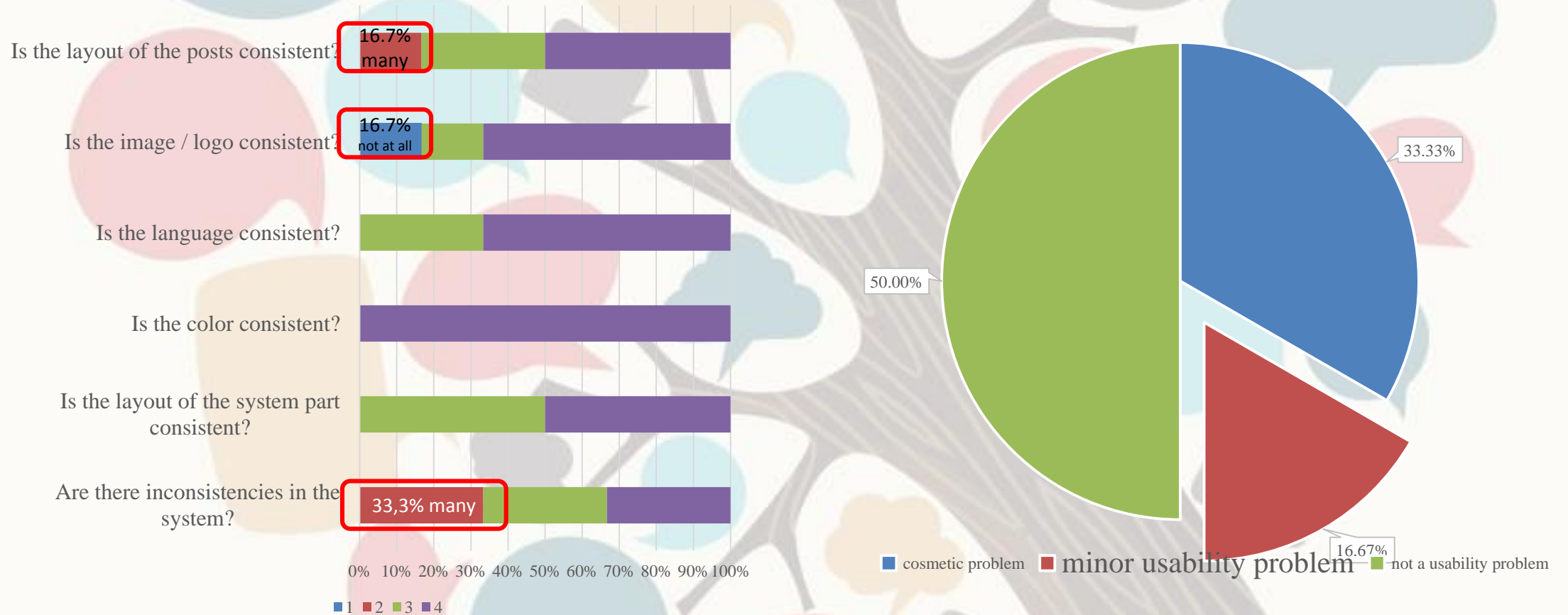
Match between the system and the real world



User control and freedom

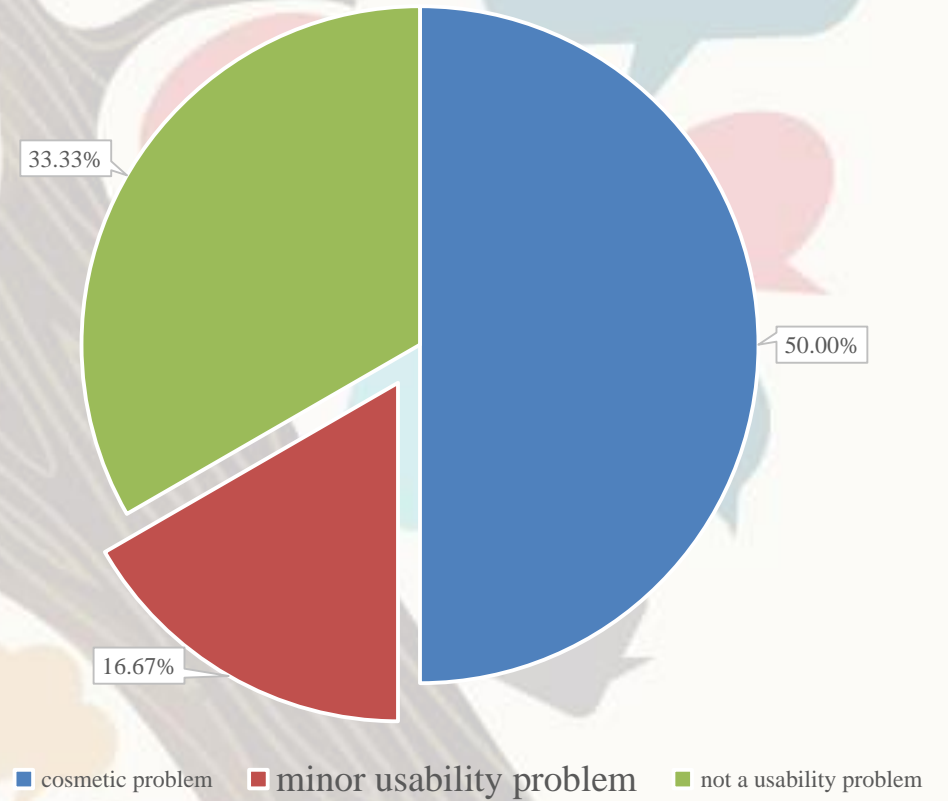
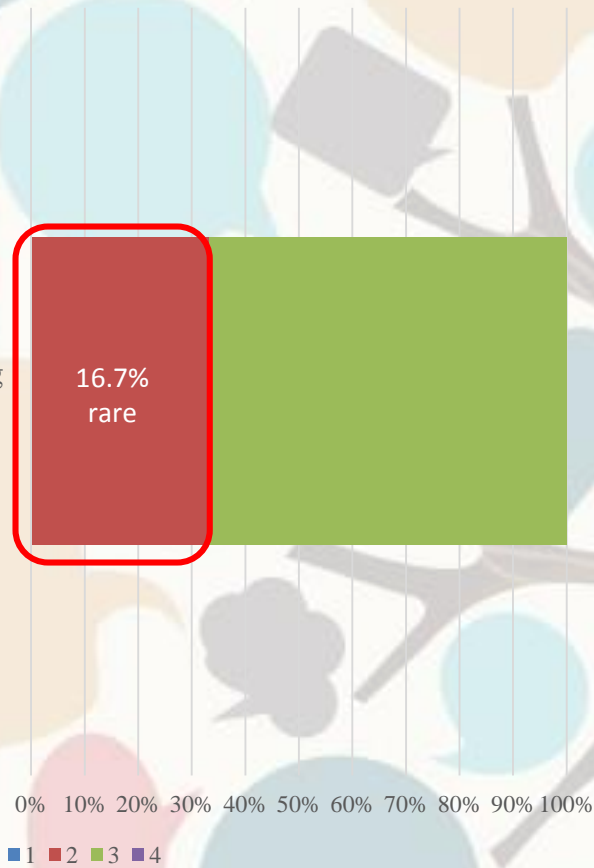


Consistency and standards

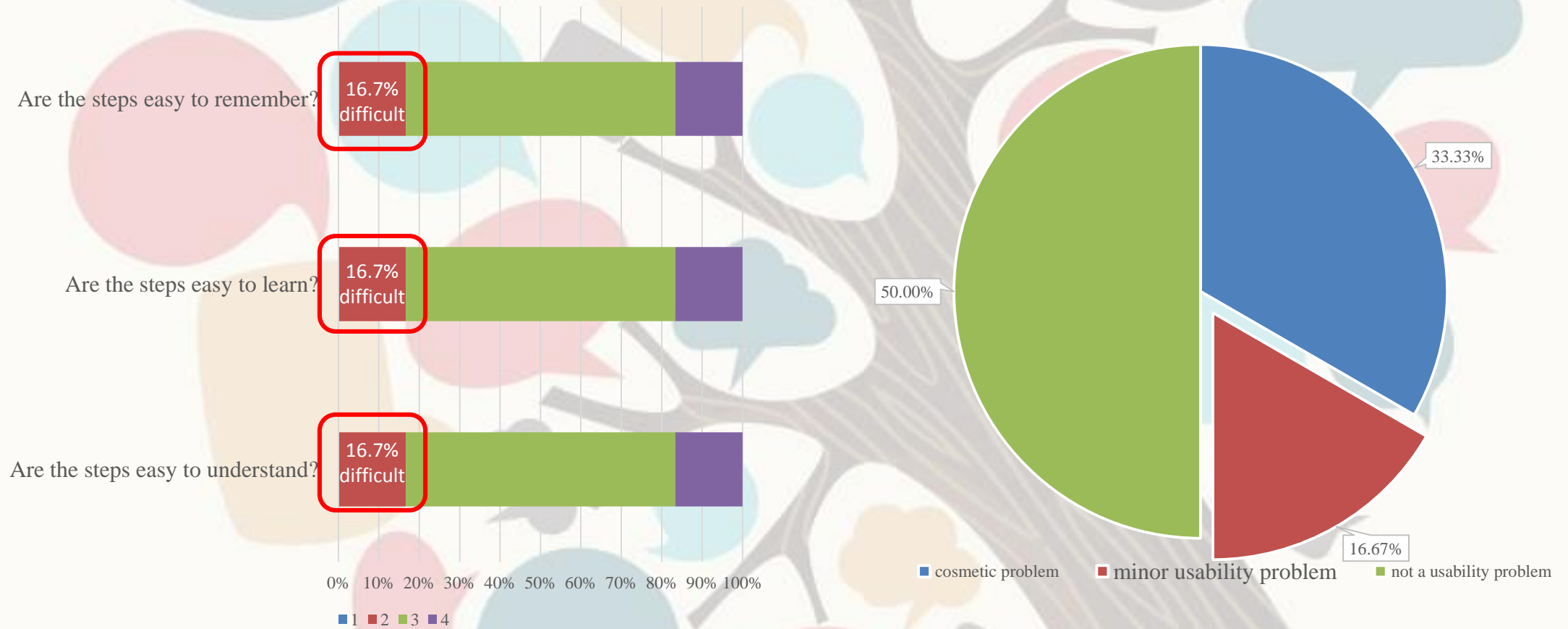


Error prevention

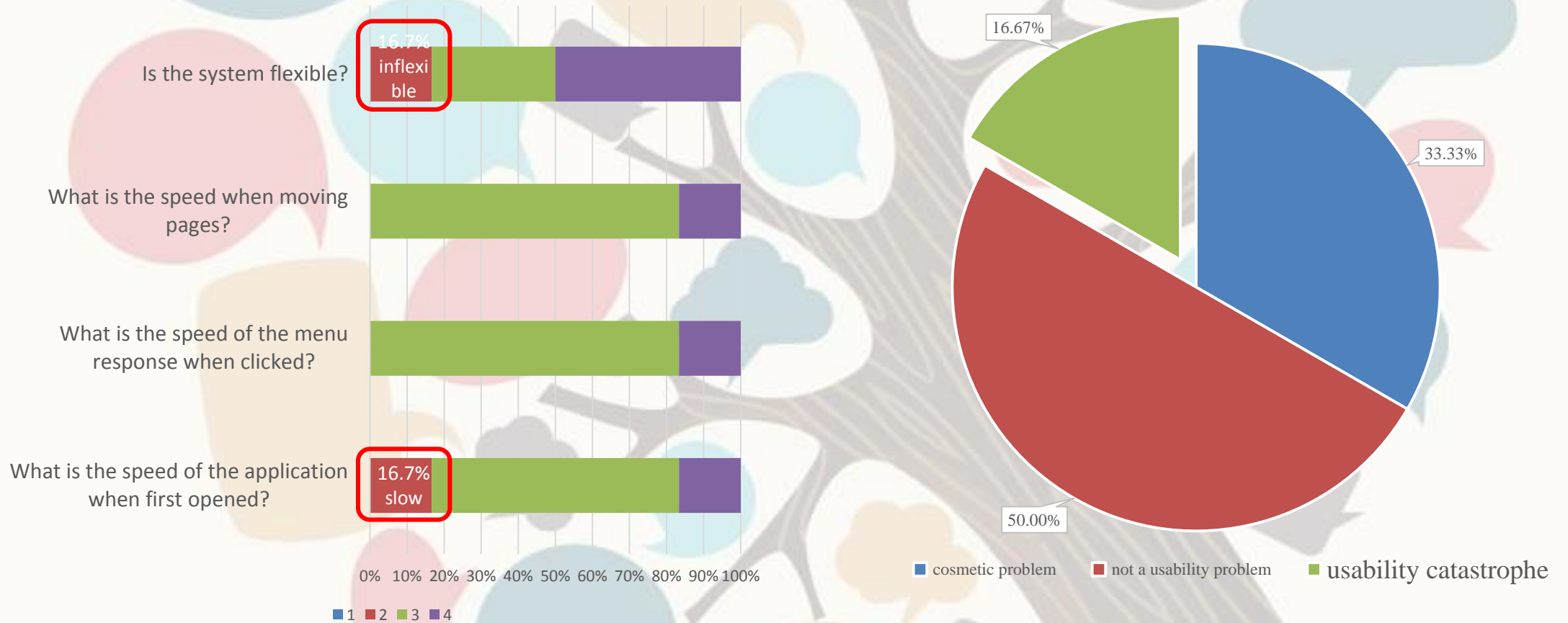
Does the system provide a warning before you take a risk action?



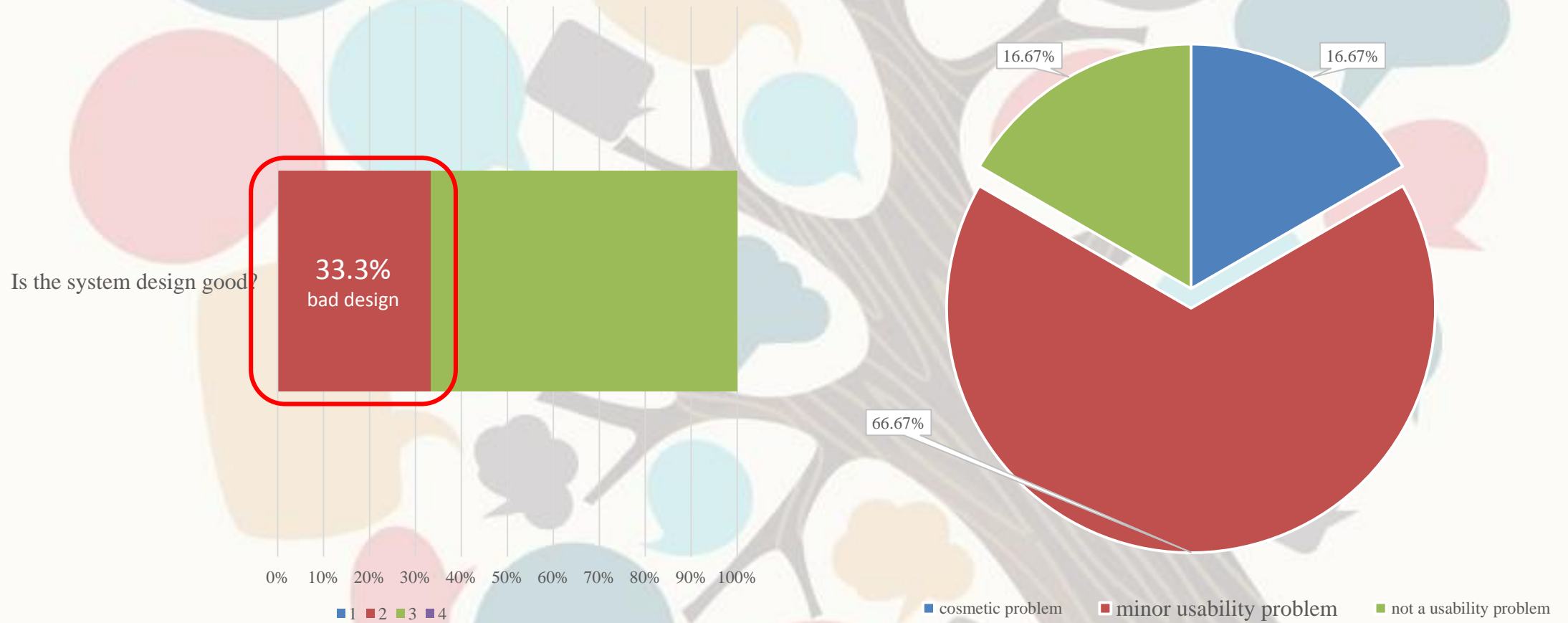
Recognition rather than recall



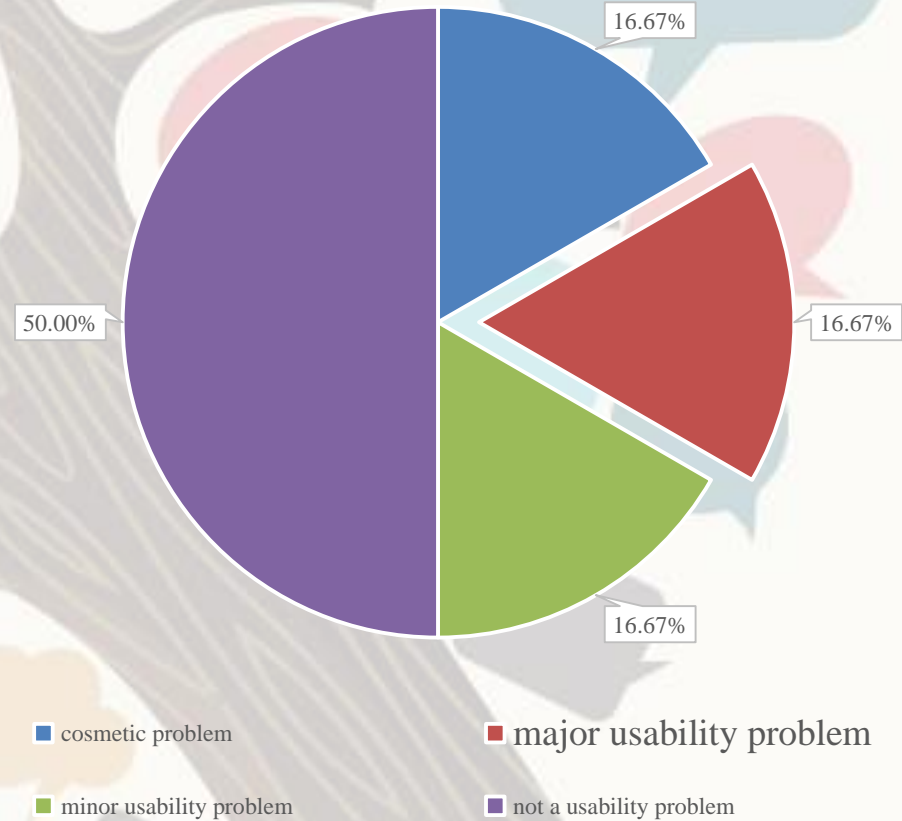
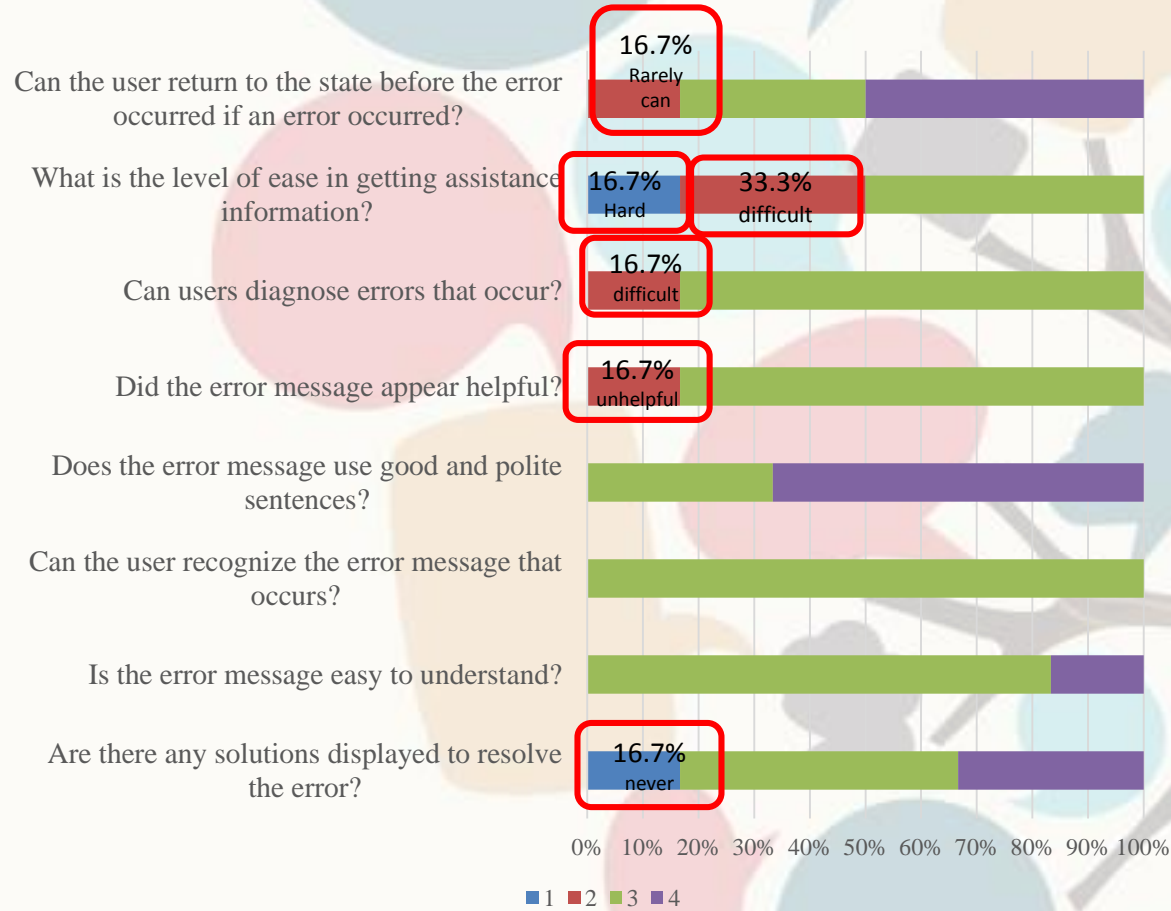
Flexibility and efficiency of use



Aesthetic and minimalist design



Help users recognize, diagnose, and recover from errors

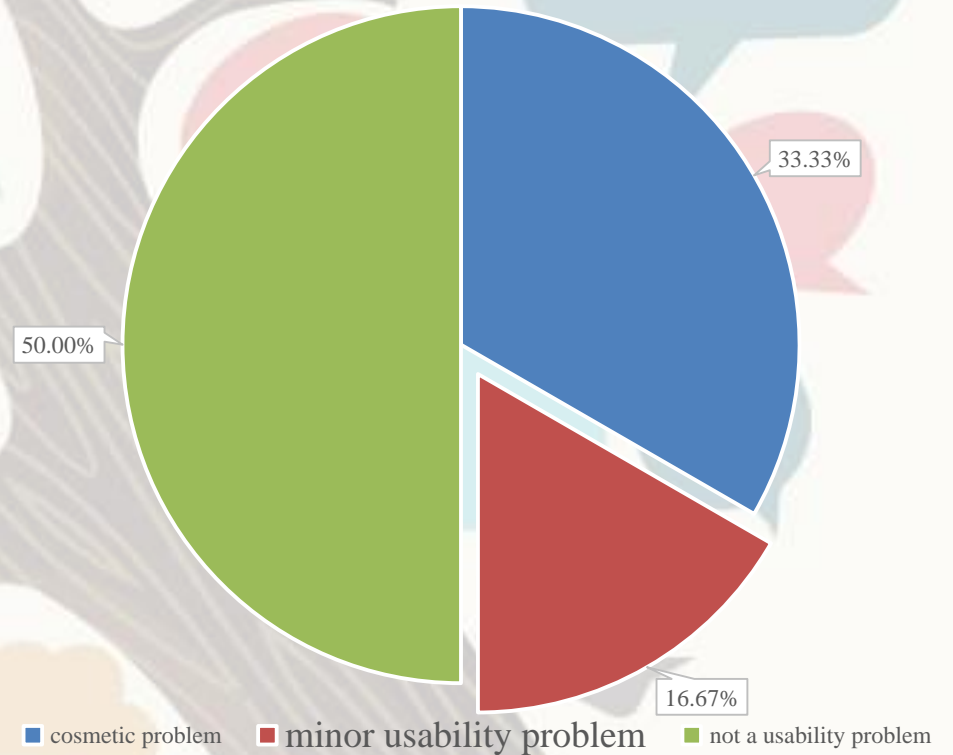
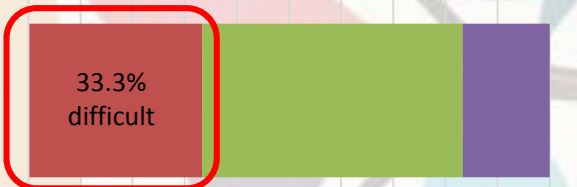


Help and documentation

Are the help and documentation menus helpful enough?



Is the help menu and documentation easy to find?



■ 1 ■ 2 ■ 3 ■ 4

Conclusion

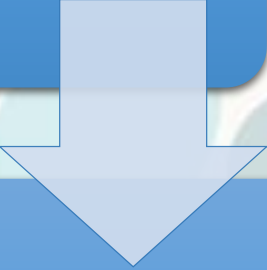
there were at least a problem
even though it only appeared,



The most severe problem
was having to redesign the
system.

Suggestion

developers should redesign aspects of control and freedom and flexibility and efficient of use.



Improvements to improve services to students, especially in the aspects of help users to recognize, dialogue, and recovers from errors



Thank you