

## Editorial

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The new issue of the Intern. Journal Transaction on Machine Learning and Data Mining presents one more two hot topics on data mining and machine learning.

In the time of deep learning, big data or mass data analysis get the evaluation and the reporting of the results new attention. We need methods besides the error rate of a classifier that allow us to weigh more accurately the particular result. Risk charts and error matrix charts have been developed for this purpose. The paper by Hari Koesmarno [1] presents the strengths and weaknesses of using these charts. Challenges with using these charts are discussed including how base rates and using prevalence data for building models and incidence data for evaluating models affect model performance. The paper also discusses the new reporting methods to the expert that result from these measures.

The second paper, by Piet Kommers [2] discusses a new aspect of machine learning where more human-like representations are used for learning and decision making. It shows how schematic diagrams offer a unique mitigation between the human- / machine partnership. It is a further step to more human-like cognitive reasoning methods and architectures. The developed ideas in the paper follow once more the concepts experimental discovered from human and described by the cognitive science researchers when studying the cognitive reasoning process of humans. As those follow the work of the computer science community that has been started in the 80's with the development of methods and architectures based on case-based reasoning as a more human-like reasoning strategy discovered by the cognitive scientists. The paper faces on an underestimated challenge to exploit metaphoric representations like for example the early transition from map into circuit scheme of the London Underground Map. We are curious to see how the ideas will lead to more advanced decision-making systems.

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## References

1. Koesmarno H.K., Measuring Classifier Performance with Risk and Error Matrix Charts, Transaction of Machine Learning and Data Mining, Volume 12 - Number 1, July 2019, p.3 – 22, (ISSN: 1865-6781) (ONLINE-ISSN 2509-9337), (ISBN: 978-3-942952-67-5).
2. Kommers P., Metacognitive Architectures for Human Roles in Machine Learning for Analyzing Multimedia Data, Transaction of Machine Learning and Data Mining, Volume 12 - Number 1, July 2019, p.23 – 29, (ISSN: 1865-6781) (ONLINE-ISSN 2509-9337), (ISBN: 978-3-942952-67-5).