



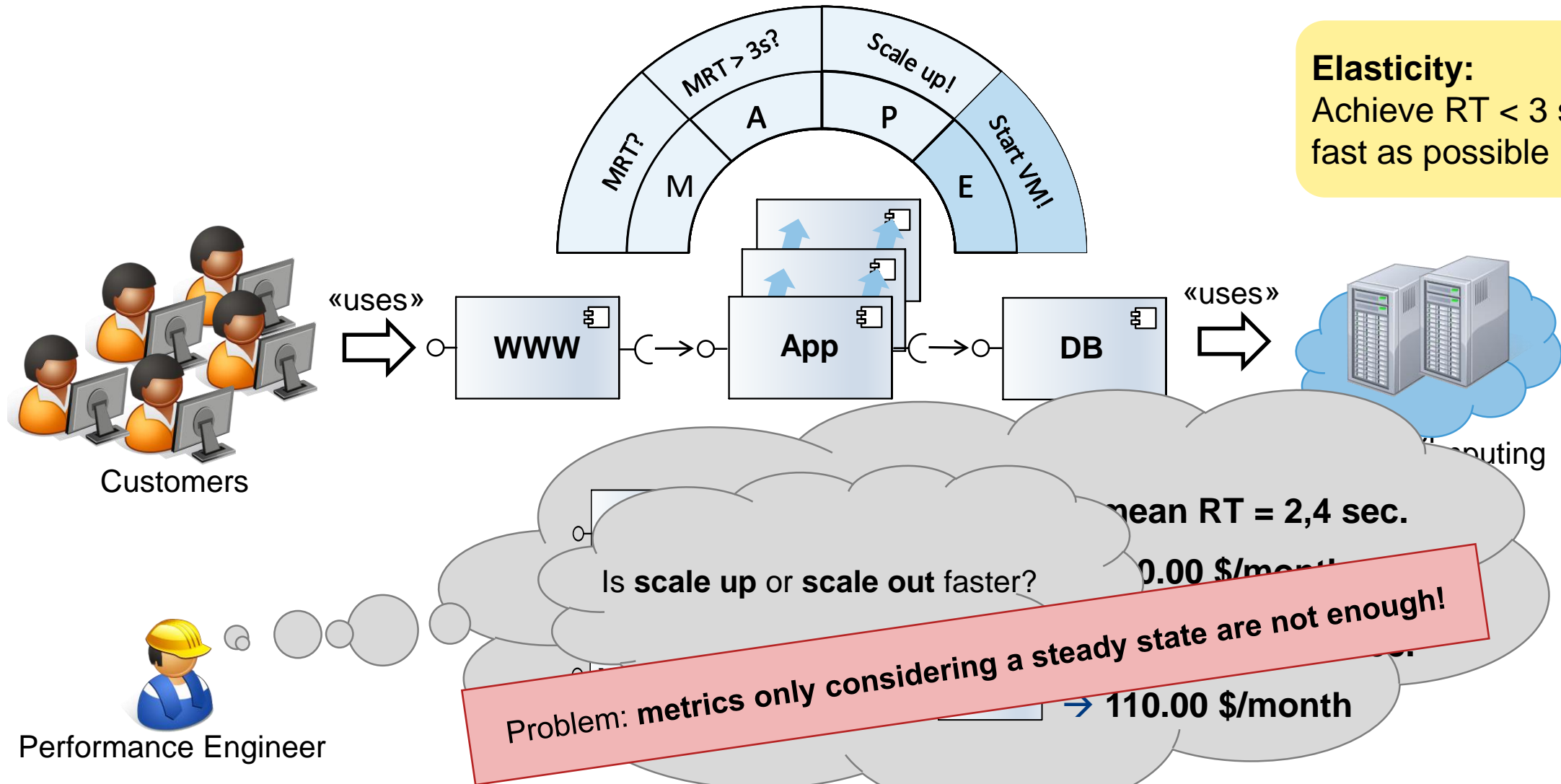
Systematically Deriving Quality Metrics for Cloud Computing Systems

Matthias Becker

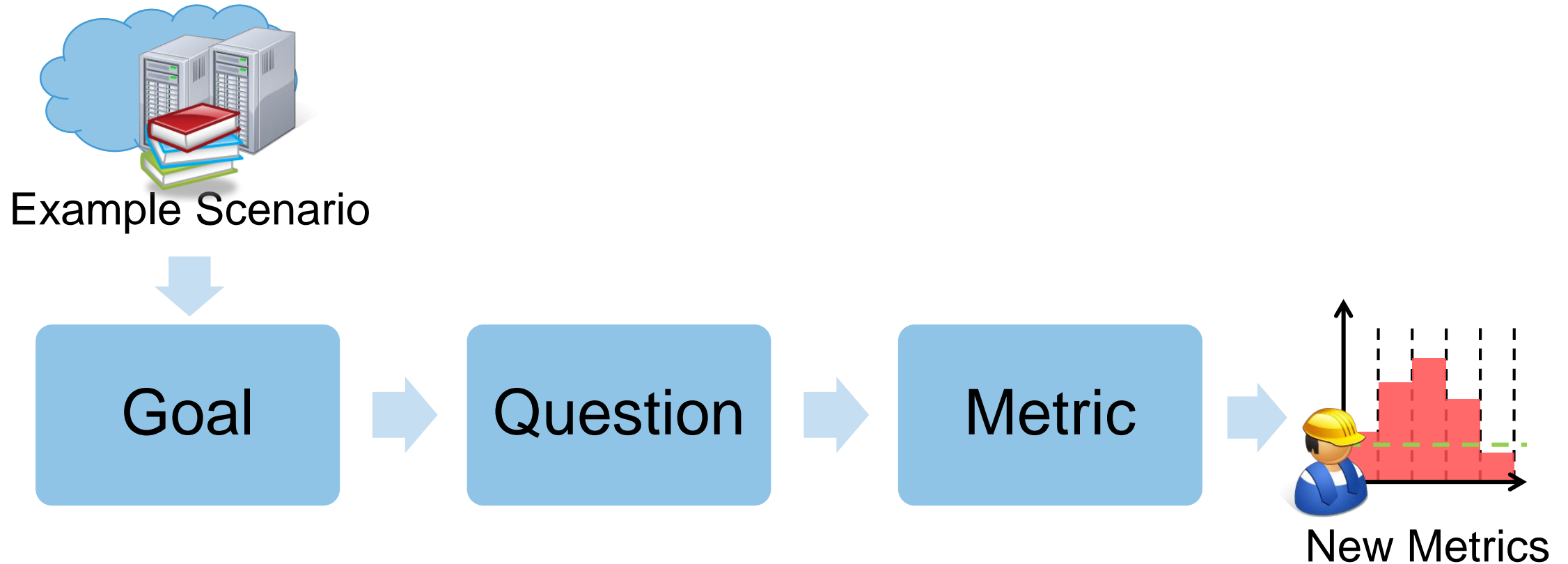
Sebastian Lehrig

Steffen Becker

Engineering Cloud Systems: Analysis

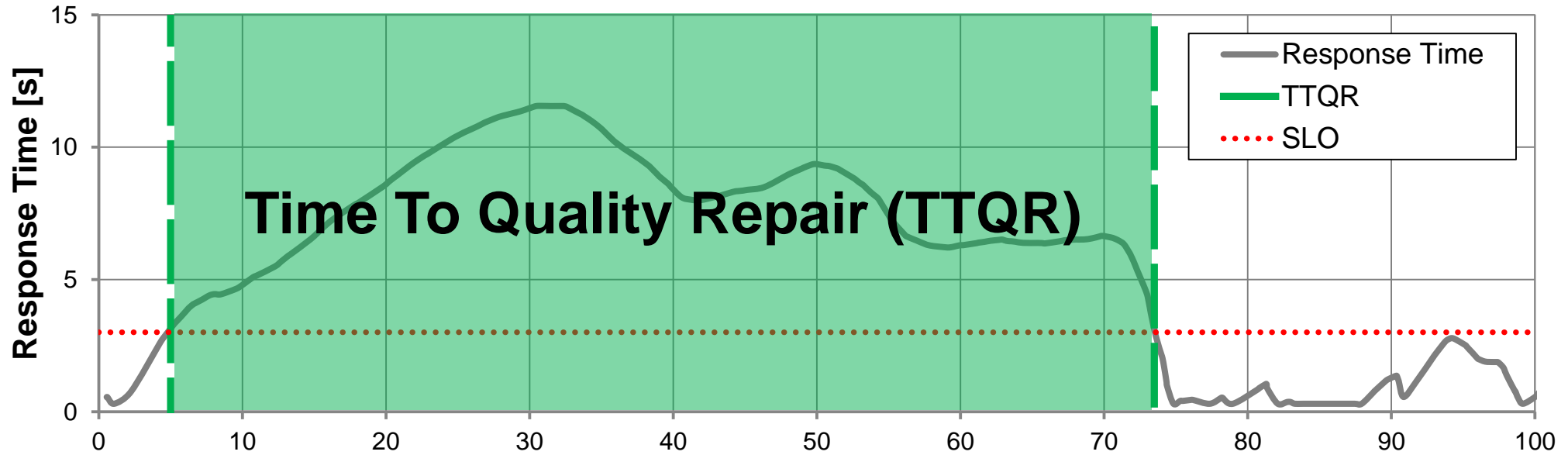


Idea: Systematically Deriving New Metrics

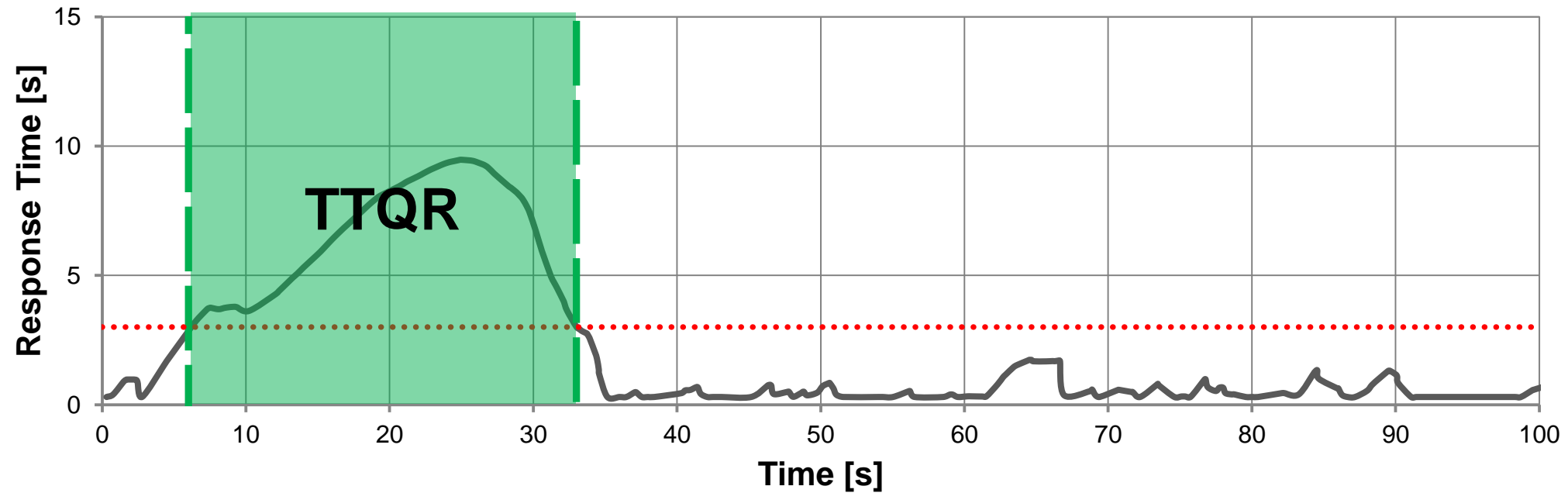


Comparison of Alternative Adaptation Layers

Strategy A

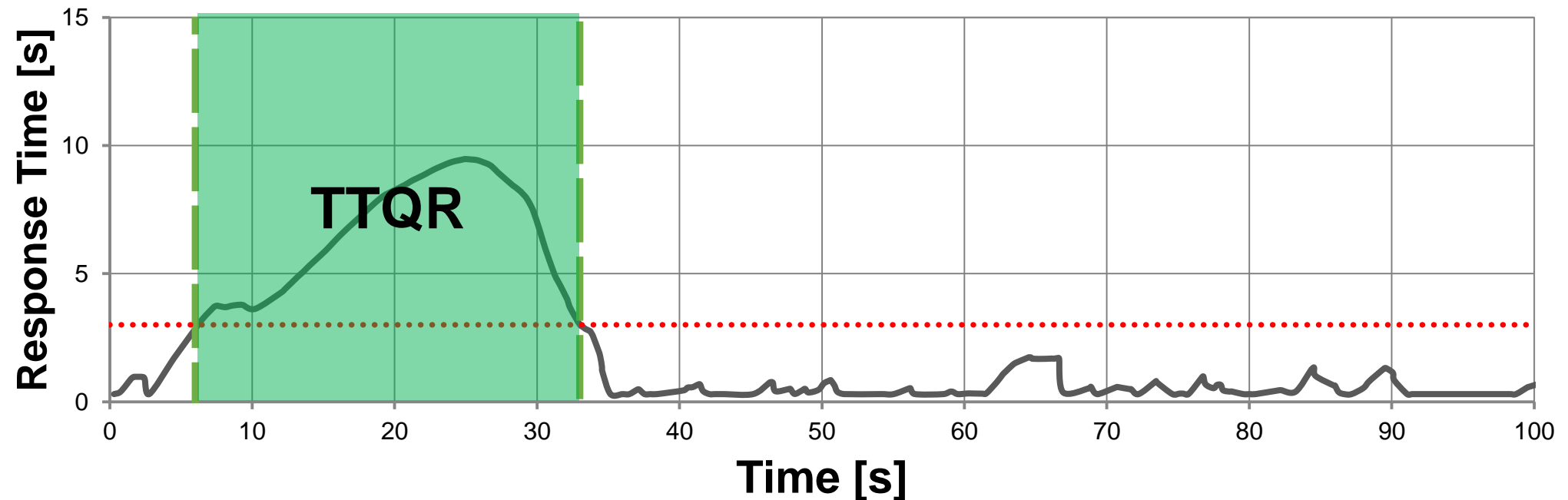


Strategy B



Derived General Metric

TTQR: Time To Quality Repair. The time between the occurrence of a (quality) SLO violation and the time the SLO is fulfilled again.



Short Paper Summary

- Initial set of 6 metrics
- Re-usable GQM plan
- Classification of related metrics

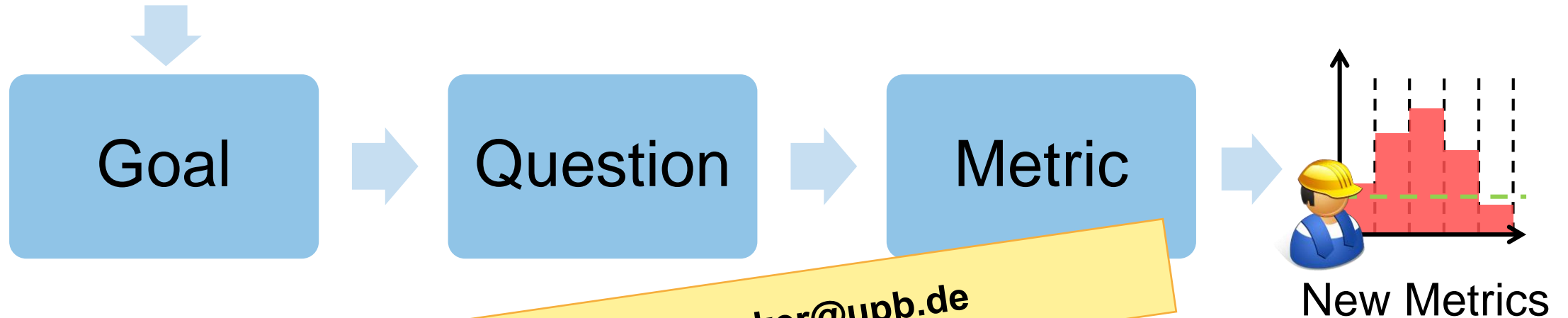
Future Work

- Derive more metrics
- Implement analysis tools
- Case study

Thank you



Example Scenario



Contact: matthias.becker@upb.de