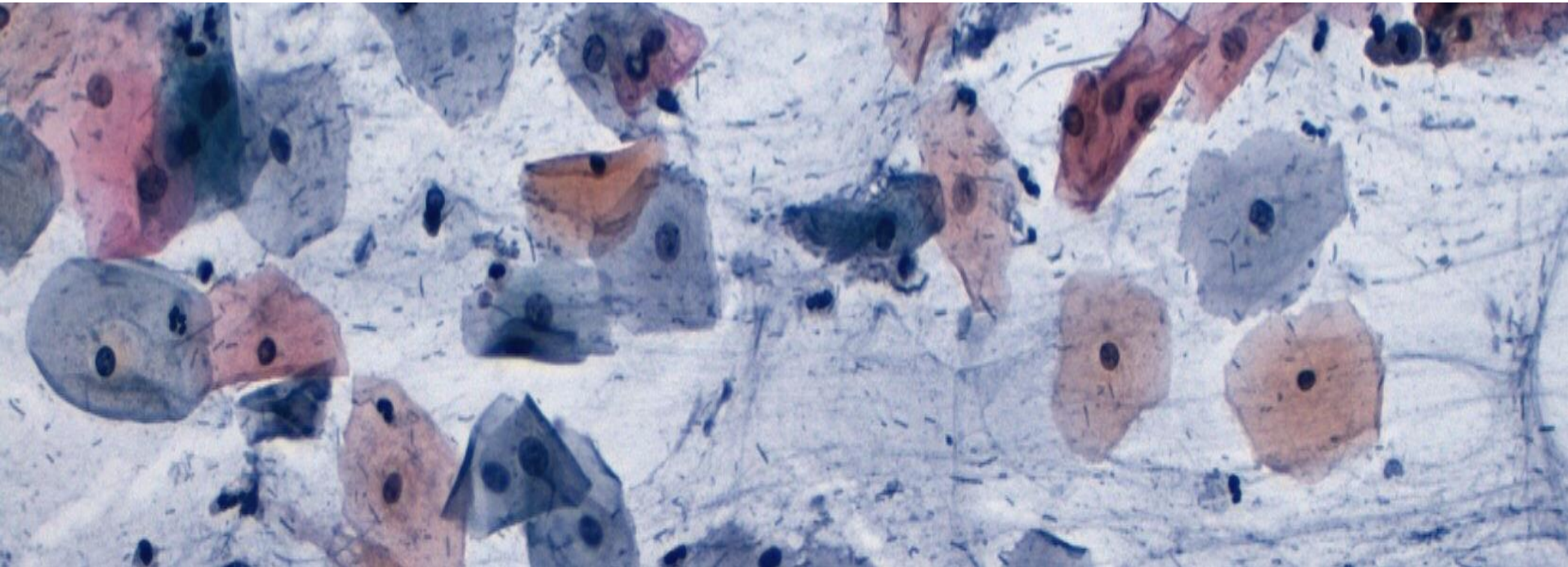


NextGen Pathology Lab Control Software

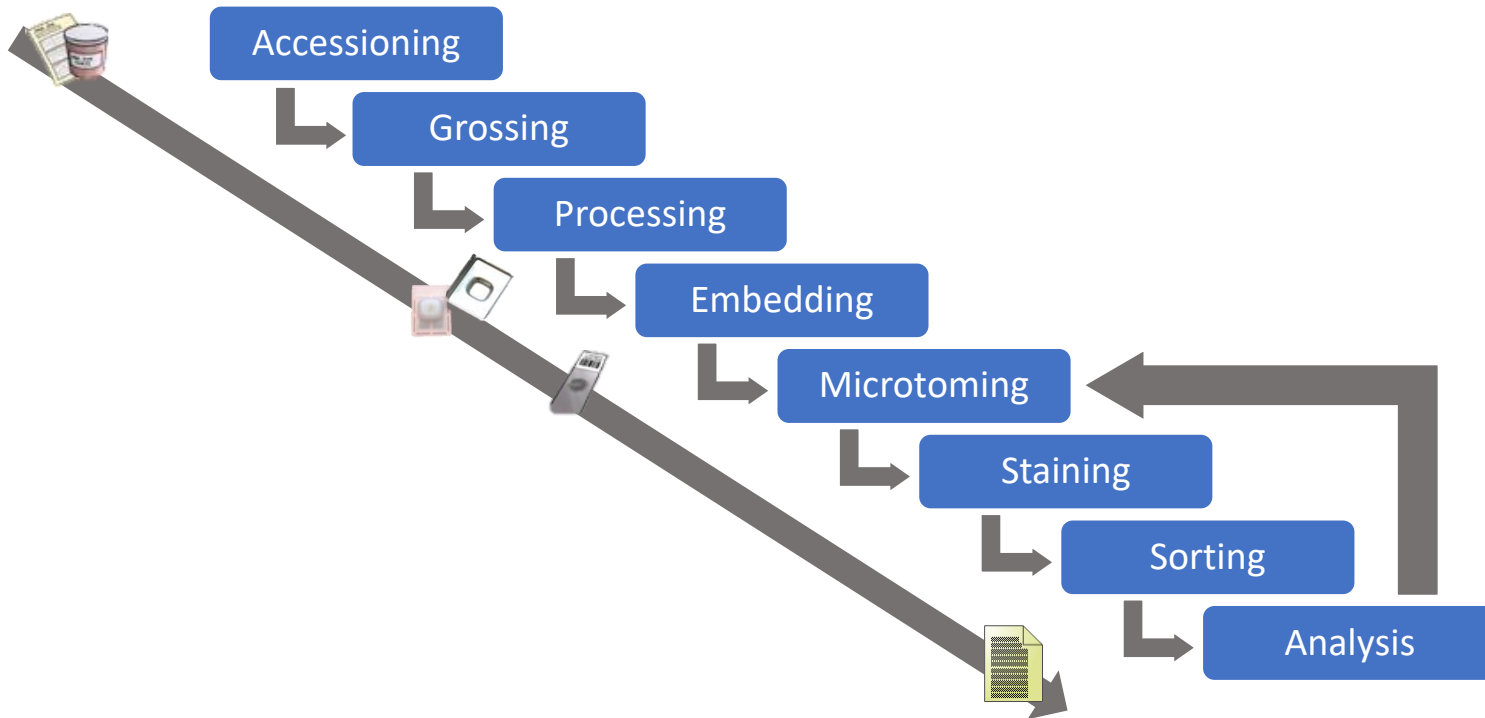
Charlotte Pröller, Florian Krone, Jonas Kett, Sebastian Sieb, Tobias Haßberg



Problem und Ansatz



Pathologielabor



Zielgruppe

Laborleiter



Pathologen



Labor Techniker



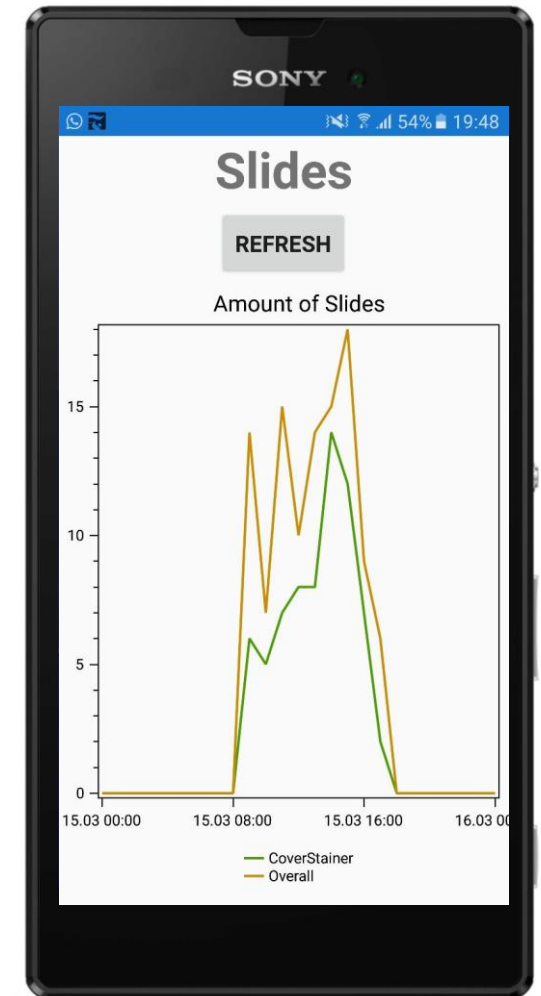
Ziele der Anwendung

- Schnelle, direkte Kommunikation
- Darstellung von Maßzahlen

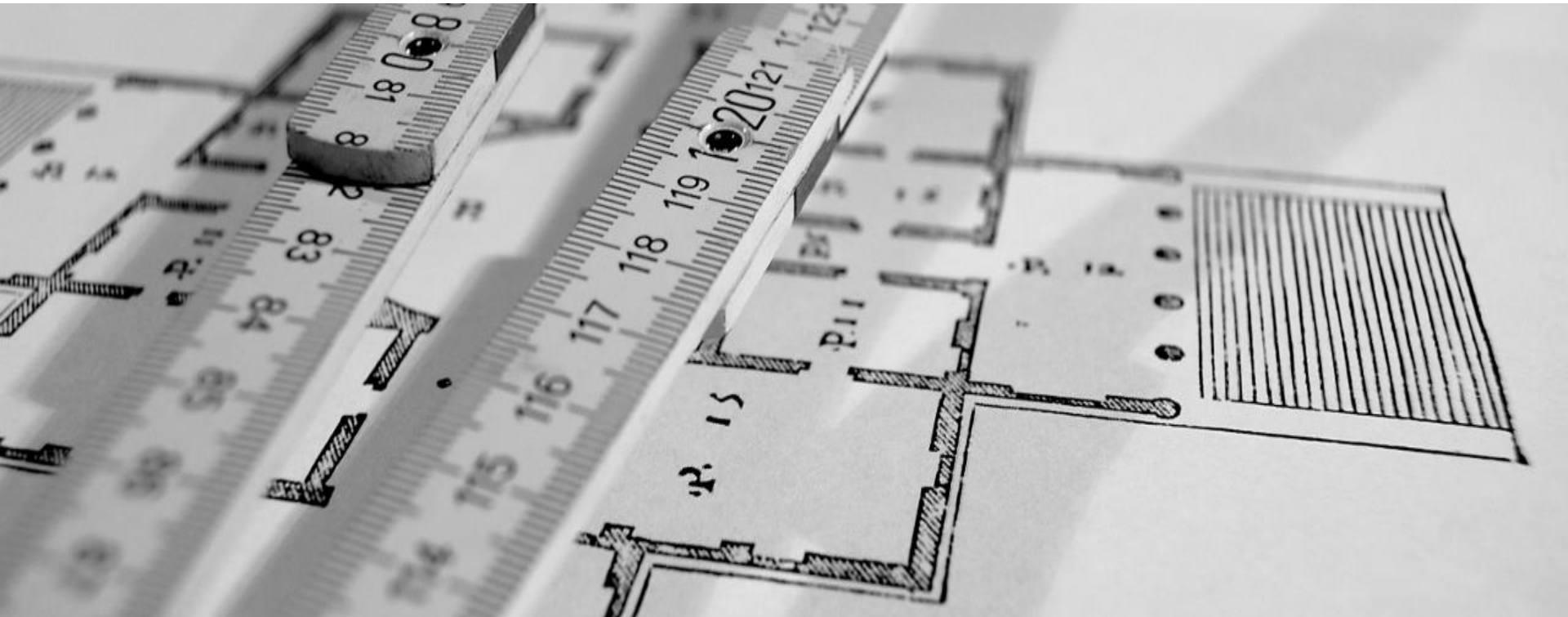
➔ **Steigerung der Effizienz**

- Nachverfolgung von Objekten

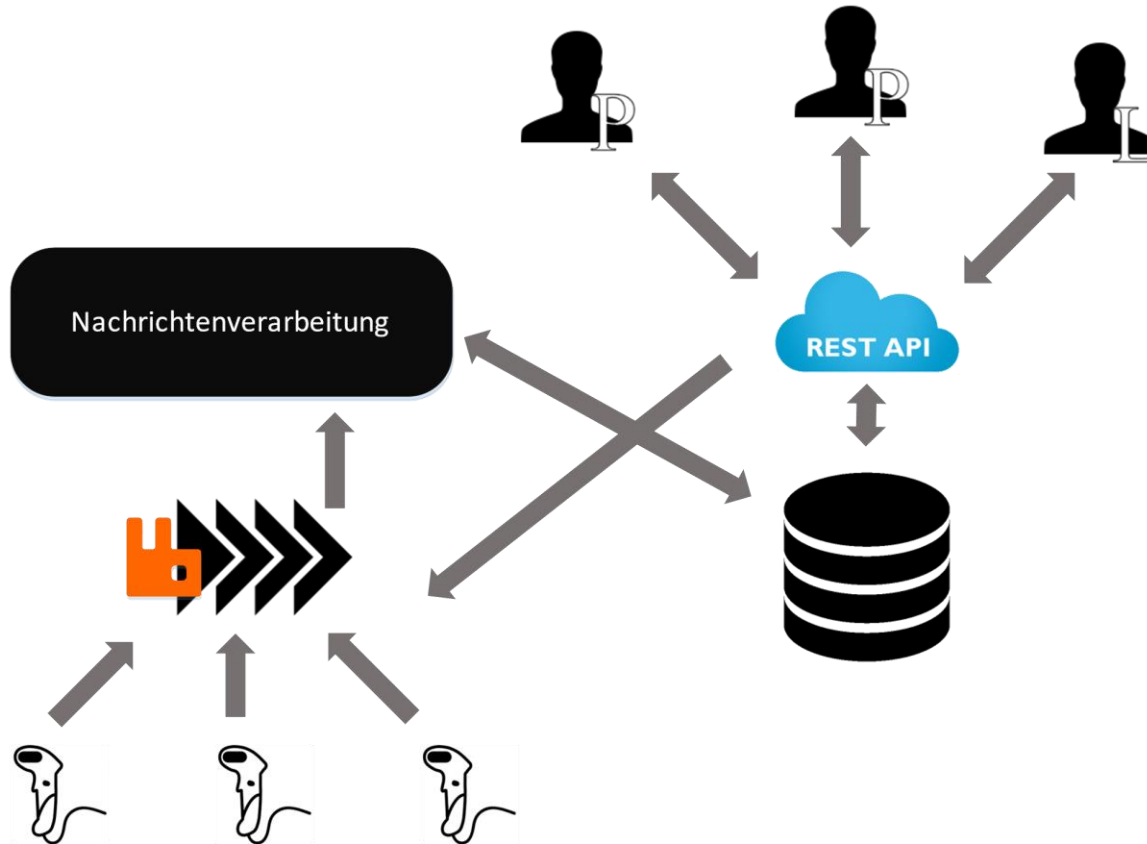
➔ **Steigerung der Zuverlässigkeit**



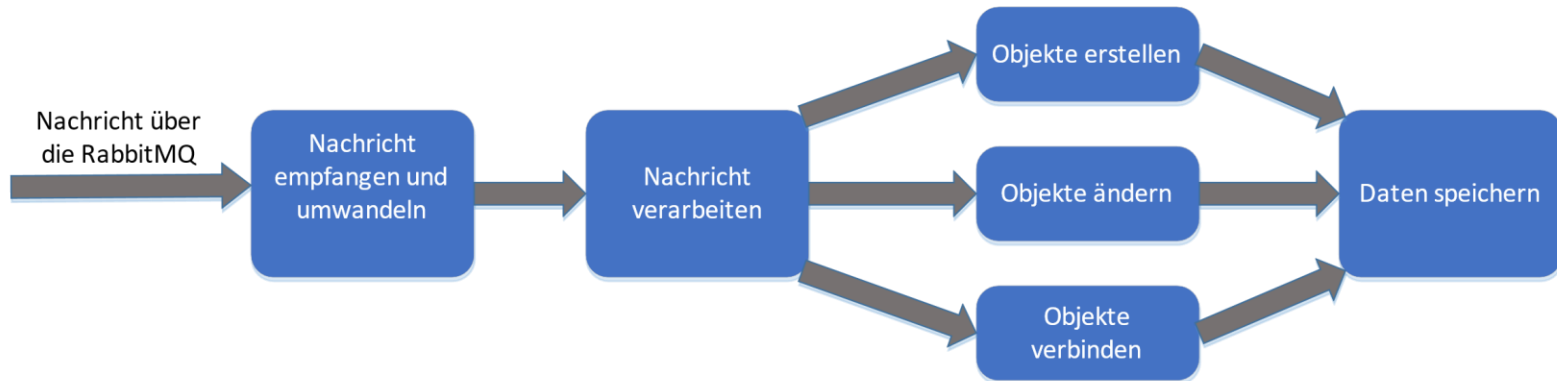
Technische Umsetzung



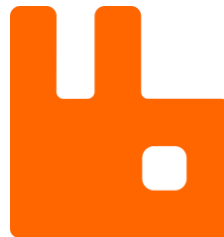
Systemarchitektur



Nachrichtenverarbeitung



Frameworks



Demonstration



Evaluation



Codemetrik

- 25 Projekte
- 211 Klassen
- 29047 LOC
- 73,11% Testabdeckung
 - 239 Unittests
 - 25 Automatische Integrationstests
 - 24 Manuelle Testfälle

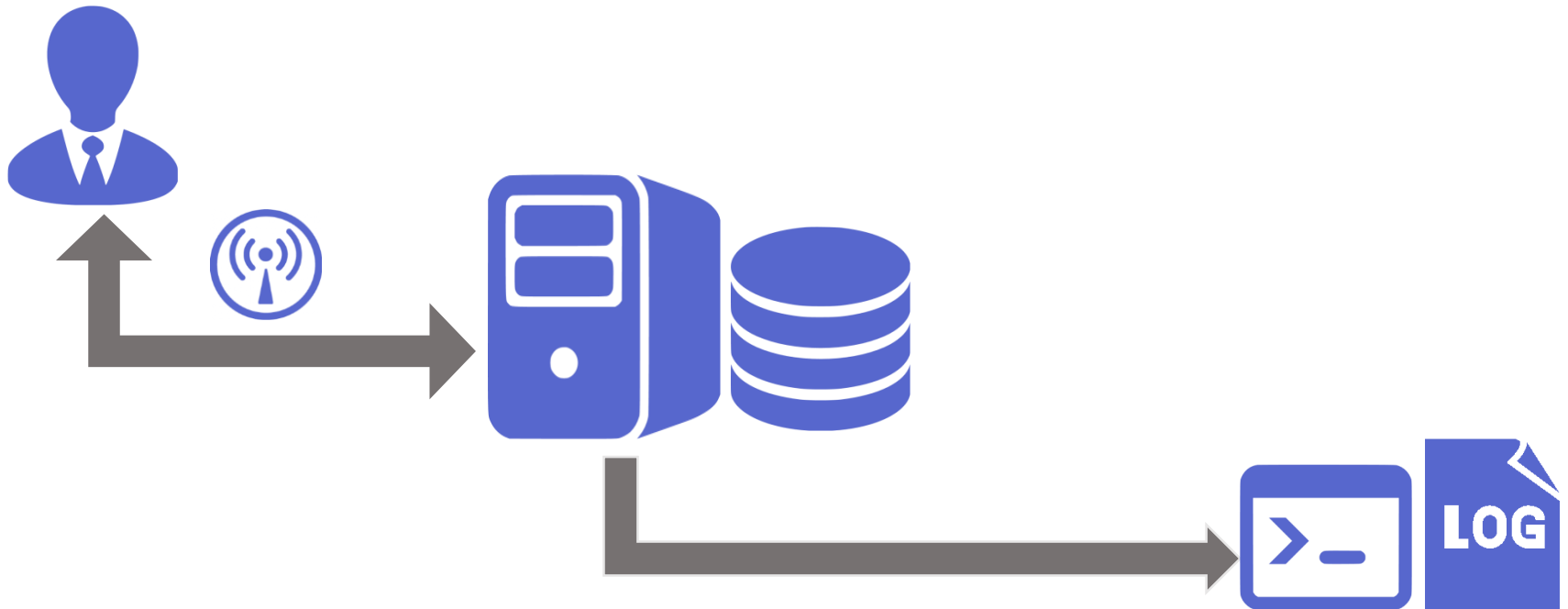
IntegrationTesting (25)	
✓ AccomplishedRequestsTest	671 ms
✓ BlockShortTermArchive	15 sec
✓ CreateBlock	15 sec
✓ CreateRequest	15 sec
✓ CreateSlide	15 sec
✓ DeviceFillLevelTest	542 ms
✓ InLabRequestsTest	592 ms
✓ NewRequestNewPatient	15 sec
✓ NewRequestOldPatient	16 sec
✓ NewRequestsTest	549 ms
✓ OpenPatientDataTest	632 ms
✓ OrderSlidesTest	15 sec
✓ ScanGrossing	15 sec
✓ ScanMicrotoming	15 sec
✓ ScanSorting	15 sec
✓ ScanStainingAndStained	30 sec
✓ SendFileTest	15 sec
✓ SlideLongTermArchive	15 sec
✓ SlideProtocolTest	613 ms
✓ SlidesCurrentInAutoTest	560 ms
✓ SlidesCurrentInCoverTest	624 ms
✓ SlidesCurrentInOmnisTest	534 ms
✓ SlidesCurrentInPTLinkTest	533 ms
✓ SlidesStainedFromToTest	546 ms
✓ TestSetDiagnosis	15 sec

Codequalität

- 6 Augenprinzip
- Workflow mit Merge requests



Systemstabilität

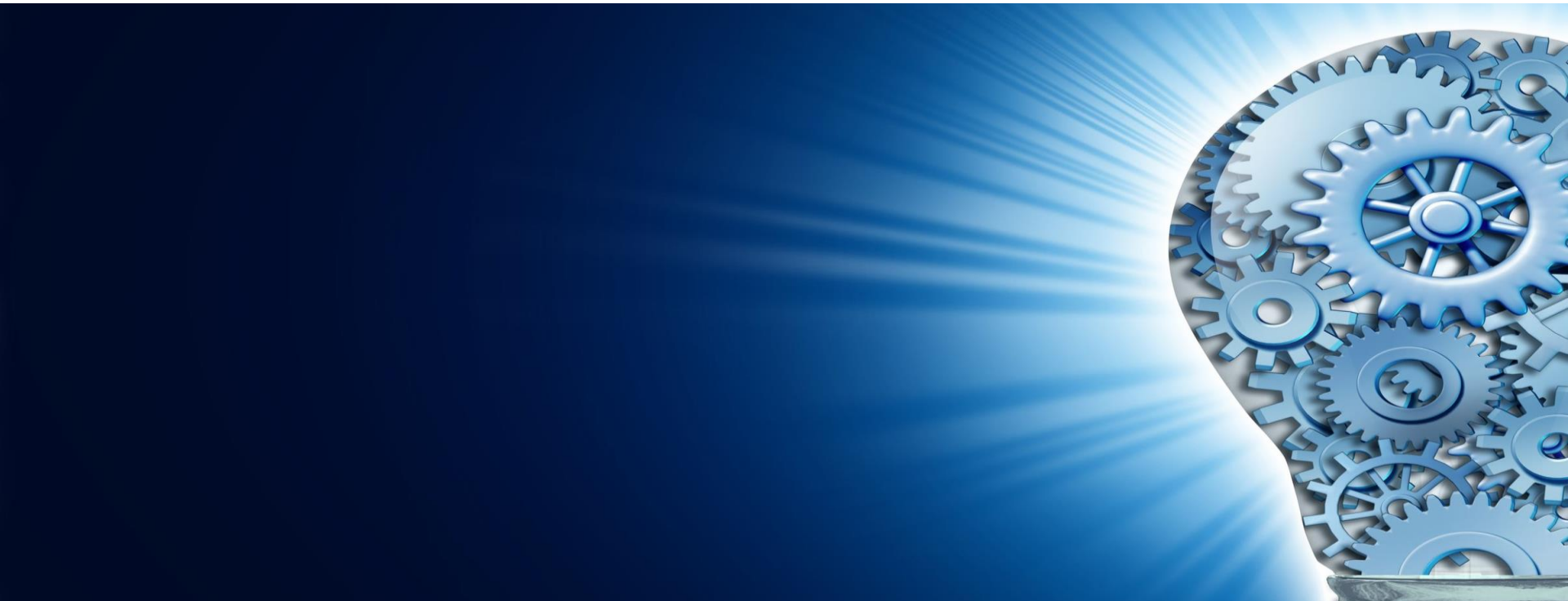


Wiederverwendbarkeit und Erweiterbarkeit

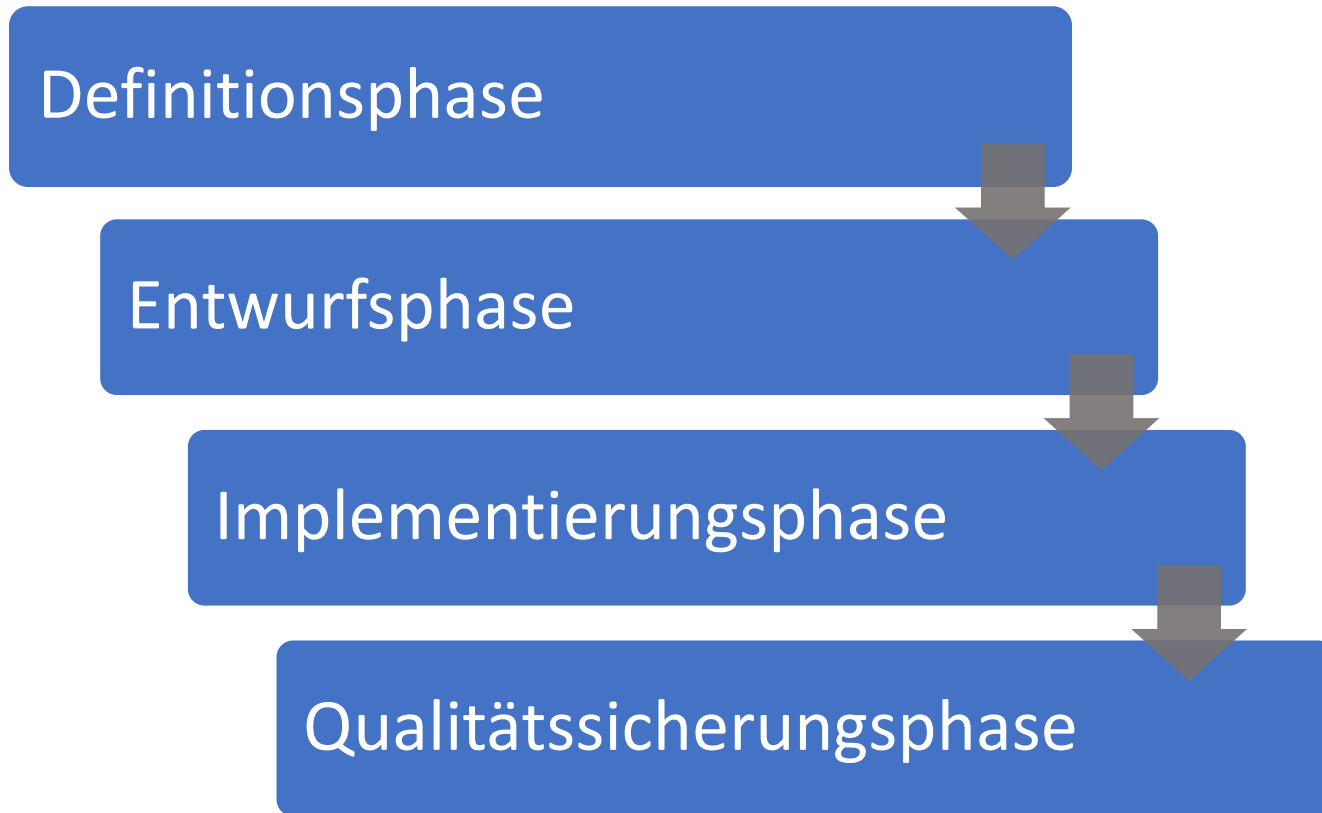
- Modularer Aufbau
- Einfaches Anbinden neuer UI's
- Austauschbare Datenbank
- Device Mockups austauschbar gegen echte Geräte



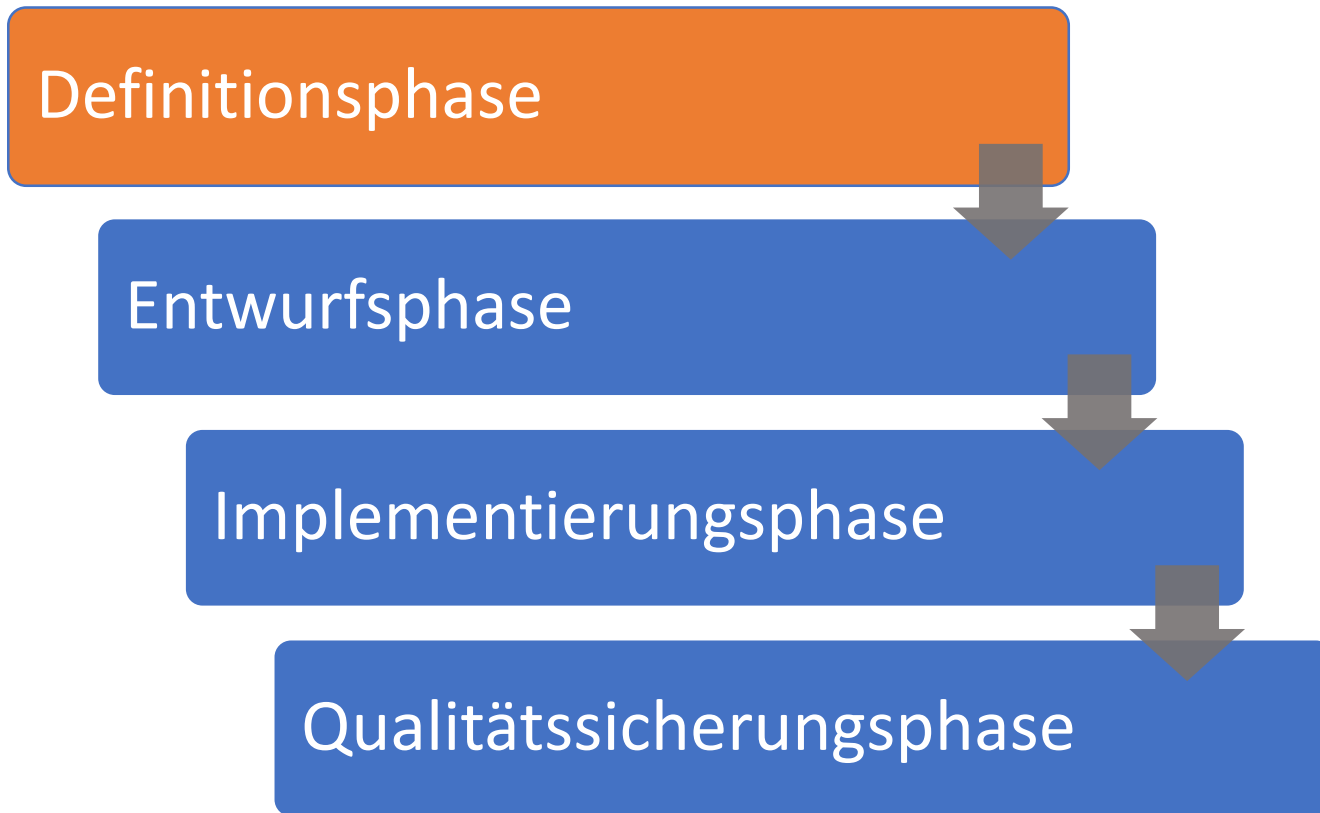
Retrospektive



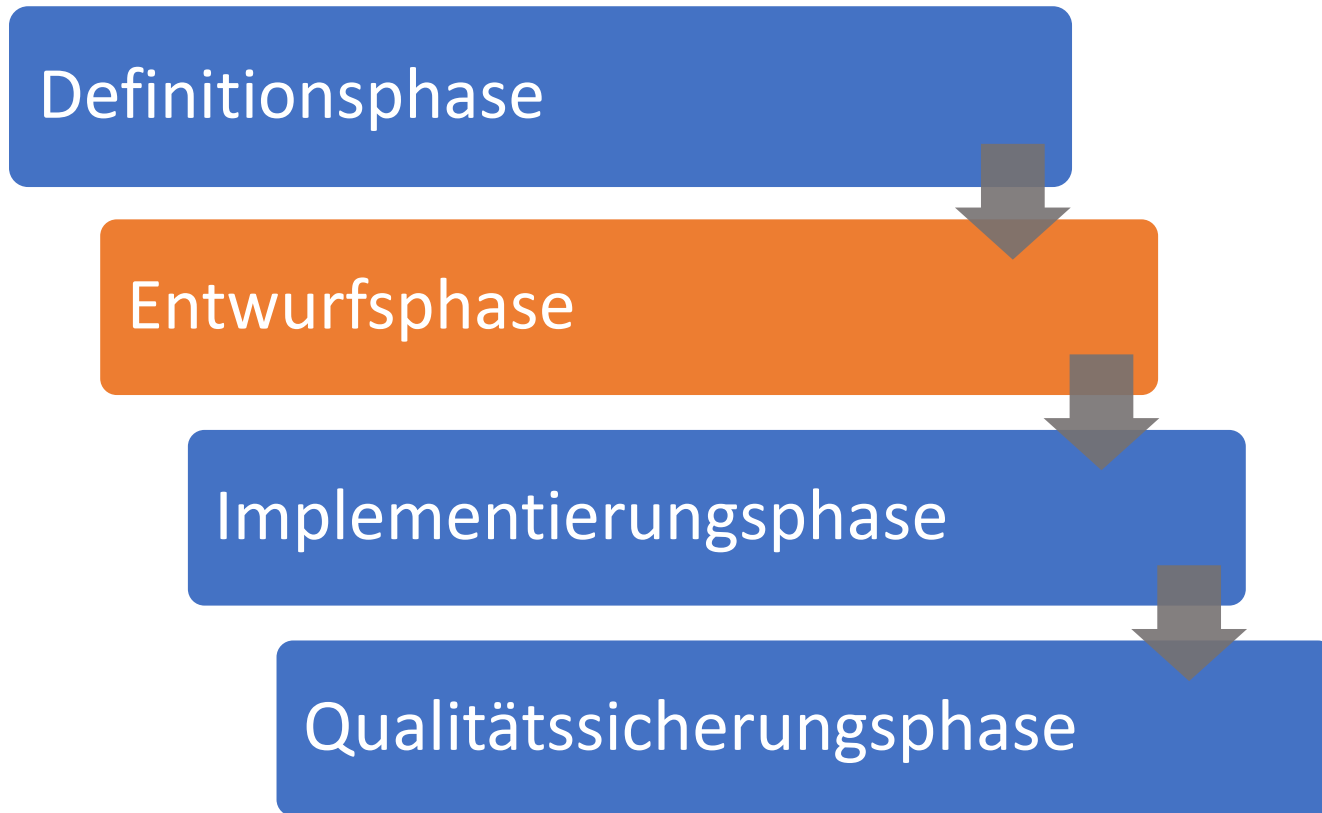
Was haben wir gelernt?



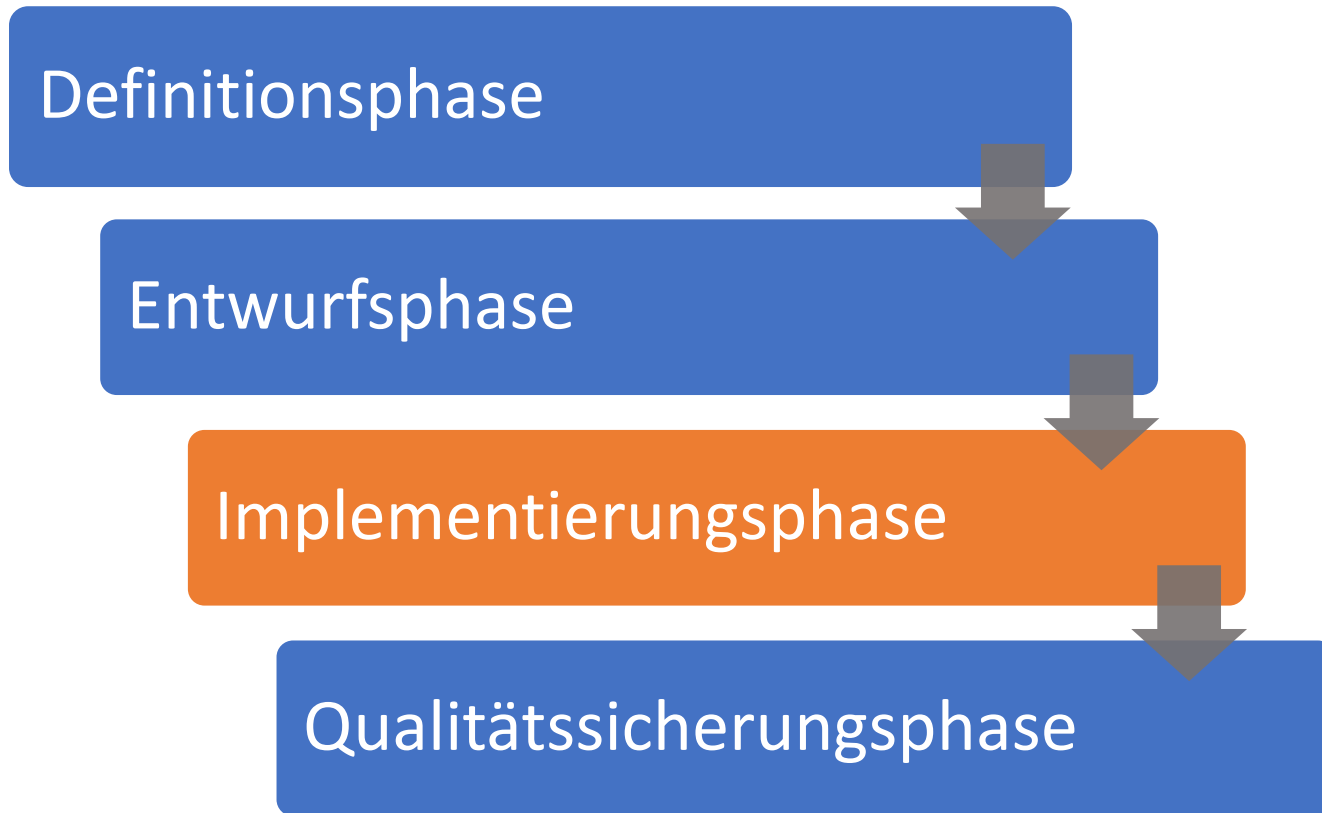
Was haben wir gelernt?



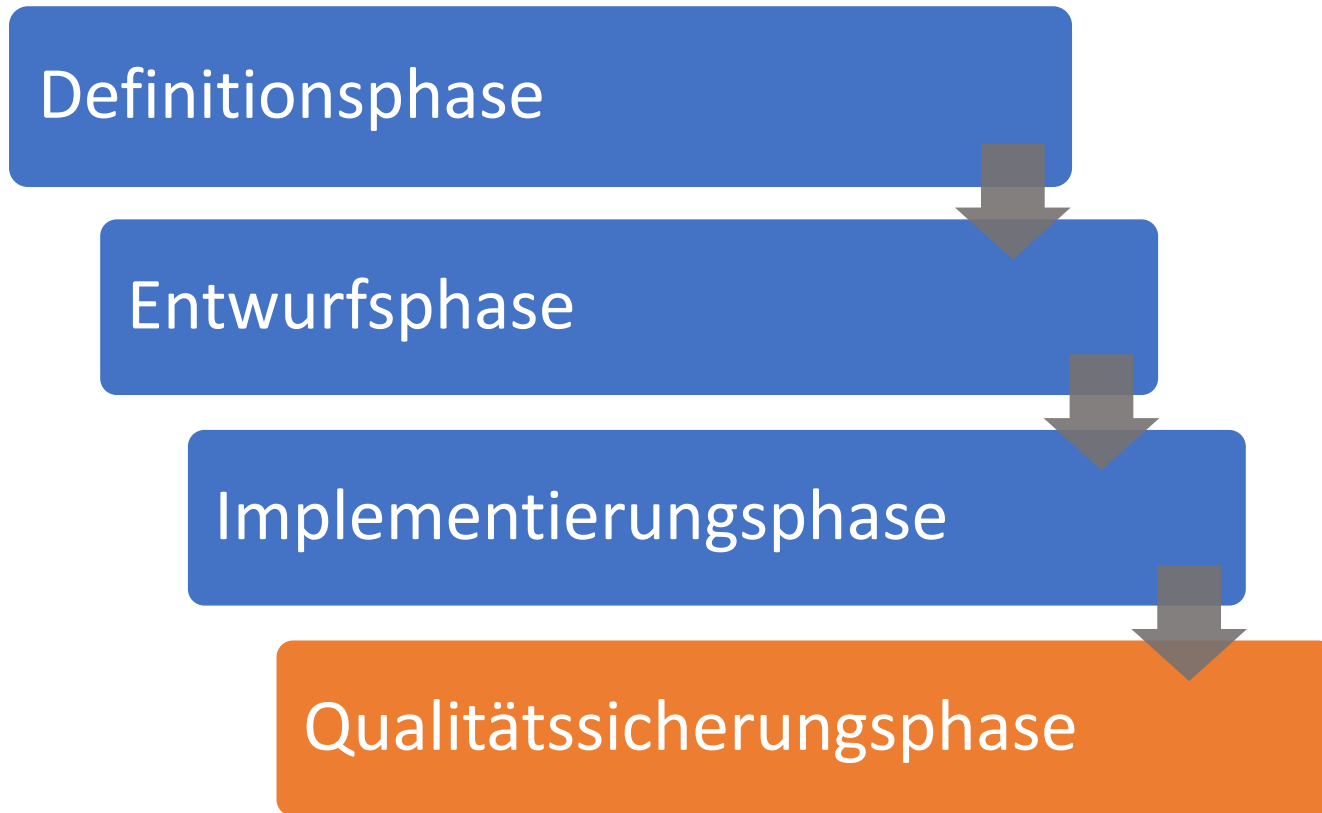
Was haben wir gelernt?



Was haben wir gelernt?



Was haben wir gelernt?



Bildquellen:

- <http://tyrolpath.at/wp-content/uploads/2016/07/image.jpeg>
- <http://www.advantos.net/images/SOFTWARE.jpg>
- http://img.directindustry.de/images_di/photo-g/34309-2835841.jpg
- <http://www.thedegreeexperts.com/userfiles/Master-of-Financial-Analysis.GIF>
- <http://teamagility.net/wp-content/uploads/2015/05/teamwork3.jpeg>
- <http://www.iconsdb.com/icons/preview/caribbean-blue/businessman-xxl.png>
- <http://www.iconsdb.com/icons/preview/caribbean-blue/server-xxl.png>
- http://www.iconshock.com/img_vista/WINDOWS8/communications/jpg/log_icon.jpg
- http://www.iconshock.com/img_vista/WINDOWS8/communications/jpg/log_icon.jpg
- <http://www.iconsdb.com/icons/preview/caribbean-blue/database-5-xxl.png>
- <http://www.iconsdb.com/icons/preview/icon-sets/web-2-blue/console-xxl.png>
- <http://www.schul-netz.com/funktionen/images/modular.jpg>
- <https://avatars1.githubusercontent.com/u/1057779?v=3&s=400>
- <https://www.xamarin.com/content/images/pages/branding/assets/xamagon.png>
- <https://www-asp.azureedge.net/v-2016-11-01-012/images/ui/asplogo-square.png>
- http://www.dataworks.ie/images/uploaded_images/entity_image.png

