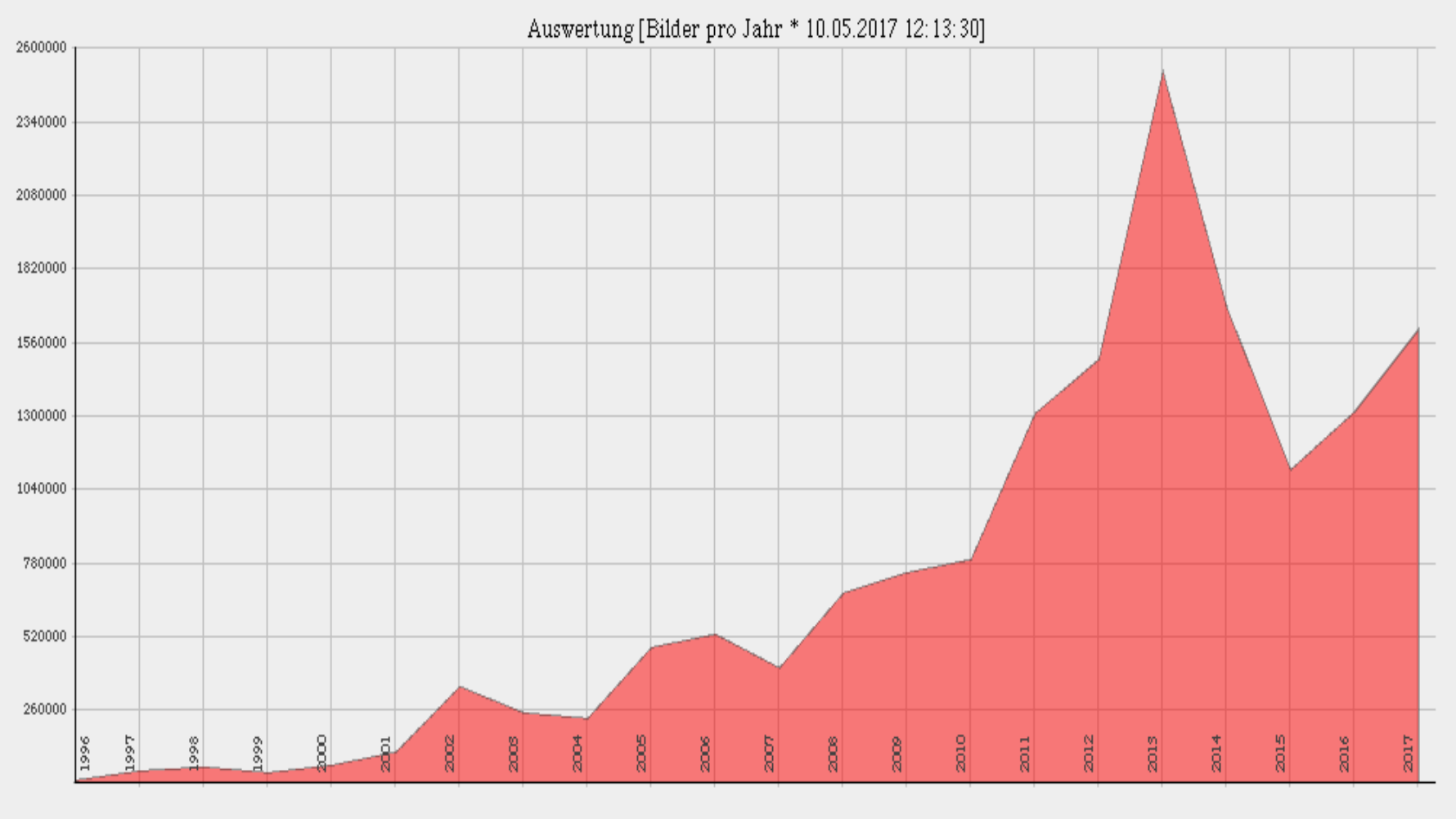
if autotagging becomes real

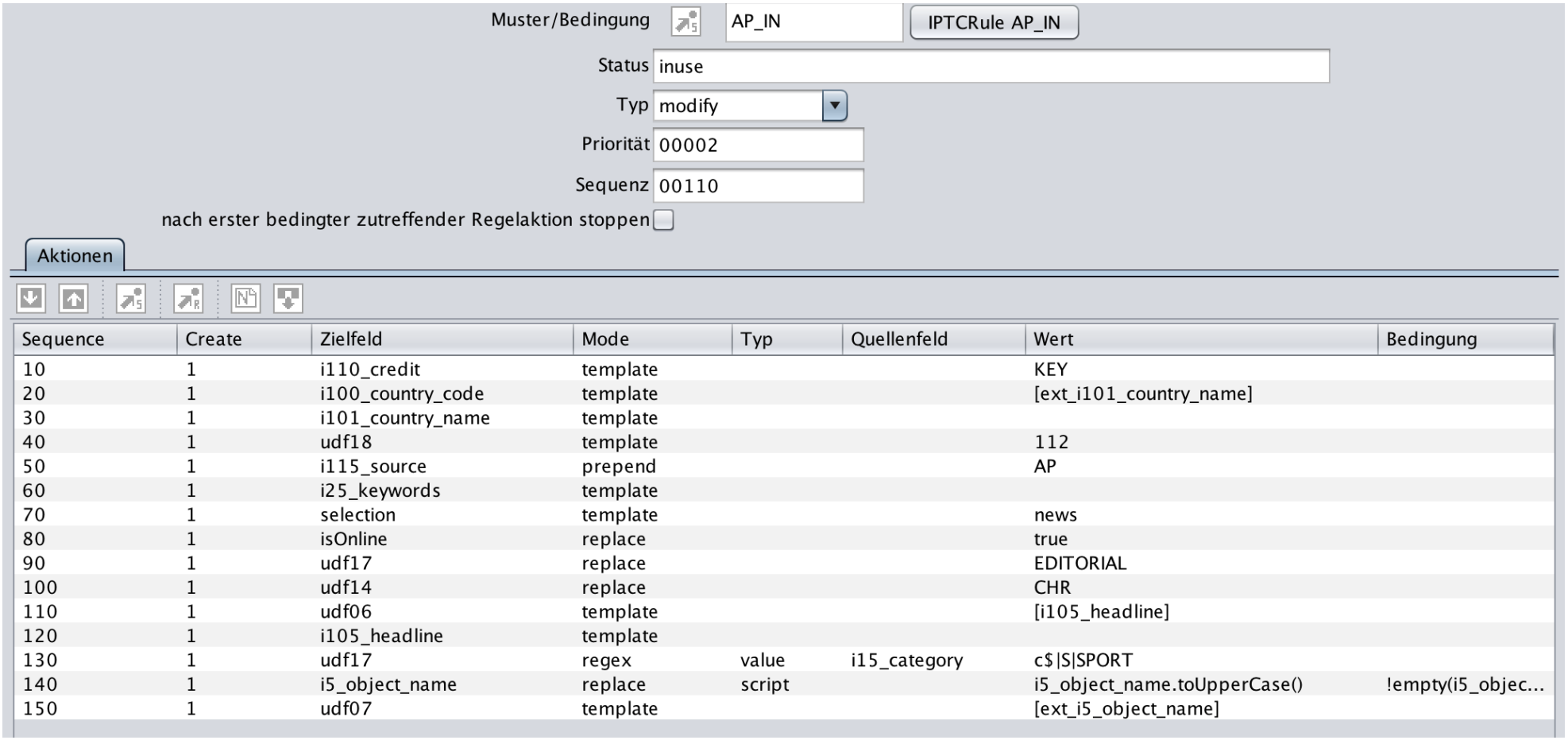
KEYSTONE
Switzerland
K. Csoknyay

Challenge



KEYSTONE

Today



Muster/Bedingung AP_IN IPTCRule AP_IN

Status inuse

Typ modify

Priorität 00002

Sequenz 00110

nach erster bedingter zutreffender Regelaktion stoppen

Aktionen

Sequence	Create	Zielfeld	Mode	Typ	Quellenfeld	Wert	Bedingung
10	1	i110_credit	template			KEY	
20	1	i100_country_code	template			[ext_i101_country_name]	
30	1	i101_country_name	template				
40	1	udf18	template			112	
50	1	i115_source	prepend			AP	
60	1	i25_keywords	template				
70	1	selection	template			news	
80	1	isOnline	replace			true	
90	1	udf17	replace			EDITORIAL	
100	1	udf14	replace			CHR	
110	1	udf06	template			[i105_headline]	
120	1	i105_headline	template				
130	1	udf17	regex	value	i15_category	c$|S|SPORT	
140	1	i5_object_name	replace	script		i5_object_name.toUpperCase()	!empty(i5_objec...
150	1	udf07	template			[ext_i5_object_name]	

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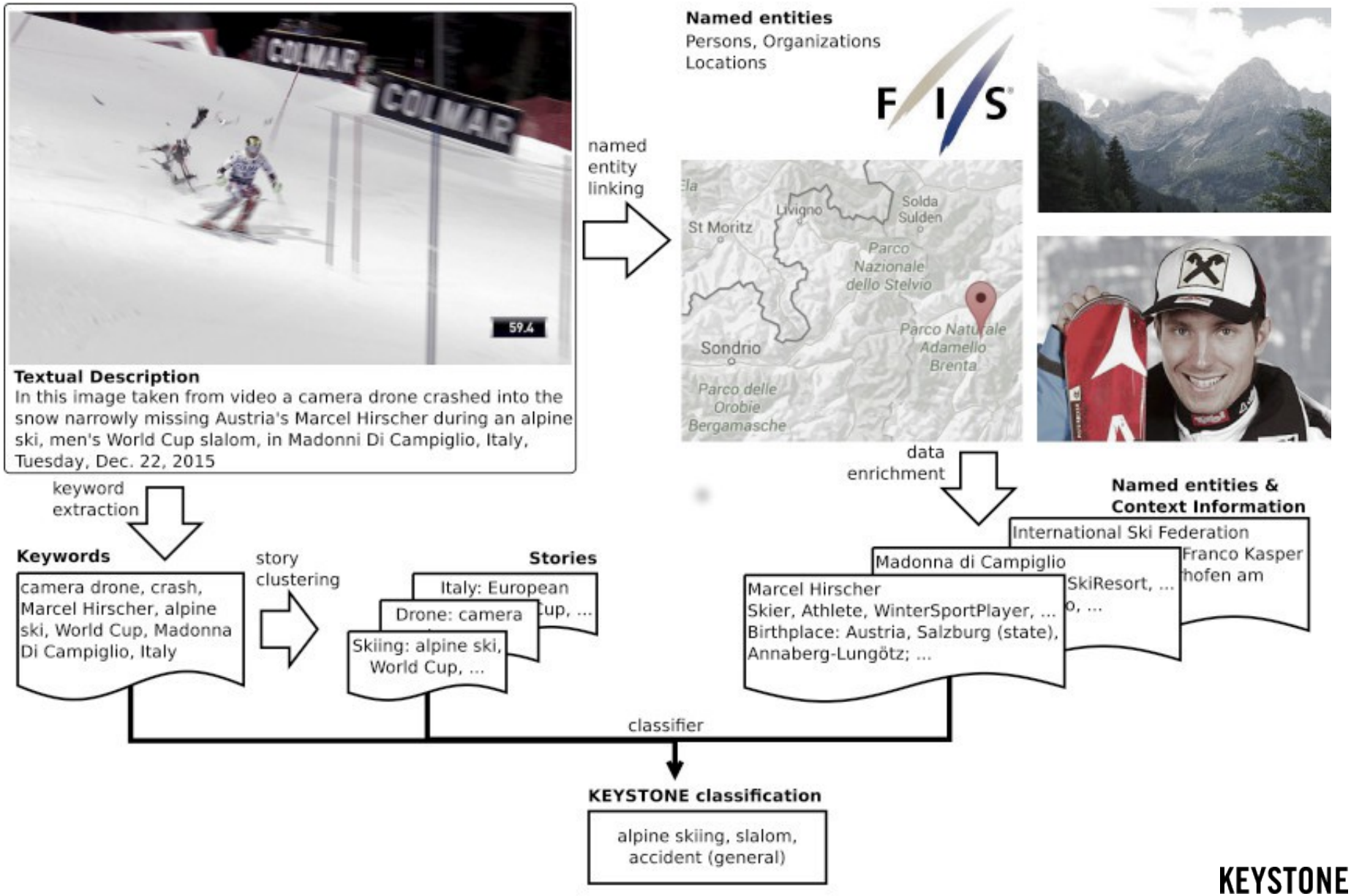
IMAGINE - Project

- CTI Research Project
  - Participants are KEYSTONE and HTW Chur
- Goals
  - automated instead of manual tagging
  - more extensive and consistent metadata
  - training for manual tagging
- Setup
  - HTW provides the technical solution
  - KEYSTONE provides the test corpus

IMAGINE - Overview



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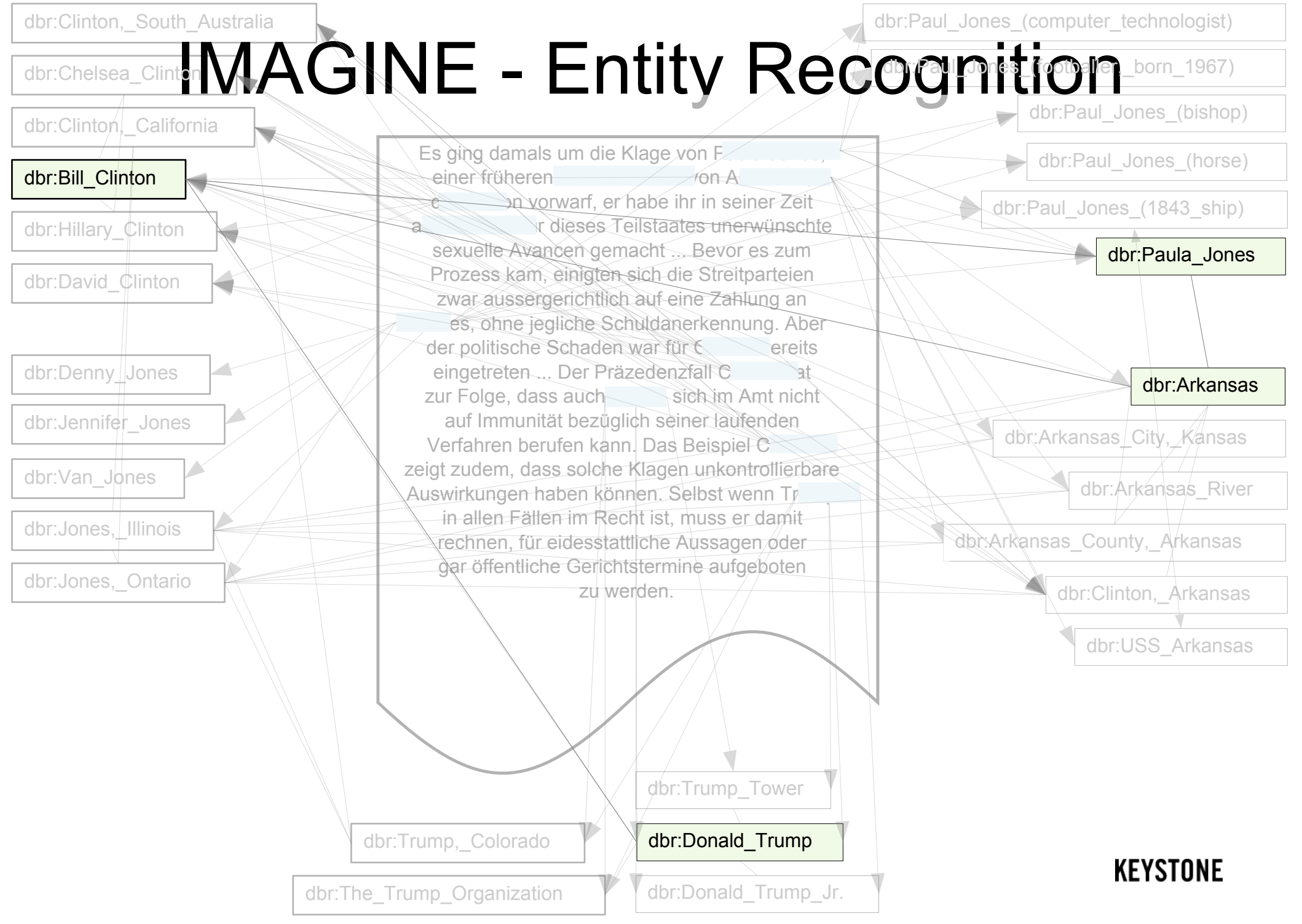
IMAGINE - Entity Recognition



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IMAGINE - Story Clustering

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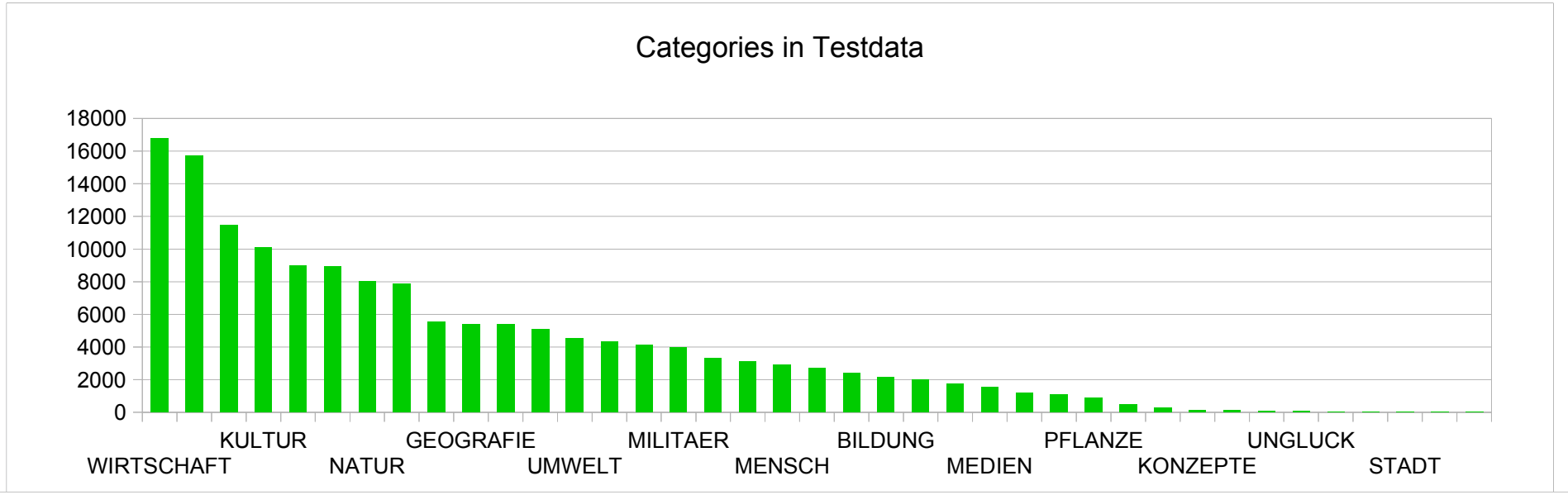
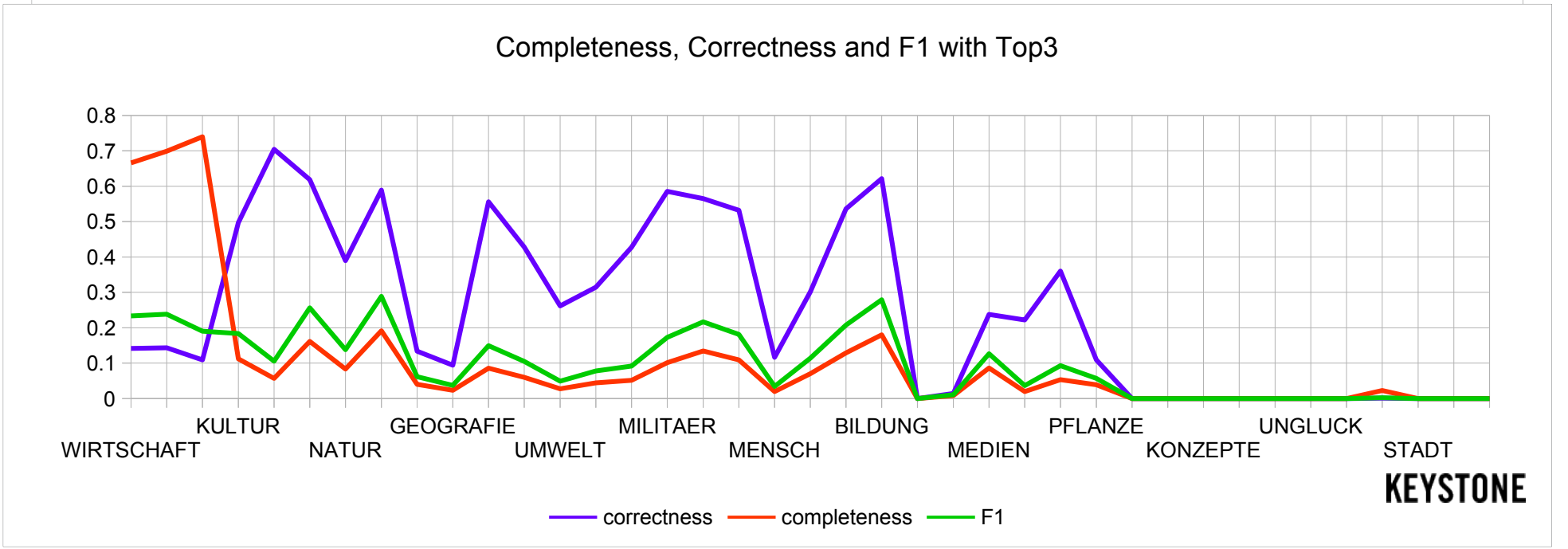
IMAGINE - CV Mapping





IMAGINE - Result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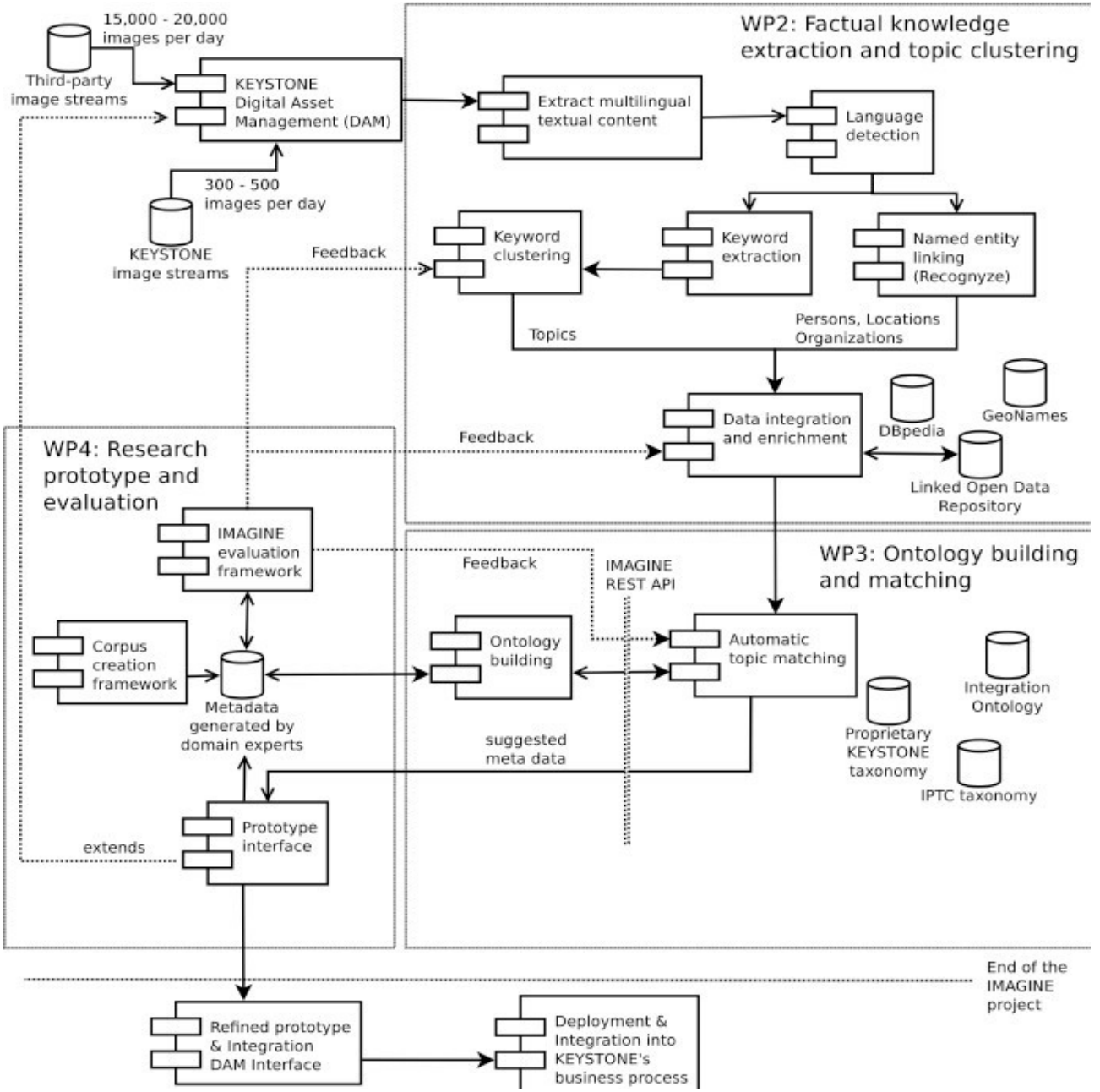
IMAGINE - Architecture



KEYSTONE

IMAGINE - Conclusion

- Our Conclusion
  - entity recognition is very promising
  - story clustering is intresting
  - keyword mapping is promising
- To Consider
  - without IMAGINE only a part of the daily production may be tagged completely
  - with IMAGINE all daily incoming images may be tagged automatically. For an example: if only 50% may be processed automatically by a lower fail rate it would be better than by manually tagging...

IMAGINE - Outlook

- HTW will finish their work in the following weeks
- KEYSTONE will implement the interfaces by the end of this year
- First tests with our DAM will start next year
- Improve precision and recall remain work in progress
- Use the enriched metadata for our search engines
- Combine IMAGINE with CBIR to get better visual results

IMAGINE - References

- http://www.htwchur.ch/digital-science/forschung-und-dienstleistung/institut-sii/projektuebersicht/imagine.html
- https://www.weblyzard.com/research/
- http://www.keystone.ch/
- https://www.kti.admin.ch/kti/en/home.html?_organization=711