

Perceptum Project: Document recommendation for StarFish



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June 5, 2014

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Product vision

Perceptum

A company that thrives to be a learning community of responsible autonomous individuals, where each member determines what projects to work on within a team they care about.

StarFish

a website where people can add and read information about the learning domain



Product vision

Starfish beta

Browse

Feedback

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SmartVoting

Posted by [@NatasaBrouwer](#) on April 6, 2014, 1:18 p.m.

Contact: [@NatasaBrouwer](#)

Ask a question

Pedagogy ActiveLearning Assessment FormativeToetsen Peer-instruction StemmenInHetOnderwijs Think-pair-share
Technology Shakespeak Stemkastjes Stemsysteem Stemsystemen TurningPoint
Content Docentprofessionalisering
Topic ToetsenEnToetsgestuurdLeren TTL

About

Motivation for this project

Voting in teaching in a pedagogical sound way can improve the quality of learning by students. There is already a group lecturers at the Faculty of Science who apply voting in their teaching with very good results. This group is still to small and should be bigger.

Results

This project made it possible for the Faculty of Science lecturers to get started with voting in teaching in a pedagogical sound way. The goals of this project were to exchange the experiences of the lecturers who are using voting in teaching and to prepare the necessary information for the FNWI teaching staff about how to use the voting tools and where to find them.

4 of 13 During the project a practice oriented workshop for lecturers about the use of voting in teaching was organized twice. The teaching methods, the e-



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End project: October 2013

Funding: University of Amsterdam, Grassroots programme

Budget: 10.000 euro

Download project report: [Evaluatieverslag Grassroots 2012_NBrouwer_FNWI.pdf](#)



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See also



Interactief college voor grote groepen met stemsysteem en webcolleges (onderwijs herontwerp)



[Shakespeak - FNWI](#)



Natasa Brouwer



Can I use different types of clickers in the same voting session?



[STEEP: Supporting Technology Enhanced Education Projects](#)



[Cloud voting systems](#)



[Clickers - Stemkastjes](#)

Product vision

Problem: how to relate these documents?

- Centralized authority ?
- Manual linking by authors ?

Solution: The StarFish system automatically recommends documents that are relevant to the authors document



Product vision

Elevator pitch

For StartFish users **who** search for and edit knowledge in Starfish, **the** document linker **is a** core system addition to StarFish **that** finds related documents. **Unlike** linking by moderation (centralized) our product uses algorithms and data (decentralized) to automatically suggest document links.



Product Backlog

VALUE	POINT	WHO	WHAT	WHY	TYPE
1000	8	As a Perceptum employee	I want... to use an automated evaluation metric	in order to determine how well each algorithm performs at an early stage	Research/Implementation
800	8	As a Developer	I want... the system to use NN to calculate several distance metrics between document descriptors	in order to ensure the quality of the descriptor-based algorithms	Implementation
700	5	As a Perceptum employee	I want... to use the algorithm that uses document descriptors calculated with glossaries of tags	in order to see how it performs on the StarFish data set and compare it with other algorithms	Research/Implementation
600	2	As a Perceptum employee	I want... to use the algorithm that uses document descriptors based on the texts in documents	in order to see how it performs on the StarFish data set and compare it with other algorithms	Implementation
600	13	As a Perceptum employee	I want... to use the algorithm that uses document descriptors calculated using weighted tags in graphs	in order to see how it performs on the StarFish data set and compare it with other algorithms	Research/Implementation
600	8	As a Perceptum employee	I want... to use the algorithm that uses document descriptors calculated with weighted document descriptors based on text in documents	in order to see how it performs on the StarFish data set and compare it with other algorithms	Research/Implementation
500	2	As a Perceptum employee	I want... an evaluation metric based on expert examination	in order to find out in a detailed manner how well each of the algorithms performs	Research/Report/Implementation
400	?	As a Perceptum employee	I want... to know if there are other possible valuable algorithms	in order to find out in a detailed manner how well each of the algorithms performs	Research
300	100	As a Perceptum employee	I want... the implemented algorithms to be tuned towards the Starfish data	in order to find the best algorithm that gives the highest quality of the final product	Analysis/Implementation
50	20	As a Perceptum employee	I want... to have a clear overview (report) of all tried algorithms	in order to reuse the system and use it in the real Starfish application	Report

Product Backlog

Definition of Done

- The code is written OOP, and the classes that act correctly within the application framework
- The code is documented in a notebook containing examples of usage, test results and description of design choices
- The code is well tested both individually as within the application flow (this may be done manually no automated tests)



Sprint 1

POINTS	WHAT	TYPE
8	An automated evaluation metric	Research/Implementation
8	Implementation of NN to calculate several distance metrics between document descriptors	Implementation
5	Algorithm that uses document descriptors calculated with glossaries of tags	Research/Implementation
2	Algorithm that uses document descriptors based on the texts in documents	Implementation
13	Algorithm that uses document descriptors calculated using weighted tags in graphs	Research/Implementation
8	Algorithm that uses document descriptors calculated with weighted document descriptors based on text in documents	Research/Implementation
?	Find out if there are other possible valuable algorithms	Research



Feedback

We would love to hear what you think about our planning! Are there any suggestions or questions?

