



Sistema de apoio à criação da Distribuição do Serviço Docente - Elaboration phase

Projeto em Informática

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CONTEXT AND SOA


- The DSD is a very complex task
- The information required in the process is spread apart and hard to access
- Sometimes there is a need to cooperate with DSDers of other departments (who are they? How can I contact them?)
- We aim to make the whole process faster, simpler, easier...

The logo for Soft Expert, featuring the word "Soft" in white on a red rectangular background, followed by the word "Expert" in white on a blue rectangular background.The logo for Float, consisting of a blue icon of three horizontal bars of increasing length to the left of the word "Float" in a bold, dark blue sans-serif font.



FUNCTIONAL REQUIREMENTS



- List information about UCs and Professors
 - Allocate teachers to UCs
 - Give allocation recommendations
 - View professor's hours history
 - View professor's wishlist history
 - Export DSD in CSV/JSON/Excel format
 - Customizable acronyms
 - Predict number of students for a given UC
 - Display useful contacts for the DSD process
- 

NON-FUNCTIONAL REQUIREMENTS

<i>Requirement</i>	<i>Description</i>
<i>Maintainability</i>	Rapidity with which a system can be restored after a failure
<i>Availability</i>	Prevent system downtimes
<i>Performance</i>	No need to wait long for data to load
<i>Usability</i>	Interface designed according to the problem
<i>Data integrity</i>	Maintaining and assuring data accuracy and consistency over its entire lifecycle
<i>Interoperability</i>	The system is a module of a bigger system

ACTORS

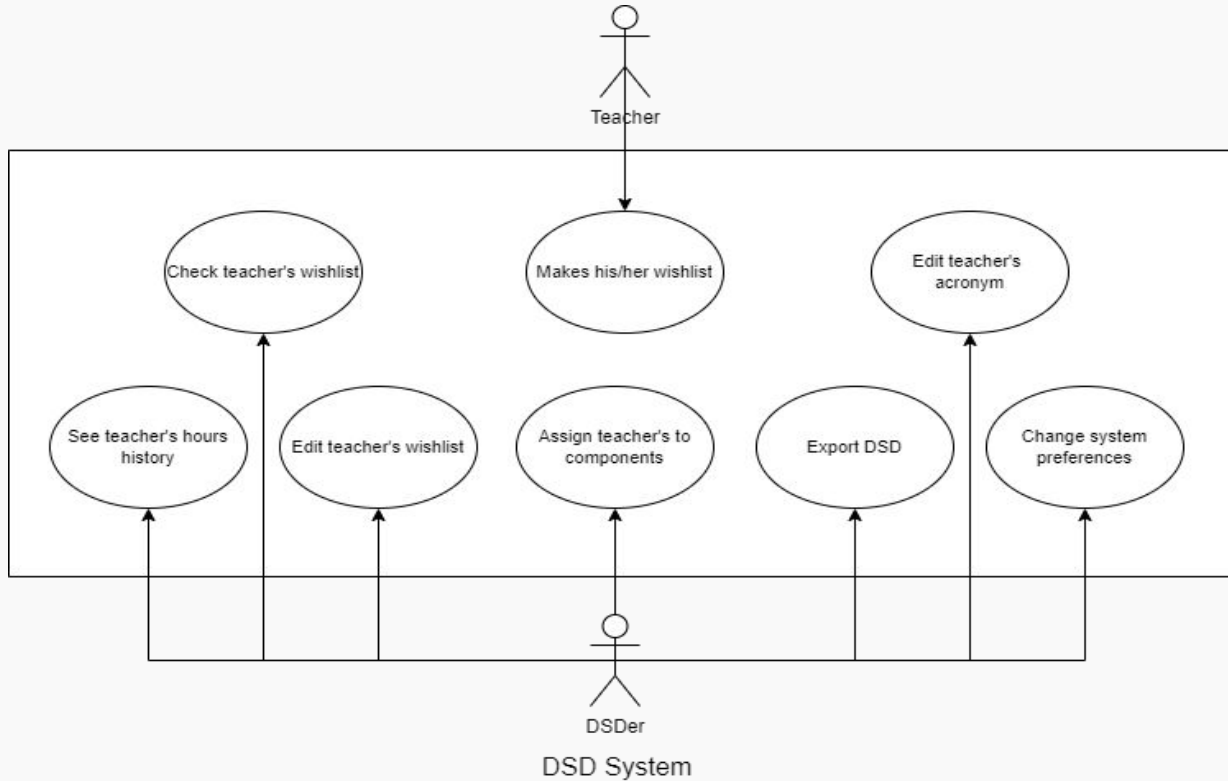
Teachers

Create a wishlist, through a form, that will later be used to carry out the DSD

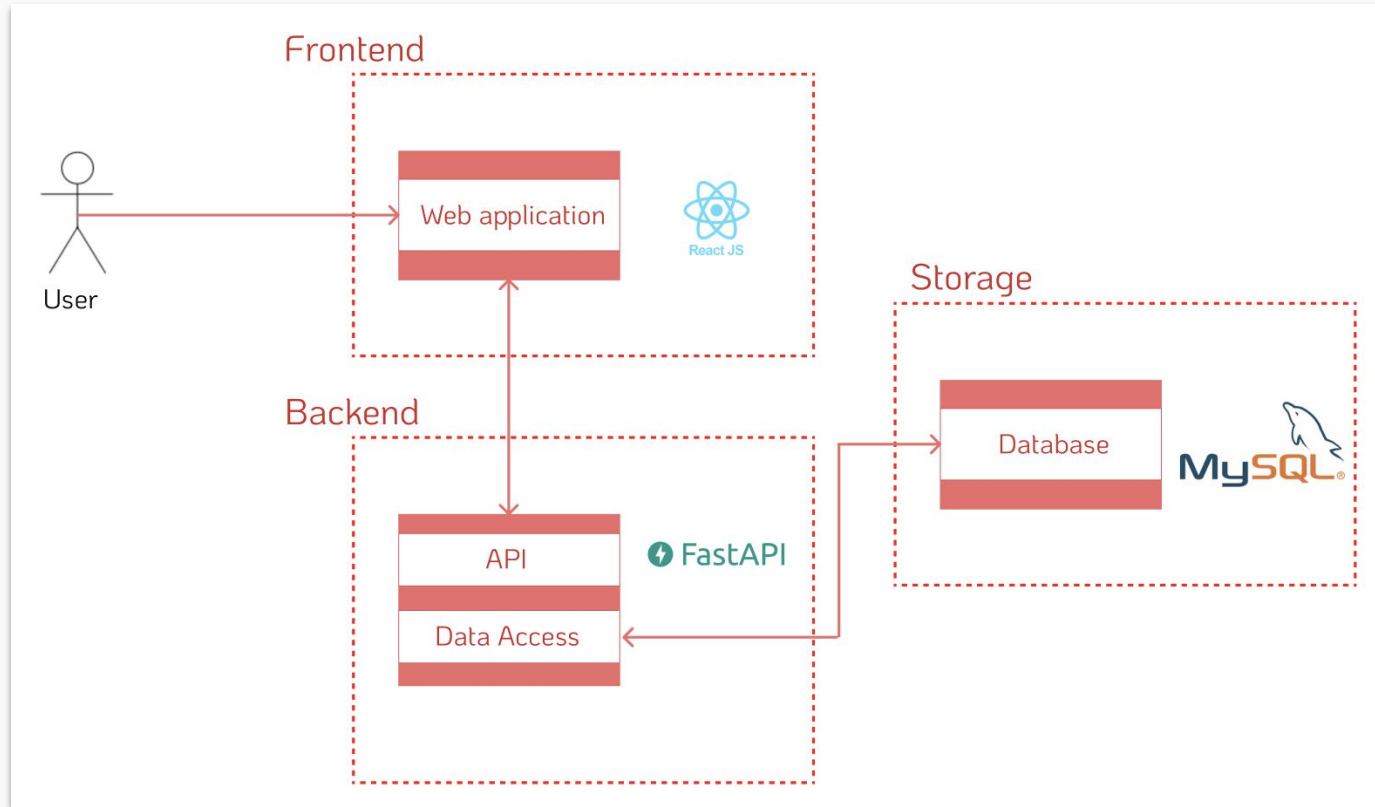
Person responsible to create DSD

Person who creates the DSD, which allocates professors to CUs, following wishlists and hours histories

USE CASES



SYSTEM ARCHITECTURE



MOCK-UP

DSD

Sabáticas

Contactos

Alterar Siglas

Definições

?

IHC

Interação Humano Computador

P (2H) TP (10H)

Prev. Alunos: 85 (17)

LEI MIECT

Reg: BSS

Sab. Reg: 2024

T:

BSS (2H)

P:

BSS (2H)

BSS (2H)

JPS (2H)

(2H)

(2H)

Wishlist:

ACD ICO TOS HTZ ORP

DNC CCB AJC ASO DG

History

Filtros

Q search

FP Fund. Progr. JMR 180	2 P J F	2 P J F	2 S S	2 S
ITW Intr. Tecn. Web JSP 60	2 N B C	2 N P L	2 N P L	2 N
MAS Modl. Aná. Sist. ICO 120	2 I C O	2 I C O	2 J S P	2 J
AED Algr. Estrut. Dad. TOS 120	2 T O S	2 T O S	2 N P L	2 J
BD Bases Dad. CC 60	2 D G	2 D G	2 D G	2 D
MPEI Métds. Prob. Eng. Inf. CAB 60	2 C C	2 I C O	2 I C O	2 J
SM Sist. Mult. TRC 60	2 T R C	2 T R C	2 T R C	2 J
POO Progr. Orient. Obj. SAM 60	2 J L O	2 J L O	2 S A M	2 S
TQS Test.Qual.Soft. IFC 60	2 I C O	2 I C O	2 I C O	2 J
RS Redes Serv. AN 70	2 A N	2 D G	2 D G	2 J
IAC Int. Arq. Comp PMR 60	2 P M R	2 A M C	2 P M R	2 A
APSEI Asp. Prof. Soc. EI. AMD 60	3 M O D	3 M O D	3 M O D	3 M
PI Proj. Inf. OMP 60	3 O R P	3 A N	3 J N V	
SO Sist. Op. INL 120	2 J N L	2 J N L	2 J N L	2 J
CD Comp. Dist. DG 120	2 D G	2 D G	2 D G	2 J

Filtros

Q search

TOS Tomás Silva 12H	2 A E D	2 A E D	2 A E D	2 A C 1	2
JLO José Oliveira 12H	2 A E D	2 A E D	2 A E D	2 A C 1	2
LSL Luís Lopes 12H	2 A E D	2 A E D	2 A E D	2 A C 1	2
JPB João Barraca 0H					
AMD Anibal Duarte 0H					
ORP Osvaldo Pache 0H					
ICO Ilídio Oliveira 0H					
DG Diogo Gomes 0H					
NPL José Lau 0H					
NBC Nuno Carvalho 6H	2 S O	2 S O	2 S O		
PJF Paulo Ferreira 6H	2 C B D	2 P D S	2 P D S		
SS Susana Sargento 6H	2 E A	2 R S	2 S D		
BSS Maria Santos 6H	2 I H C	2 I H C	2 I H C		
TRC Telmo Cunha 6H	2 S M	2 S M	2 L S D		
AMZ André Zuquete 6H	2 S I O	2 S I O	2 C		

TOS

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Prof. Associado

Ativo

Sab: 2026

2021: 10h/s

2020: 11h/s

2019: 9h/s

👍

AED AC1 AC2 FP SO

PDS IA IO TQS MD

ISD TOP PID FOD

👎

BD CBD LSD PI LSD

PROE MEC NOD PLS

PIF TIP ROF DOR

```

    erDiagram
        department ||--o{ director : "1:1"
        department ||--o{ uc : "1:1"
        professor ||--o{ uc : "1:1"
        professor ||--o{ classes : "1:1"
        professor ||--o{ wishlist : "1:1"
        uc ||--o{ classes : "1:1"

        department {
            string id PK
            string acronym
            string name
            string address
            string phone
            string course FK
        }
        director {
            string prof_stic_id PK FK
            string department_num FK
            string uc_num FK
        }
        dsder {
            string prof_stic_id PK FK
        }
        professor {
            string prof_stic_id PK
            string nmec
            string email
            string phone
            string acronym
            string name
            string rank
            string situation
            string department_num FK
        }
        classes {
            string id PK
            string year
            string uc_num FK
            string component
            string hours
            string prof_stic_id FK
        }
        uc {
            string id PK
            string acronym
            string name
            string students_estimate
            string classes FK
            string course FK
            string director FK
        }
        wishlist {
            string id PK
            string year
            string prof_stic_id FK
            string preference
            string uc_num FK
        }
        course {
            string id PK
            string acronym
            string name
            string department FK
            string uc FK
        }
  
```