Курсовая работа по Нечеткой логике

Выполнил: Андросов Иван Сергеевич

Группа: P3210

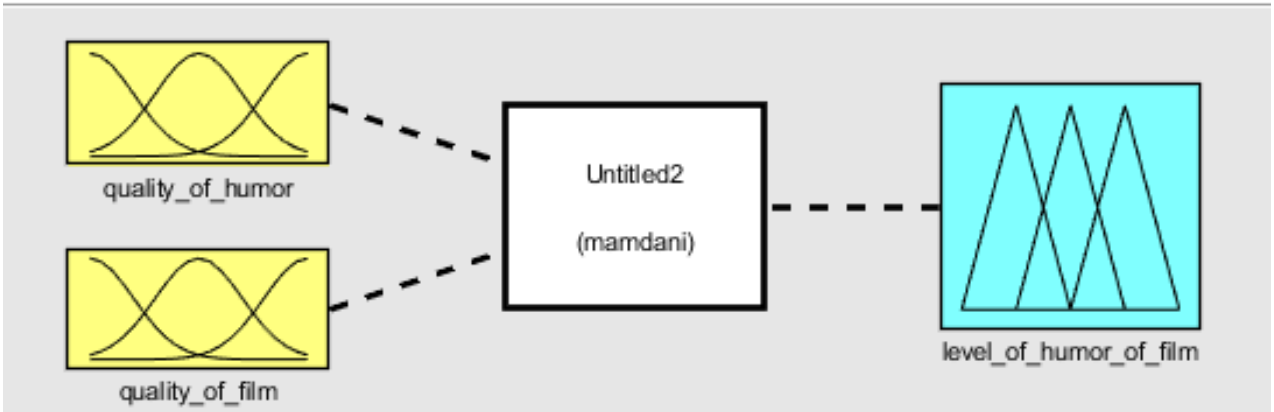
Преподаватель: Поляков Владимир Иванович

Университет ИТМО

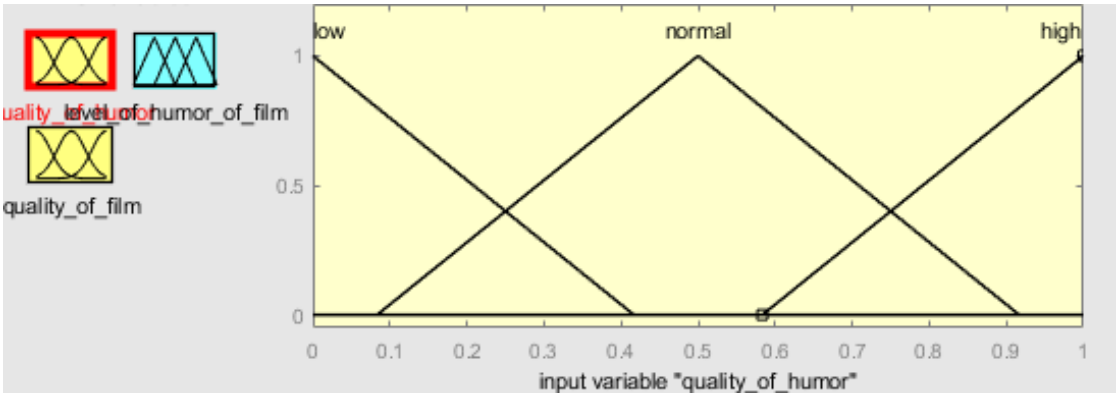
2021г

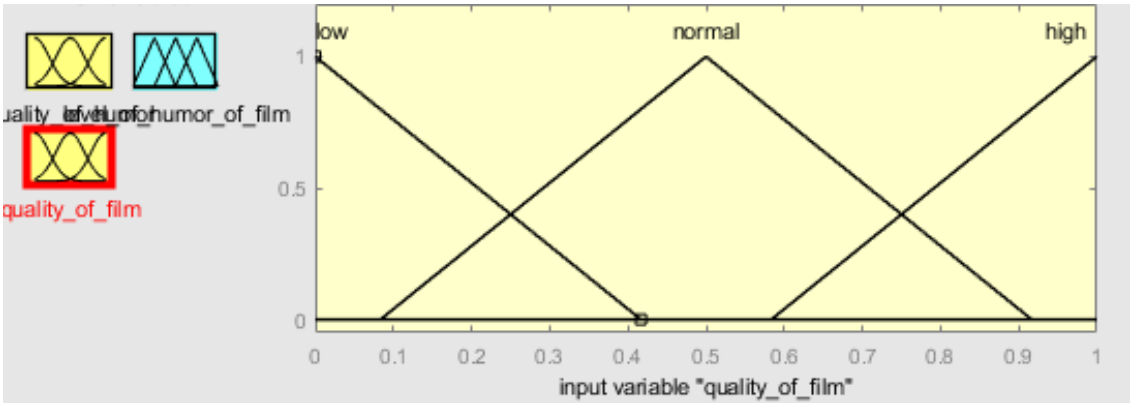
Во время выполнения работы был использован пакет инструментов *Fuzzy Logic* в MatLab.

Модель, определяющая юмористичность фильма в зависимости от уровня юмора и качества самого фильма

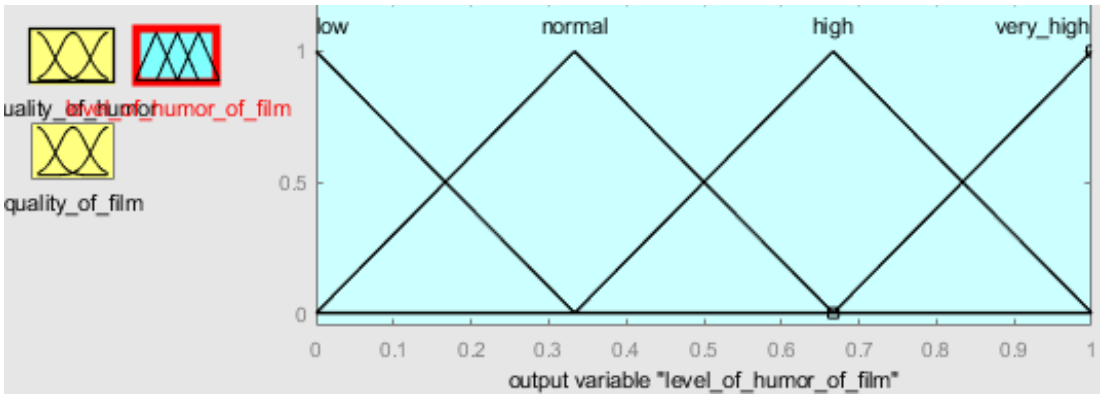


Входные данные





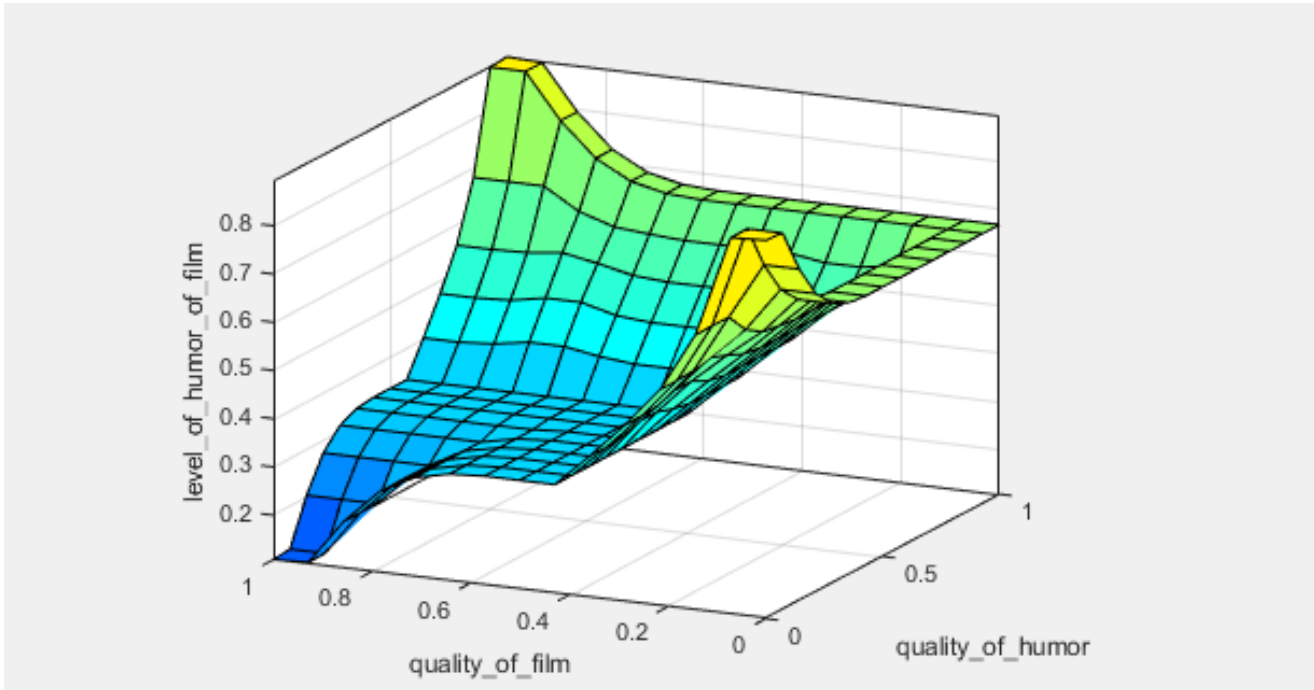
Выходные данные



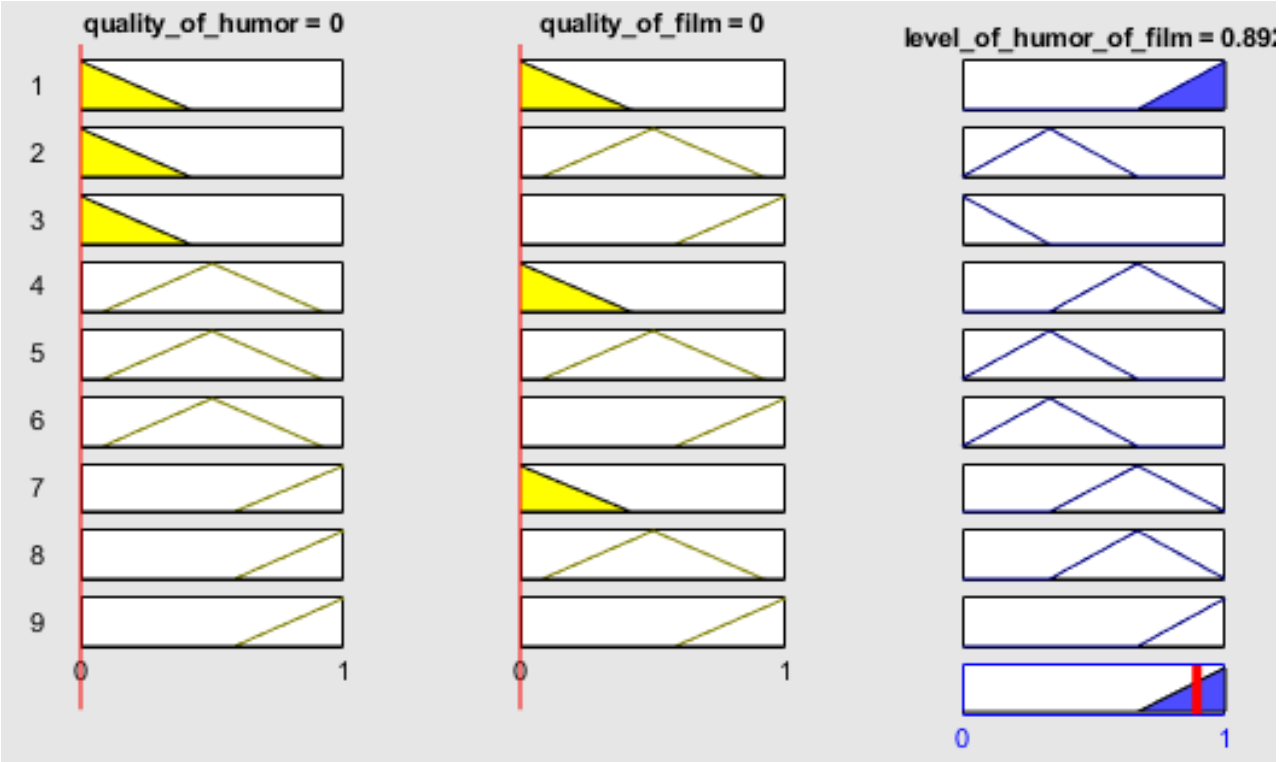
Правила

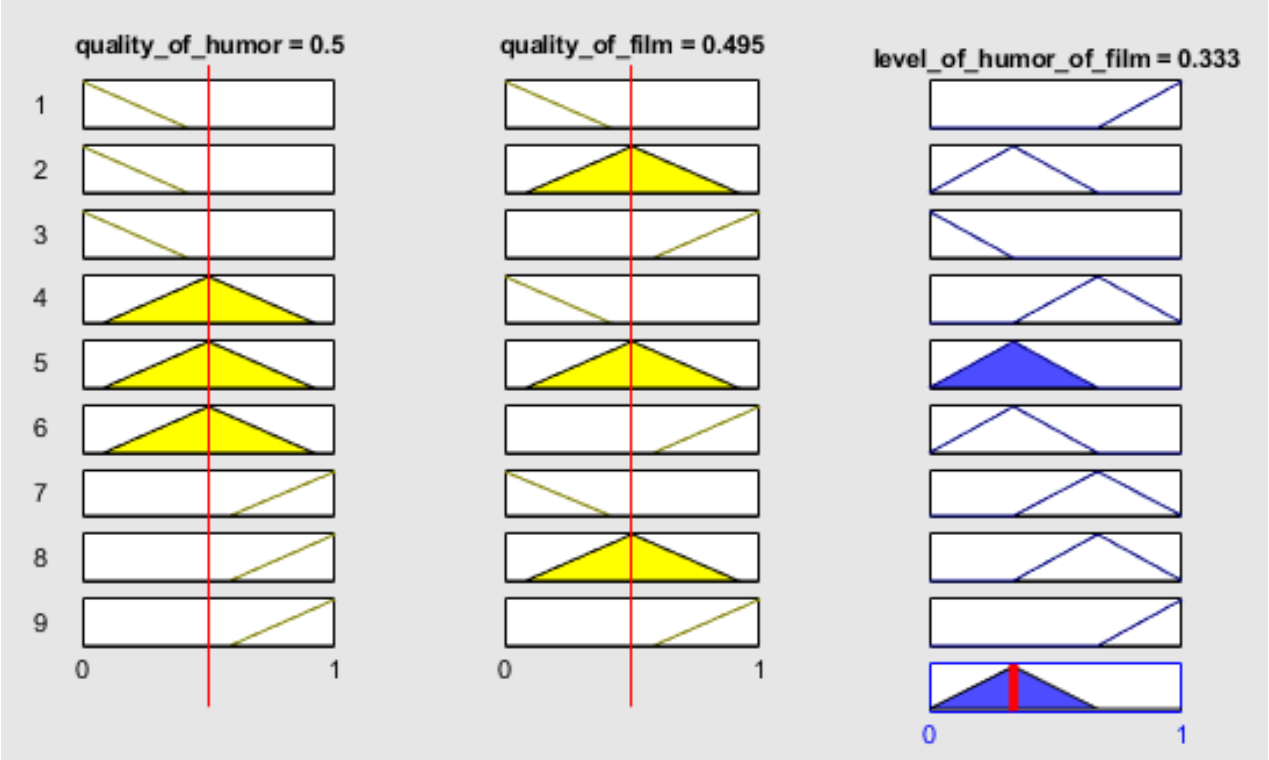
1. If (quality_of_humor is low) and (quality_of_film is low) then (level_of_humor_of_film is very_high) (1)
2. If (quality_of_humor is low) and (quality_of_film is normal) then (level_of_humor_of_film is normal) (1)
3. If (quality_of_humor is low) and (quality_of_film is high) then (level_of_humor_of_film is low) (1)
4. If (quality_of_humor is normal) and (quality_of_film is low) then (level_of_humor_of_film is high) (1)
5. If (quality_of_humor is normal) and (quality_of_film is normal) then (level_of_humor_of_film is normal) (1)
6. If (quality_of_humor is normal) and (quality_of_film is high) then (level_of_humor_of_film is normal) (1)
7. If (quality_of_humor is high) and (quality_of_film is low) then (level_of_humor_of_film is high) (1)
8. If (quality_of_humor is high) and (quality_of_film is normal) then (level_of_humor_of_film is high) (1)
9. If (quality_of_humor is high) and (quality_of_film is high) then (level_of_humor_of_film is very_high) (1)

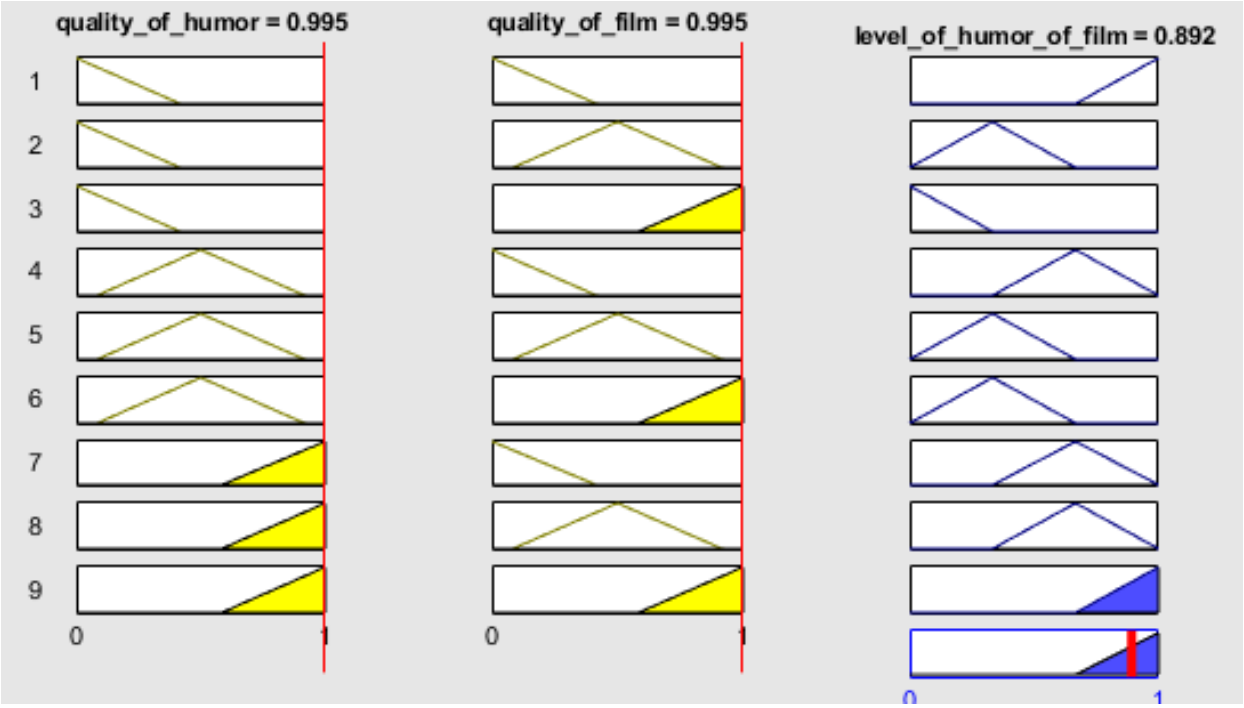
График зависимости



Результат работы при разных значениях






quality_of_humor = 0.995
quality_of_film = 0.995
level_of_humor_of_film = 0.892
1
2
3
4
5
6
7
8
9
0
1
0
1
0
1