

Relatório trabalho em OWL

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Frases(Perguntas e afirmações):

D1 - João viajou de Evora para Lisboa

DRS F1

X - Y - W - Z

Nome(X, João)

Viajar(Y)

Cidade(W, Évora)

Cidade(Z, Lisboa)

Agent(Y, X)

OBJ(Y, W)

OBL(Y, Z)

Representação semantica

Instancia de pessoa X

dataproperty has_name X João

Viajar, instancia de travel com Y

Instancia de object property IsActor(X,Y)

Instancia de cidade W has_name Évora

Instancia de cidade W has_name Lisboa

instancia de object property From Y, W

instancia de object property To Y, Z

Individual: example:A1

Types:

example:Person

Facts:

example:IsActor example:T1,

example:has_name "João"

Individual: example:T1

Types:
example:Travel

Facts:
example:From example:C2,
example:To example:C1

Individual: example:C1

Types:
example:City,
example:Country,
example:Place

Facts:
example:has_Country example:P1,
example:has_name "Lisboa"

Individual: example:C2

Types:
example:City,
example:Country,
example:Place

Facts:
example:has_Country example:P1,
example:has_name "Evora"

P1 - Quem viajou de Évora para Lisboa?

DRS F1
X - Y - W - Z

Who(X)
Viajar(Y)
Cidade(W, Évora)
Cidade(Z, Lisboa)
Agent(Y, X)

OBJ(Y, W)

OBL(Y, Z)

DLQuery:

IsActor some (To Value C1 and From Value C2)

D2 - O João é do genero masculino

DRS F1

X Y

Genero(Y)

masculino(Y)

Ser(X,Y)

nome(X, João)

Individual: example:A1

Types:

example:Person

Facts:

example:IsActor example:T1,

example:who_was example:T1,

example:has_name "João"

Class: example:Man

EquivalentTo:

example:Adult

and (example:has_Gender value example:Male)

SubClassOf:

example:Adult,

example:Person,

example:Adult

and (example:has_Gender value example:Male),

example:Person

and (example:has_Age some xsd:integer[> 18]),

example:has_Gender value example:Male,

example:has_Age some xsd:integer[> 18]

P2 - Qual o genero do João?

DRS

Genero(Y)
Nome(X, João)

DLQuery:
has_name value "João" and Man

D3 - John_Doe tem um irmão Tom_Doe

DRS
X Y
Has_Name X(John_Doe)
Has_Name Y(Tom_Doe)
has_brother(X,Y)

Individual: example:John_Doe

Types:
 example:Adult,
 example:Person,
 example:Person
 and (example:has_Age some xsd:integer[> 18]),
 example:has_Child some example:Person,
 example:has_Age some xsd:integer[> 18]

Facts:
 example:has_Brother example:Tom_Doe,
 example:has_Child example:Mary_Doe,
 example:has_Daughter example:Mary_Doe,
 example:has_Friend example:Daisy_Buchanan,
 example:has_Friend example:Jay_Gatsby,
 example:has_Friend example:John_Smith,
 example:has_Sibling example:Sarah_Doe,
 example:has_Sibling example:Tom_Doe,
 example:has_Sister example:Sarah_Doe,
 example:has_Social_Relation_With example:Beth_Doe,
 example:has_Social_Relation_With example:Daisy_Buchanan,
 example:has_Social_Relation_With example:Jay_Gatsby,
 example:has_Social_Relation_With example:John_Smith,
 example:has_Social_Relation_With example:Mary_Doe,
 example:has_Social_Relation_With example:Sarah_Doe,
 example:has_Social_Relation_With example:Tom_Doe,
 example:has_Spouse example:Beth_Doe,
 example:has_Wife example:Beth_Doe,

example:has_Age 34

Individual: example:Tom_Doe

Types:

example:Person,
example:has_Gender value example:Male

Facts:

example:has_Gender example:Male,
example:has_Sibling example:John_Doe,
example:has_Social_Relation_With example:John_Doe

ObjectProperty: example:has_Brother

SubPropertyOf:

example:has_Sibling,
example:has_Social_Relation_With

Domain:

example:Person

Range:

example:Person,
example:has_Gender value example:Male

P3 - Quem têm 34 anos de idade?

DLQuery:

has_Age value 34

D4 - Beth é esposa do John.

RS

X Y

Has_Name X (Beth)

Has_Name Y (John_Doe)

has_Spouse(X,Y)

Individual: example:John_Doe

Types:

```
example:Adult,  
example:Person,  
example:Person  
and (example:has_Age some xsd:integer[> 18]),  
example:has_Child some example:Person,  
example:has_Age some xsd:integer[> 18]
```

Facts:

```
example:has_Brother example:Tom_Doe,  
example:has_Child example:Mary_Doe,  
example:has_Daughter example:Mary_Doe,  
example:has_Friend example:Daisy_Buchanan,  
example:has_Friend example:Jay_Gatsby,  
example:has_Friend example:John_Smith,  
example:has_Sibling example:Sarah_Doe,  
example:has_Sibling example:Tom_Doe,  
example:has_Sister example:Sarah_Doe,  
example:has_Social_Relation_With example:Beth_Doe,  
example:has_Social_Relation_With example:Daisy_Buchanan,  
example:has_Social_Relation_With example:Jay_Gatsby,  
example:has_Social_Relation_With example:John_Smith,  
example:has_Social_Relation_With example:Mary_Doe,  
example:has_Social_Relation_With example:Sarah_Doe,  
example:has_Social_Relation_With example:Tom_Doe,  
example:has_Spouse example:Beth_Doe,  
example:has_Wife example:Beth_Doe,  
example:has_Age 34
```

Individual: example:Beth_Doe

Types:

```
example:Adult,  
example:Person,  
example:Person  
and (example:has_Age some xsd:integer[> 18]),  
example:has_Gender value example:Female,  
example:has_Age some xsd:integer[> 18]
```

Facts:

```
example:has_Friend example:Jay_Gatsby,  
example:has_Gender example:Female,  
example:has_Social_Relation_With example:Jay_Gatsby,  
example:has_Social_Relation_With example:John_Doe,  
example:has_Spouse example:John_Doe,
```

example:has_Age 32

ObjectProperty: example:has_Spouse

SubPropertyOf:
example:has_Social_Relation_With

Characteristics:
Functional,
Symmetric

Domain:
example:Adult,
example:Person,
example:Person
and (example:has_Age some xsd:integer[> 18]),
example:has_Age some xsd:integer[> 18]

Range:
example:Adult,
example:Person,
example:Person
and (example:has_Age some xsd:integer[> 18]),
example:has_Age some xsd:integer[> 18]

P4 - Quem é a esposa do John_Doe?

DLQuery:
has_Spouse value John_Doe

D5 - O John têm uma esposa chamada Beth

'X0', 'X1', 'X2'
Lista condições:
('X0', 'ter')
('X1', 'John')
('X0', 'agent', 'X1')
('X2', 'esposo')
('X0', 'obj', 'X2')

ObjectProperty: example:has_Spouse

SubPropertyOf:
 example:has_Social_Relation_With

Characteristics:
 Functional,
 Symmetric

Domain:
 example:Adult,
 example:Person,
 example:Person
 and (example:has_Age some xsd:integer[> 18]),
 example:has_Age some xsd:integer[> 18]

Range:
 example:Adult,
 example:Person,
 example:Person
 and (example:has_Age some xsd:integer[> 18]),
 example:has_Age some xsd:integer[> 18]

Individual: example:Beth_Doe

Types:
 example:Adult,
 example:Person,
 example:Person
 and (example:has_Age some xsd:integer[> 18]),
 example:has_Gender value example:Female,
 example:has_Age some xsd:integer[> 18]

Facts:
 example:has_Friend example:Jay_Gatsby,
 example:has_Gender example:Female,
 example:has_Social_Relation_With example:Jay_Gatsby,
 example:has_Social_Relation_With example:John_Doe,
 example:has_Spouse example:John_Doe,
 example:has_Age 32

Individual: example:John_Doe

Types:
 example:Adult,
 example:Person,
 example:Person


```

    and (example:has_Age some xsd:integer[> 18]),
    example:has_Child some example:Person,
    example:has_Age some xsd:integer[> 18]

```

Facts:

```

example:has_Brother   example:Tom_Doe,
example:has_Child     example:Mary_Doe,
example:has_Daughter  example:Mary_Doe,
example:has_Friend    example:Daisy_Buchanan,
example:has_Friend    example:Jay_Gatsby,
example:has_Friend    example:John_Smith,
example:has_Sibling   example:Sarah_Doe,
example:has_Sibling   example:Tom_Doe,
example:has_Sister    example:Sarah_Doe,
example:has_Social_Relation_With example:Beth_Doe,
example:has_Social_Relation_With example:Daisy_Buchanan,
example:has_Social_Relation_With example:Jay_Gatsby,
example:has_Social_Relation_With example:John_Smith,
example:has_Social_Relation_With example:Mary_Doe,
example:has_Social_Relation_With example:Sarah_Doe,
example:has_Social_Relation_With example:Tom_Doe,
example:has_Spouse    example:Beth_Doe,
example:has_Wife      example:Beth_Doe,
example:has_Age       34

```

P5 - Quem é amiga do John_Doe?

DLQuery:

has_Friend value John_Doe and Woman

D6 - A filha do John chama-se May

'X0', 'X1', 'X2', 'X3'

Lista condições:

```

('X0', 'chamar')
('X1', 'filha')
('X0', 'agent', 'X1')
('X2', 'John')
('X1', 'de', 'X2')
('X3', 'se')
('X0', 'obj', 'X3')

```

P6 - Quem é a filha do John_Doe?

DLQuery:
inverse has_Daughter value John_Doe

D7 - O john têm amigos e amigas

'X0', 'X1', 'X2'
Lista condições:
('X0', 'ter')
('X1', 'john')
('X0', 'agent', 'X1')
('X2', 'amigo')
('X0', 'obj', 'X2')

ObjectProperty: example:has_Friend

SubPropertyOf:
example:has_Social_Relation_With

Characteristics:
Symmetric

Domain:
example:Person

Range:
example:Person

Individual: example:John_Doe

Types:
example:Adult,
example:Person,
example:Person
and (example:has_Age some xsd:integer[> 18]),
example:has_Child some example:Person,
example:has_Age some xsd:integer[> 18]

Facts:
example:has_Brother example:Tom_Doe,
example:has_Child example:Mary_Doe,
example:has_Daughter example:Mary_Doe,
example:has_Friend example:Daisy_Buchanan,
example:has_Friend example:Jay_Gatsby,

```

example:has_Friend   example:John_Smith,
example:has_Sibling  example:Sarah_Doe,
example:has_Sibling  example:Tom_Doe,
example:has_Sister   example:Sarah_Doe,
example:has_Social_Relation_With example:Beth_Doe,
example:has_Social_Relation_With example:Daisy_Buchanan,
example:has_Social_Relation_With example:Jay_Gatsby,
example:has_Social_Relation_With example:John_Smith,
example:has_Social_Relation_With example:Mary_Doe,
example:has_Social_Relation_With example:Sarah_Doe,
example:has_Social_Relation_With example:Tom_Doe,
example:has_Spouse   example:Beth_Doe,
example:has_Wife     example:Beth_Doe,
example:has_Age      34

```

P7 - Quem tem uma relação social com John_Doe?

DLQuery:

inverse has_Social_Relation_With value John_Doe

D8 - O John esteve em Évora e no Porto

X - Y - W - Z

```

Nome(X, John)
has_been(Y)
Cidade(W, Évora)
Cidade(Z, Porto)
Agent(Y, X)
OBJ(Y, W)
OBL(Y, Z)

```

Individual: example:C4

Types:

```

example:City,
example:Place

```

Facts:

```

example:has_Country example:P1,
example:has_name     "Porto"

```

Individual: example:C2

Types:
 example:City,
 example:Country,
 example:Place

Facts:
 example:has_Country example:P1,
 example:has_name "Evora"

P8 - Quais mulheres têm uma relação social com John_Doe?

DLQuery:
inverse has_Social_Relation_With value John_Doe and has_Gender value Female

D9 - A filha do John é do genero feminino

DRS F1
X Y Z
Genero(Y)
feminino(Y)
filha_de(X,Z)
nome filha(Z)
Ser(X,Y)
nome(X, John)

Individual: example:Mary_Doe

Types:
 example:Person,
 example:has_Gender value example:Female

Facts:
 example:has_Aunt example:Sarah_Doe,
 example:has_Gender example:Female,
 example:has_Parent example:John_Doe,
 example:has_Sibling example:Susan_Doe,
 example:has_Sister example:Susan_Doe,
 example:has_Social_Relation_With example:John_Doe,
 example:has_Social_Relation_With example:Sarah_Doe,
 example:has_Social_Relation_With example:Susan_Doe,
 example:has_Social_Relation_With example:Tom_Doe,
 example:has_Uncle example:Tom_Doe

Individual: example:John_Doe

Types:

```
example:Adult,  
example:Person,  
example:Person  
and (example:has_Age some xsd:integer[> 18]),  
example:has_Child some example:Person,  
example:has_Age some xsd:integer[> 18]
```

Facts:

```
example:has_Brother example:Tom_Doe,  
example:has_Child example:Mary_Doe,  
example:has_Daughter example:Mary_Doe,  
example:has_Friend example:Daisy_Buchanan,  
example:has_Friend example:Jay_Gatsby,  
example:has_Friend example:John_Smith,  
example:has_Sibling example:Sarah_Doe,  
example:has_Sibling example:Tom_Doe,  
example:has_Sister example:Sarah_Doe,  
example:has_Social_Relation_With example:Beth_Doe,  
example:has_Social_Relation_With example:Daisy_Buchanan,  
example:has_Social_Relation_With example:Jay_Gatsby,  
example:has_Social_Relation_With example:John_Smith,  
example:has_Social_Relation_With example:Mary_Doe,  
example:has_Social_Relation_With example:Sarah_Doe,  
example:has_Social_Relation_With example:Tom_Doe,  
example:has_Spouse example:Beth_Doe,  
example:has_Wife example:Beth_Doe,  
example:has_Age 34
```

P9 - Qual das pessoas com uma relação social com o Jay_Gatsby têm uma filha chamada Mary_Doe

DLQuery:

has_Social_Relation_With value Jay_Gatsby and has_Daughter value Mary_Doe

D10 - Jay viajou de Tomar para Lisboa

DRS

X - Y - W - Z

Nome(X, Jay)

Viajar(Y)

Cidade(W, Tomar)

Cidade(Z, Lisboa)

Agent(Y, X)

OBJ(Y, W)

OBL(Y, Z)

Individual: example:C1

Types:

example:City,
example:Country,
example:Place

Facts:

example:has_Country example:P1,
example:has_name "Lisboa"

Individual: example:C3

Types:

example:City,
example:Place

Facts:

example:has_Country example:P1,
example:has_name "Tomar"

Individual: example:Jay_Gatsby

Types:

example:Person

Facts:

example:has_Friend example:Beth_Doe,
example:has_Friend example:Daisy_Buchanan,
example:has_Friend example:John_Doe,
example:has_Friend example:John_Smith,
example:has_Friend example:Nick_Carraway,
example:has_Social_Relation_With example:Beth_Doe,
example:has_Social_Relation_With example:Daisy_Buchanan,
example:has_Social_Relation_With example:John_Doe,
example:has_Social_Relation_With example:John_Smith,
example:has_Social_Relation_With example:Nick_Carraway,
example:has_Age 42

P10 - Quais sao os amigos adultos do John_Doe?

DLQuery:

has_Friend value John_Doe and Adult