

Classes

Class1

Class1 $\equiv \exists \text{ likesToWorkWith FemaleColleagues}$

Class2

Class2 $\equiv \forall \text{ likesToWorkWith FemaleColleagues}$

Class3

Class3 $\equiv \exists \text{ likesToWorkWith } \{\text{doris}\}$

Class4

Class4 $\equiv \geq 3 \text{ likesToWorkWith Person}$

Class5

Class5 $\equiv = \text{ likesToWorkWith Person}$

FemaleColleagues

FemaleColleagues $\equiv \{\text{desiree}\} \sqcup \{\text{doris}\} \sqcup \{\text{dagmar}\}$

Person

Object properties

likesToWorkWith

$\exists \text{ likesToWorkWith Thing} \sqsubseteq \text{Person}$

$\top \sqsubseteq \forall \text{ likesToWorkWith Person}$

Data properties

Individuals

anton

anton : Person

$\{\text{anton}\} \neq \{\text{bernd}\} \neq \{\text{charles}\} \neq \{\text{dagmar}\} \neq \{\text{desiree}\} \neq \{\text{doris}\} \neq \{\text{gustav}\}$

likesToWorkWith(anton, doris)

likesToWorkWith(anton, dagmar)

bernd

bernd : Person

{anton} \neq {bernd} \neq {charles} \neq {dagmar} \neq {desiree} \neq {doris} \neq {gustav}

charles

charles : Person

{anton} \neq {bernd} \neq {charles} \neq {dagmar} \neq {desiree} \neq {doris} \neq {gustav}

dagmar

dagmar : Person

{anton} \neq {bernd} \neq {charles} \neq {dagmar} \neq {desiree} \neq {doris} \neq {gustav}

desiree

desiree : Person

{anton} \neq {bernd} \neq {charles} \neq {dagmar} \neq {desiree} \neq {doris} \neq {gustav}

doris

doris : Person

{anton} \neq {bernd} \neq {charles} \neq {dagmar} \neq {desiree} \neq {doris} \neq {gustav}

likesToWorkWith(doris, dagmar)

likesToWorkWith(doris, bernd)

gustav

gustav : Person

{anton} \neq {bernd} \neq {charles} \neq {dagmar} \neq {desiree} \neq {doris} \neq {gustav}

likesToWorkWith(gustav, bernd)

likesToWorkWith(gustav, desiree)

likesToWorkWith(gustav, doris)

Datatypes