

# Mysql Workbench

Un outil de conception graphique  
d'une base de données

COMPIL Bases de données 14/1/2009

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II – Exemple de "pro-ingéniérie" (MRD ==> SQL)

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IV – Autres caractéristiques de l'outil

# I - Présentation générale

Logiciel de conception graphique d'une base de données (modèle relationnel)

Successeur de DBDesigner 4 de fabForce.

Disponible pour Windows, Linux et Mac OS.

MySQL Workbench Community : gratuit

MySQL Workbench Standard : environ 80€/an (version pro, incluant notamment des fonctionnalités de synchronisation, de validation et de documentation)

Différences entre les 2 versions : <http://www.mysql.fr/products/workbench/features.html>

## **Infos en ligne**

<http://www.mysql.fr/products/workbench/>

Téléchargement : <http://dev.mysql.com/downloads/workbench/5.0.html>

Documentation : <http://dev.mysql.com/doc/workbench/en/index.html>

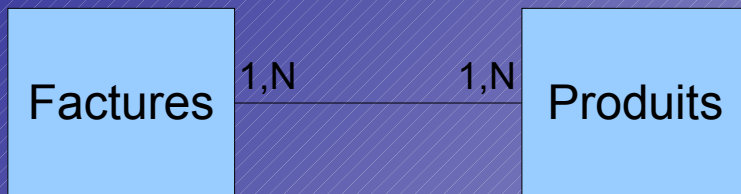
Démos : <http://www.mysql.fr/products/workbench/demo.html>

# Modèle Relationnel des Données

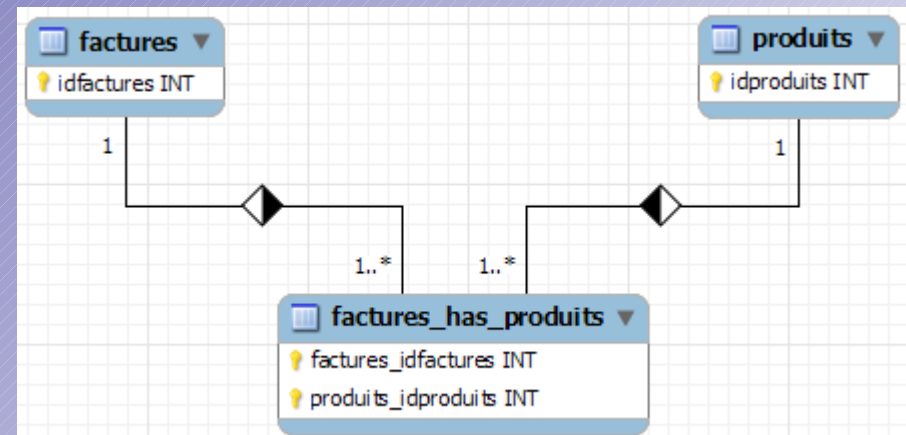
Mysql Workbench est un logiciel de conception graphique du **Modèle Relationnel des Données** (MRD, ou modèle Entités-Associations, en anglais Entity-Relationship)

Le MRD (niveau relationnel) est normalement généré à partir d'un **Modèle Conceptuel des Données** (MCD, niveau conceptuel). Pour cela, on peut utiliser d'autres outils tels que PowerDesigner...

MCD



MRD





# Mysql Workbench permet de travailler à partir du MRD

Il permet de générer le schéma SQL\* (script de création de la base) à partir du MRD. On parle de "pro-ingénierie" (forward engineering).

Mais il permet aussi de faire l'inverse. On parle alors de "rétro-ingénierie" (retro engineering).

MRD

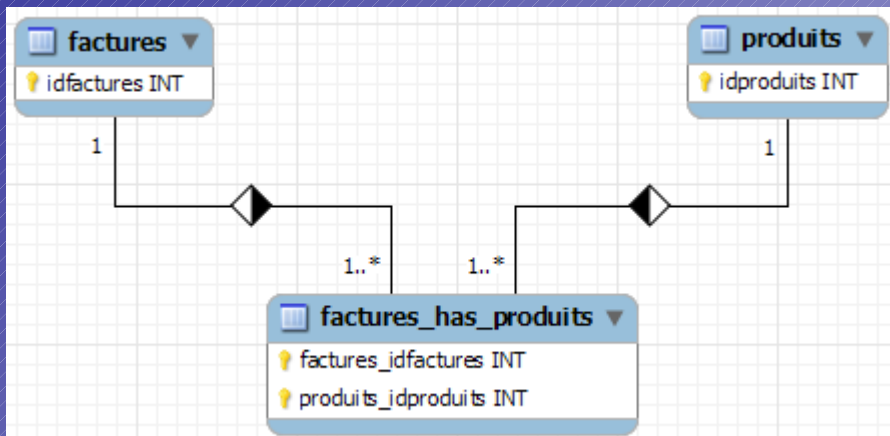
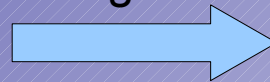


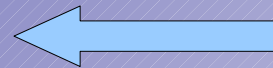
Schéma SQL\*

pro-ingénierie



```
Create database compta_db;
Create table factures...
Create table produits...
Create table factures_has_produits...
```

rétro-ingénierie



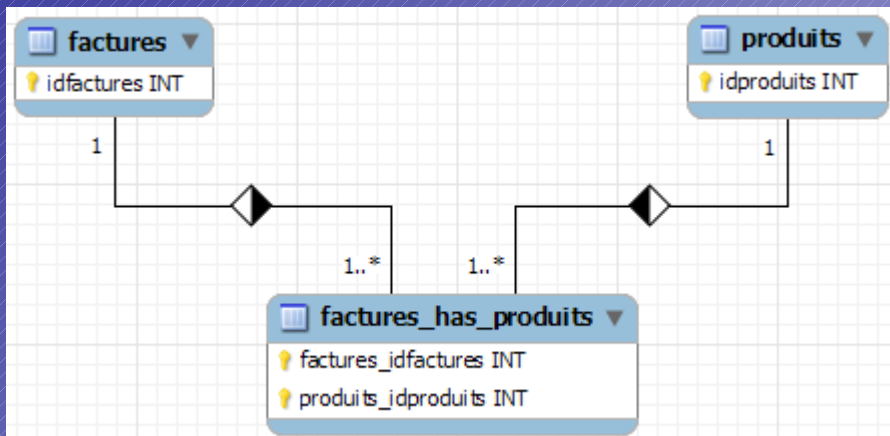
\* Note : on devrait parler ici de DDL (Data **D**escription Language) plutôt que de SQL (Structured **Q**uery Language)

# Avantage de la version payante : la synchronisation

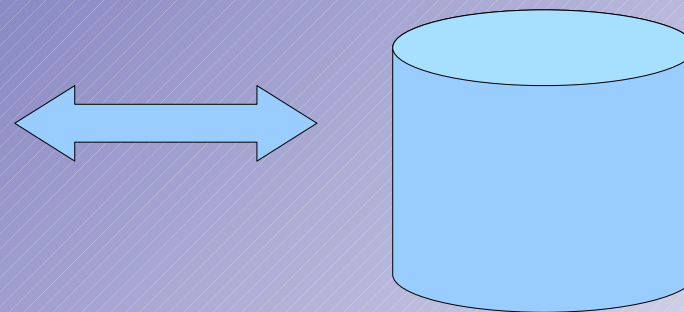
La version payante permet notamment de garder un lien permanent entre le MRD et la base de données active : les 2 restent synchronisés.

Cela fonctionne à travers des connecteurs ODBC ou JDBC vers n'importe quel SGBD (pas seulement Mysql)

MRD

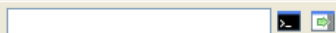


Base de données online



## II – Exemple de pro-ingénierie (MRD ==> SQL)

1) Création du MRD à la souris



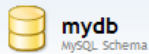
MySQL Model

EER Diagrams



Add Diagram

Physical Schemata



Tables (0 items)

Add Table

Views (0 items)

Add View

Routines (0 items)

Add Routine

Routine Groups (0 items)

Add Group

Schema Privileges

SQL Scripts

Model Notes



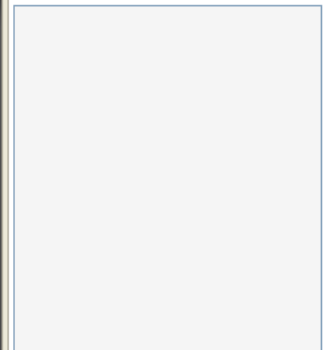
Catalog

- mydb
  - Tables
  - Views
  - Routine Groups

Catalog Layers User Types

Description

No Selection

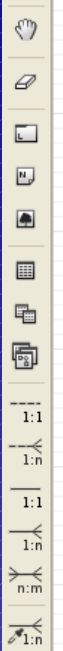


Descript... Properties History

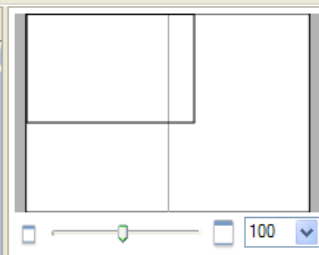




MySQL Model **EER Diagram**



Search bar



Zoom slider and zoom level (100)

Catalog

- mydb
  - Tables
  - Views
  - Routine Groups

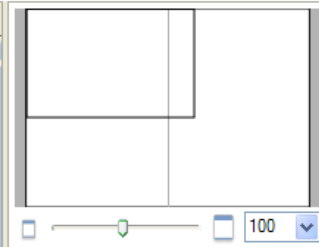
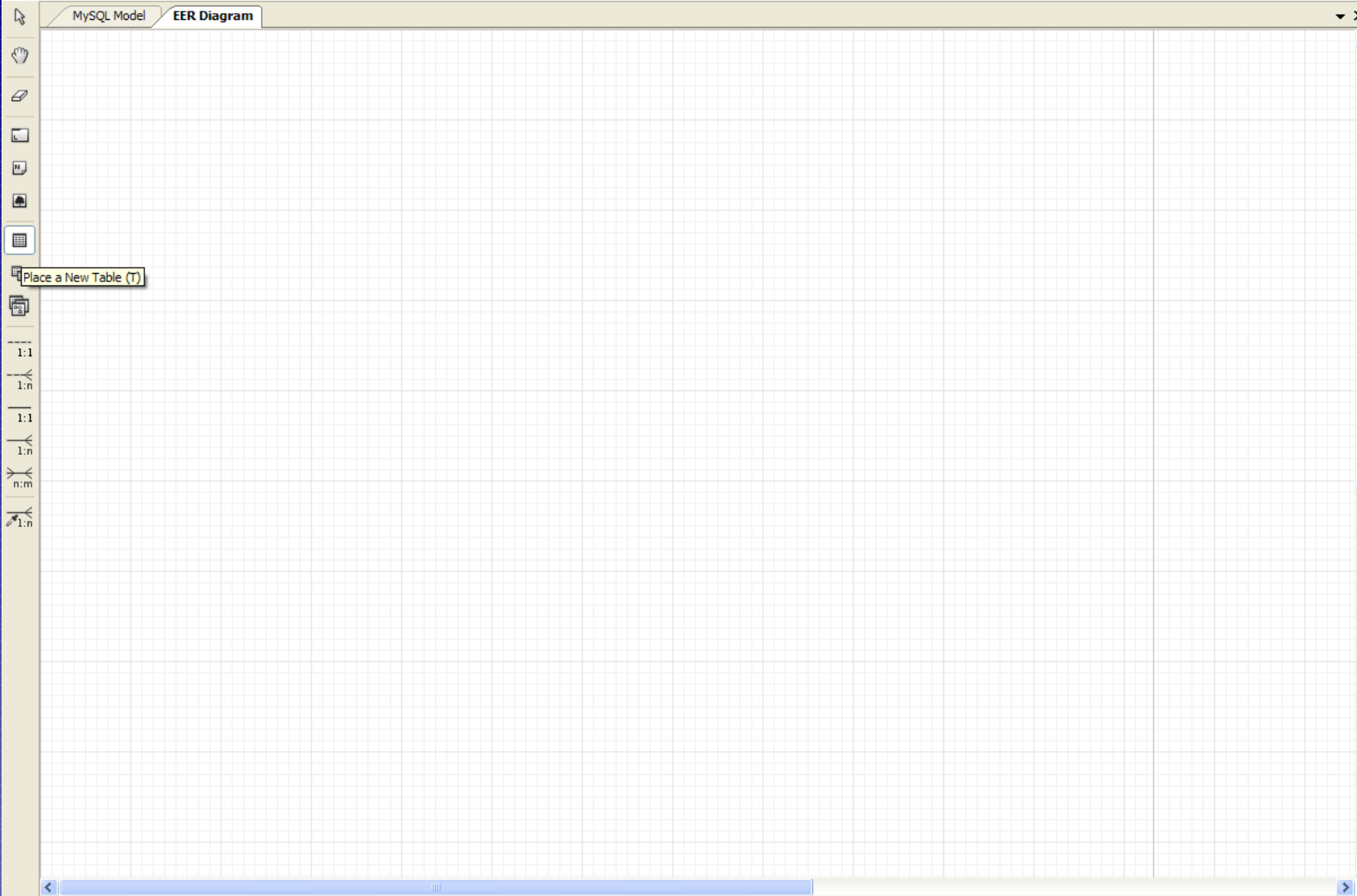
Catalog Layers User Types

Description

No Selection

Empty area for description details.

Descript... Properties History



Catalog

- mydb
  - Tables
  - Views
  - Routine Groups

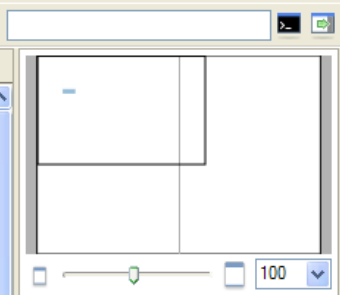
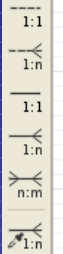
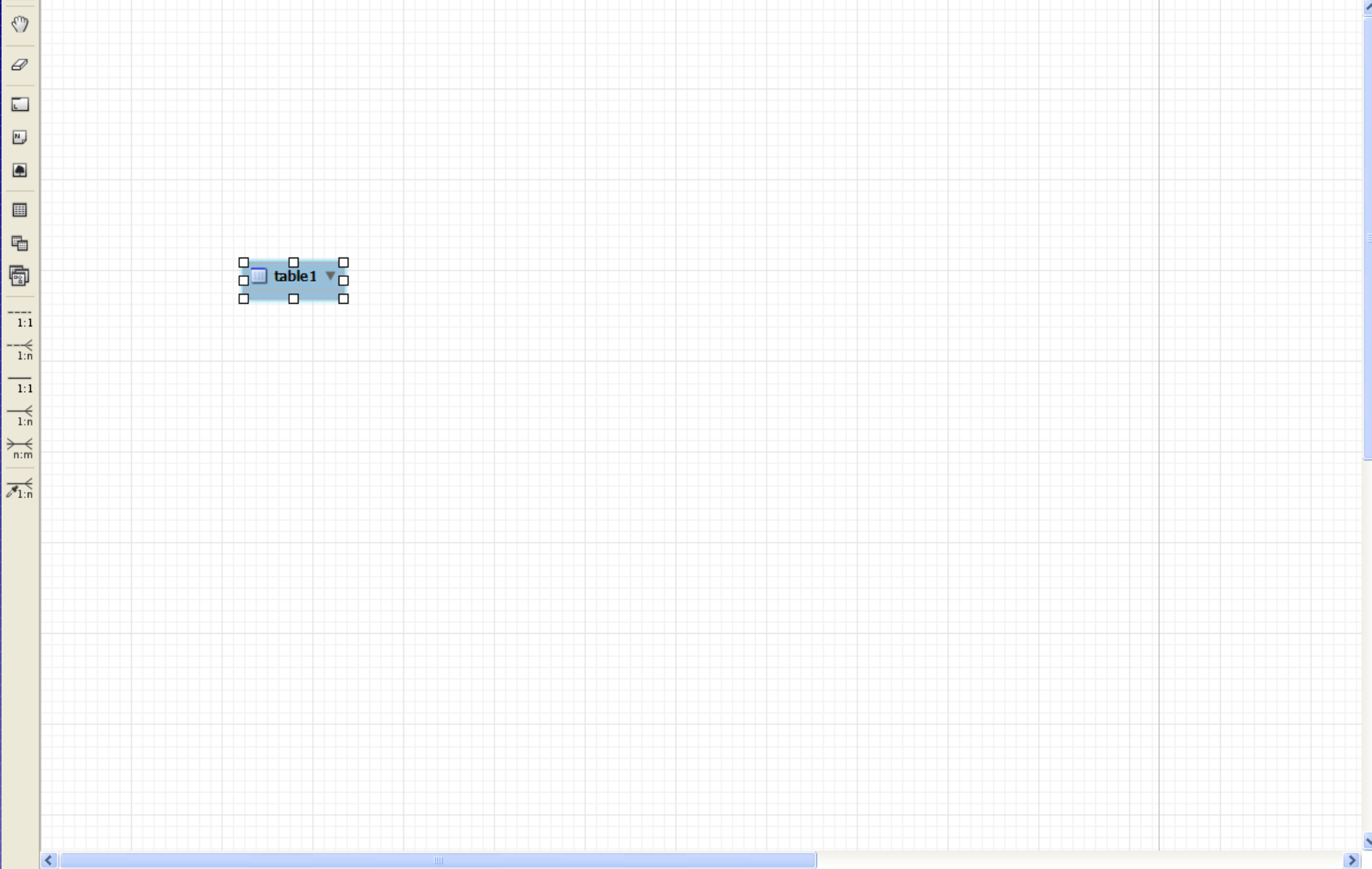
Description

No Selection

Descript... Properties History



MySQL Model **EER Diagram**



Catalog

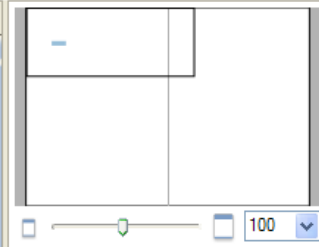
- mydb
  - Tables
    - table1
  - Views
  - Routine Groups

Description

No Selection



MySQL Model EER Diagram



Catalog

- mydb
  - Tables
    - factures
  - Views
  - Routine Groups

Description

No Selection

factures

Name:

Collation:

Engine:

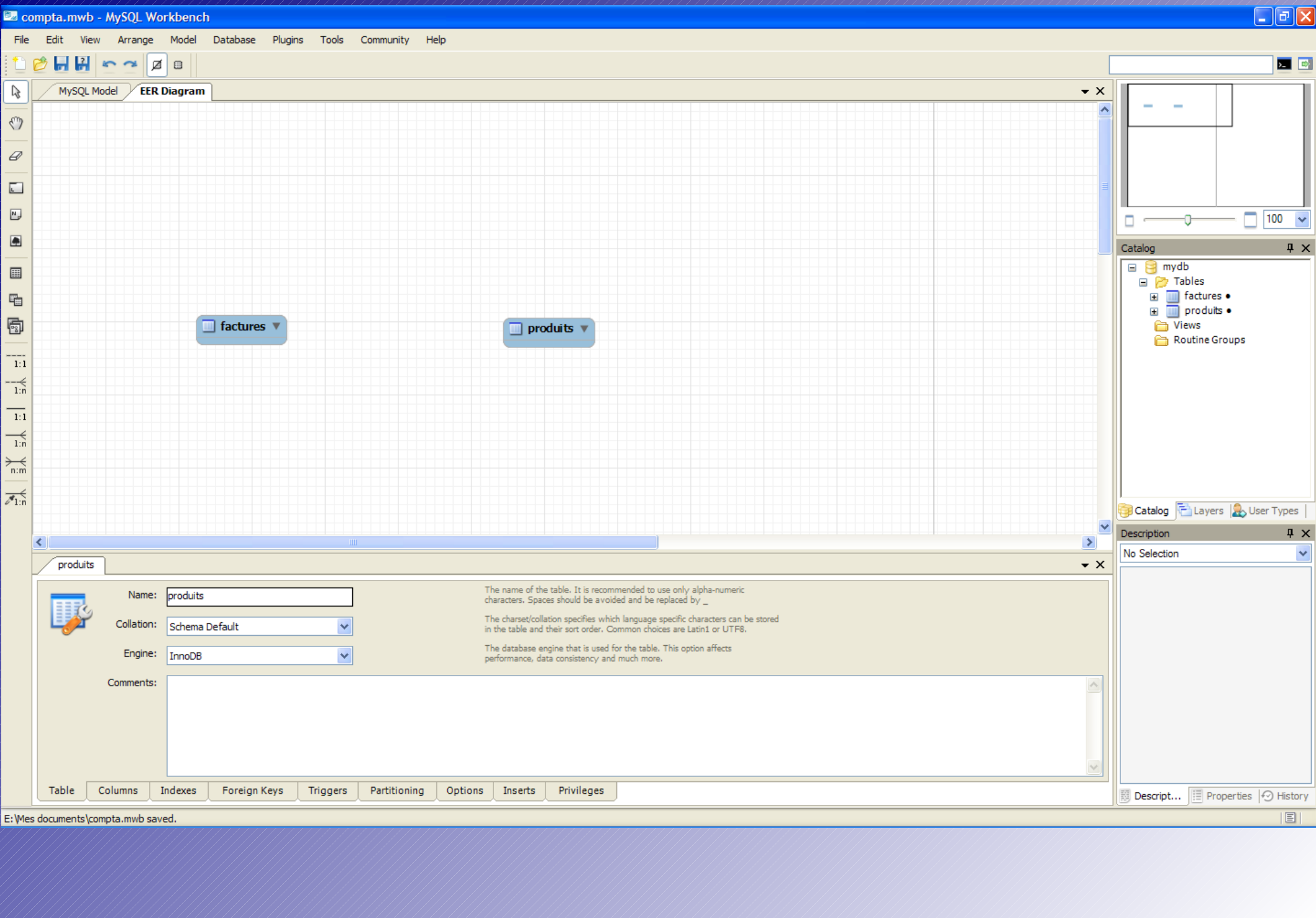
Comments:

The name of the table. It is recommended to use only alpha-numeric characters. Spaces should be avoided and be replaced by \_

The charset/collation specifies which language specific characters can be stored in the table and their sort order. Common choices are Latin1 or UTF8.

The database engine that is used for the table. This option affects performance, data consistency and much more.

- Table
- Columns
- Indexes
- Foreign Keys
- Triggers
- Partitioning
- Options
- Inserts
- Privileges



MySQL Model EER Diagram

factures

produits

Catalog

- mydb
  - Tables
    - factures
    - produits
  - Views
  - Routine Groups

Description

No Selection

produits



Name:

The name of the table. It is recommended to use only alpha-numeric characters. Spaces should be avoided and be replaced by \_

Collation:

The charset/collation specifies which language specific characters can be stored in the table and their sort order. Common choices are Latin1 or UTF8.

Engine:

The database engine that is used for the table. This option affects performance, data consistency and much more.

Comments:

- Table
- Columns
- Indexes
- Foreign Keys
- Triggers
- Partitioning
- Options
- Inserts
- Privileges

- Descript...
- Properties
- History







MySQL Model | EER Diagram

**EER Diagrams**

+ Add Diagram | EER Diagram

**Physical Schemata**

compta\_bd  
MySQL Schema

**Tables (2 items)**

+ Add Table | factures | produits

**Views (0 items)**

+ Add View

**Routines (0 items)**

+ Add Routine

**Routine Groups (0 items)**

+ Add Group

**Schema Privileges**

**SQL Scripts**

**Model Notes**

compta\_bd | produits

**compta\_bd**

Name:  The name of the schema. It is recommended to use only alpha-numeric characters. Spaces should be avoided and be replaced by \_

Collation:  Specifies which charset/collations the schema's tables will use if they do not have an explicit setting. Common choices are Latin1 or UTF8.

Comments:

Schema



**Catalog**

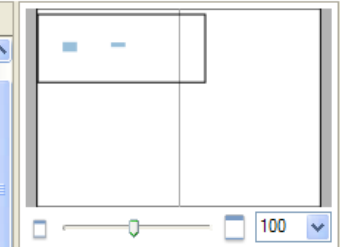
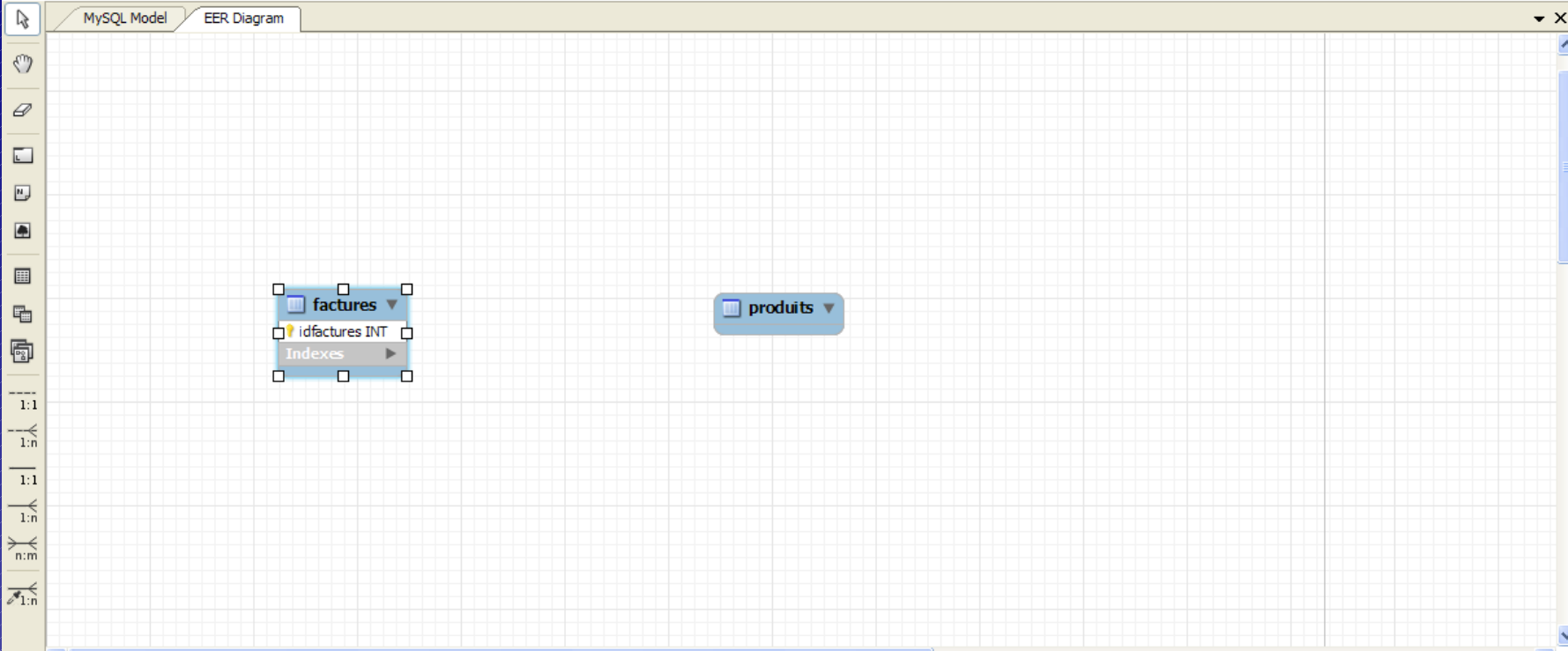
- compta\_bd
  - Tables
    - factures
    - produits
  - Views
  - Routine Groups

Catalog | Layers | User Types

**Description**

No Selection

Descript... | Properties | History



Catalog

- compta\_bd
  - Tables
    - factures
    - produits
  - Views
  - Routine Groups

Catalog Layers User Types

Description

factures: Table

Column Details

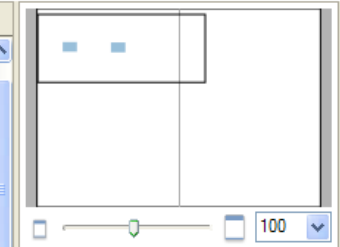
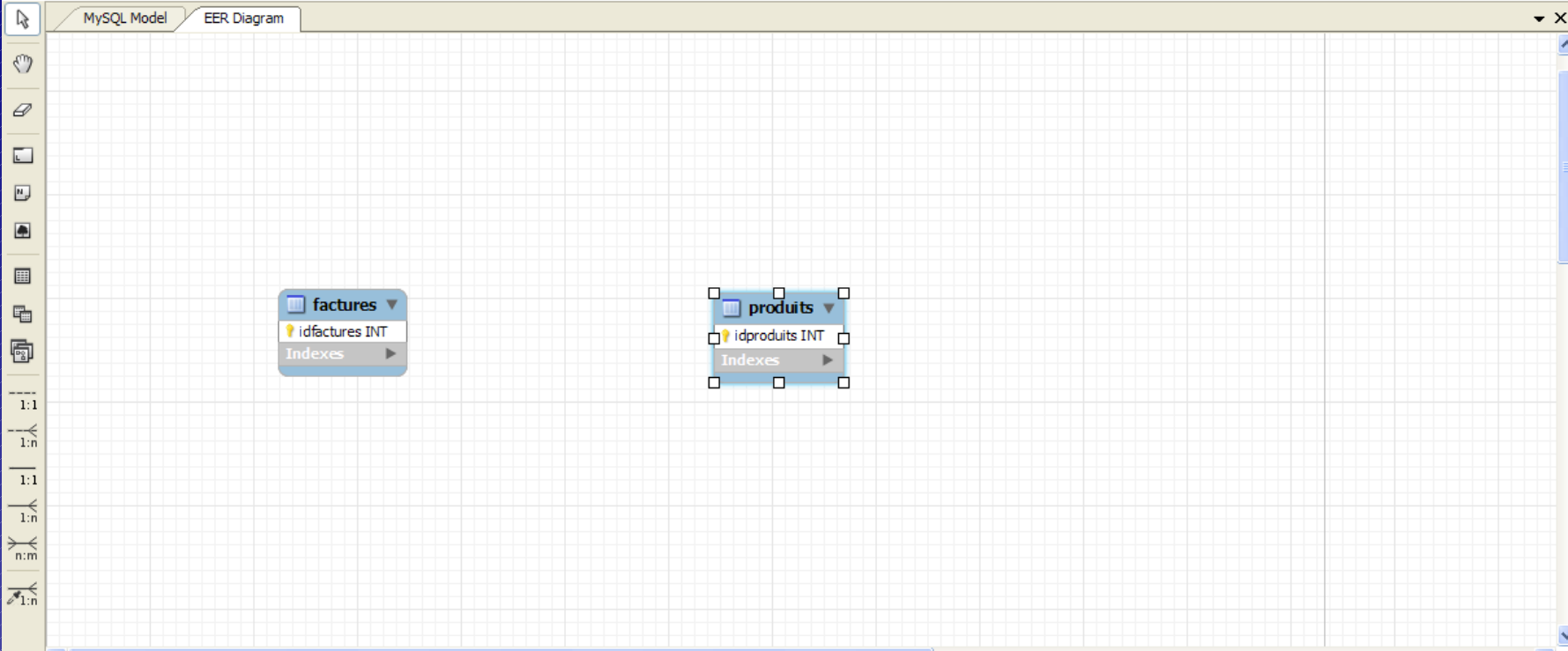
Collation: Table Default

Comments:

compta\_bd factures

Column Name	Datatype	PK	NN	BIN	UN	ZF	AI	Default
idfactures	INT	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges



Catalog

- compta\_bd
  - Tables
    - factures
    - produits
  - Views
  - Routine Groups

Catalog Layers User Types

Description

produits: Table

Column Details

Collation: Table Default

Comments:

compta\_bd produits

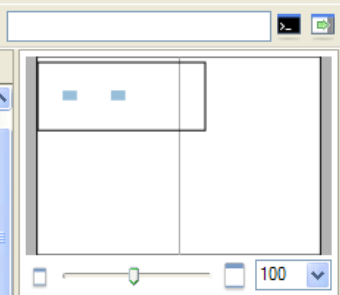
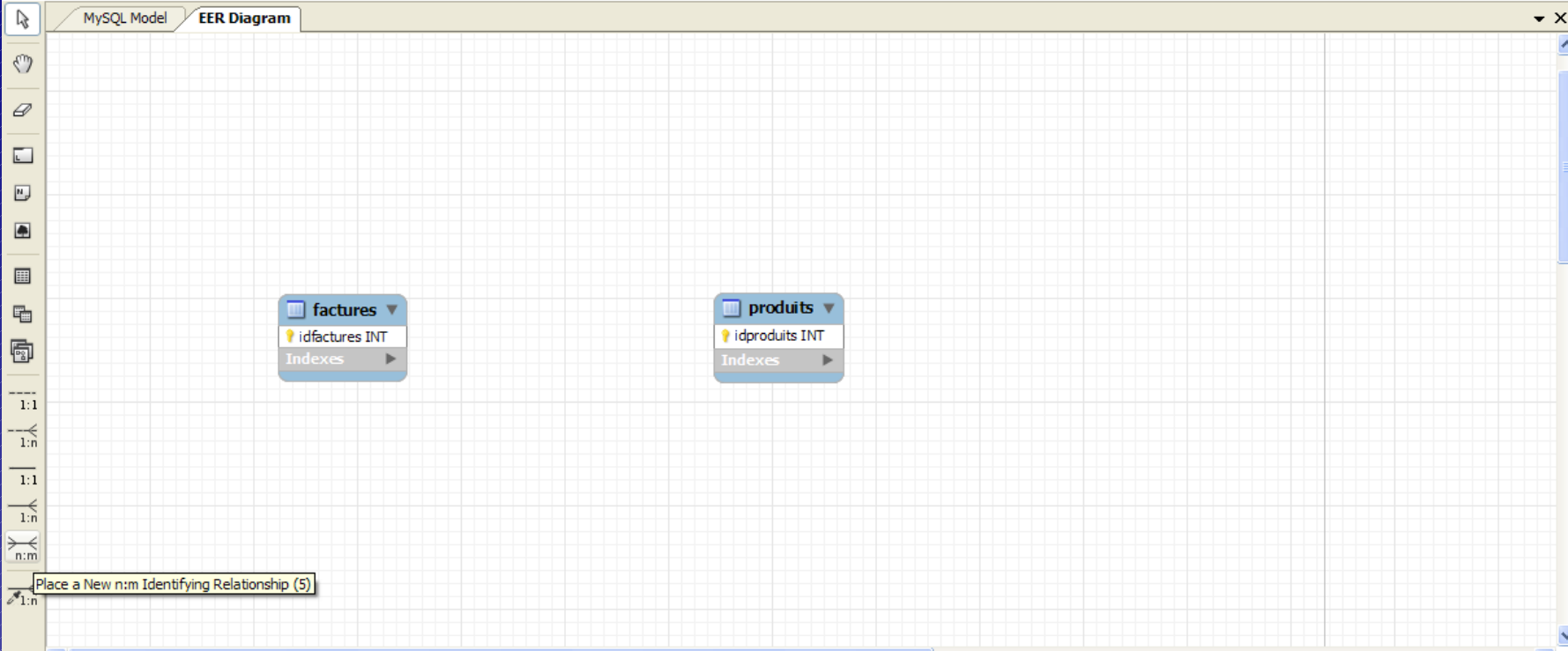
Column Name	Datatype	PK	NN	BIN	UN	ZF	AI	Default
idproduits	INT	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	

Column Details

Collation: Table Default

Comments:

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges



Catalog

- compta\_bd
  - Tables
    - factures
    - produits
  - Views
  - Routine Groups

Catalog Layers User Types

compta\_bd factures

Index Name	Type	Index Columns	Index Options								
PRIMARY	PRIMARY	<table border="1"><thead><tr><th>Column</th><th>#</th><th>Order</th><th>Length</th></tr></thead><tbody><tr><td><input checked="" type="checkbox"/> idfactures</td><td>1</td><td>ASC</td><td></td></tr></tbody></table>	Column	#	Order	Length	<input checked="" type="checkbox"/> idfactures	1	ASC		<p>Storage Type: <input type="text"/></p> <p>Key Block Size: <input type="text" value="0"/></p> <p>Parser: <input type="text"/></p> <p>Index Comment: <input type="text"/></p>
Column	#	Order	Length								
<input checked="" type="checkbox"/> idfactures	1	ASC									

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges

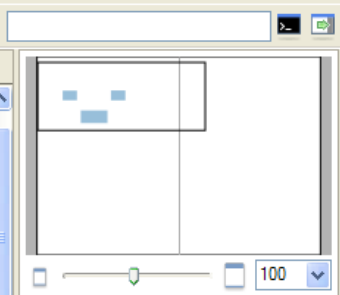
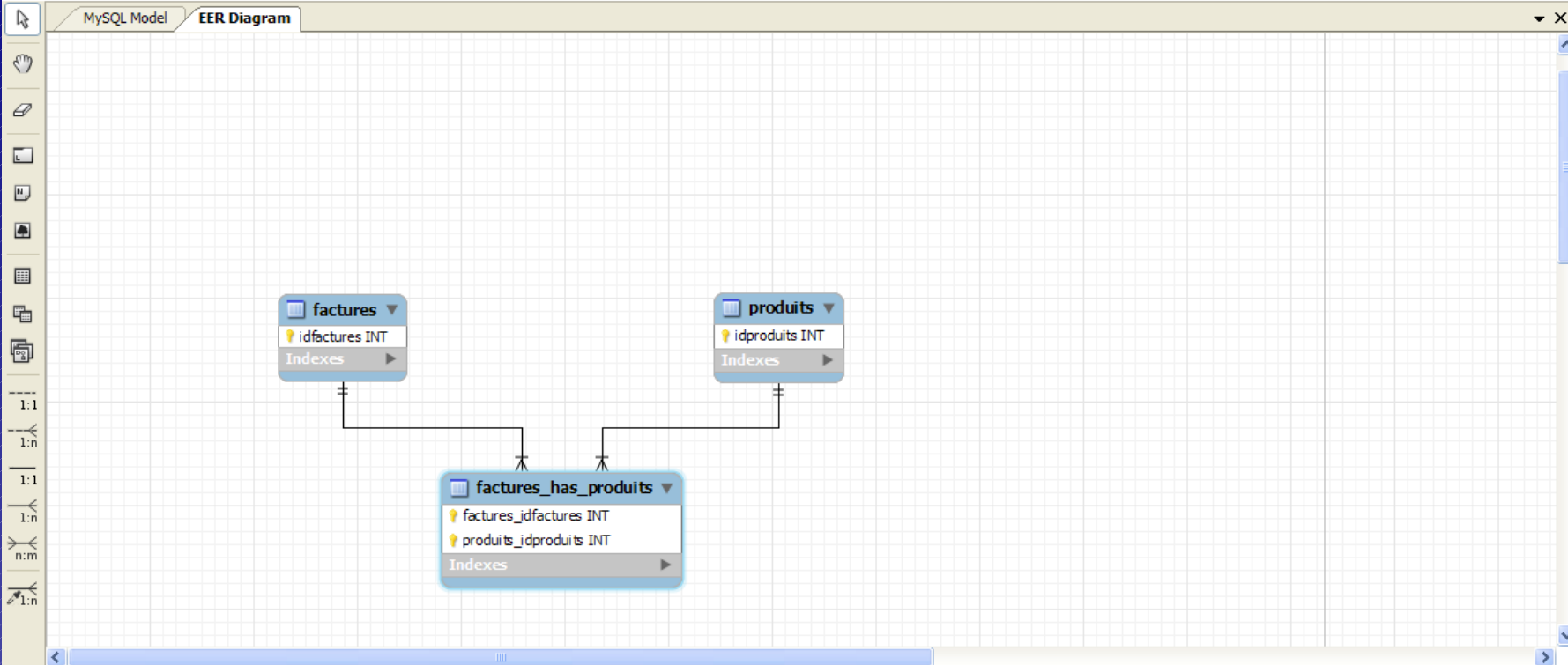
Description

No Selection

Descript... Properties History

Use the right mouse button on the index grid to bring up the popup menu.





Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_products
    - produits
  - Views
  - Routine Groups

Catalog Layers User Types

Description

factures\_has\_products: Table

Storage Type: [Dropdown]  
Key Block Size: 0  
Parser: [Text]  
Index Comment: [Text Area]

compta\_bd factures

Index Name	Type
PRIMARY	PRIMARY

Index Columns				
Column	#	Order	Length	
<input checked="" type="checkbox"/> idfactures	1	ASC		

Index Options

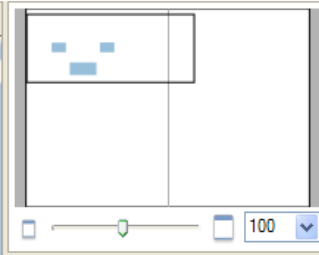
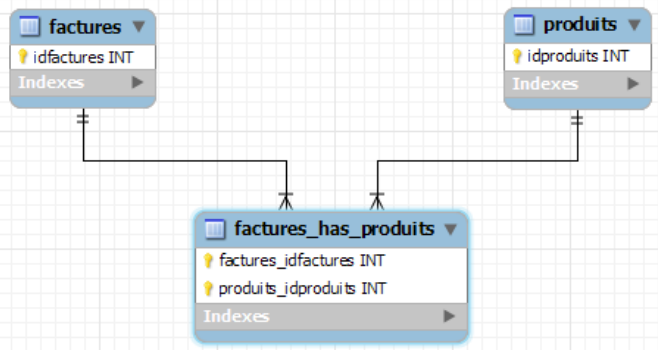
Storage Type: [Dropdown]  
Key Block Size: 0  
Parser: [Text]  
Index Comment: [Text Area]

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges

Descript... Properties History

Model menu options:

- Add Diagram (Ctrl+T)
- Create Diagram from Catalog Objects
- User Defined Types...
- Object Notation
- Relationship Notation
  - Crow's Foot (IE) [checked]
  - Classic
  - Connect to Columns
  - UML
  - IDEF1X
- Diagram Properties and Size...
- Model Options...



Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_products
    - produits
  - Views
  - Routine Groups

Description

factures\_has\_products: Table

compta\_bd factures

Index Name	Type
PRIMARY	PRIMARY

Index Columns				
Column	#	Order	Length	
<input checked="" type="checkbox"/> idfactures	1	ASC		

Index Options

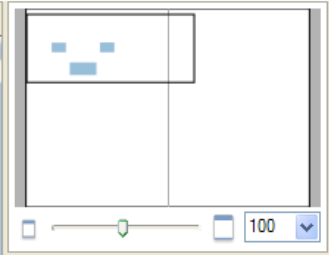
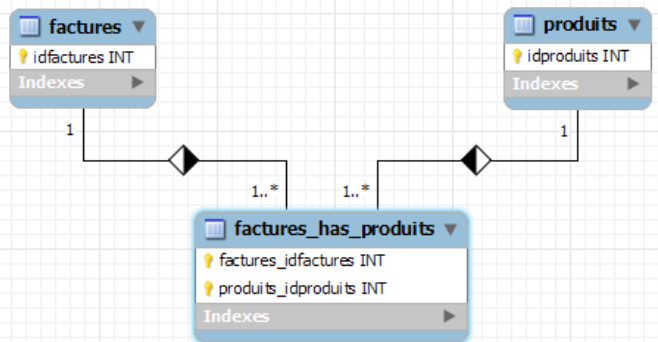
Storage Type: [dropdown]

Key Block Size: 0

Parser: [text box]

Index Comment: [text area]

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges



Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_produits
    - produits
  - Views
  - Routine Groups

compta\_bd factures

Index Name	Type
PRIMARY	PRIMARY

Index Columns				
Column	#	Order	Length	
<input checked="" type="checkbox"/> idfactures	1	ASC		

Index Options

Storage Type:

Key Block Size:

Parser:

Index Comment:

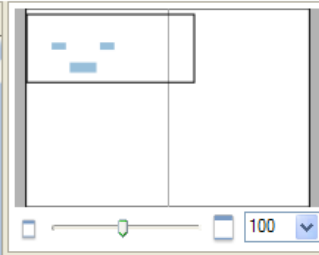
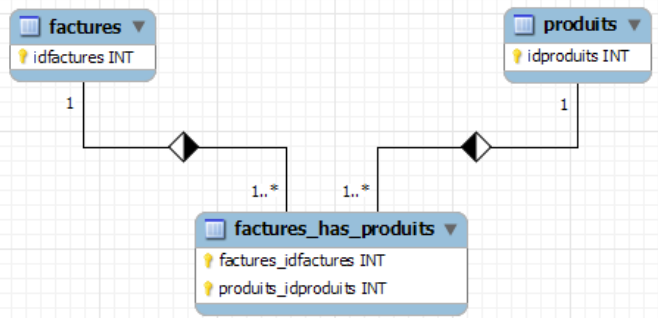
- Table
- Columns
- Indexes
- Foreign Keys
- Triggers
- Partitioning
- Options
- Inserts
- Privileges

Description

factures\_has\_produits: Table

- Descript...
- Properties
- History

- Add Diagram Ctrl+T
- Create Diagram from Catalog Objects
- User Defined Types...
- Object Notation
- Relationship Notation
- Diagram Properties and Size...
- Model Options...



Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_products
    - produits
  - Views
  - Routine Groups

compta\_bd factures

Index Name	Type
PRIMARY	PRIMARY

Index Columns				
Column	#	Order	Length	
<input checked="" type="checkbox"/> idfactures	1	ASC		

Index Options

Storage Type:

Key Block Size:

Parser:

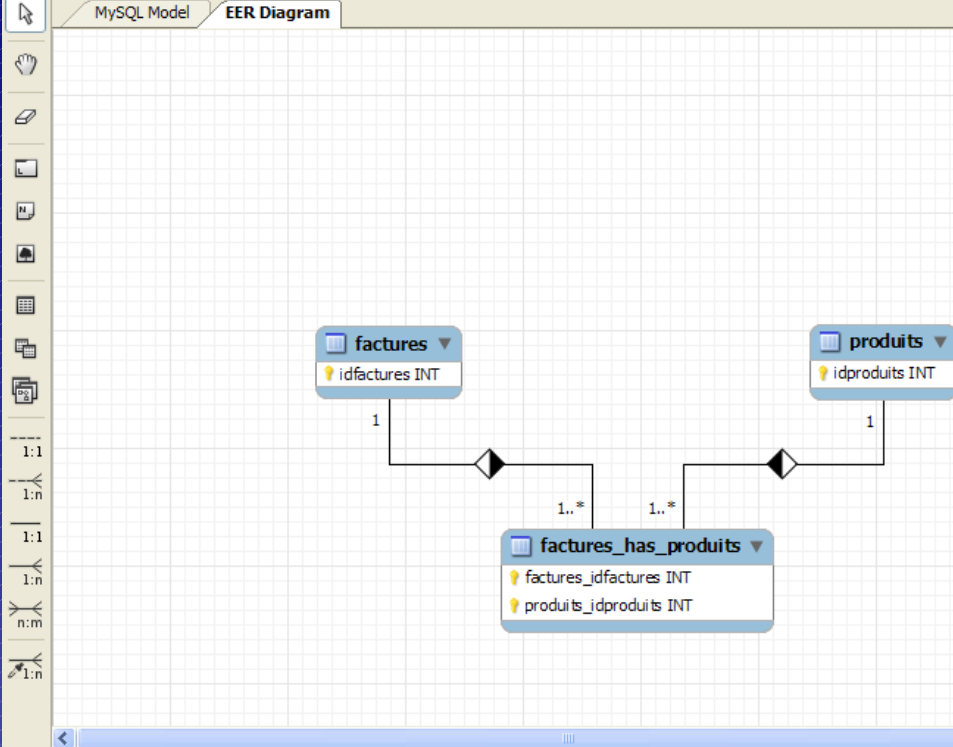
Index Comment:

- Table
- Columns
- Indexes
- Foreign Keys
- Triggers
- Partitioning
- Options
- Inserts
- Privileges

Description

No Selection

Descript... Properties History



### Model Options

Model: MySQL | Diagram

When Deleting Physical Model Figures in Diagram: Ask

Column Defaults

PK Name: id%table%      PK Type: INT

Column Name: %table%col      Column Type: VARCHAR(45)

Foreign Key/Relationship Defaults

FK Name: fk\_%stable%\_%dtable%      Column Name: %table%\_%column%

ON UPDATE: NO ACTION      ON DELETE: NO ACTION

Associative Table Name: %stable%\_has\_%dtable%      for n:m relationships

Use Global Settings

OK      Cancel

Index Name	Type	Index Columns	Index Options
PRIMARY	PRIMARY		
		Column      #      Order      Length	

Storage Type: [v]  
Key Block Size: 0  
Parser: [v]  
Index Comment: [v]

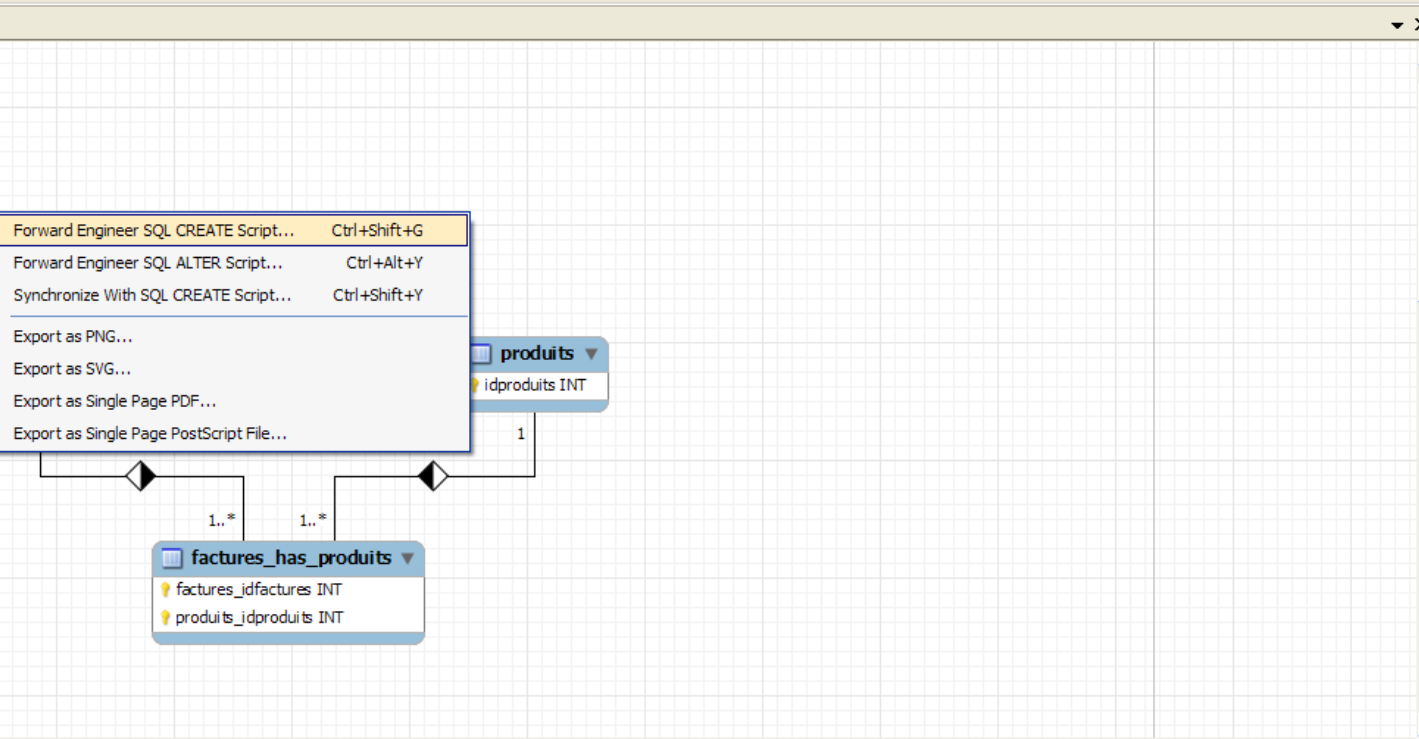


## II – Exemple de pro-ingéniérie (MRD ==> SQL)

1) Création du MRD à la souris

**2) Génération du script SQL de création de la base**

- New Ctrl+N
- Open... Ctrl+O
- Open Recent
- Close Tab Ctrl+W
- Save Ctrl+S
- Save As... Ctrl+Shift+S
- Import
- Export
  - Forward Engineer SQL CREATE Script... Ctrl+Shift+G
  - Forward Engineer SQL ALTER Script... Ctrl+Alt+Y
  - Synchronize With SQL CREATE Script... Ctrl+Shift+Y
  - Export as PNG...
  - Export as SVG...
  - Export as Single Page PDF...
  - Export as Single Page PostScript File...
- Page Setup...
- Print Preview...
- Print... Ctrl+P
- Print to PDF...
- Print to PS File...
- Document Properties...
- Exit



Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_products
    - produits
  - Views
  - Routine Groups

Description  
No Selection

compta\_bd factures

Index Name	Type	Index Columns	Index Options								
PRIMARY	PRIMARY	<table border="1"><thead><tr><th>Column</th><th>#</th><th>Order</th><th>Length</th></tr></thead><tbody><tr><td><input checked="" type="checkbox"/> idfactures</td><td>1</td><td>ASC</td><td></td></tr></tbody></table>	Column	#	Order	Length	<input checked="" type="checkbox"/> idfactures	1	ASC		<p>Storage Type: <input type="text"/></p> <p>Key Block Size: <input type="text" value="0"/></p> <p>Parser: <input type="text"/></p> <p>Index Comment: <input type="text"/></p>
Column	#	Order	Length								
<input checked="" type="checkbox"/> idfactures	1	ASC									

- Table
- Columns
- Indexes
- Foreign Keys
- Triggers
- Partitioning
- Options
- Inserts
- Privileges

Descript... Properties History

### Forward Engineer SQL Script

#### SQL Export Options

Filter Objects  
Review SQL Script

Output SQL Script File:

Leave blank to view generated script but not save to a file.

SQL Options

- Generate DROP Statements Before Each CREATE Statement
- Generate DROP SCHEMA
- Skip Creation of FOREIGN KEYS
- Omit Schema Qualifier in Object Names
- Generate Separate CREATE INDEX Statements
- Add SHOW WARNINGS After Every DDL Statement
- Do Not Create Users. Only Export Privileges
- Generate INSERT Statements for Tables

MySQL Model **EER Diagram**

compta\_bd factures

Index Name	Type
PRIMARY	PRIMARY

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges

100

Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_products
    - products
  - Views
  - Routine Groups

Description: No Selection

Options

Type:

Block Size:

Parser:

Comment:

Descript... Properties History

### Forward Engineer SQL Script

SQL Export Options

#### Filter Objects

Review SQL Script

#### SQL Object Export Filter

To exclude objects of a specific type from the SQL Export, disable the corresponding checkbox. Press Show Filter and add objects or patterns to the ignore list to exclude them from the export.

- Export MySQL Table Objects  
3 Total Objects, 3 Selected Show Filter
- Export MySQL View Objects  
0 Total Objects, 0 Selected Show Filter
- Export MySQL Routine Objects  
0 Total Objects, 0 Selected Show Filter
- Export MySQL Trigger Objects  
0 Total Objects, 0 Selected Show Filter
- Export User Objects  
0 Total Objects, 0 Selected Show Filter

Back Next Cancel

MySQL Model **EER Diagram**

compta\_bd factures

Index Name	Type
PRIMARY	PRIMARY

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges

100

Catalog

- compta\_bd
  - Tables
    - factures •
    - factures\_has\_products •
    - products •
  - Views
  - Routine Groups

Catalog Layers User Types

Description

No Selection

Options

Type:

Block Size:

Parser:

Comment

Descript... Properties History

**Forward Engineer SQL Script**

SQL Export Options

Filter Objects

Review SQL Script

**Review Generated Script**

Review and edit the generated script and press Finish to save.

```

CREATE SCHEMA IF NOT EXISTS `compta_bd` DEFAULT CHARACTER SET latin1 COLLATE latin1_spanish_ci ;
USE `compta_bd`;

-----
-- Table `compta_bd`.`factures`
-----
DROP TABLE IF EXISTS `compta_bd`.`factures` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`factures` (
  `idfactures` INT NOT NULL ,
  PRIMARY KEY (`idfactures`))
ENGINE = InnoDB;

-----
-- Table `compta_bd`.`produits`
-----
DROP TABLE IF EXISTS `compta_bd`.`produits` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`produits` (
  `idproduits` INT NOT NULL ,
  PRIMARY KEY (`idproduits`))
ENGINE = InnoDB;

-----
-- Table `compta_bd`.`factures_has_produits`
-----
DROP TABLE IF EXISTS `compta_bd`.`factures_has_produits` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`factures_has_produits` (
  `factures_idfactures` INT NOT NULL ,
  `produits_idproduits` INT NOT NULL ,
  PRIMARY KEY (`factures_idfactures`, `produits_idproduits`),
  INDEX `fk_factures_has_produits_factures` (`factures_idfactures` ASC),
  INDEX `fk_factures_has_produits_produits1` (`produits_idproduits` ASC),
  CONSTRAINT `fk_factures_has_produits_factures`
  FOREIGN KEY (`factures_idfactures`)
  REFERENCES `compta_bd`.`factures` (`idfactures`)
  ON DELETE NO ACTION
  ON UPDATE NO ACTION,
  CONSTRAINT `fk_factures_has_produits_produits1`
  FOREIGN KEY (`produits_idproduits`)
  REFERENCES `compta_bd`.`produits` (`idproduits`)
  ON DELETE NO ACTION
  ON UPDATE NO ACTION)
ENGINE = InnoDB;

```

Save to Other File... Copy to Clipboard

Back Finish Cancel

MySQL Model

EER Diagram

compta\_bd

factures

Index Name	Type
PRIMARY	PRIMARY

Table Columns Indexes Foreign Keys Triggers Partitioning Options Inserts Privileges

Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_produits
    - produits
  - Views
  - Routine Groups

Catalog Layers User Types

Description

No Selection

Options

Type: [ ]

Block Size: [ ]

Parser: [ ]

Comment



## III – Exemple de rétro-ingéniérie (SQL ==> MRD)

1) Modification de la base de données :

- soit directement depuis la console du serveur mysql
- soit à l'aide d'outils tels que PhpMyadmin
- soit avec Mysql Workbench (ou tout autre client Mysql), via une connexion odbc/jdbc à la base

2) Dump de la base pour créer le script sql de création de la base (mysqldump)

**3) Importation de ce fichier dump dans Mysql Workbench pour générer le MRD correspondant**

*Remarque : avec la version payante du logiciel, on peut éviter le dump, et faire simplement une re-synchronisation entre la base et le MRD*

```
compta_bd.sql - WordPad
Fichier Edition Affichage Insertion Format ?
[Icons]

SET @OLD_UNIQUE_CHECKS=@UNIQUE_CHECKS, UNIQUE_CHECKS=0;
SET @OLD_FOREIGN_KEY_CHECKS=@FOREIGN_KEY_CHECKS, FOREIGN_KEY_CHECKS=0;
SET @OLD_SQL_MODE=@SQL_MODE, SQL_MODE='TRADITIONAL';

CREATE SCHEMA IF NOT EXISTS `compta_bd` DEFAULT CHARACTER SET latin1 COLLATE latin1_spanish_ci ;
USE `compta_bd`;

-----
-- Table `compta_bd`.`factures`
-----
DROP TABLE IF EXISTS `compta_bd`.`factures` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`factures` (
  `idfactures` INT NOT NULL ,
  PRIMARY KEY (`idfactures`) )
ENGINE = InnoDB;

-----
-- Table `compta_bd`.`produits`
-----
DROP TABLE IF EXISTS `compta_bd`.`produits` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`produits` (
  `idproduits` INT NOT NULL ,
  PRIMARY KEY (`idproduits`) )
ENGINE = InnoDB;

-----
-- Table `compta_bd`.`factures_has_products`
-----
DROP TABLE IF EXISTS `compta_bd`.`factures_has_products` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`factures_has_products` (
  `factures_idfactures` INT NOT NULL ,
  `produits_idproduits` INT NOT NULL ,
  PRIMARY KEY (`factures_idfactures`, `produits_idproduits`) ,
  INDEX `fk_factures_has_products_factures` (`factures_idfactures` ASC) ,
  INDEX `fk_factures_has_products_produits1` (`produits_idproduits` ASC) ,
  CONSTRAINT `fk_factures_has_products_factures`
    FOREIGN KEY (`factures_idfactures`)
      REFERENCES `compta_bd`.`factures` (`idfactures` )
)
ENGINE = InnoDB;

Appuyez sur F1 pour obtenir de l'aide
```





```
compta_bd.sql - WordPad
Fichier Edition Affichage Insertion Format ?

CREATE SCHEMA IF NOT EXISTS `compta_bd` DEFAULT CHARACTER SET latin1 COLLATE latin1_spanish_ci ;
USE `compta_bd`;

-----
-- Table `compta_bd`.`factures`
-----
DROP TABLE IF EXISTS `compta_bd`.`factures` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`factures` (
  `idfactures` INT NOT NULL ,
  PRIMARY KEY (`idfactures`) )
ENGINE = InnoDB;

-----
-- Table `compta_bd`.`produits`
-----
DROP TABLE IF EXISTS `compta_bd`.`produits` ;

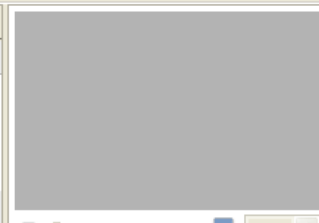
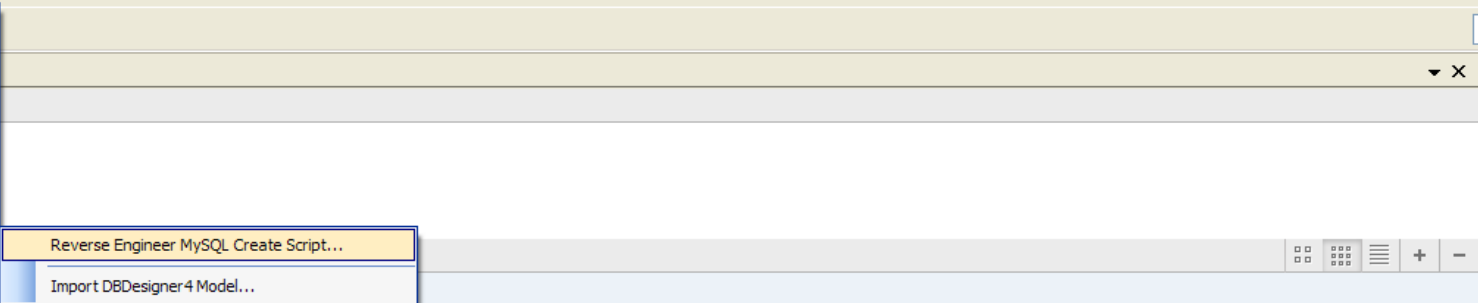
CREATE TABLE IF NOT EXISTS `compta_bd`.`produits` (
  `idproduits` INT NOT NULL ,
  nom varchar(100),
  prix int,
  PRIMARY KEY (`idproduits`) )
ENGINE = InnoDB;

-----
-- Table `compta_bd`.`factures_has_products`
-----
DROP TABLE IF EXISTS `compta_bd`.`factures_has_products` ;

CREATE TABLE IF NOT EXISTS `compta_bd`.`factures_has_products` (
  `factures_idfactures` INT NOT NULL ,
  `produits_idproduits` INT NOT NULL ,
  PRIMARY KEY (`factures_idfactures`, `produits_idproduits`) ,
  INDEX `fk_factures_has_products_factures` (`factures_idfactures` ASC) ,
  INDEX `fk_factures_has_products_products1` (`produits_idproduits` ASC) ,
  CONSTRAINT `fk_factures_has_products_factures`
  FOREIGN KEY (`factures_idfactures`)
  REFERENCES `compta_bd`.`factures` (`idfactures`)
  ON DELETE NO ACTION
```

Appuyez sur F1 pour obtenir de l'aide

- New Ctrl+N
- Open... Ctrl+O
- Open Recent
- Close Tab Ctrl+W
- Save Ctrl+S
- Save As... Ctrl+Shift+S
- Import
  - Reverse Engineer MySQL Create Script...
  - Import DBDesigner4 Model...
- Export
- Page Setup...
- Print Preview...
- Print... Ctrl+P
- Print to PDF...
- Print to PS File...
- Document Properties...
- Exit



Catalog

- mydb
  - Tables
  - Views
  - Routine Groups

**Routines** (0 items)

Add Routine

**Routine Groups** (0 items)

Add Group

**Schema Privileges**

**SQL Scripts**

**Model Notes**

Catalog Layers User Types

Description

No Selection

Descript... Properties History



MySQL Model

EER Diagrams



Add Diagram

Physical Schemata

**mydb**  
MySQL Schema

Tables (0 items)

Add Table

Views (0 items)

Add View

Routines (0 items)

Add Routine

Routine Groups (0 items)

Add Group

Schema Privileges

SQL Scripts

Model Notes

### Reverse Engineer SQL Script

Reverse Engineer

Results

Select the script containing the schemata to reverse engineer

Select SQL script file:

File encoding:

Place imported objects on a diagram

Back    Execute >    Cancel

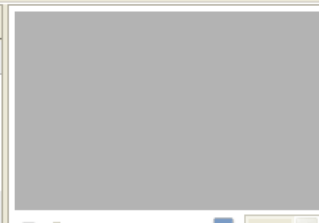
### Ouvrir

Regarder dans : Bureau

Mes documents	INFO
Poste de travail	MANUAL (from php.net)
Favoris réseau	MesDoc
A CLASSER	PARC INFO
a transfer sur E	PERSO
DIDAC	REFCARDZ
AFAIRE (TODO)	RESOURCES
AJETER	SOFT
AUDIO	TOBESAVED
Chants	Touch_Diamond Mes documents
<b>compta_bd.sql</b>	WORK
DISQUES	XAMPP htdocs
EBOOKS	
EN COURS	
IMPORTANT	

Nom du fichier :

Fichiers de type :



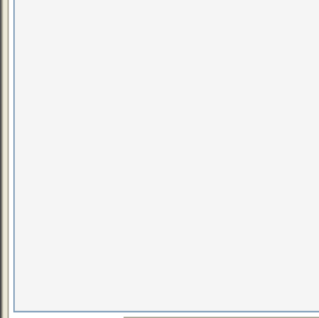
### Catalog

- mydb
  - Tables
  - Views
  - Routine Groups

Catalog Layers User Types

Description

No Selection



Descript... Properties History



MySQL Model

EER Diagrams



Add Diagram

Physical Schemata

**mydb**  
MySQL Schema

Tables (0 items)

Add Table

Views (0 items)

Add View

Routines (0 items)

Add Routine

Routine Groups (0 items)

Add Group

Schema Privileges

SQL Scripts

Model Notes

### Reverse Engineer SQL Script

Input and Options

Reverse Engineer

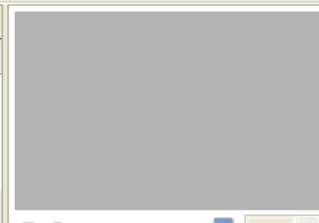
Results

Select the script containing the schemata to reverse engineer

Select SQL script file:

File encoding:

Place imported objects on a diagram



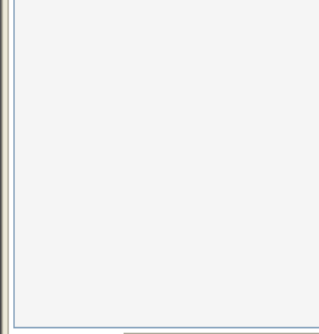
Catalog

- mydb
  - Tables
  - Views
  - Routine Groups

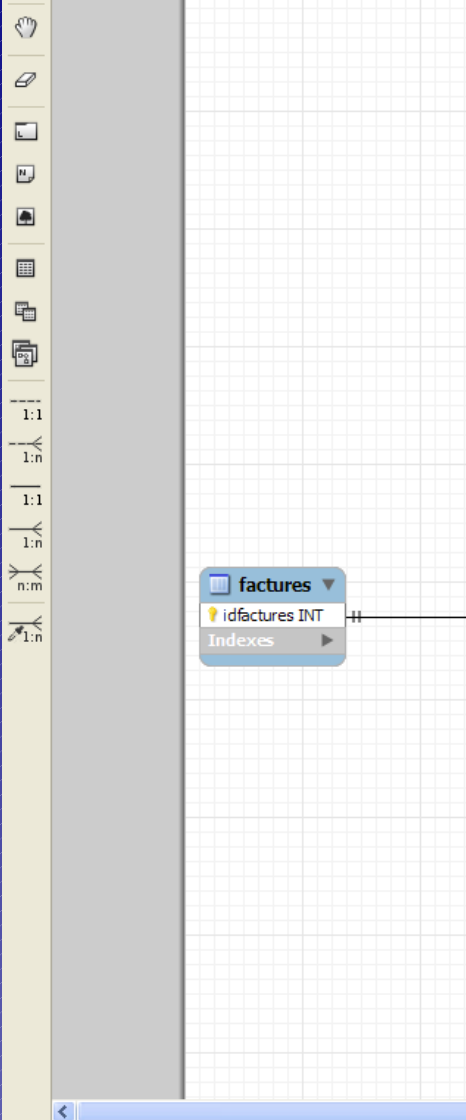
Catalog Layers User Types

Description

No Selection



Descript... Properties History



### Reverse Engineer SQL Script

Input and Options

**Reverse Engineer**

Results

#### Reverse Engineering Progress

The following tasks will now be executed. Please monitor the execution. Press Show Logs to see the execution logs.

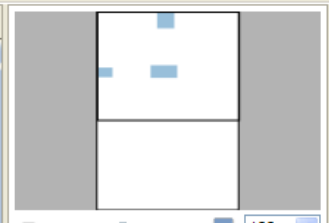
- Reverse Engineer SQL Script
- Verify Results
- Place Objects on Diagram

Import finished.  
Finished parsing MySQL SQL script.

**Message Log**

```
Started parsing MySQL SQL script.  
Created MySQL Schema: compta_bd  
Created MySQL Table: compta_bd.factures  
Created MySQL Table: compta_bd.produits  
Created MySQL Table: compta_bd.factures_has_produits  
Finished parsing MySQL SQL script. Totally processed statements: successful (7), errors (0), warnings (0).
```

Buttons: Hide Logs, Back, Next, Cancel



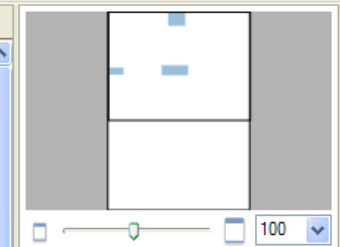
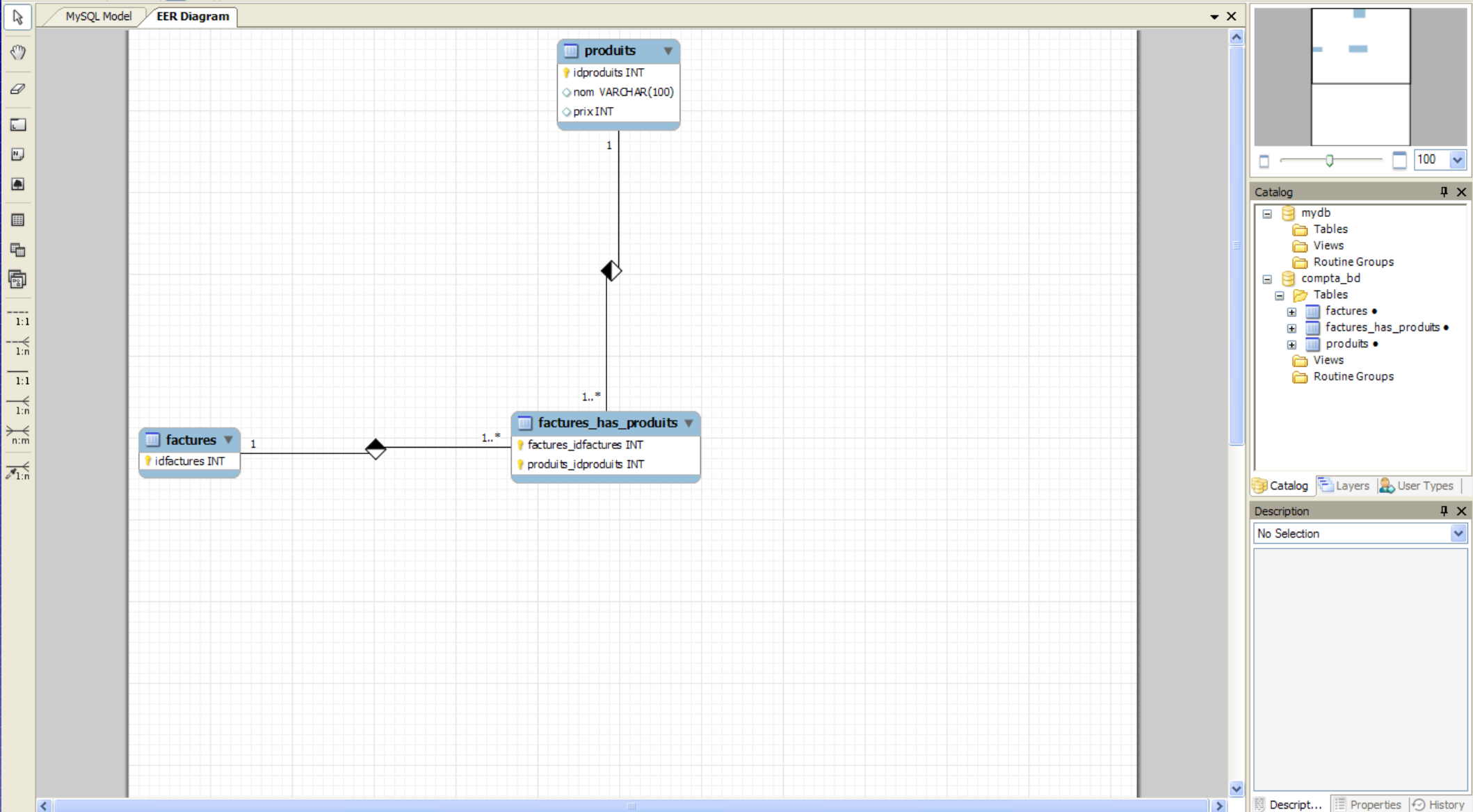
### Catalog

- mydb
  - Tables
  - Views
  - Routine Groups
- compta\_bd
  - Tables
    - factures
    - factures\_has\_produits
    - produits
  - Views
  - Routine Groups

### Description

No Selection





Catalog

- mydb
  - Tables
  - Views
  - Routine Groups
- compta\_bd
  - Tables
    - factures
    - factures\_has\_products
    - produits
  - Views
  - Routine Groups

Description

No Selection

# IV – Autres fonctionnalités

- Manage Connections...
- Reverse Engineer... Ctrl+R
- Forward Engineer... Ctrl+G
- Synchronize Model... Ctrl+Y
- Generate Catalog Diff Report...

EER Diagrams

PHYSICAL

Add Diagram EER Diagram

Physical Schemata

mydb MySQL Schema

compta\_bd MySQL Schema

Tables (0 items)

Add Table

Views (0 items)

Add View

Routines (0 items)

Add Routine

Routine Groups (0 items)

Add Group

Schema Privileges

SQL Scripts

Model Notes

produits

Name:

Collation:

Engine:

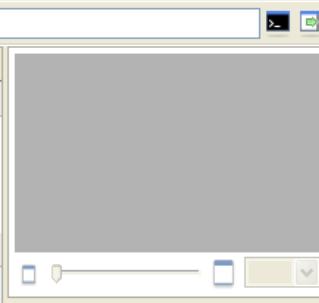
Comments:

The name of the table. It is recommended to use only alpha-numeric characters. Spaces should be avoided and be replaced by \_

The charset/collation specifies which language specific characters can be stored in the table and their sort order. Common choices are Latin1 or UTF8.

The database engine that is used for the table. This option affects performance, data consistency and much more.

- Table
- Columns
- Indexes
- Foreign Keys
- Triggers
- Partitioning
- Options
- Inserts
- Privileges



Catalog

- mydb
  - Tables
  - Views
  - Routine Groups
- compta\_bd
  - Tables
    - factures
    - factures\_has\_products
    - produits
  - Views
  - Routine Groups

Catalog Layers User Types

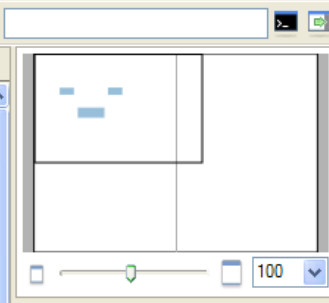
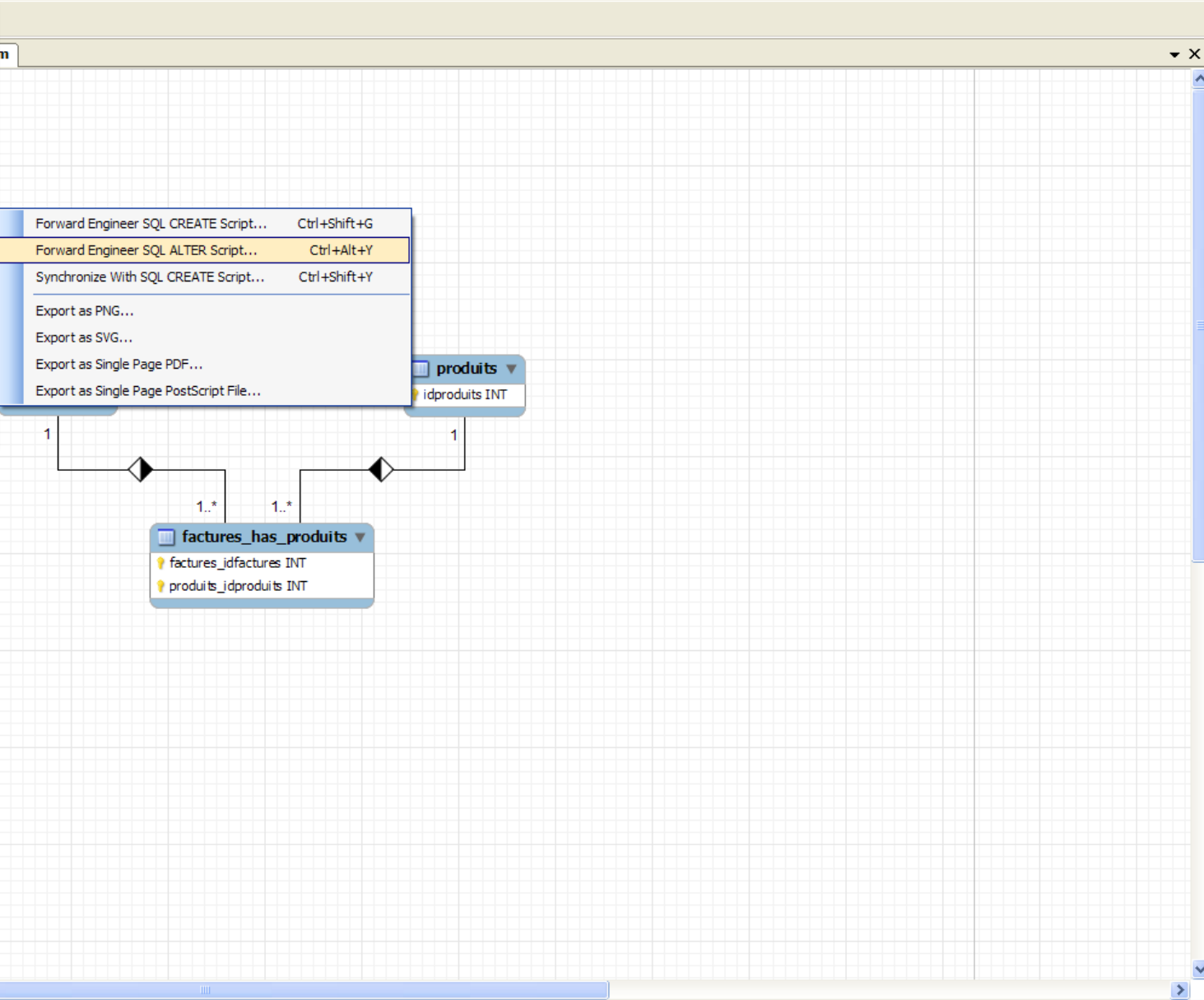
Description

produits: Table

Description area for the selected table.

Description Properties History

- New Ctrl+N
- Open... Ctrl+O
- Open Recent
- Close Tab Ctrl+W
- Save Ctrl+S
- Save As... Ctrl+Shift+S
- Import
- Export
  - Forward Engineer SQL CREATE Script... Ctrl+Shift+G
  - Forward Engineer SQL ALTER Script... Ctrl+Alt+Y
  - Synchronize With SQL CREATE Script... Ctrl+Shift+Y
  - Export as PNG...
  - Export as SVG...
  - Export as Single Page PDF...
  - Export as Single Page PostScript File...
- Page Setup...
- Print Preview...
- Print... Ctrl+P
- Print to PDF...
- Print to PS File...
- Document Properties...
- Exit



Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_produits
    - produits
  - Views
  - Routine Groups

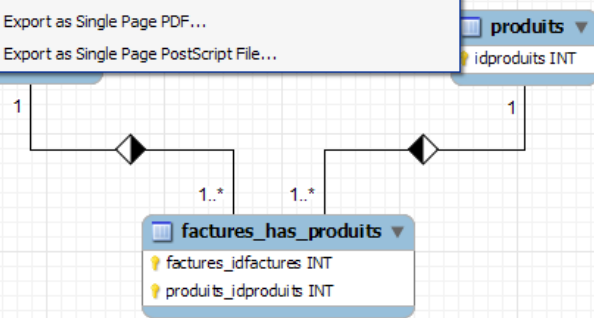
Description

No Selection

Descript... Properties History

- New Ctrl+N
- Open... Ctrl+O
- Open Recent
- Close Tab Ctrl+W
- Save Ctrl+S
- Save As... Ctrl+Shift+S
- Import
- Export
- Page Setup...
- Print Preview...
- Print... Ctrl+P
- Print to PDF...
- Print to PS File...
- Document Properties...
- Exit

- Forward Engineer SQL CREATE Script... Ctrl+Shift+G
- Forward Engineer SQL ALTER Script... Ctrl+Alt+Y
- Synchronize With SQL CREATE Script... Ctrl+Shift+Y
- Export as PNG...
- Export as SVG...
- Export as Single Page PDF...
- Export as Single Page PostScript File...



Catalog

- compta\_bd
  - Tables
    - factures
    - factures\_has\_produits
    - produits
  - Views
  - Routine Groups

Description

No Selection