

Peregrine

AssetCenter

Cable and Circuit



© Copyright 2002 Peregrine Systems, Inc. or its subsidiaries.

All Rights Reserved.

Information contained in this document is proprietary to Peregrine Systems, Incorporated, and may be used or disclosed only with written permission from Peregrine Systems, Inc. This manual, or any part thereof, may not be reproduced without the prior written permission of Peregrine Systems, Inc. This document refers to numerous products by their trade names. In most, if not all, cases these designations are claimed as Trademarks or Registered Trademarks by their respective companies.

Peregrine Systems® and AssetCenter® are trademarks of Peregrine Systems, Inc. or its subsidiaries.

This document and the related software described in this manual are supplied under license or nondisclosure agreement and may be used or copied only in accordance with the terms of the agreement. The information in this document is subject to change without notice and does not represent a commitment on the part of Peregrine Systems, Inc. Contact Peregrine Systems, Inc., Customer Support to verify the date of the latest version of this document.

The names of companies and individuals used in the sample database and in examples in the manuals are fictitious and are intended to illustrate the use of the software. Any resemblance to actual companies or individuals, whether past or present, is purely coincidental.

This product includes software developed by the Apache Software Foundation (<http://www.apache.org>).

This edition applies to version 4.1.0 of the licensed program

AssetCenter

Peregrine Systems, Inc.  
Worldwide Corporate Campus and Executive Briefing Center  
3611 Valley Centre Drive San Diego, CA 92130  
Tel 800.638.5231 or 858.481.5000  
Fax 858.481.1751  
[www.peregrine.com](http://www.peregrine.com)



# Table of Contents

---

<b>Introduction (Cable and Circuit)</b> . . . . .	<b>13</b>
Who is the Cable and Circuit module intended for? . . . . .	13
What does the Cable and Circuit module do? . . . . .	14
How to use this guide . . . . .	15
<b>Chapter 1. Overview (Cable and Circuit)</b> . . . . .	<b>19</b>
Areas covered by the Cable and Circuit module . . . . .	19
Principal concepts . . . . .	21
<b>Chapter 2. Presentation of the practical case (Cable and Circuit)</b> . . . . .	<b>25</b>
<b>Chapter 3. Implementing cable management (Cable and Circuit)</b> . . . . .	<b>29</b>
Preliminary steps . . . . .	29
Cable-device types . . . . .	32
Creating cable device types . . . . .	32
Creating the cable device types for the practical case . . . . .	32
Cable types . . . . .	33
Creating cable types . . . . .	33
Creating the cable types for the practical case . . . . .	34
Cable roles . . . . .	34
Creating cable roles . . . . .	34

Creating the cable roles for the practical case . . . . .	35
Colors to use for the color codes . . . . .	35
Creating colors . . . . .	35
Creating the colors for the practical case . . . . .	36
Color codes . . . . .	38
Creating color codes . . . . .	39
Creating the color codes for the practical case . . . . .	40
Label rules . . . . .	42
Creating label rules . . . . .	44
Creating the label rules for the practical case . . . . .	46
Types of pairs and conductors . . . . .	46
Creating pair/conductor types . . . . .	47
Creating the pair/conductor types for the practical case . . . . .	48
Connection types . . . . .	48
Creating connection types . . . . .	49
Creating the connection types for the practical case . . . . .	50
Cable duties . . . . .	51
Creating cable duties manually . . . . .	52
Creating the cable duties manually for the practical case . . . . .	53
Locations . . . . .	53
Creating the locations for the practical case . . . . .	54
Projects and work orders associated with cabling . . . . .	55
Creating projects and work orders associated to the Cable and Circuit module . . . . .	56
Creating the projects and work orders for the practical case . . . . .	57
Natures for cables and cable devices . . . . .	59
Creating the natures of cables and cable devices . . . . .	60
Creating the natures of cables and cable devices for the practical case . . . . .	61
Brands of cable and cable device models . . . . .	62
Creating the brands of the cable and cable device models . . . . .	62
Creating the brands of the cable and cable device models for the practical case . . . . .	62
Cable models . . . . .	63
Creating cable models . . . . .	63
<b>Create pairs</b> wizard . . . . .	65
Creating the cable models for the practical case . . . . .	67
Cable device models without slots. . . . .	68
Creating the models of cable devices without slots . . . . .	68
<b>Create ports</b> wizard . . . . .	70
Creating the models of cable devices without slots for the practical case . . . . .	72
Slot types . . . . .	74
Creating slot types . . . . .	76
Creating the slot types for the practical case . . . . .	76
Cable device models with slots. . . . .	77

Creating the models of cable devices with slots . . . . .	77
<b>Create slots</b> wizard . . . . .	79
Creating the models of cable devices with slots for the practical case . . . . .	81
Topologies . . . . .	81
Creating topologies . . . . .	83
Creating the topologies for the practical case . . . . .	85
Topology groups . . . . .	89
Creating topology groups . . . . .	91
Creating the topology groups for the practical case . . . . .	92
Termination-field configurations . . . . .	93
Creating termination-field configurations . . . . .	99
Creating the termination-field configurations for the practical case . . . . .	101
<b>Chapter 4. Termination fields . . . . .</b>	<b>105</b>
<b>Create a termination field</b> wizard . . . . .	107
Use the <b>Create a termination field</b> wizard for the practical case. . . . .	112
<b>Expand termination field</b> wizard . . . . .	113
Using the <b>Expand termination field</b> wizard in the practical case . . . . .	118
<b>Duplicate wiring closet</b> wizard . . . . .	119
Use the <b>Duplicate wiring closet</b> wizard for the practical case. . . . .	125
<b>Chapter 5. Cable devices, cables and connections - manual creation . . . . .</b>	<b>127</b>
Cable devices - manual creation . . . . .	128
Creating cable devices manually . . . . .	134
Creating the cable devices manually for the practical case . . . . .	138
Cables - manual creation . . . . .	140
Creating cables manually . . . . .	140
Creating the cables manually for the practical case . . . . .	142
Connections - manual creation . . . . .	143
Simplified data model . . . . .	144
Creating connections manually . . . . .	149
Creating the connections manually for the practical case . . . . .	152
<b>Chapter 6. Connections - creation with the wizards . . . . .</b>	<b>155</b>
<b>Run riser cables</b> wizard . . . . .	155
Use the <b>Run riser cables</b> wizard. . . . .	157
Use the <b>Run riser cables</b> wizard for the practical case. . . . .	168
<b>Run lateral cables</b> wizard . . . . .	170
Use the <b>Run lateral cables</b> wizard. . . . .	171
Use the <b>Run lateral cables</b> wizard for the practical case. . . . .	179
<b>Cross connect bundles</b> wizard . . . . .	180
Use the <b>Cross connect bundles</b> wizard. . . . .	181

Use the <b>Cross connect bundles</b> wizard for the practical case. . . . .	188
<b>Chapter 7. Viewing the traces</b> . . . . .	<b>191</b>
<b>Cable cross-connections</b> wizard . . . . .	192
Use the <b>Cable cross-connections</b> wizard. . . . .	192
<b>Device cross-connections</b> wizard . . . . .	194
Use the <b>Device cross-connections</b> wizard. . . . .	195
<b>Display device traces</b> wizard . . . . .	196
Use the <b>Display device traces</b> wizard. . . . .	197
<b>Display cable traces</b> wizard . . . . .	198
Use the <b>Display cable traces</b> wizard. . . . .	199
<b>Chapter 8. Glossary (Cable and Circuit)</b> . . . . .	<b>201</b>
AssetCenter key terms (Cable and Circuit) . . . . .	201
Pin/ Terminal . . . . .	201
Cable . . . . .	202
Trace . . . . .	202
Color code . . . . .	203
Column . . . . .	205
Trace output . . . . .	205
Termination-field configuration . . . . .	206
Cable device . . . . .	206
Slot . . . . .	207
Color code entry . . . . .	209
Topology step . . . . .	209
Label . . . . .	209
Bundle . . . . .	211
Function . . . . .	211
Topology group . . . . .	212
Host . . . . .	212
Cross connection . . . . .	213
Cable link . . . . .	213
Line . . . . .	213
Ring . . . . .	213
Pair/conductor . . . . .	214
Tip . . . . .	214
Port . . . . .	214
Label rule . . . . .	215
Termination field . . . . .	215
Role . . . . .	216
Sequence . . . . .	217
Terminal . . . . .	217

Topology . . . . .	217
Cable type . . . . .	218
Connection type . . . . .	218
Cable device type . . . . .	219
Pair/Conductor type . . . . .	219
Slot type . . . . .	220
User . . . . .	220
Key terms of the profession (Cable and Circuit) . . . . .	221
Adapter . . . . .	221
Rack . . . . .	223
Punchdown block . . . . .	224
Chassis . . . . .	224
Cabling path . . . . .	224
Converter . . . . .	225
Vertical distribution . . . . .	225
Lateral distribution . . . . .	226
Hub . . . . .	228
Jumper/ Patch cord . . . . .	229
Length . . . . .	229
Patch panel . . . . .	229
Wall outlet . . . . .	230
Main termination field . . . . .	230
Repeater . . . . .	230
Riser . . . . .	231
Router . . . . .	231
Wallfield . . . . .	231
Switch . . . . .	231
Run (a cable) . . . . .	232
Run . . . . .	233
<b>Chapter 9. References (Cable and Circuit) . . . . .</b>	<b>235</b>
Menus and tabs (Cable and Circuit) . . . . .	235
Toolbar icons (Cable and Circuit) . . . . .	244
Interface options (Cable and Circuit) . . . . .	244
Tables (Cable and Circuit) . . . . .	245
Interdependence of tables used in cable management (Cable and Circuit) . . . . .	250
Itemized lists (Cable and Circuit) . . . . .	254
Calculated fields (Cable and Circuit) . . . . .	254
Counters (Cable and Circuit) . . . . .	255
Actions and wizards (Cable and Circuit) . . . . .	256
Modules of the AssetCenter Server (Cable and Circuit) . . . . .	260
<b>System data and Line-of-business data</b> (Cable and Circuit) . . . . .	260
Reports and forms (Cable and Circuit) . . . . .	262

Automatic actions (Cable and Circuit) . . . . .	263
APIs (Cable and Circuit) . . . . .	263
Views (Cable and Circuit) . . . . .	263
Other sources of information (Cable and Circuit) . . . . .	264



# List of Figures

---

1.1. Cable and Circuit module - area of coverage . . . . .	21
2.1. Practical case - locations to use . . . . .	26
2.2. Practical case - network to use . . . . .	27
3.1. Color codes - data model . . . . .	39
3.2. Labels and label rules - data model . . . . .	43
3.3. Cable label - example . . . . .	44
3.4. Pair/conductor types - data model . . . . .	47
3.5. Duties - data model . . . . .	52
3.6. Practical case - locations to use . . . . .	54
3.7. Cables and cable devices - data model . . . . .	60
3.8. Slots - data model . . . . .	75
3.9. Topologies - data model . . . . .	83
3.10. Topology groups - data model . . . . .	90
3.11. Topologies - correspondence between the termination field of a network . . . . .	91
3.12. Termination-field configuration - data model . . . . .	94
3.13. Example of termination-field configuration - representation in AssetCenter . . . . .	95
3.14. Example of termination-field configuration - correspondence at the termination field level . . . . .	96
3.15. Termination-field configuration - example of the impact resulting from changing the starting position . . . . .	96

3.16. Termination-field configuration - example of the impact resulting from changing the cable device and role orientations . . . . .	97
3.17. Termination-field configuration - example of the impact resulting from changing the flow specification . . . . .	97
3.18. Termination-field configuration - signification of the starting positions . . . . .	98
3.19. Termination-field configuration - signification of the flow specification . . . . .	99
3.20. Practical case - Termination-field configuration to create . . . . .	102
5.1. Cables and cable devices - data model . . . . .	128
5.2. Ports and virtual bundles - representation . . . . .	130
5.3. Double-sided devices (port/port) - representation . . . . .	132
5.4. Double-sided devices (port/pins) - representation . . . . .	133
5.5. Double-sided devices (pin/pin) - representation . . . . .	134
5.6. Cable link - representation of implicated components . . . . .	145
5.7. Cable links - simple data model . . . . .	146
5.8. Cable links - correspondence between the cable link to represent and the database . . . . .	147
5.9. Cable links - detailed data model . . . . .	148
7.1. <b>Cable cross-connections</b> wizard - browser window . . . . .	193
7.2. <b>Device cross-connections</b> wizard - browser window . . . . .	195
7.3. <b>Display device traces</b> wizard - browser window . . . . .	197
7.4. <b>Display cable traces</b> wizard - browser window . . . . .	199
8.1. Cable with its pairs and its wires - photo . . . . .	202
8.2. Color code - relation between cable wires, connector pins and colors. . . . .	204
8.3. Cable device slots - representation . . . . .	208
8.4. Cable label - example . . . . .	210
8.5. RJ-45 connector - photo . . . . .	219
8.6. Adapter - photo . . . . .	222
8.7. Rack - photo . . . . .	223
8.8. Punchdown block - photos . . . . .	224
8.9. Vertical distribution of a cable network - representation . . . . .	226
8.10. Lateral distribution of a cable network - representation . . . . .	227
8.11. Hub - photo . . . . .	228
8.12. Patch cord - photo . . . . .	229
8.13. Patch panel - photo . . . . .	229
8.14. Repeater - photo . . . . .	230
8.15. Router - photo . . . . .	231
8.16. Switch - photo . . . . .	232

# List of Tables

---

2.1. Practical case - list of components to use . . . . .	28
3.1. Color codes - Fields and links that must absolutely be populated . . .	40
3.2. Label rules - Fields and links that must absolutely be populated . . . .	45
3.3. Pair/conductor types - Fields and links that must absolutely be populated . . . . .	48
3.4. Connection types - Fields and links that must absolutely be populated . . . . .	49
3.5. Cable duties - Fields and links that must absolutely be populated . . .	53
3.6. Projects and work orders associated with cabling - Fields and links that must absolutely be populated . . . . .	57
3.7. Natures reserved for cables and cable devices - Fields and links that must absolutely be populated . . . . .	61
3.8. Brands of cable and cable device models - Fields and links that must absolutely be populated . . . . .	62
3.9. Cable models - Fields and links that must absolutely be populated . .	64
3.10. <b>Create pairs</b> wizard - description of fields to populate . . . . .	65
3.11. <b>Create pairs</b> wizard - created or modified data . . . . .	66
3.12. Models of cable devices without slots - Fields and links that must absolutely be populated . . . . .	69
3.13. <b>Create ports</b> wizard - description of fields to populate . . . . .	71
3.14. <b>Create ports</b> wizard - data created or modified by the wizard . . . .	71
3.15. Slot types - Fields and links that must absolutely be populated . . .	76

3.16. Models of cable devices with slots - Fields and links that must absolutely be populated . . . . .	78
3.17. <b>Create slots</b> wizard - description of fields to populate . . . . .	79
3.18. <b>Create slots</b> wizard - created or modified data . . . . .	80
3.19. Topologies - Fields and links that must absolutely be populated . . . . .	84
3.20. Topology groups - Fields and links that must absolutely be populated . . . . .	92
3.21. Termination-field configurations - Fields and links that must absolutely be populated . . . . .	100
4.1. Termination fields - Fields and links that must absolutely be populated . . . . .	106
4.2. <b>Create a termination field</b> wizard - description of fields to populate . . . . .	107
4.3. <b>Create a termination field</b> wizard - data created or modified by the wizard . . . . .	109
4.4. <b>Expand termination field</b> wizard - description of fields to populate . . . . .	114
4.5. <b>Expand termination field</b> wizard - data created or modified by the wizard . . . . .	116
4.6. <b>Duplicate wiring closet</b> wizard - description of fields to populate . . . . .	120
4.7. <b>Duplicate wiring closet</b> wizard - data created or modified by the wizard . . . . .	122
5.1. Cable devices - Fields and links that must absolutely be populated . . . . .	135
5.2. Cables - Fields and links that must absolutely be populated . . . . .	141
5.3. Connections - Fields and links that must absolutely be populated . . . . .	151
6.1. <b>Run riser cables</b> wizard - description of fields to populate . . . . .	157
6.2. <b>Run riser cables</b> wizard - created or modified data . . . . .	163
6.3. <b>Run lateral cables</b> wizard - description of fields to populate . . . . .	172
6.4. <b>Run lateral cables</b> wizard - created or modified data . . . . .	173
6.5. <b>Cross connect bundles</b> wizard - description of fields to populate . . . . .	181
6.6. <b>Cross connect bundles</b> wizard - created or modified data . . . . .	185
8.1. Color codes - description for an <b>RJ-45</b> connector . . . . .	204
9.1. Menus and tabs (Cable and Circuit) - list . . . . .	235
9.2. Tables (Cable and Circuit) - list . . . . .	245
9.3. Interdependence of tables (Cable and Circuit) - table . . . . .	251
9.4. Itemized lists (Cable and Circuit) - list . . . . .	254
9.5. Calculated fields (Cable and Circuit) -list . . . . .	255
9.6. Counters (Cable and Circuit) - list . . . . .	256
9.7. Actions and wizards (Cable and Circuit) - list . . . . .	256
9.8. Other documentation (Cable and Circuit) -list . . . . .	264

# Introduction (Cable and Circuit)

## PREFACE

---

### Warning:

The Cable and Circuit module relies on the technical knowledge of the following domains:

- Organization of cabling systems
- Cabling techniques
- Cabling material
- Cabling standards

This guide does not explain the technical knowledge related to the domains mentioned above; it is assumed that you are already familiar with it.

---

## Who is the Cable and Circuit module intended for?

The Cable and Circuit module is mainly intended for organizations with a complex networking system (LAN, WAN, telephony, video, etc).

In general, it is used by the following people:

- Network administrators
- Maintenance technicians

## What does the Cable and Circuit module do?

The Cable and Circuit module enables you to perform the following tasks:

- Conduct a physical and detailed inventory of your cables and cable devices:
  - Technical description
  - Geographic location
- Locate your cables and cable devices:
  - Labeling system
  - Description of links between cable devices and cables.
  - Verify the continuity of the cables' paths (from the user to the server or to the PABX).
  - Create projects and work orders to manage the placement or removal of cables and cable devices.

Managing these tasks enables you to:

- Locate each cable and cable device.
- Easily intervene in case of a problem at level of the faulty cable or cable device.
- Create, modify or cancel connections.
- Homogenize the mode of connection between cables and cable devices.
- Define cabling standards all the way to the conductors and connector pins.

## How to use this guide

### **The chapter Overview (Cable and Circuit)**

This chapter outlines some important principals relating to the cabling of a network and explains how AssetCenter represents a cable network. You should read this information to form a general idea of how AssetCenter functions.

### **The chapter Presentation of the practical case (Cable and Circuit)**

To make this guide as simple as possible, we have developed an example that is used throughout its entirety. This example represents a part of a network in the AssetCenter database. Using this example, you will be guided through the various tables involved in the Cable and Circuit module and will use most of the cabling wizards that automate the most common tasks.

Read the chapter **Presentation of the practical case (Cable and Circuit)** to better understand what you are going to create in the AssetCenter database using the practical case, and how to best use this practical case throughout the course of this guide.

### **The chapter Implementing cable management (Cable and Circuit)**

Before creating cable devices, cables and cable links, it is indispensable that you perform some preliminary tasks and populate certain tables of reference.

Read this chapter to understand what these tasks are, what purpose these tables of reference serve and how to populate them.

The steps outlined in this chapter are done so in an ordered fashion. You must respect this order in order to properly perform these steps. Each step brings you information on the following points:

- **Definitions**

This section indicates which definitions you should consult in the chapter **Glossary (Cable and Circuit)**. It is important to read these definitions since each one of these glossary terms has a precise signification in AssetCenter.

- **Table names**

Names of the reference tables to populate.

- **Access menu**

Menu enabling you to access the tables to populate.

- **Simplified data model**

This model is for the administrator who wants to understand how the database is structured. This information is indispensable for creating data in an appropriate manner and for customizing the use of AssetCenter for your personal needs.

- **Create the ...**

This point provides you the information you need to create records in the table.

- **Prerequisites**

In order to populate certain tables, you need to have previously populated certain others. The list of such tables is provided for you in this point.

- **Fields and links that must absolutely be populated**

There are numerous fields and links in the AssetCenter database. Certain are mandatory, others are optional. This point provides you the list of fields and links that are mandatory in order for the Cable and Circuit module to function correctly.

- **Create the ... for the practical case**

Nothing speaks louder than an example! That's why we have illustrated each step necessary to implement the Cable and Circuit module with a concrete example. All you need to do is adapt this example to your own needs.

In order to keep the amount of extra information to a minimum, the detailed descriptions of fields and links present in the database is not



provided in this guide. You can obtain this information by using the contextual help available for these fields (Help on this field).

To learn more about the help on fields and links, refer to the section **References (Cable and Circuit)**, section **Other sources of information (Cable and Circuit)**.

In the same way, we will not detail each step taken to create records in all the different tables. This is because the steps taken are always the same and always respect the general interface of AssetCenter application.

### Termination fields chapter

Once the tables of reference are created, you can concentrate on creating the termination fields. Termination fields must be created before running the riser and lateral cables in order to take advantage of the cabling wizards, which help you accomplish these tasks.

Read this chapter to understand how to create, expand and duplicate termination fields.

---

#### Note:

To create termination fields, you use cabling wizards and rely on the termination-field configurations.

---

### Cable devices, cables and connections - manual creation chapter

Of course, you can also create cable devices, cables and connections manually. This chapter explains how to do this.

However, AssetCenter is also provided with cabling wizards that automate these common tasks.

Read this chapter if you wish to learn how these wizards create such records. Otherwise, you can skip this chapter.

### Chapter Connections - creation with the wizards

This chapter presents the cabling wizards that automate the main tasks required to manage your cables.

Each wizard is presented with the following information:

- **Functions performed by the wizard**
- **Prerequisites**
- **Launching the wizard**
- **Information used when using the wizard**
- **Data created or modified by the wizard**
- **Viewing the result**
- **After having launched the wizard**
- **Resolving possible problems**

Read this chapter to learn about the possibilities offered by these wizards as well as how they function.

### **Chapter Viewing the traces**

A cable network is composed of numerous cables and connections. In order to help you locate them all, AssetCenter represents the traces of your network.

Read this chapter to understand how to access the representation of these traces, how to read them and how to browse through them.

### **Chapter Glossary (Cable and Circuit)**

The terminology for the Cable and Circuit module is very specialized. The glossary that we propose contains the key terms used in the AssetCenter application and a selection of terms common to this profession.

Read this glossary to better understand what these terms signify.

### **Chapter References (Cable and Circuit)**

This chapter contains exhaustive and systematic reference information. Read this chapter if you want to learn about all the AssetCenter components that are linked to the Cable and Circuit module, or to access advanced or supplementary information.

# 1 Overview (Cable and Circuit)

## CHAPTER

Managing a cable network is extremely complex: There is a large number of cables and cable devices involved in a network. You need to be able to locate these cables and cable devices with precision and simplicity. AssetCenter offers this possibility and enables you to manage large quantities of information that would otherwise be difficult to store on paper or in an generic database.

## Areas covered by the Cable and Circuit module

This section covers certain aspects of managing a cable network and explains how the network is represented in AssetCenter. Some principal terms are also defined in this section.

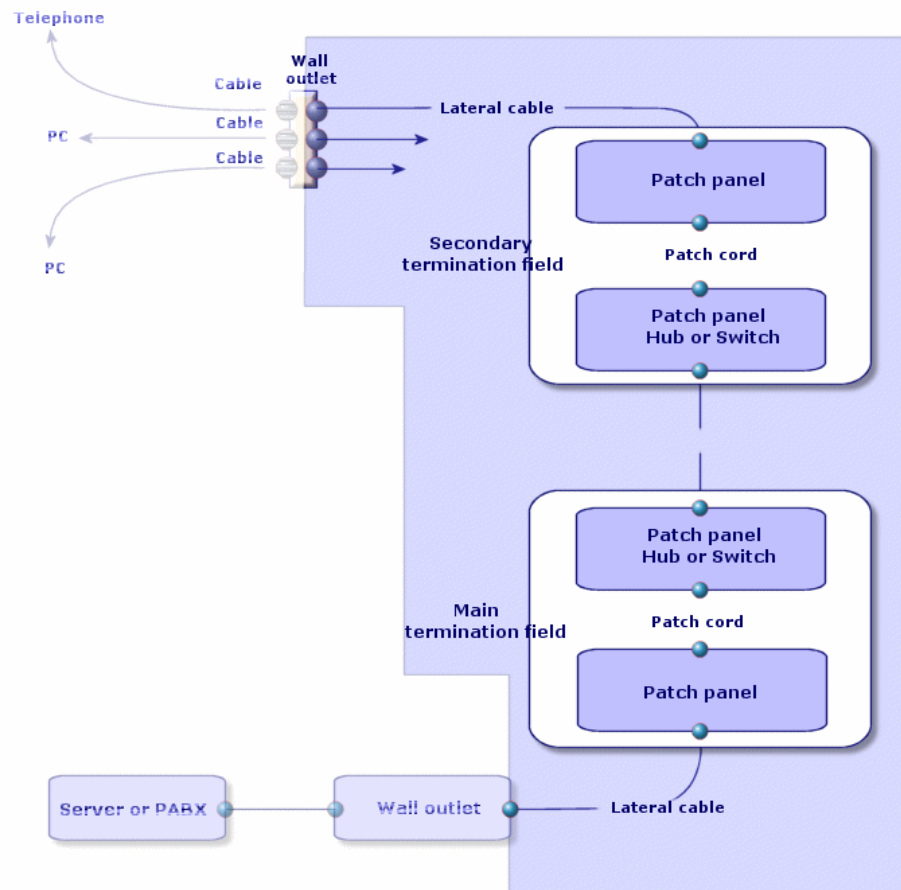
The Cable and Circuit module concerns the "hidden" part of the cable network, from the wall outlet to the termination fields.

Examples:

- The invisible side of the wall outlet is also taken into consideration. The visible side of the outlet and its connection to computers, peripheral devices and telephones is not taken into consideration here.
- The termination-field devices, the riser and the lateral cables are also included here. The servers, the PABX and the connection to them are not concerned by the module.

The following illustration shows you the part of a network covered by the Cable and Circuit module.

**Figure 1.1. Cable and Circuit module - area of coverage**



## Principal concepts

### Cables: pairs, conductors, bundles

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Pair/conductor of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Bundle of this guide.

## Cable devices: pins, terminals, ports

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Pin/ Terminal of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Port of this guide.

## The connection between cable devices and cables: connection types

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Connection type of this guide.

The cable devices and cables are connected in the following ways:

- From device pin to device pin.
- From device pin to cable conductor or wire.
- From device port to device port.
- From device port to cable bundle.

Thus, AssetCenter distinguishes between two types of connections:

- By pin: Each pin is identified.
- By port: Pins are not longer identified individually.

## Connections: cable links, user and host directions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable link of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Host of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ User of this guide.

---

### Note:

The patch cords used to cross connect the termination-field devices are not described in the database. Only the cable links between the ports and these devices are described.

---

**Locating wires and pins: color codes**

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Color code of this guide.





# 2 | Presentation of the practical case (Cable and Circuit)

## CHAPTER

In order to facilitate your learning experience, we will develop a practical case throughout the course of this guide.

This will help you better understand what the Cable and Circuit module represents and how it represents it.

---

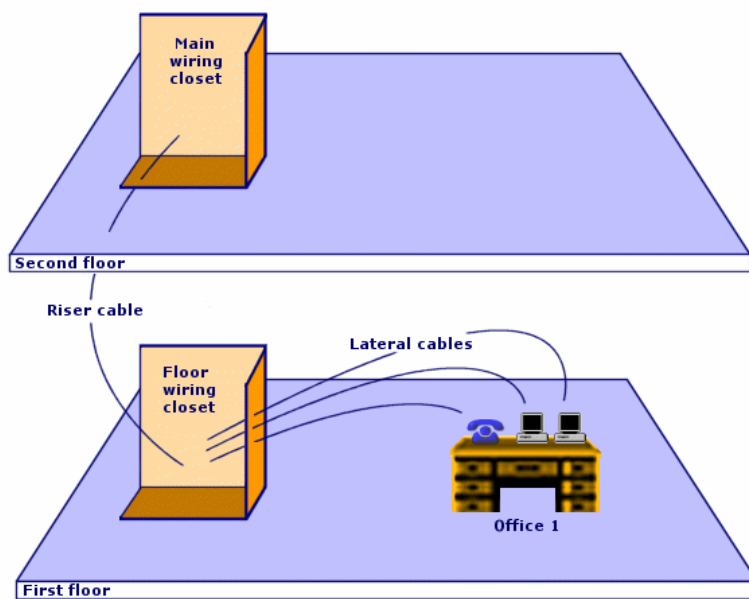
 **Warning:**

For an example to work, you must perform each step in its entirety and respect the order in which these steps are presented. Only the fields and links that are absolutely necessary to perform most procedures are referred to in this guide. Feel free to explore the utility of the other fields and links on your own.

---

### Locations of the practical case

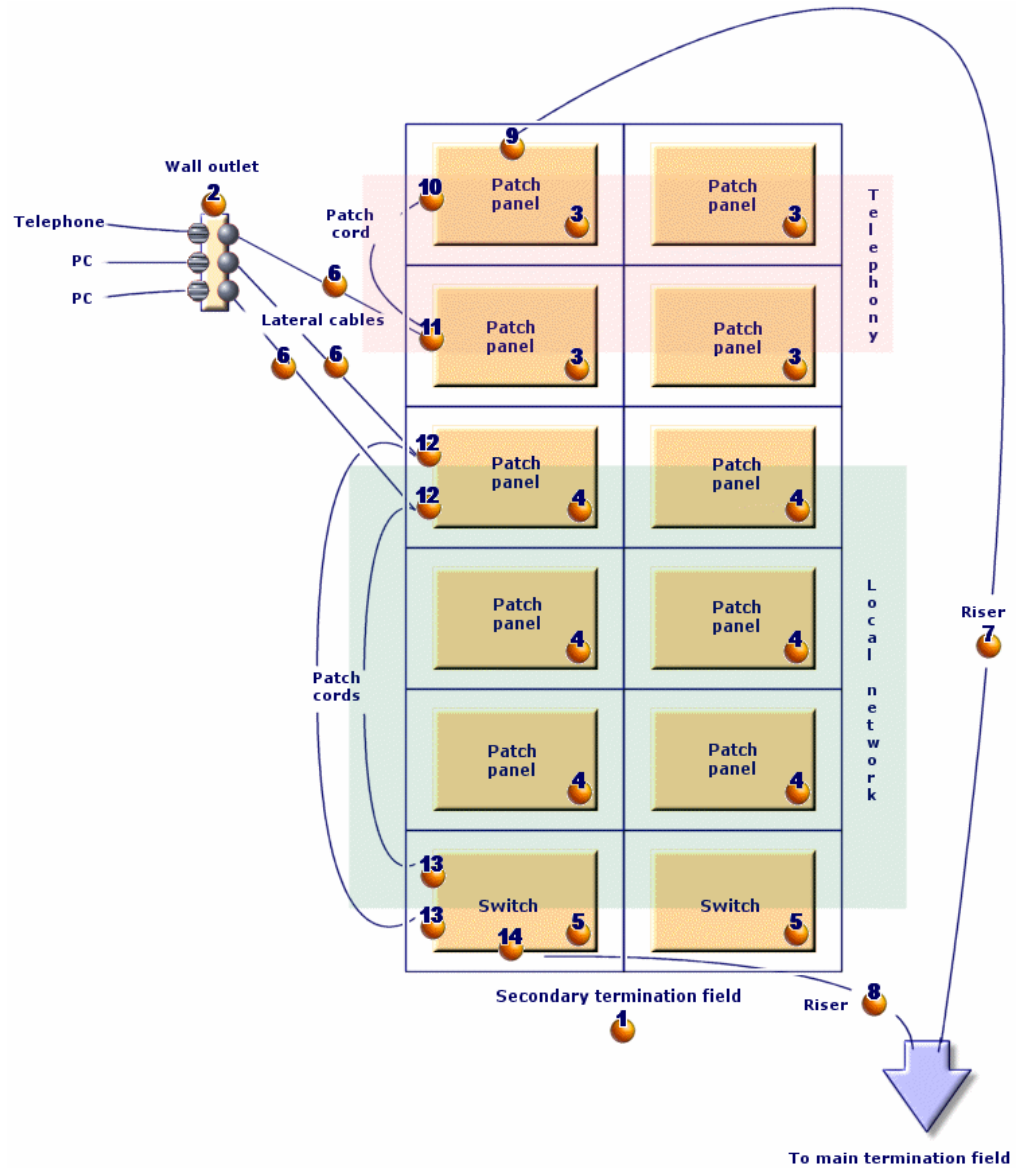
The network that we are going to represent is divided up in the locations illustrated by the following diagram:

**Figure 2.1. Practical case - locations to use**

### Network of the practical case

The following diagram illustrates which portion of the network we will use in the AssetCenter database for our practical case.

Figure 2.2. Practical case - network to use



This network contains components that will not be used in the example illustrating the Cable and Circuit module:

- 1 telephone connected to the wall outlet by 1 telephone cable.
- 1 stationary computer connected to the wall outlet by 1 LAN cable.
- 1 portable computer connected to the wall outlet by 1 LAN cable.

Then there are the components that will be used:

**Table 2.1. Practical case - list of components to use**

Location on the diagram	Quantity	Component	Composition	Connection type
1	1	Termination field	2 columns and 6 rows	Does not apply.
2	1	Wall outlet	3 ports with 8 pins	By pin
3	4	Patch panels	Back side: 24 ports with 8 preloaded pins	By port
			Front side: 24 RJ45 ports	By port (patch)
4	6	Patch panels	Back side: 256 pins (32 x 8)	By pin
			Back side: 24 RJ45 ports	By port (patch)
5	2	Switch	10 slots	Does not apply.
	1	Module (for one of the switch slots)	8 RJ45 ports	By port
6	3	Lateral cables	4 twisted pairs with 2 copper wires	Does not apply.
7	1	Riser cable	32 twisted pairs with 2 copper wires	Does not apply.
8	1	Riser cable	4 twisted pairs with 2 copper wires	Does not apply.
9	1	Port	2 pins (back side)	By pin
10	1	Port	8 pins (front side)	By port
11	1	Port	8 pins (front side)	By port
			8 pins (back side)	By pin
12	2	Ports	8 pins (2 sides)	By port
13	2	Ports	8 pins (front side)	By port
14	1	Port	8 pins (back side)	By port

# 3 | Implementing cable management (Cable and Circuit)

## CHAPTER

Before implementing the Cable and Circuit module, you need to perform certain preliminary steps, which are described in this chapter.

You must then define the reference information that will be used to create and define your cables, cable devices and cable links. This reference information must be created first: You can create it all right away, or do so as you go.

### Preliminary steps

#### **In order to continue reading the *AssetCenter 4.1.0 - Cable and Circuit guide***

Before continuing to read this guide, you must first:

- 1 Install AssetCenter.
- 2 Execute AssetCenter.
- 3 Connect to AssetCenter's demonstration database.

- 4 Activate the Cable and Circuit module using the **File/ Activate modules** menu item.

### Working with your own database using the Cable and Circuit module

In order to work with your own database, you must:

- 1 Install AssetCenter.
- 2 Execute AssetCenter Database Administrator.
- 3 Create your database by importing the Cable and Circuit **line-of-business data** (see the section **Importing the Line-of-business data when you create the database** of this guide).
- 4 Insert your user's license that includes authorization for the Cable and Circuit module.
- 5 Execute AssetCenter.
- 6 Connect to your database.
- 7 Activate the Cable and Circuit module using the **File/ Activate modules** menu item.

### Importing the System data when you create your database

Proceed in the following manner:

- 1 Execute AssetCenter Database Administrator.
- 2 Select the **File/ Open** menu item.
- 3 Select the **Open database description file - create new database** option.
- 4 Select the **gbase.dbb** file, located in the **config** sub-folder of the AssetCenter installation folder.
- 5 Select the **Action/ Create database** menu item.
- 6 Check the **Create system data** option.
- 7 Populate the other fields and continue creating the database.

## Importing the Line-of-business data when you create the database

Proceed in the following manner:

- 1 Execute AssetCenter Database Administrator.
- 2 Select the **File/ Open** menu item.
- 3 Select the **Open database description file - create new database** option.
- 4 Select the **gbbase.dbb** file, located in the **config** sub-folder of the AssetCenter installation folder.
- 5 Select the **Action/ Create database** menu item.
- 6 Check the **Use an import scenario** option.
- 7 Populate the **Import configuration** field by selecting the **Import data destined for the cable module** value from the list.
- 8 Populate the other fields and continue creating the database.

## Importing the Line-of-business into an existing database

Proceed in the following manner:

- 1 Execute AssetCenter Database Administrator.
- 2 Select the **File/ Open** menu item.
- 3 Select the **Open database description file - create new database** option.
- 4 Select the **gbbase.dbb** file, located in the **config** sub-folder of the AssetCenter installation folder.
- 5 Select the **Action/ Create database** menu item.
- 6 Unselect the **Create database** option.
- 7 Unselect the **Create system data** option.
- 8 Check the **Use an import scenario** option.
- 9 Populate the **Import configuration** field by selecting the **Import data destined for the cable module** value from the list.
- 10 Click **Create**.

## To learn more about installing AssetCenter

Refer to the **Installation** guide.

## Cable-device types

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable device type of this guide.

### Table names

The types of cable devices are stored in the **amDeviceType** itemized list in the **Itemized lists** table (**amItemizedList**).

### Access menu

**Administration/ Itemized lists**

## Creating cable device types

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).
- 2 Select the **amDeviceType** itemized list.
- 3 Create the values that you need.

### Prerequisites

No prerequisites.

The **amDeviceType** itemized list already exists in the **Itemized lists** table.

## Creating the cable device types for the practical case

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).



- 2 Select the **amDeviceType** itemized list.
- 3 Create the following values if they don't already exist:
  - **Switch module**
  - **Patch panel**
  - **Wall outlet**
  - **Switch**

## Cable types

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable type of this guide.

### Table names

The types of cables are stored in the **amCableType** itemized list in the **Itemized lists** table (**amItemizedList**).

### Access menu

**Administration/ Itemized lists**

## Creating cable types

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).
- 2 Select the **amCableType** itemized list.
- 3 Create the values that you need.

### Prerequisites

No prerequisites.

The **amCableType** itemized list already exists in the **Itemized lists** table.

## Creating the cable types for the practical case

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).
- 2 Select the **amCableType** itemized list.
- 3 Create the following values if they don't already exist:
  - **Twisted pairs**

## Cable roles

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Role of this guide.

### Table names

The types of cables are stored in the **amCableRole** itemized list in the **Itemized lists** table (**amItemizedList**).

### Access menu

**Administration/ Itemized lists**

## Creating cable roles

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).
- 2 Select the **amCableRole** itemized list.
- 3 Create the values that you need.

### Prerequisites

No prerequisites.

The **amCableRole** itemized list already exists in the **Itemized lists** table.

## Creating the cable roles for the practical case

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).
- 2 Select the **amCableRole** itemized list.
- 3 Create the following values if they don't already exist:
  - **Riser**
  - **Lateral**

## Colors to use for the color codes

### Table names

The colors are stored in the **Itemized lists** table (**amItemizedList**):

- **amColor**
- **amTipColor**
- **amRingColor**

### Access menu

#### Administration/ Itemized lists

The **amColor**, **amTipColor** and **amRingColor** itemized lists already exist in the **Itemized lists** table.

## Creating colors

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).
- 2 Select the **amColor** itemized list.
- 3 Create the values that you need.
- 4 Select the **amTipColor** itemized list.
- 5 Create the values that you need.
- 6 Select the **amRingColor** itemized list.
- 7 Create the values that you need.

---

 **Tip:**

You can begin by creating the colors in the **amColor** itemized list, then copy them into the **amTipColor** and **amRingColor** itemized lists.

---

### Prerequisites

No prerequisites.

## Creating the colors for the practical case

We are going to create the colors that we need for the color code entries for our practical case.

First, we will create them in the **amColor** itemized list, and then we will copy them into the **amTipColor** and **amRingColor** itemized lists.

### Creating the colors in the amColor itemized list

- 1 Display the list of itemized lists (**Administration/ Itemized lists**).
- 2 Select the **amColor** itemized list.
- 3 Add the following values to the itemized list:
  - **white/blue**
  - **white/brown**
  - **white/orange**
  - **white/green**
  - **blue**
  - **blue/white**
  - **blue/yellow**
  - **blue/black**
  - **blue/red**
  - **blue/violet**
  - **yellow/blue**
  - **yellow/brown**
  - **yellow/green**

- **brown**
- **brown/white**
- **brown/yellow**
- **brown/black**
- **brown/red**
- **brown/violet**
- **black/blue**
- **black/brown**
- **black/orange**
- **black/green**
- **orange**
- **orange/black**
- **red/blue**
- **red/brown**
- **red/green**
- **green**
- **green/white**
- **green/yellow**
- **green/black**
- **green/red**
- **green/violet**
- **violet/blue**
- **violet/brown**
- **violet/green**

### **Creating the colors in the amTipColor and amRingColor itemized lists**

Follow the same steps you used for the **amColor** itemized list (by creating the same colors).

## Color codes

### Definition

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Color code of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Color code entry of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Ring of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Tip of this guide.

### Table names

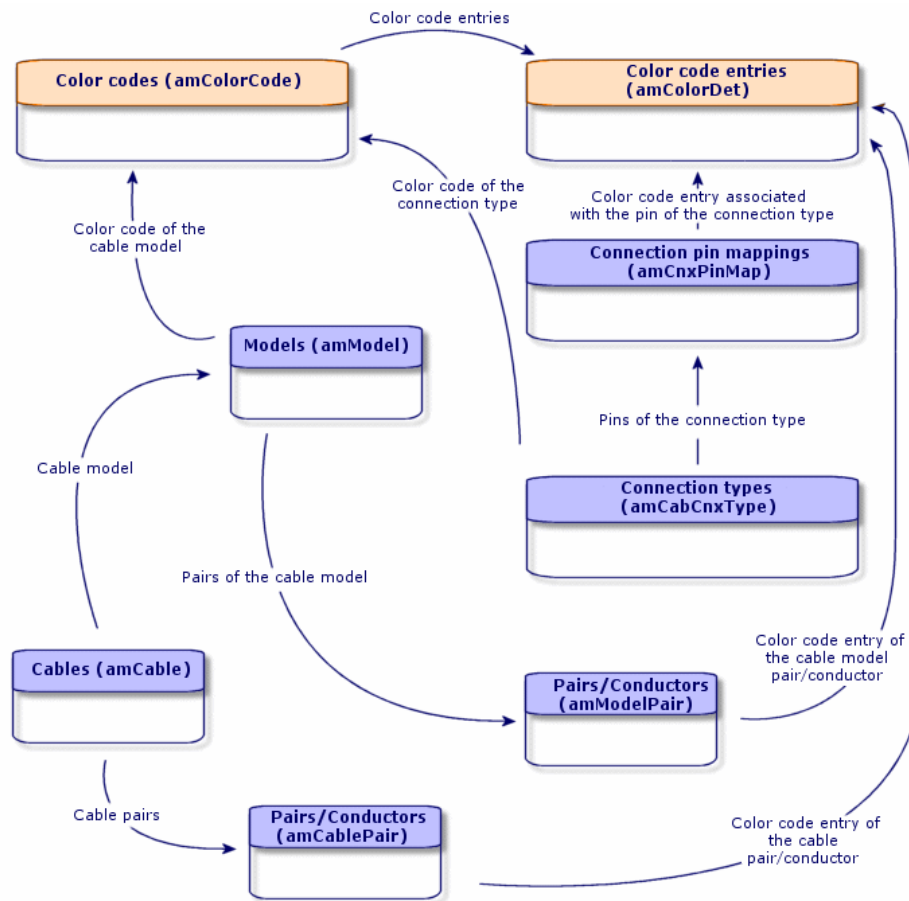
- **Color codes (amColorCode)**
- **Color code entries (amColorDet)**

### Access menu

**Cable/ Color codes**

## Simplified data model

Figure 3.1. Color codes - data model



## Creating color codes

- 1 Display the list of color codes (**Cable/ Color codes**).
- 2 For each color code to create:
  - 1 Create a record in the **Color codes** table.

- 2 Add a color code entry by pair or by conductor.

### Prerequisites

We recommend that you first create the colors in the following itemized lists of the **Itemized lists** table (**amItemizedList**):

- **amColor**
- **amTipColor**
- **amRingColor**

If you have not already done this, you can add the colors on the fly while you create the color codes.

### Fields and links that must absolutely be populated

**Table 3.1. Color codes - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
<b>Color codes table (amColorCode)</b>	
Name	Name
Color code entries	ColorDetail
<b>Color code entries table (amColorDet)</b>	
#	sSequenceNumber
Color	Color

## Creating the color codes for the practical case

We are going to create 2 color codes and their entries.

### Creating the color codes

- 1 Display the list of color codes (**Cable/ Color codes**).
- 2 Create a new record for each color code in the **Color codes** table (**amColorCode**) and populate the following fields:



Value of the field or link ...	Record 1	Record 2
Name (Name)	568B - 4 pairs	32 pairs

### Creating the entries of color code 568B - 4 pairs

- 1 Select the color code **568B - 4 pairs**.
- 2 Create the following color codes:

Value of the # field (SequenceNumber)	Value of the Color field (Color)	Value of the Tip color field (TipColor)	Value of the Ring color field (RingColor)
1	blue	white/blue	blue
2	orange	white/orange	orange
3	green	white/green	green
4	brown	white/brown	brown

### Creating the entries for the color code 32 pairs

- 1 Select the color code **568B - 4 pairs**.
- 2 Select the color code and create the following color code entries:

Value of the # field (SequenceNumber)	Value of the Color field (Color)	Value of the Tip color field (TipColor)	Value of the Ring color field (RingColor)
1	white/blue	white/blue	blue/white
2	white/brown	white/brown	brown/white
3	white/green	white/green	green/white
4	blue/yellow	blue/yellow	yellow/blue
5	blue/black	blue/black	black/blue
6	blue/red	blue/red	red/black
7	blue/violet	blue/violet	violet/blue
8	yellow/brown	yellow/brown	brown/yellow
9	yellow/green	yellow/green	green/yellow
10	brown/black	brown/black	black/brown
11	brown/red	brown/red	red/brown
12	brown/violet	brown/violet	violet/brown
13	black/orange	black/orange	orange/black
14	black/green	black/green	green/black

Value of the # field (SequenceNumber)	Value of the Color field (Color)	Value of the Tip color field (TipColor)	Value of the Ring color field (RingColor)
15	red/green	red/green	green/red
16	green/violet	green/violet	violet/green
17	white/blue	white/blue	blue/white
18	white/brown	white/brown	brown/white
19	white/green	white/green	green/white
20	blue/yellow	blue/yellow	yellow/blue
21	blue/black	blue/black	black/blue
22	blue/red	blue/red	red/black
23	blue/violet	blue/violet	violet/blue
24	yellow/brown	yellow/brown	brown/yellow
25	yellow/green	yellow/green	green/yellow
26	brown/black	brown/black	black/brown
27	brown/red	brown/red	red/brown
28	brown/violet	brown/violet	violet/brown
29	black/orange	black/orange	orange/black
30	black/green	black/green	green/black
31	red/green	red/green	green/red
32	green/violet	green/violet	violet/green

## Label rules

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Label rule of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Label of this guide.

### Table names

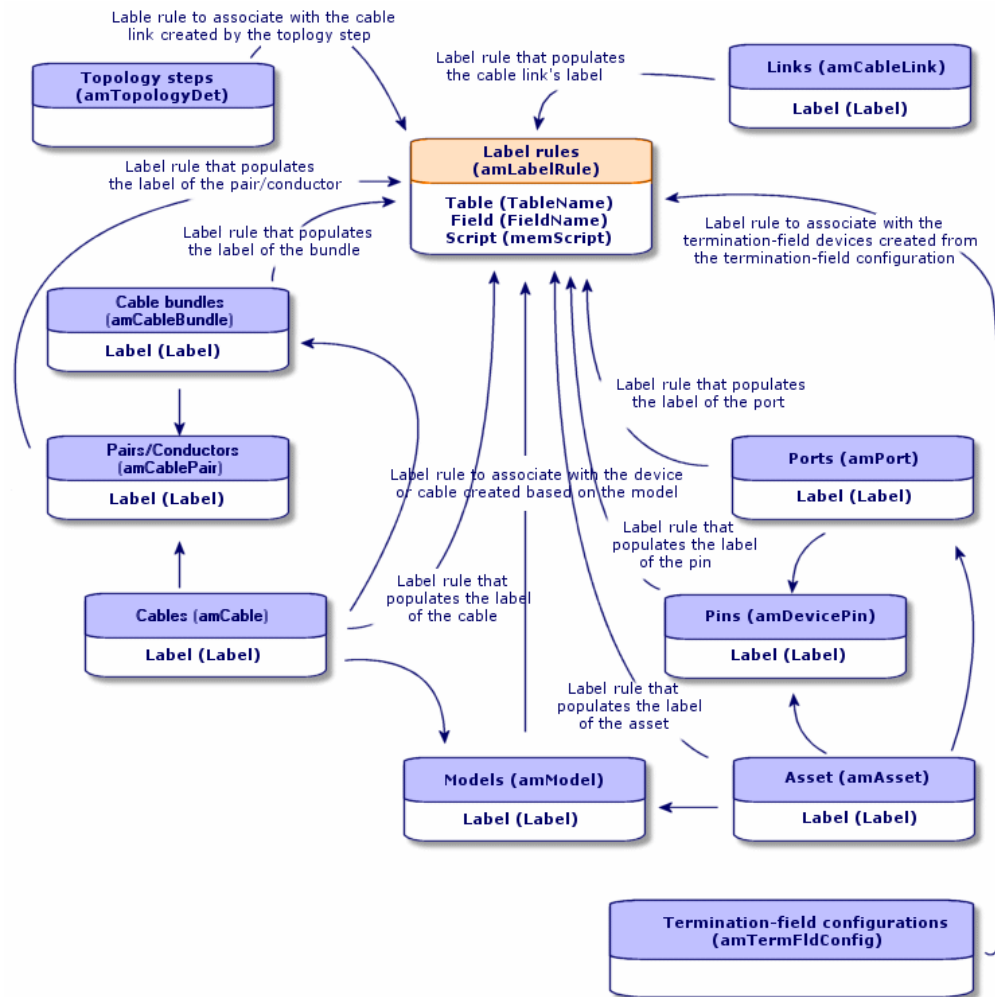
**Label rules (amLabelRule)**

### Access menu

**Cable/ Label rules**

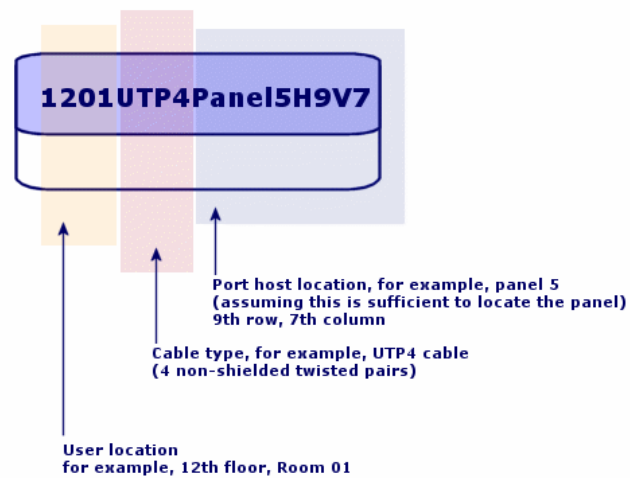
## Simplified data model

Figure 3.2. Labels and label rules - data model



## Label example

Figure 3.3. Cable label - example



## Creating label rules

**Warning:**

In order for the wizards to function, you must create label rules to identify the following components:

- Cable devices
- Termination-field devices
- Cables
- Links

 **Tip:**

There are several ways to create cable-link labels according to, for example:

- The connection can be made by port or by pin.
- You can use either the starting and ending numbers in a sequence of pins or you can use all the numbers in the sequence.
- The link can reference a cable or a cable device.

You can create label rules for the following components:

- Bundles
- Pins/ terminals
- Ports
- Pairs/conductors

To create label rules:

- 1 Display the list of label rules (**Cable/ Label rules**).
- 2 Create the records from the list.

### Prerequisites

Determine with precision which information you want to use to create labels.

### Fields and links that must absolutely be populated

**Table 3.2. Label rules - Fields and links that must absolutely be populated**

<b>Label of the field or link</b>	<b>SQL name of the field or link</b>
Field	FieldName
Name	Name
SQL name	SQLName
Script	memScript
Table	TableName

## Creating the label rules for the practical case

We are going to create a label rule enabling you to locate and identify cables according to their model and their code.

- 1 Display the list of label rules (**Cable/ Label rules**).
- 2 Create a new record in the **Label rules** table (**amLabelRule**) and populate the following fields:

Field	Value
Name	Cable label rule
Table	Cables (amCable)
Field	Label
Script	RetVal = [Model.Name] + " - " + [Code]

When you select this label rule for a cable, the label will indicate:

- The cable's model.
- The cable's code.

It is presented in the form of:

```
<Name of the cable model> - <Code of the cable>
```

Example:

FTP - Category 5 - 4 twisted pairs - 000001

## Types of pairs and conductors

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Pair/Conductor type of this guide.

### Table names

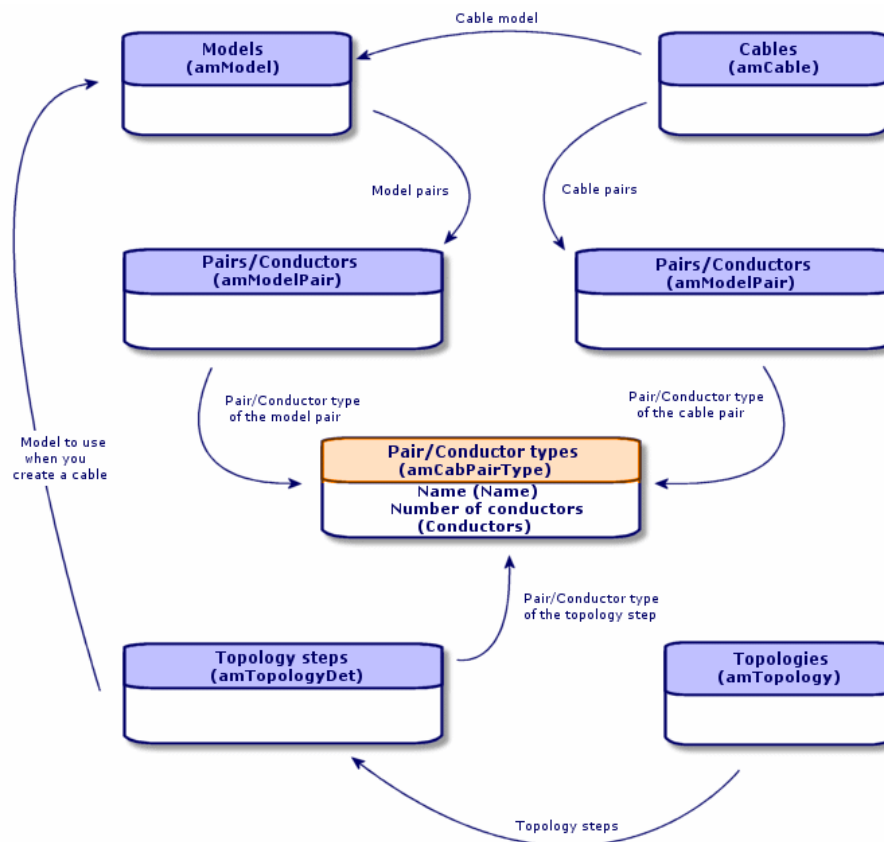
**Pair/conductor types (amCabPairType)**

## Access menu

Cable/ Cable pair/conductor types

## Simplified data model

Figure 3.4. Pair/conductor types - data model



## Creating pair/conductor types

- 1 Display the list of pair/conductor types (Cable/ Cable pair/conductor types).

- 2 Create as many records as there are pair/conductor types that you use.

### Prerequisites

None

### Fields and links that must absolutely be populated

**Table 3.3. Pair/conductor types - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
Name	Name
No. of conductors	sConductors

## Creating the pair/conductor types for the practical case

We are going to create a pair type composed of 2 copper wires:

- 1 Display the list of pair/conductor types (**Cable/ Cable pair/conductor types**).
- 2 Create a new record in the **Pair/Conductor types** table (**amCabPairType**) and populate the following fields:

Field or link to populate	Value
Name ( <b>Name</b> )	Copper
No. of conductors ( <b>sPairs</b> )	2

## Connection types

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Connection type of this guide.



## Table names

Cable connection types (**amCabCnxType**)

Connection pin mappings (**amCnxPinMap**)

## Access menu

Cable/ Cable connection types

## Creating connection types

- 1 Identify the connection types that you use in your network.
- 2 Display the list of connection types (**Cable/ Cable connection types**).
- 3 Create a record by identified connection type.
- 4 If you want to associate each of this connection-type's pins to a color code entry, then you have to populate the **Connection pin mappings** link. Create as many links as the connection type contains pins/terminals.

## Prerequisites

You need to have already created the color codes.

## Fields and links that must absolutely be populated

**Table 3.4. Connection types - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Connection types table (amCabCnxType)</b>		
Name	Name	
Port-based or pin-based	seMode	
No. of pins/terminals	sPinCount	
Color code	ColorCode	

Label of the field or link	SQL name of the field or link	Remarks
Connection pin mappings	CnxPinMaps	<ul style="list-style-type: none"> <li>If the <b>Port-based or pin-based</b> field has <b>Pin</b> for its value, then this link must be populated.</li> <li>If the <b>Port-based or pin-based</b> field has <b>Port</b> for its value, then this field is optional.</li> </ul>
<b>Connection pin mappings table ( amCnxPinMap)</b>		
#	sPinSeq	
Color code entry	ColorCodeDet	

## Creating the connection types for the practical case

We are going to create the following connection types:

- RJ45 - 568B - Port
- RJ45 - 568B - Pin

### Creating the connection types

- 1 Display the list of connection types (**Cable/ Cable connection types**).
- 2 Create a new record in the **Connection types** table (**amCabPairType**) and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2
Name ( <b>Name</b> )	RJ45 - 568B - Port	RJ45 - 568B - Pin
Port-based or pin-based ( <b>Name</b> )	Port	Pin
No. of pins/terminals ( <b>sPinCount</b> )	0	8
Color code ( <b>ColorCode</b> )		568B - 4 pairs

### Populate the Connection pin mappings link for the RJ45 - 568B - Pin connection type.

- 1 Select the **RJ45 - 568B - Pin** connection type.

- 2 Create the connection-pin mapping entries by populating the following fields:

Value of the # field (sPinSeq)	Color code entry (ColorCodeDet)
1	orange
2	orange
3	green
4	blue
5	blue
6	green
7	brown
8	brown

## Cable duties

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Function of this guide.

### Table names

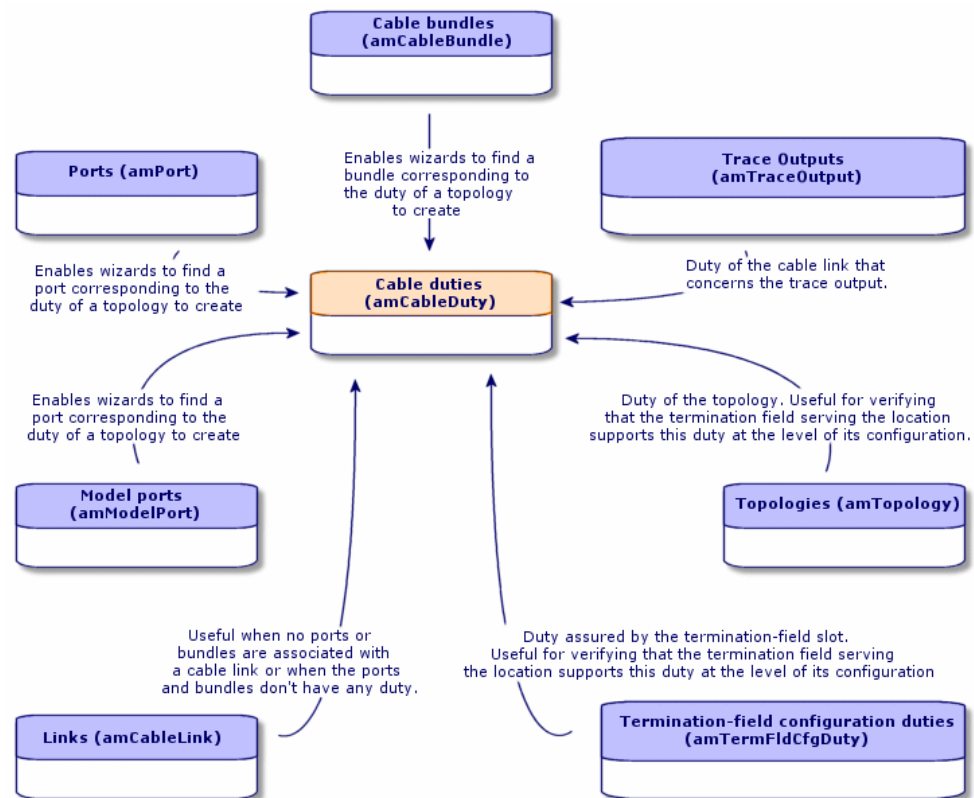
**Cable duties (amCableDuty)**

### Access menu

**Cable/ Cable duties**

## Simplified data model

Figure 3.5. Duties - data model



## Creating cable duties manually

- 1 Display the list of cable duties (**Cable/ Cable duties**).
- 2 Create a record for each of the duties that your cable network fulfills.

 **Tip:**

At this stage, we advise against populating the **Topologies** link (**Topology**) since the topologies have not yet been created. It is better to associate a duty with the topologies after they have been created.

## Prerequisites

No prerequisites.

## Fields and links that must absolutely be populated

**Table 3.5. Cable duties - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
Name	Name

## Creating the cable duties manually for the practical case

We are going to create two duties.

- 1 Display the list of cable duties (**Cable/ Cable duties**).
- 2 Create a new record and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2
Name ( <b>Name</b> )	Data	Voice

## Locations

We are introducing the **Locations** table for the needs of our practical case.

## Table names

**Locations (amLocation)**

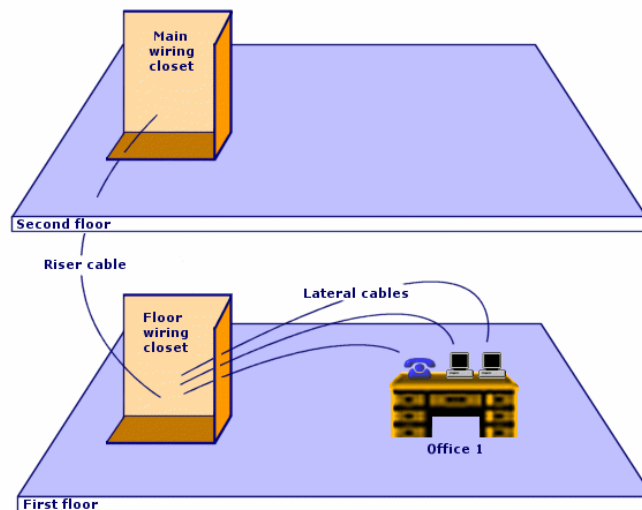
## Access menu

**Portfolio/ Locations**

## Creating the locations for the practical case

We are going to create the records that correspond to the locations represented by the following diagram:

**Figure 3.6. Practical case - locations to use**



- 1 Display the list of locations (**Portfolio/ Locations**).
- 2 Create a new record per location and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2	Value for record 3
Name (Name)	Cabled building	1st floor	2nd floor

Field or link to populate	Value for record 1	Value for record 2	Value for record 3
Sub-location of (Parent)	Do not populate.	Cabled building	Cabled building

Field or link to populate	Value for record 4	Value for record 5	Value for record 6
Name (Name)	Wiring closet for each floor	Main wiring closet	Office 1
Sub-location of (Parent)	Cabled building/1st floor	Cabled building/2nd floor	Cabled building/1st floor

## Projects and work orders associated with cabling

The projects and work orders enable you to conserve a trace of the operations carried out on the network:

- Running or removing cables.
- Connecting or disconnecting bundles and ports.
- Installing a cable device.

You need to create projects and work orders before launching the cabling wizards. Due to this constraint, you must create at least one project containing at least one work order.

The cabling wizards do not populate the following tables, unless you select a project and a work order at the end of the wizard's execution:

- **Trace outputs (amTraceOutput)**
- **Trace histories (amTraceHistory)**
- **Trace operations (amTraceOp)**

### Table names

- **Projects (amProject)**
- **Work orders (amWorkOrder)**

### Access menu

- **Portfolio/ Projects**
- **Portfolio/ Work orders**

## Creating projects and work orders associated to the Cable and Circuit module

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Create a project for each cabling operation you will perform.
- 3 Associate one or more work orders with the project.
- 4 Execute the cabling wizards by referencing the appropriate project and work order.

These wizards automatically populate the following links in the projects:

- **Assets (AstProjDescs)**
- **Cables (ProjectCables)**
- **Project traces (ProjectTraces)**

These wizards automatically populate the following links in the work orders:

- **Title (Title)**
- **Work order devices (ProjBien)**
- **Project cables (ProjCable)**
- **Project traces (ProjTraceOut)**

### Prerequisites

No prerequisites.



## Fields and links that must absolutely be populated

**Table 3.6. Projects and work orders associated with cabling - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
<b>Projects table (amProject)</b>	
Title	Title
Work orders	WorkOrders
<b>Work orders table (amWorkOrder)</b>	
Work order #	WONo

## Creating the projects and work orders for the practical case

We are going to create one project per wizard, which you will execute in the practical case. We will also associate a work order to each one of these projects.

Thus, you will be able to consult these projects and work orders in able to better understand what the wizards create, modify or delete.

### Creating the projects

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Create a new record per project and populate the following fields:

	Label (Title)
Value for record 1	Create a termination field
Value for record 2	Disconnect bundles
Value for record 3	Disconnect ports
Value for record 4	Duplicate a wiring closet
Value for record 5	Swap assets
Value for record 6	Remove cables
Value for record 7	Remove lateral cables
Value for record 8	Remove cables by location
Value for record 9	Expand a termination field
Value for record 10	Cross-connect generic hub

	<b>Label (Title)</b>
Value for record 11	Cross-connect specific hub
Value for record 12	Cross-connect bundles
Value for record 13	Cross-connect ports
Value for record 14	Cross-connect ports (internal)
Value for record 15	Cross-connect wallfield
Value for record 16	Run lateral cables
Value for record 17	Run riser cables
Value for record 18	Relocate cables
Value for record 19	Transfer project assets
Value for record 20	Relocate project connections
Value for record 21	Transfer project cables

### Creating a Work orders link for each project

- 1 Select each project one by one.
- 2 Select the **Work orders** tab and add a new work order to the project by populating the following fields:

<b>Project label</b>	<b>Value of the # of work orders (WONo)</b>
Create a termination field	Accept the value proposed by AssetCenter.
Disconnect bundles	Accept the value proposed by AssetCenter.
Disconnect ports	Accept the value proposed by AssetCenter.
Duplicate a wiring closet	Accept the value proposed by AssetCenter.
Swap assets	Accept the value proposed by AssetCenter.
Remove cables	Accept the value proposed by AssetCenter.
Remove lateral cables	Accept the value proposed by AssetCenter.
Remove cables by location	Accept the value proposed by AssetCenter.
Expand a termination field	Accept the value proposed by AssetCenter.
Cross-connect generic hub	Accept the value proposed by AssetCenter.
Cross-connect specific hub	Accept the value proposed by AssetCenter.
Cross-connect bundles	Accept the value proposed by AssetCenter.
Cross-connect ports	Accept the value proposed by AssetCenter.
Cross-connect ports (internal)	Accept the value proposed by AssetCenter.
Cross-connect wallfield	Accept the value proposed by AssetCenter.
Run lateral cables	Accept the value proposed by AssetCenter.
Run riser cables	Accept the value proposed by AssetCenter.
Relocate cables	Accept the value proposed by AssetCenter.
Transfer project assets	Accept the value proposed by AssetCenter.
Relocate project connections	Accept the value proposed by AssetCenter.
Transfer project cables	Accept the value proposed by AssetCenter.

## Natures for cables and cable devices

The natures define the information that is common to certain groups of assets. The cables and cable devices each require a specific nature that will be associated with the models of cables and cable devices.

The information that you define at the nature level determines whether certain fields and links will be displayed in the detail of models, cables and assets.

### Table names

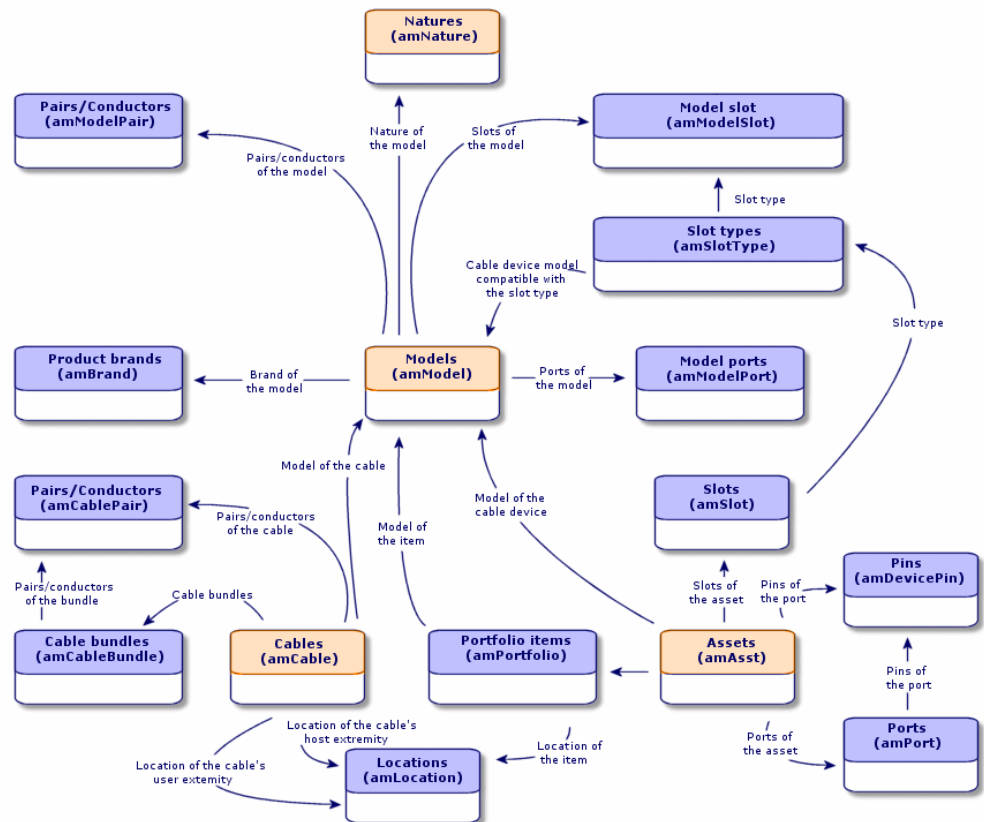
**Natures (amNature)**

### Access menu

**Portfolio/ Natures**

## Simplified data model

Figure 3.7. Cables and cable devices - data model



## Creating the natures of cables and cable devices

- 1 Display the list of natures (**Portfolio/ Natures**).
- 2 Create a nature for the cable devices and a nature for the cables.

### Prerequisites

No prerequisites.

## Fields and links that must absolutely be populated

**Table 3.7. Natures reserved for cables and cable devices - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
Name	Name	
Created	seBasis	Must be set to <b>Asset</b> for the cable devices and <b>Cable</b> for the cables.
Management constraints	seMgtConstraint	Does not apply to cables. This field must be set to <b>Unique asset tag</b> for the cable devices.
Also create	seOverflowTbl	Does not apply to cables. This field must be set to <b>None</b> for the cable devices.
Cable device	bDevice	Does not apply to cables. This option must be checked for the cable devices.
Can be connected	bIsCnxClient	Does not apply to cables. This option must be checked for the cable devices.

## Creating the natures of cables and cable devices for the practical case

We are going to create a nature for the cable devices and a nature for the cables.

- 1 Display the list of natures (**Portfolio/ Natures**).
- 2 Create a new record per nature and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2
Name ( <b>Name</b> )	Cable	Cable device
Created ( <b>seBasis</b> )	Cable	Portfolio item
Management constraints ( <b>seMgtConstraint</b> )	Do not populate.	Unique asset tag
Also create ( <b>seOverflowTbl</b> )	Do not populate.	None
Cable device ( <b>bDevice</b> )	Do not populate.	Check
Can be connected ( <b>bIsCnxClient</b> )	Do not populate.	Check

## Brands of cable and cable device models

### Table names

**Brands (amBrand)**

### Access menu

**Portfolio/ Brands**

## Creating the brands of the cable and cable device models

- 1 Display the list of brands (**Portfolio/ Brands**).
- 2 Create one record per brand of cable device and cable of your network.

### Prerequisites

No prerequisites.

### Fields and links that must absolutely be populated

**Table 3.8. Brands of cable and cable device models - Fields and links that must absolutely be populated**

<b>Label of the field or link</b>	<b>SQL name of the field or link</b>
Name	Name

## Creating the brands of the cable and cable device models for the practical case

We are going to create the brands of the cable devices and cables for our practical case. You will then be able to associate them with the models that you will create later.

- 1 Display the list of brands (**Portfolio/ Brands**).
- 2 Create a new record per brand and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2	Value for record 3	Value for record 4
Name ( <b>Name</b> )	Corel	Hewlett Packard	ITT	Generic

## Cable models

The cable models enable you to create the cables in your network in the **Cables** table (**amCable**).

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable of this guide.

### Table names

- **Models** (**amModel**)
- **Pairs/Conductors** (**amCablePair**)

### Access menu

#### Portfolio/ Models

## Creating cable models

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Create a record for each cable model in your network.
- 3 Associate pairs/conductors with the cable model.

You have the following possibilities:

- Add each pair/conductor manually by clicking **+**.
- Launch the **Create pairs** wizard.

## Prerequisites

You should have already created:

- A nature for the cables.
- The brands of the cables.
- Label rules.
- Cable types.
- Color codes.
- Pair/ Conductor types.

## Fields and links that must absolutely be populated

**Table 3.9. Cable models - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Models table (amModel)</b>		
Name	Name	
Nature	Nature	Must be a cable nature.
Label rule	LabelRule	
Cable type	CableType	
Color code	ColorCode	If you want the pairs/conductors to be identified by a color code.
Model pairs/conductors	Pairs	
<b>Pairs/Conductors table (amModelPair)</b>		
Name	Name	
#	sSequenceNumber	
Pair/Conductor type	CabPairType	
Color code entry	ColorCodeDet	If you selected a color code at the level of the cable model.



## Create pairs wizard

### Functions performed by the wizard

This wizard generates pairs having the same type.

### Prerequisites

You should have already created:

- Pair/ Conductor types

### Launching the wizard

To access this wizard, you need to select a record or field (not a link) in the **Models** table (**amModel**):

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Select the model in the list window, or select a field (not a link) in the **Models** table.
- 3 Select the **Create pairs** wizard.

### Information used when using the wizard

**Table 3.10. Create pairs wizard - description of fields to populate**

Label displayed by the wizard	Explanations
Default type for each pair/conductor created.	The selected value populates the <b>Pair/conductor type</b> link ( <b>CabPairType</b> ) of each pair/conductor created.

Label displayed by the wizard	Explanations
Number to begin with	<p>For example, enter 1 if you want to create 4 numbered pairs from 1 to 4. Enter 5 if you want to create 4 numbered pairs from 5 to 8.</p> <p>This number populates the # field (<b>sSequenceNumber</b>) of the model pairs.</p> <p>The number displayed by default by the wizard corresponds to the largest existing pair number plus 1 (if the model contains 4 pairs, numbered 1 through 4, this number will be 5).</p> <p>The pair number is linked with the number of the color code entries of the model in order to associate a color code entry to a pair/conductor.</p>

### Data created or modified by the wizard

The wizard creates records in the **Pairs/Conductors** table (**amModelPair**).

The wizard populates the following fields:

**Table 3.11. Create pairs wizard - created or modified data**

Field label	SQL name of the field	Explanations
Name	Name	A sequential number that begins with the starting number specified using the wizard.
#	sSequenceNumber	A sequential number that begins with the starting number specified using the wizard.
Pair/Conductor type	CabPairType	The pair/conductor type is selected using the wizard.
Color code entry	ColorCodeDet	Color code entry associated with the cable whose number ( <b>sSequenceNumber</b> ) corresponds to the number of the conductor pair ( <b>sSequenceNumber</b> ).

## Viewing the result

The easiest way to view the result of this wizard is to look at the **Cable** tab of the model.

## After having launched the wizard

You need to edit the pairs/conductors manually if you want to change certain information relating to them.

## Creating the cable models for the practical case

We are going to create a 32-pair cable model (for the telephone riser) and a 4-pair cable model (for the given lateral and riser cables).

### Creating the models

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Create a new record per model and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2
Name ( <b>Name</b> )	L 120 - Category 5 - 32 twisted pairs	FTP - Category 5 - 4 twisted pairs
Nature ( <b>Nature</b> )	Cable	Cable
Brand ( <b>Brand</b> )	Corel	Corel
Label rule ( <b>LabelRule</b> )	Cable label rule	Cable label rule
Cable type ( <b>CableType</b> )	Twisted pairs	Twisted pairs
Color code ( <b>ColorCode</b> )	32 pairs	568B - 4 pairs

### Creating the pairs/conductors for each cable model

- 1 Select the model.
- 2 Launch the **Create pairs** wizard one time for each model, and specify the following values:

Label displayed by the wizard	Value for the L 120 - Category 5 - 32 twisted pairs cable	Value for the FTP - Category 5 - 4 twisted pairs cable
Number of pairs/conductors to generate	32	4
Default type for each pair/conductor created	Copper	Copper
Number to begin with	1	1

## Cable device models without slots.

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable device of this guide.

### Table names

- **Models (amModel)**
- **Model ports (amModelPort)**

### Access menu

**Portfolio/ Models**

## Creating the models of cable devices without slots

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Create a record for each cable device model in your network.
- 3 Add ports to the model.

You have the following choices:

- Add each port manually by clicking **+**.
- Launch the **Create ports** wizard.

## Prerequisites

You should have already created:

- A nature for the cable devices.
- The brands of the cable devices.
- Label rules.
- Device types.
- Connection types.
- Duties.

## Fields and links that must absolutely be populated

**Table 3.12. Models of cable devices without slots - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Models table ( amModel)</b>		
Name	Name	
Nature	Nature	Must be a cable device nature.
Label rule	LabelRule	
Device type	DeviceType	
Number of pins/terminals	lPins	If the device is connected to the network by pins on at least one side.
Number of sides	seDevSdType	
Ports	Ports	If the device is connected to the network by ports on all sides.
<b>Ports table ( amModelPort)</b>		
Port #	PortNo	If you create ports.
#	sSequenceNumber	If you create ports.
Connection type	CabCnxType	If you create ports.
Function	Duty	If you create ports.

## Connection by ports or by pins

There are two connection modes for the cable devices:

- By ports
- By pins

If the device is connected to the network by ports on all sides:

- Assign the value **0** to the **Number of pins/terminals** field (**IPins**).
- Create the **Ports** links (**Ports**). These ports will be associated with the cable bundles using the **Cable links** table (**amCableLink**).

If the device is connected to the network by pins on at least one side:

- Populate the **Number of pins/terminals** field (**IPins**) with the total number of pins contained by the cable device.
- Only create the **Ports** (**Ports**) link if you want to use the cabling wizards to create cable links to the device pins. In effect, such wizards create virtual ports that they associate automatically to the existing pins that are free.

## Create ports wizard

### Functions performed by the wizard

This wizard generates ports having the same duty and the same connection type.

### Prerequisites

You should have already created:

- Connection types
- Functions

### Launching the wizard

To access this wizard, you need to select a record or a field (not a link) in the **Models** table (**amModel**):

- 1 Display the list of models (**Portfolio/ Models**).

- 2 Select the model in the list window, or select a field (not link) in the **Models** table.
- 3 Select the **Create ports** wizard.

### Information used when using the wizard

**Table 3.13. Create ports wizard - description of fields to populate**

Label displayed by the wizard	Explanations
Default type for each port created	The selected value populates the <b>Connection type</b> link ( <b>CabCnxType</b> ) of each port created.
Type of duty by default for each port created	The selected value populates the <b>Duty</b> link ( <b>Duty</b> ) of each port created.
Number to begin with	For example, enter 1 if you want to create 4 numbered ports from 1 to 4. Enter 5 if you want to create 4 numbered ports from 5 to 8. This number populates the <b>Port #</b> field ( <b>PortNo</b> ) of the model ports. The number displayed by default by the wizard corresponds to the largest existing port number plus 1 (if the model contains 4 ports, numbered 1 through 4, this number will be 5).

### Data created or modified by the wizard

The wizard creates records in the **Model ports** table (**amModelPort**).  
The wizard populates the following fields:

**Table 3.14. Create ports wizard - data created or modified by the wizard**

Field label	SQL name of the field	Explanations
Sequence number of the port in the model	sSequenceNumber	A sequential number that begins with the starting number specified using the wizard.
Port #	PortNo	A sequential number that begins with the starting number specified using the wizard.
Connection type	CabCnxType	The connection type selected using the wizard.

Field label	SQL name of the field	Explanations
Function	Duty	The duty selected using the wizard.

## Viewing the result

The easiest way to view the result of this wizard is to look at the **Ports** tab of the model.

## After having launched the wizard

You need to edit the ports manually if you want to change certain information relating to them.

## Creating the models of cable devices without slots for the practical case

We are going to create the models that will help create the following cable devices without slots:

- 3-port wall outlet
- Patch panels
- Switch modules

## Creating the models

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Create a new record per model and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2	Value for record 3	Value for record 4
Name ( <b>Name</b> )	Procurve 10/100 Base T - 8 ports	24-port preloaded patch panel	32-port patch panel (256 pins)	3-port wall outlet
Nature ( <b>Nature</b> )	Cable device	Cable device	Cable device	Cable device
Brand ( <b>Brand</b> )	Hewlett Packard	Generic	Generic	ITT
Device type ( <b>DeviceType</b> )	Switch module	Patch panel	Patch panel	Wall outlet



Field or link to populate	Value for record 1	Value for record 2	Value for record 3	Value for record 4
Number of pins/terminals (IPins)	0	0	256	24
Number of sides (seDevSdType)	Single sided	Double sided	Double sided	Single sided

## Creating the ports for each device model for which the network connection is established by ports

For each model whose **Number of pins/terminals (IPins)** is null:

- 1 Select the **Procurve 10/100 Base T- 8 ports** model.
- 2 Launch the **Create ports** wizard one time by entering the following information:

Label displayed by the wizard	Value
Number of ports to generate	8
Default connection type for each port to generate	RJ45 - 568B - Port
Default type for each port created	Data
Number to begin with	1

- 3 Select the **24-port preloaded patch panel** model.
- 4 Launch the **Create ports** wizard one time by entering the following information:

Label displayed by the wizard	Value
Number of ports to generate	24
Connection type by default for each port to generate	RJ45 - 568B - Port
Type of duty by default for each port created	Data
Number to begin with	1

## Slot types

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Slot type of this guide.

### Table names

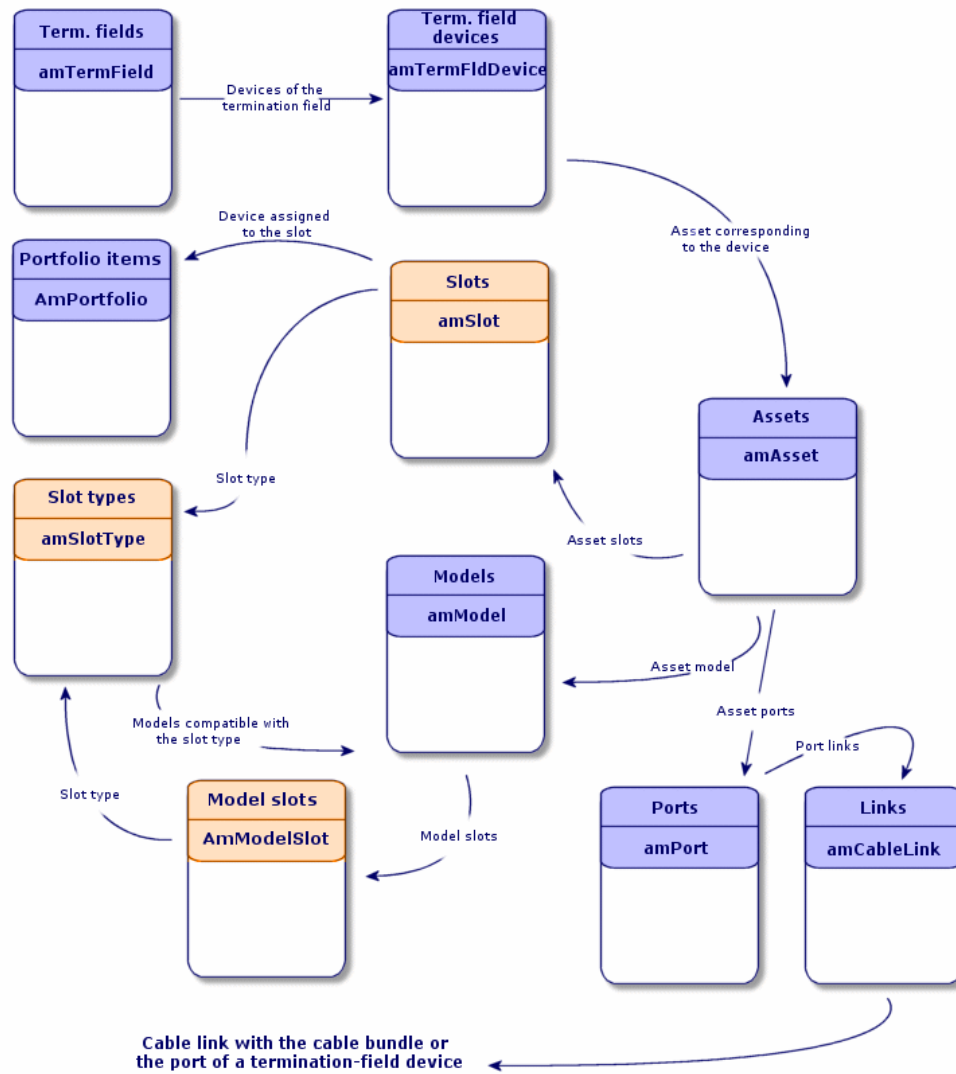
Slot types (amSlotType)

### Access menu

Cable/ Slot types

## Simplified data model

Figure 3.8. Slots - data model



## Creating slot types

- 1 Display the list of slot types (**Cable/ Slot types**).
- 2 Create a record per slot type of your termination-field devices.

### Prerequisites

You need to have already created the models of modules or extensions to insert in the slots.

### Fields and links that must absolutely be populated

**Table 3.15. Slot types - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
Name	Name
Compatible models	SlotTypeModels

## Creating the slot types for the practical case

We are going to create a slot type for the **ProcureSwitch 4000 M - 10 slots** model that will receive the **Procurve 10/100 Base T - 8 ports** models.

 **Note:**

You are going to create the **ProcureSwitch 4000 M - 10 slots** in another step.

- 1 Display the list of slot types (**Cable/ Slot types**).
- 2 Create a new record in the **Slot types** table (**amSlotType**) and populate the following fields:

Field or link to populate	Value
Name ( <b>Name</b> )	8-port switch module
Compatible models ( <b>SlotTypeModels</b> )	Procurve 10/100 Base T - 8 ports

## Cable device models with slots.

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable device of this guide.

### Table names

- **Models** (amModel)
- **Model slots** (amModelSlot)
- **Model ports** (amModelPort)

### Access menu

**Portfolio/ Models**

## Creating the models of cable devices with slots

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Create a record for each cable device model in your network.
- 3 Associate ports or slots to the model.

You have the following choices:

- Add each port or slot manually by clicking +.
- Launch either the **Create ports** or **Create slots** wizard.

### Connection by ports or by pins

See chapter **Implementing cable management (Cable and Circuit)**, section **Cable device models without slots./ Connection by ports or by pins**.

### Create ports wizard

See chapter **Implementing cable management (Cable and Circuit)**, section **Cable device models without slots./ Create ports wizard**.

## Prerequisites

You should have already created:

- A nature for the cable devices.
- The brands of the cable devices.
- Label rules.
- Device types.
- Connection types.
- Duties.
- Slot types.

## Fields and links that must absolutely be populated

**Table 3.16. Models of cable devices with slots - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Models table ( amModel)</b>		
Name	Name	
Nature	Nature	Must be a cable device nature.
Label rule	LabelRule	
Device type	DeviceType	
Number of pins/terminals	IPins	If the device is connected to the network by pins on at least one side.
Number of sides	seDevSdType	
Ports	Ports	If the device is connected to the network by ports on all sides.
Model slots	ModelSlots	If the device must receive connection modules in its slots.
<b>Ports table (amPort)</b>		
Port #	PortNo	If you create ports.
#	sSequenceNumber	If you create ports.
Connection type	CabCnxType	If you create ports.
Function	Duty	If you create ports.

Label of the field or link	SQL name of the field or link	Remarks
<b>Model slots table (amModelSlot)</b>		
Name	Name	If you create slots.
#	sSequenceNumber	If you create slots.
Slot type	SlotType	If you create slots.

## Create slots wizard

### Functions performed by the wizard

This wizard generates slots having the same type.

### Prerequisites

You should have already created:

- Slot types

### Launching the wizard

To access this wizard, you need to select a record or select a field (not a link) in the **Models** table (**amModel**).

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Select the model in the list window, or select a field (not a link) in the **Models** table.
- 3 Select the **Create slots** wizard.

### Information used when using the wizard

**Table 3.17. Create slots wizard - description of fields to populate**

Label displayed by the wizard	Explanations
Default type for each slot created	The selected value populates the <b>Slot type</b> link ( <b>SlotType</b> ) of each slot created.

Label displayed by the wizard	Explanations
Number to begin with	<p>For example, enter 1 if you want to create 4 numbered slots from 1 to 4. Enter 5 if you want to create 4 numbered slots from 5 to 8.</p> <p>This number populates the # field (<b>sSequenceNumber</b>) and Name field (<b>amModelSlot</b>) of the model slots.</p> <p>The number displayed by default by the wizard corresponds to the largest existing slot number plus 1 (if the model contains 4 slots, numbered 1 through 4, this number will be 5).</p>

### Data created or modified by the wizard

The wizard creates records in the **Model slots** table (**amModelSlot**).  
The wizard populates the following fields:

**Table 3.18. Create slots wizard - created or modified data**

Field label	SQL name of the field	Explanations
Name	Name	A sequential number that begins with the starting number specified using the wizard.
#	sSequenceNumber	A sequential number that begins with the starting number specified using the wizard.
Slot type	SlotType	The slot type selected using the wizard.

### Viewing the result

The easiest way to view the result of this wizard is to look at the **Slots** tab of the model.

### After having launched the wizard

You need to edit the slots manually if you want to change certain information relating to them.



## Creating the models of cable devices with slots for the practical case

We are going to create the model of a modular switch that has 10 slots:

### Creating the model

- 1 Display the list of models (**Portfolio/ Models**).
- 2 Create a new record and populate the following fields:

Field or link to populate	Value
Name ( <b>Name</b> )	ProcureSwitch 4000 M - 10 slots
Nature ( <b>Nature</b> )	Cable device
Brand ( <b>Brand</b> )	Hewlett Packard
Device type ( <b>DeviceType</b> )	Switch
Number of pins/terminals ( <b>IPins</b> )	0
Number of sides ( <b>seDevSdType</b> )	Single sided

### Creating the slots

- 1 Select the **Procurve 4000M- 10 slots** model.
- 2 Launch the **Create slots** wizard one time for each model, and specify the following values:

Label displayed by the wizard	Value
Number of slots to generate	10
Default type for each slot created	8-ports switch module
Number to begin with	1

## Topologies

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Topology of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Topology step of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Host of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ User of this guide.

### **Table names**

- **Topologies (amTopology)**
- **Topology steps (amTopologyDet)**

### **Access menu**

**Cable/ Topologies**



- 1 A link at the level of the wall outlet.
- 2 A link at the level of a lateral cable.
- 3 A link at the level of a termination-field device.

### Prerequisites

You should have already created the:

- Duties
- Label rules
- Cable types
- Pair/conductor types
- Device types
- Connection types
- Roles
- Models of cables and cable devices to create from the topology step.

### Fields and links that must absolutely be populated

**Table 3.19. Topologies - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Topologies table (amTopology)</b>		
Name	Name	
Direction	seTraceDir	
Function	Duty	
Topology steps	Detail	
<b>Topology steps table (amTopologyDet )</b>		
#	sSequenceNumber	
Link type	seLinkType	
Label rule	LabelRule	
Cable type	CableType	If seLinkType = <b>Cable</b>
Device type	DeviceType	If seLinkType = <b>Device</b>
Pair/Conductor type	CabPairType	If seLinkType = <b>Cable</b>
Connection type	CabCnxType	If seLinkType = <b>Device</b>

Label of the field or link	SQL name of the field or link	Remarks
Map bundles at pair/conductor level	bPairLevelMapping	If seLinkType = <b>Cable</b>
Termination-field device	bTermField	If seLinkType = <b>Device</b>
No. of pairs/conductors	sPairs	If seLinkType = <b>Cable</b>
Auto-create Model	seCreateType	If seCreateType <> <b>Never create</b>
Role	CableRole	<ul style="list-style-type: none"> <li>• If seLinkType = <b>Cable</b></li> <li>• or bTermField = <b>Yes</b></li> </ul>

## Creating the topologies for the practical case

We are going to create two topologies:

- Data connection between the wall outlet and the floor's termination field.
- Telephone connection between the wall outlet and the floor's termination field.

These topologies break down into three steps:

- 1 A link at the level of the wall outlet.
- 2 A link at the level of the lateral cable.
- 3 A link at the level of the termination-field device.

These topologies are then assembled together in a group of topologies.

### Creating the topologies

- 1 Display the list of topologies (**Cable/ Topologies**).
- 2 Create a new record per topology and populate the following fields:

Field or link to populate	Value for record 1	Value for record 2
Name ( <b>Name</b> )	Telephone outlet to termination field.	Local network outlet to termination field
Direction ( <b>seTraceDir</b> )	User to host	User to host
Duty ( <b>Duty</b> )	Voice	Data

## Creating the steps for the Telephone outlet to termination field topology

- 1 Select the topology.
- 2 Create step 1 by populating the following fields:

Field or link to populate	Value
# (sSequenceNumber)	1
Cable link type (seLinkType)	Device
Label rule (LabelRule)	Wall outlet label
Cable type (CableType)	Do not populate.
Device type (DeviceType)	Wall outlet
Pair/ Conductor type (CabPairType)	Do not populate.
Connection type (CabCnxType)	RJ45 - 568B - Pin
Map bundles at pair/conductor level (bPairLevelMapping)	Do not populate.
Termination field device (bTermField)	Do not populate.
No. of pairs/conductors (sPairs)	Do not populate.
Auto-create (seCreateType)	Create if not available
Model (Model)	3-port outlet
Role (CableRole)	Do not populate.

- 3 Create step 2 by populating the following fields:

Field or link to populate	Value
# (sSequenceNumber)	2
Cable link type (seLinkType)	Cable
Label rule (LabelRule)	Label by sequential pair number
Cable type (CableType)	Twisted pairs
Device type (DeviceType)	Do not populate.
Pair/ Conductor type (CabPairType)	Copper (2)
Connection type (CabCnxType)	Do not populate.
Map bundles at pair/conductor level (bPairLevelMapping)	Check this selection box.
Termination field device (bTermField)	Do not populate.
No. of pairs/conductors (sPairs)	2
Auto-create (seCreateType)	Always create
Model (Model)	FTP - Category 5 - 4 twisted pairs
Role (CableRole)	Lateral

4 Create step 3 by populating the following fields:

Field or link to populate	Value
# (sSequenceNumber)	3
Cable link type (seLinkType)	Device
Label rule (LabelRule)	Term-field patch-panel port label
Cable type (CableType)	Do not populate.
Device type (DeviceType)	Patch panel
Pair/ Conductor type (CabPairType)	Do not populate.
Connection type (CabCnxType)	RJ45 - 568B - Pin
Map bundles at pair/conductor level (bPairLevelMapping)	Do not populate.
Termination field device (bTermField)	Check this selection box.
No. of pairs/conductors (sPairs)	Do not populate.
Model (Model)	Do not populate.
Role (CableRole)	Lateral

### Creating the steps for the Local network outlet to termination field topology

- 1 Select the topology.
- 2 Create step 1 by populating the following fields:

Field or link to populate	Value
# (sSequenceNumber)	1
Cable link type (seLinkType)	Device
Label rule (LabelRule)	Wall outlet label
Cable type (CableType)	Do not populate.
Device type (DeviceType)	Wall outlet
Pair/ Conductor type (CabPairType)	Do not populate.
Connection type (CabCnxType)	RJ45 - 568B - Pin
Map bundles at pair/conductor level (bPairLevelMapping)	Do not populate.
Termination field device (bTermField)	Do not populate.
No. of pairs/conductors (sPairs)	Do not populate.
Auto-create (seCreateType)	Create if not available
Model (Model)	3-port outlet
Role (CableRole)	Do not populate.

3 Create step 2 by populating the following fields:

Field or link to populate	Value
# (sSequenceNumber)	2
Cable link type (seLinkType)	Cable
Label rule (LabelRule)	Label by sequential pair number
Cable type (CableType)	Twisted pairs
Device type (DeviceType)	Do not populate.
Pair/ Conductor type (CabPairType)	Copper (2)
Connection type (CabCnxType)	Do not populate.
Map bundles at pair/conductor level (bPairLevelMapping)	Check this selection box.
Termination field device (bTermField)	Do not populate.
No. of pairs/conductors (sPairs)	4
Auto-create (seCreateType)	Always create
Model (Model)	FTP - Category 5 - 4 twisted pairs
Role (CableRole)	Lateral

#### 4 Create step 3 by populating the following fields:

Field or link to populate	Value
# (sSequenceNumber)	3
Cable link type (seLinkType)	Device
Label rule (LabelRule)	Term-field patch-panel port label
Cable type (CableType)	Do not populate.
Device type (DeviceType)	Patch panel
Pair/ Conductor type (CabPairType)	Do not populate.
Connection type (CabCnxType)	RJ45 - 568B - Port
Map bundles at pair/conductor level (bPairLevelMapping)	Do not populate.
Termination field device (bTermField)	Check this selection box.
No. of pairs/conductors (sPairs)	Do not populate.
Model (Model)	Do not populate.
Role (CableRole)	Lateral



# Topology groups

## Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Topology group of this guide.

## Table names

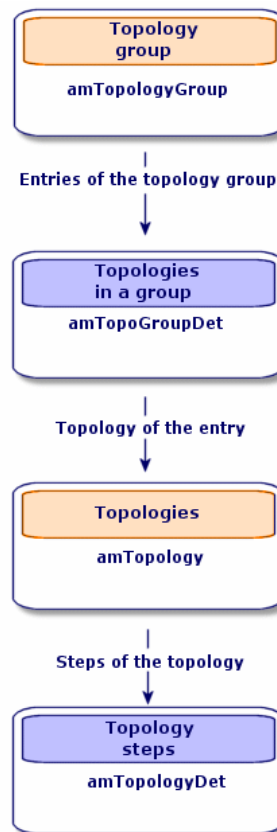
- **Topology groups (amTopologyGroup)**
- **Topologies in a group (amTopoGroupDet)**

## Access menu

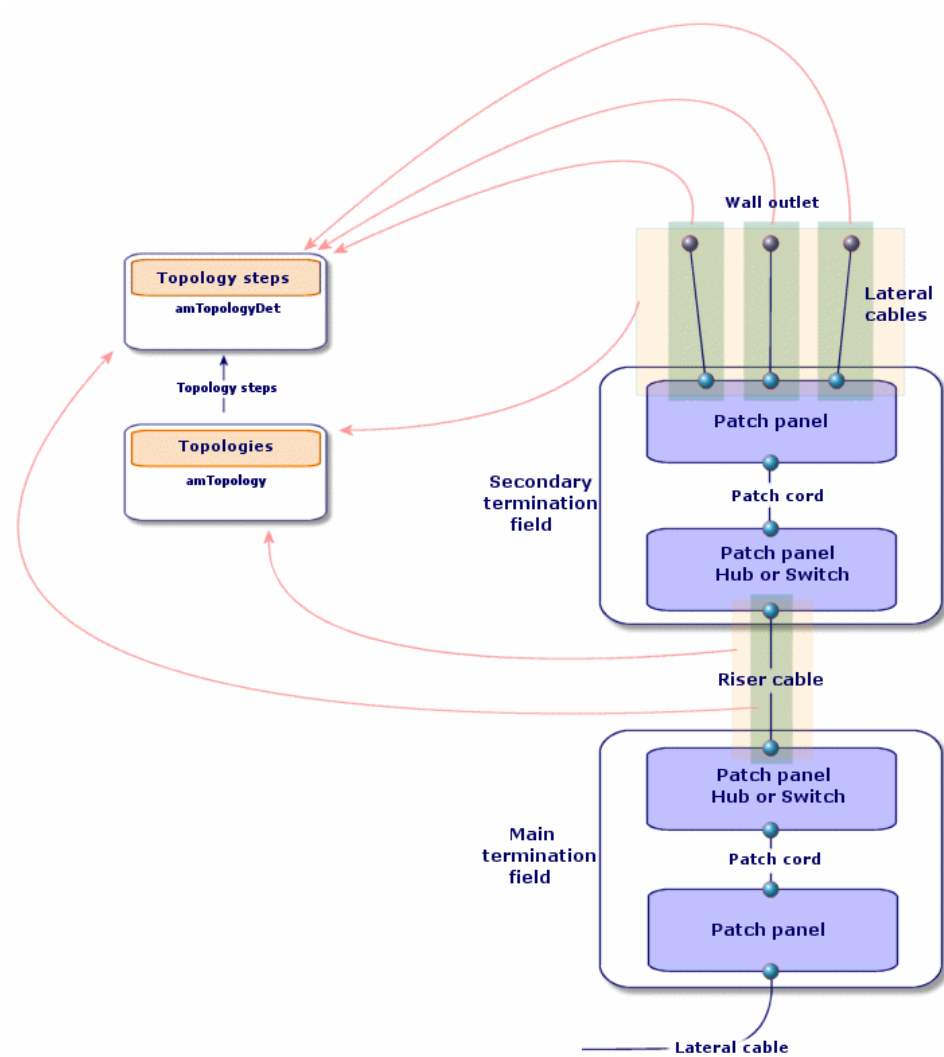
**Cable/ Topology groups**

## Simplified data model

Figure 3.10. Topology groups - data model



**Figure 3.11. Topologies - correspondence between the termination field of a network**



## Creating topology groups

- 1 Display the list of topology groups (**Cable/ Topology groups**).

2 Create one record per configuration type of your network.

Example - A standard workstation is composed of 3 topologies:

- Telephone outlet to a termination field.
- Local network outlets to a termination field.
- Local network outlets to termination field.

### Prerequisites

You need to have already created the topologies.

### Fields and links that must absolutely be populated

**Table 3.20. Topology groups - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
<b>Topology groups table (amTopologyGroup)</b>	
Name	Name
Topologies of the group	TopoGrpDetail
<b>Topologies in a group table (amTopoGroupDet)</b>	
#	sSequenceNumber

## Creating the topology groups for the practical case

We are going to create a group of topologies that reunite the following topologies:

- 1 telephone outlet to a termination field.
- 2 local network outlets to a termination field.

### Creating the topology group

- 1 Display the list of topology groups (**Cable/ Topology groups**).
- 2 Create a record and populate the following fields:

Field or link to populate	Value
Name ( <b>Name</b> )	Standard workstation

## Adding topologies to the Standard workstation group

- 1 Select the **Standard workstation** topology group.
- 2 Add topology 1 by populating the following fields and links:

Field or link to populate	Value
# (sSequenceNumber)	1
Topology (Topology)	Telephone outlet to termination field.

- 3 Add topology 2 by populating the following fields and links:

Field or link to populate	Value
# (sSequenceNumber)	2
Topology (Topology)	Local network outlet to termination field

- 4 Add topology 3 by populating the following fields and links:

Field or link to populate	Value
# (sSequenceNumber)	3
Topology (Topology)	Local network outlet to termination field

## Termination-field configurations

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Termination-field configuration of this guide.

### Table names

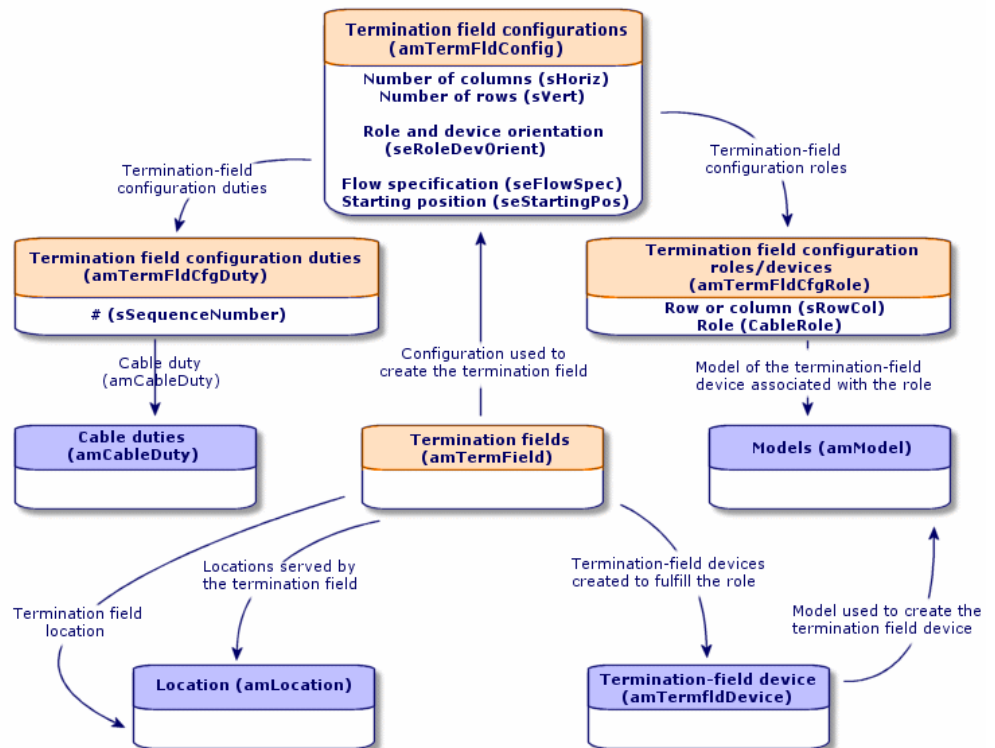
- **Termination field configurations (amTermFldConfig)**
- **Termination-field configuration duties/services (amTermFldCfgDuty)**
- **Termination field configuration roles and devices (amTermFldCfgRole)**

## Access menu

### Cable/ Termination field configurations

### Simplified data model

**Figure 3.12. Termination-field configuration - data model**

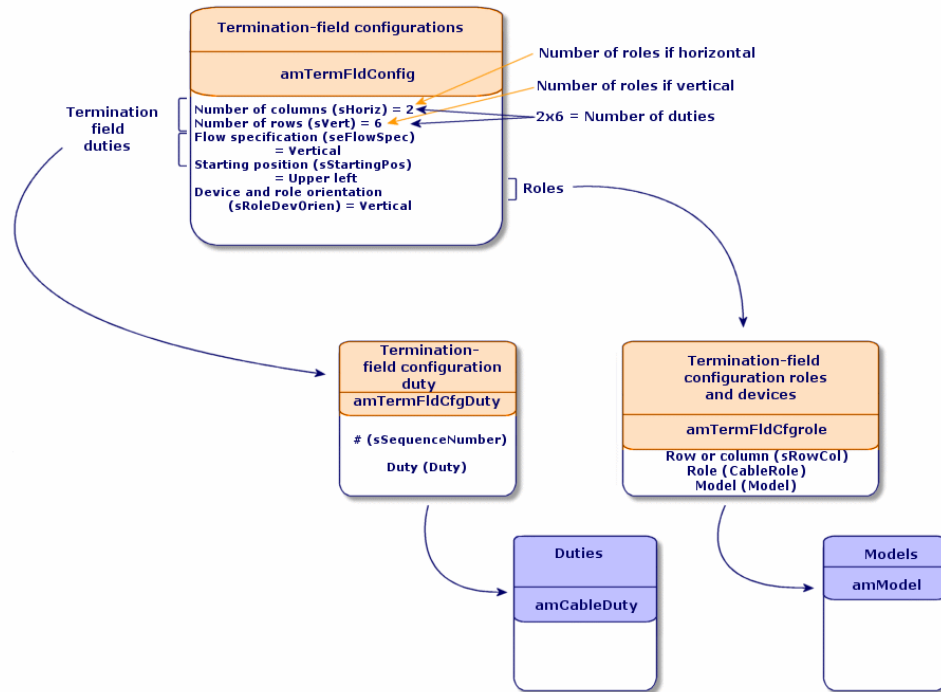


### Parameters of a termination-field configuration

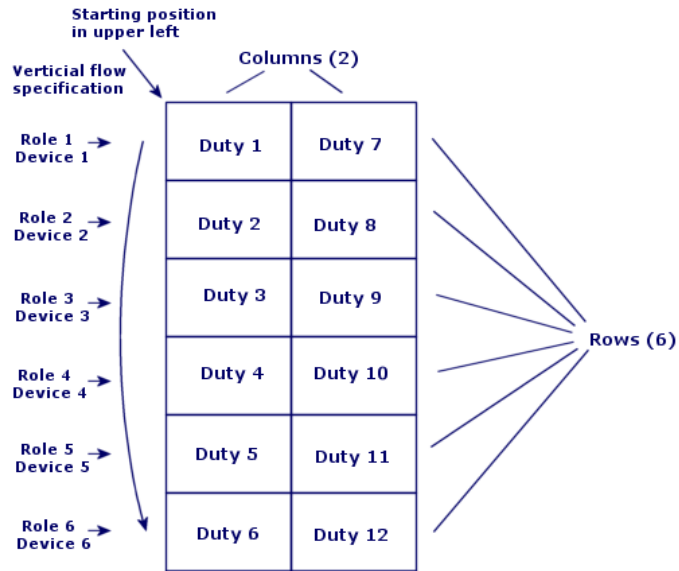
A termination-field configuration defines numerous parameters that are used by the cabling wizards to create a termination field.

The following diagrams will explain how these parameters are interpreted when you create a termination field.

**Figure 3.13. Example of termination-field configuration - representation in AssetCenter**



**Figure 3.14. Example of termination-field configuration - correspondence at the termination field level**



Role and device orientation = Vertical

**Figure 3.15. Termination-field configuration - example of the impact resulting from changing the starting position**

If starting position = Lower right

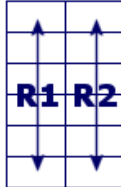
D12	D6
D11	D5
D10	D4
D9	D3
D8	D2
D7	D1

D="Duty"



**Figure 3.16. Termination-field configuration - example of the impact resulting from changing the cable device and role orientations**

If device and role orientation = Horizontal



R = "Role and device"

**Figure 3.17. Termination-field configuration - example of the impact resulting from changing the flow specification**

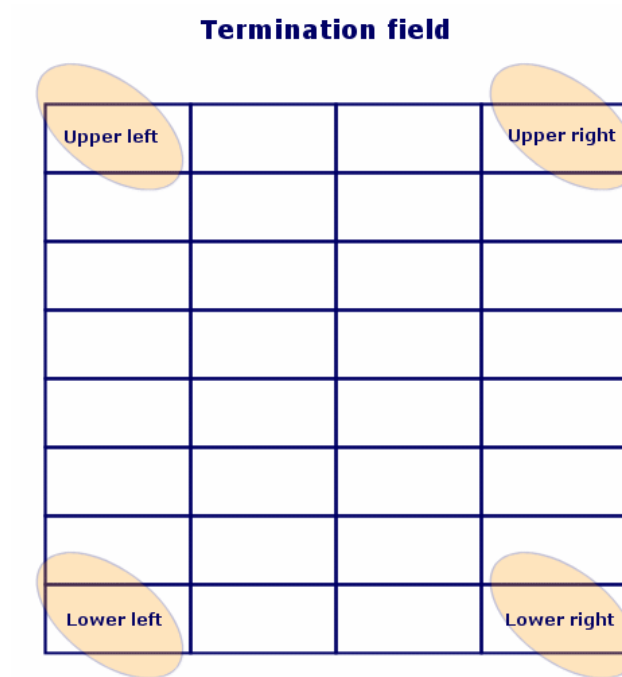
If flow specification = Horizontal

D1	D2
D3	D4
D5	D6
D7	D8
D9	D10
D11	D12

D="Duty"

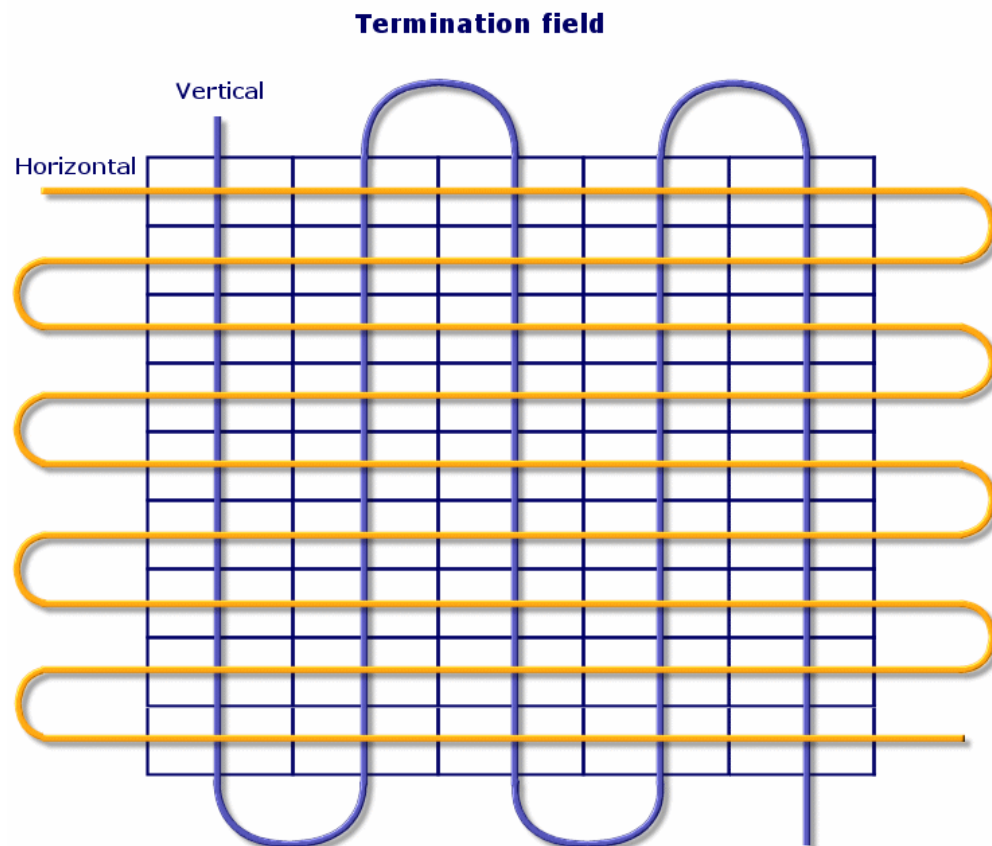
## Starting position

**Figure 3.18. Termination-field configuration - signification of the starting positions**



## Flow specification

**Figure 3.19. Termination-field configuration - signification of the flow specification**



## Creating termination-field configurations

- 1 Display the list of termination-field configurations (**Cable/Termination field configurations**).
- 2 Create one record per termination-field type of your network.

## Prerequisites

You should have already created the:

- Functions
- Label rules
- Roles
- Termination-field configuration models

## Fields and links that must absolutely be populated

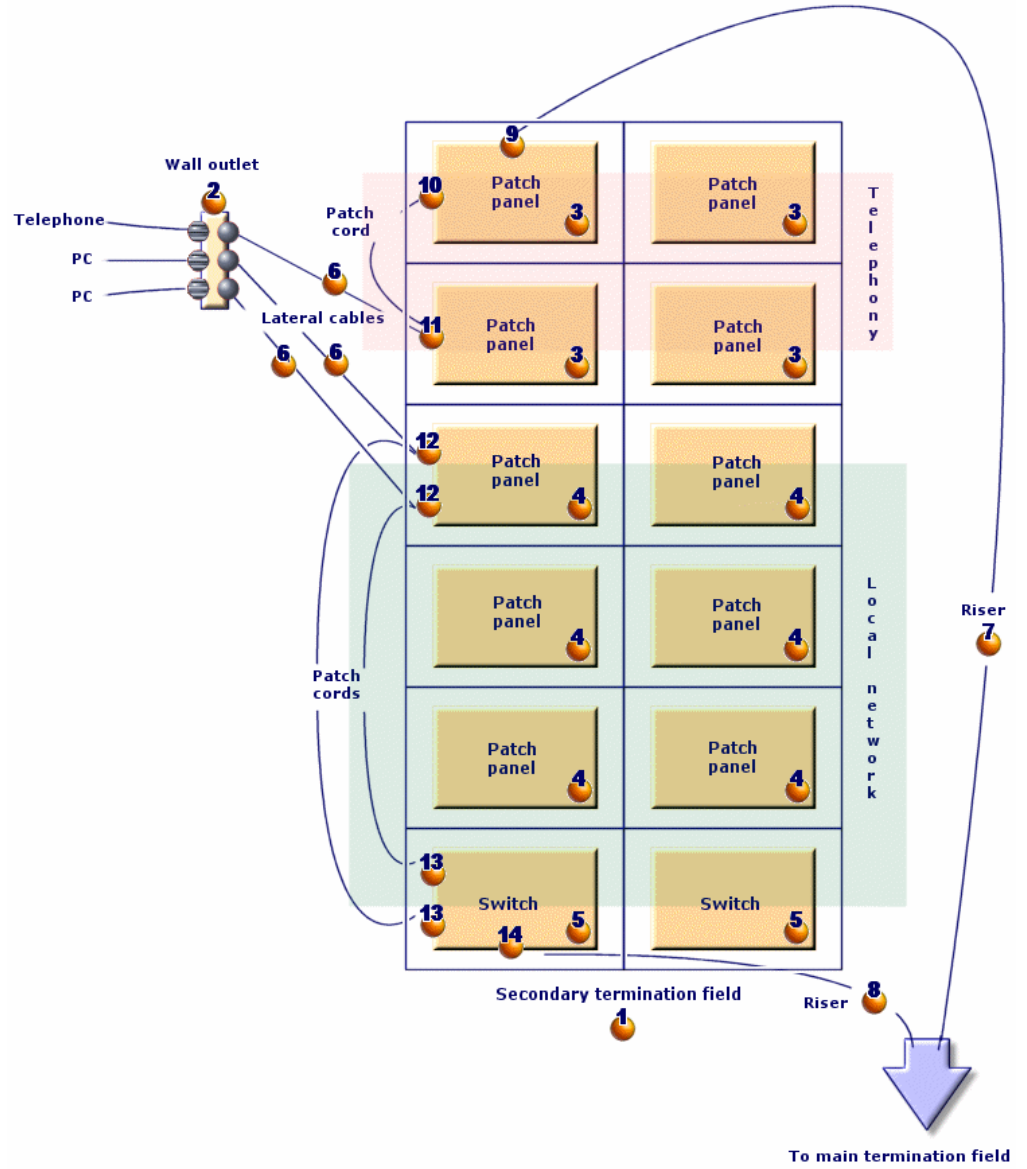
**Table 3.21. Termination-field configurations - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
<b>Termination field configurations table (amTermFldConfig)</b>	
Name	Name
Number of columns	sHoriz
Number of rows	sVert
Flow specification	seFlowSpec
Starting position	seStartingPos
Termination field configuration duties/services	TermFldCfgDuty
Role and device orientation	seRoleDevOrient
Label rule	LabelRule
Termination field configuration roles and devices	TermFldConfRoles
<b>Termination field configuration duties/services (amTermFldCfgDuty)</b>	
#	sSequenceNumber
Function	Duty
<b>Termination field configuration roles and devices table (amTermFldCfgRole)</b>	
Row or column	sRowCol
Role	CableRole
Model	Model

## Creating the termination-field configurations for the practical case

We are going to create a termination-field configuration based on the following model:

Figure 3.20. Practical case - Termination-field configuration to create



## Creating the termination-field configuration

- 1 Display the list of termination-field configurations (**Cable/Termination field configurations**).
- 2 Create a record and populate the following fields:

Field or link to populate	Value
Name ( <b>Name</b> )	Standard termination field
Number of columns ( <b>sHoriz</b> )	2
Number of rows ( <b>sVert</b> )	6
Flow specification ( <b>seFlowSpec</b> )	Vertical
Starting position ( <b>seStartingPos</b> )	Top-left
Role and device orientation ( <b>seRoleDevOrient</b> )	Vertical
Label rule ( <b>LabelRule</b> )	Wallfield label

## Creating the duties of the Standard termination field configuration

- 1 Select the termination-field configuration.
- 2 Select the **Duties** tab and add duties by populating the following fields and links:

Field or link to populate	# ( <b>sSequenceNumber</b> )	Duty ( <b>Duty</b> )
Value for duty 1	1	Voice
Value for duty 2	2	Voice
Value for duty 3	3	Data
Value for duty 4	4	Data
Value for duty 5	5	Data
Value for duty 6	6	Data
Value for duty 7	7	Voice
Value for duty 8	8	Voice
Value for duty 9	9	Data
Value for duty 10	10	Data
Value for duty 11	11	Data
Value for duty 12	12	Data

## Creating the roles of the Standard termination field configuration

- 1 Select the termination-field configuration.
- 2 Select the **Roles and devices** tab and add roles/devices by populating the following fields and links:

	<b>Row or column (sRowCol)</b>	<b>Role (CableRole)</b>	<b>Model (Model)</b>
Value for role 1	1	Riser	32-port patch panel (256 pins)
Value for role 2	2	Lateral	32-port patch panel (256 pins)
Value for role 3	3	Lateral	24-port preloaded patch panel
Value for role 4	4	Lateral	24-port preloaded patch panel
Value for role 5	5	Lateral	24-port preloaded patch panel
Value for role 6	6	Riser	ProcureSwitch 4000 M - 10 slots



# 4 Termination fields

## CHAPTER

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Termination field of this guide.

### Table names

**Termination fields (amTermField)**

### Access menu

**Cable/ Termination fields**

### Creating termination fields

You can create the termination field manually or you can use one of the following wizards:

- **Create a termination field**
- **Expand termination field**

- Duplicate wiring closet

### Prerequisites

You should have already created the:

- Termination-field configurations.
- Location of termination fields and work posts served by the termination fields.
- Duties
- Label rules
- Roles
- Termination-field device models.

### Fields and links that must absolutely be populated

**Table 4.1. Termination fields - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link
<b>Termination fields table (amTermField)</b>	
Name	Name
Location	Rental
Termination field devices	TermFieldDevices
User locations	UserLocs
<b>Termination field devices table (amTermFldDevice)</b>	
Role	CableRole
Label	Label
Horizontal position	sHoriz
#	sSequenceNumber
Vertical position	sVert

### Creating termination fields manually

For each termination field in your network (main termination field or the one on each floor):

- 1 Display the list of termination fields (**Cable/ Termination fields**).
- 2 Create a record.

- 3 Create the termination-field slots using the **Termination field devices** link (**TermFieldDevices**).
- 4 Select the termination fields served by the termination field using the **User locations** link (**UserLocs**).

## Create a termination field wizard

### Functions performed by the wizard

The **Create termination field** wizard creates a termination field from a termination-field configuration.

### Prerequisites

You should have already created the:

- Termination-field configurations
- Locations of the served termination fields and workstations.

### Launching the wizard

Launching a wizard does not necessarily require that you be in a specific context.

To launch a wizard:

- 1 Display the list of actions (**Tools/ Actions**).
- 2 Select the **Create a termination field** wizard.

### Information used when using the wizard

**Table 4.2. Create a termination field wizard - description of fields to populate**

Label displayed by the wizard	Explanations
Configure the termination field page	

Label displayed by the wizard	Explanations
Automatically name the termination field?	<p>If you check this option, the wizard uses the <b>TermFieldName</b> calculated field to populate the <b>Name</b> field (<b>Name</b>) of the termination field.</p> <p>To learn more about calculated fields, refer to the chapter <b>References (Cable and Circuit)</b>, section <b>Calculated fields (Cable and Circuit)</b> of this guide.</p>
Termination field name	This field populates the <b>Name</b> field ( <b>Name</b> ) of the termination field if you did not check the <b>Automatically name the termination field</b> option.
Locations	Select the termination field's location.
Termination-field configurations	Select the configuration that must be used as the model for the creation of the termination field.
<b>Specify the options page</b>	
Column	<p>Indicate the number of termination field columns to create. This number must be inferior or equal to the <b>Number of columns</b> field (<b>sHoriz</b>) of the termination-field configuration. The value of this field is proposed by default.</p>
Line	<p>Indicate the number of termination-field rows to create. This number must be inferior or equal to the <b>Number of rows</b> field (<b>sVert</b>) of the termination-field configuration. The value of this field is proposed by default.</p>
Auto-generate devices	<p>If you check this option, the wizard creates a termination-field device for the termination-field slots.</p> <p>The wizard uses the <b>Model</b> link (<b>Model</b>) for this, which is defined at the level of the termination-field configuration roles and devices.</p>
Label rule for new devices	<p>Select the label rule to associate with the termination-field devices created by the wizard.</p> <p>This label rule populates the devices' <b>Label rule</b> (<b>LabelRule</b>) link. It also populates the devices' <b>Label</b> field (<b>Label</b>) in reference to this label rule.</p> <p>The label rule that the wizard proposed by default is the rule selected using the <b>Label rule</b> link (<b>LabelRule</b>) of the termination-field configuration.</p>
<b>Select a project and a work order page</b>	

Label displayed by the wizard	Explanations
Apply all changes to a project/work order:	Check this option if you want to: <ul style="list-style-type: none"> <li>• Keep a trace of the operations performed in the database at the project level.</li> <li>• Describe the actions that you need to perform for (during) the work order.</li> </ul>
Projects	The project in which is stored a trace of the operations performed in the database by the wizard.
Work orders	The work orders in which is described the actions that you must physically perform for the work order.
Device comments	Enter the value to create for the <b>Description</b> field ( <b>Description</b> ) of the <b>Assets included in projects</b> table ( <b>amAstProjDesc</b> ).  This applies to all the devices created by the wizard.

### Data created or modified by the wizard

The wizard creates:

- 1 termination field (**amTermField**).
- Termination field devices (**amTermFldDevice**).
- The assets corresponding to the termination-field devices (**amAsset**).
- Ports for the devices (**amPort**).
- Slots for the devices (**amSlot**).
- Pins/terminals for the devices (**amDevicePin**).

The wizard populates the following fields:

**Table 4.3. Create a termination field wizard - data created or modified by the wizard**

Field label	SQL name of the field	Explanations
<b>Termination field table (amTermField)</b>		
Name	Name	The name that you selected using the wizard or the name determined by the <b>TermFieldName</b> calculated field.

Field label	SQL name of the field	Explanations
Termination field configuration	TermFldConfig	The configuration selected using the wizard.
Location	Rental	The location selected using the wizard.
Termination-field devices	TermFieldDevices	The wizard creates a device for each termination-field slot is created if you checked the <b>Automatically generate the devices</b> option in the wizard.
<b>Termination field devices table (amTermFldDevice)</b>		
#	sSequenceNumber	Defined according to the termination-field configuration parameters.
Horizontal position	sHoriz	Defined according to the termination-field configuration parameters.
Vertical position	sVert	Defined according to the termination-field configuration parameters.
Role	CableRole	The <b>Role</b> field ( <b>CableRole</b> ) of the termination-field configuration role corresponding to the position of the device in the termination field.
Device	Device	The device created by the wizard using the <b>Model</b> link ( <b>Model</b> ) of the termination-field configuration role corresponding to the position of the device in the termination field.
<b>Assets table (amAsset)</b>		
Model	Model	The <b>Model</b> ( <b>Model</b> ) of the termination-field configuration role corresponding to the position of the device in the termination field.
Label rule	LabelRule	Label rule selected using a wizard.
Label	Label	Label calculated by a wizard and based on the label rule of the device.
Slots	AssetSlots	Slots of the device model.
Device pins/terminals	Pins	AssetCenter creates as many pins as there are defined by the <b>Number of pins/terminals</b> field ( <b>IPins</b> ) of the model.
Ports	Ports	Ports of the device model.
<b>Ports table (amPort)</b>		
Port #	PortNo	Same as for the model.
#	sSequenceNumber	Same as for the model.
Connection type	CabCnxType	Same as for the model.
Status	seCnxStatus	Value set to <b>Available</b> by the wizard.

Field label	SQL name of the field	Explanations
Function	Duty	The <b>Duty</b> link ( <b>Duty</b> ) of the termination-field configuration duty defined for the device slot, of which the port is a part.
<b>Slots table (amSlot)</b>		
Name	Name	Same as for the model.
#	sSequenceNumber	Same as for the model.
Slot type	SlotType	Same as for the model.
<b>Pins table (amDevicePin)</b>		
Name	Name	Automatic sequential number.
#	sSequenceNumber	Automatic sequential number.
Status	seCnxStatus	Value set to <b>Available</b> by the wizard.

## Viewing the result

The termination field created can be viewed by selecting it in one of the following manners:

- Option 1:
  - 1 Display the list of termination fields (**Cable/ Termination fields**).
  - 2 Select the termination field created by the wizard.
- Option 2:
  - 1 Display the list of locations (**Portfolio/ Locations**).
  - 2 Select the location of the termination field created by the wizard.
  - 3 Select the **Termination fields** tab.
  - 4 Select the termination field created by the wizard.

## After having launched the wizard

The wizard does not populate the following links:

- **User locations** link (**UserLocs**) of the termination fields (if it concerns locations served by the termination field).
- **Device (Asset)** of the termination-field device slots.

You therefore need to:

- 1 Display the list of termination fields (**Cable/ Termination fields**).

- 2 Select the termination field created by the wizard.
- 3 Select the **Served locations** tab.
- 4 One by one, add the locations served by the termination field.
- 5 Select the **Devices** tab.
- 6 One by one, select the devices with their slots, and for each one of them:
  - 1 Click the **Magnifier**.
  - 2 Click the **Magnifier** to the right of the **Device** link (**Device**).
  - 3 Select the **Slots** tab.
  - 4 One by one, select the slots to use, and for each one of them:
    - 1 Click the **Magnifier**.
    - 2 Populate the fields and links in the detail window.
  - 5 Click **Modify**.
  - 6 Click **Modify**.
  - 7 Click **Close**.
- 7 Click **Modify**.

## Use the Create a termination field wizard for the practical case.

We are going to create 1 termination-field column from the **Standard termination field** configuration. The second column will be added later using the **Expand termination field** wizard.

- 1 Display the list of actions (**Tools/ Actions**).
- 2 Select the **Create a termination field** wizard.
- 3 Enter the following information:


<b>Label displayed by the wizard</b>	<b>Value to enter or select</b>
<b>Configure the termination field page</b>	
Automatically name the termination field?	Do not check this option.
Termination field name	Floor's termination field
Locations	Cabled building/1st floor/1st floor's wiring closet



Label displayed by the wizard	Value to enter or select
Termination-field configurations	Standard termination field
<b>Specify the options page</b>	
Column	1
Line	6
Auto-generate devices	Check this selection box.
Label rule for new devices	Wallfield label
<b>Select a project and a work order page</b>	
Apply all changes to a project/work order?	Check this selection box.
Projects	Create a termination field
Work orders	Select the work order proposed by the wizard.
Device comments	Install the device in termination field.

- 4 Manually add the locations served by the termination field:
  - 1 Display the list of termination fields (**Cable/ Termination fields**).
  - 2 Select the **Floor's termination field**.
  - 3 Select the **Served locations** tab.
  - 4 Add the **Cabled building/1st floor/Office 1** location.
  - 5 Click **Modify**.
- 5 Add the modules in the slots of the **ProcureSwitch 4000 M - 10 slots** devices:
 

---

 **Warning:**

This will be done later on, according to the procedure described in the chapter **Cable devices, cables and connections - manual creation**, section **Cable devices - manual creation/ Creating the cable devices manually for the practical case** of this guide.

---
- 6 View the results created by the wizard by looking at the other tabs.

## Expand termination field wizard

### Functions performed by the wizard

The **Expand termination field** wizard adds rows or columns to an existing termination field from a termination-field configuration.

## Prerequisites

You should have already created:

The existing termination field must have less rows or columns than the termination-field configuration.

- The workstation locations served by the termination fields.
- The termination field to expand.

## Launching the wizard

To access this wizard, you must select a record or a field (not a link) from the **Termination fields** table (**amTermField**):

- 1 Display the list of termination fields (**Cable/ Termination fields**).
- 2 Select the termination field to expand from the list in the window.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Expand termination field** wizard.

## Information used when using the wizard

**Table 4.4. Expand termination field wizard - description of fields to populate**

<b>Label displayed by the wizard</b>	<b>Explanations</b>
<b>Specify the options page</b>	
Column	Indicate the number of termination field columns to add. This number must be inferior or equal to the <b>Number of columns</b> field ( <b>sHoriz</b> ) of the termination-field configuration. The possible number of columns that you can add is proposed by default.
Line	Indicate the number of termination-field rows to add. This number must be inferior or equal to the <b>Number of rows</b> field ( <b>sVert</b> ) of the termination-field configuration. The possible number of rows that you can add is proposed by default.

Label displayed by the wizard	Explanations
Auto-generate devices	<p>If you check this option, the wizard creates a termination-field device for the termination field slots.</p> <p>The wizard uses the <b>Model</b> link (<b>Model</b>) for this, which is defined at the level of the termination-field configuration roles and devices.</p>
Select the label rule for new devices	<p>Select the label rule to associate with the termination-field devices created by the wizard.</p> <p>This label rule populates the devices' <b>Label rule</b> link (<b>LabelRule</b>).</p> <p>The wizard also populates the devices' <b>Label</b> field (<b>Label</b>) in reference to this label rule.</p> <p>The label rule that the wizard proposed by default is the rule selected using the <b>Label rule</b> link (<b>LabelRule</b>) of the termination-field configuration.</p>
<b>Select a project and a work order page</b>	
Apply all changes to a project/work order?	<p>Check this option if you want to:</p> <ul style="list-style-type: none"> <li>• Keep a trace of the operations performed in the database at the project level.</li> <li>• Describe the actions that you need to perform for (during) the work order.</li> </ul>
Projects	The project in which is stored a trace of the operations performed in the database by the wizard.
Work orders	The work orders in which is described the actions that you must physically perform for the work order.
Device comments	Enter the value to create for the <b>Description</b> field ( <b>Description</b> ) of the <b>Assets included in projects</b> table ( <b>amAstProjDesc</b> ). This applies to the devices created while extending the termination field.

## Data created or modified by the wizard

The wizard creates:

- Termination field devices (**amTermFldDevice**)
- The assets corresponding to the termination-field devices (**amAsset**).
- Ports for the devices (**amPort**).
- Slots for the devices (**amSlot**).
- Pins/terminals for the devices (**amDevicePin**).

The wizard populates the following fields:

**Table 4.5. Expand termination field wizard - data created or modified by the wizard**

Field label	SQL name of the field	Explanations
<b>Termination field table (amTermField)</b>		
Termination-field devices	TermFieldDevices	The wizard creates a device for each termination-field slot is created if you checked the <b>Automatically generate the devices</b> option in the wizard.
<b>Termination field devices table (amTermFldDevice)</b>		
#	sSequenceNumber	Defined according to the termination-field configuration parameters.
Horizontal position	sHoriz	Defined according to the termination-field configuration parameters.
Vertical position	sVert	Defined according to the termination-field configuration parameters.
Role	CableRole	The <b>Role</b> field ( <b>CableRole</b> ) of the termination-field configuration role corresponding to the position of the device in the termination field.
Device	Device	The device created by the wizard using the <b>Model</b> link ( <b>Model</b> ) of the termination-field configuration role corresponding to the position of the device in the termination field.
<b>Assets table (amAsset)</b>		
Model	Model	The <b>Model</b> ( <b>Model</b> ) of the termination-field configuration role corresponding to the position of the device in the termination field.
Label rule	LabelRule	The label rule selected using a wizard.
Label	Label	The label is calculated by a wizard and is based on the label rule of the device.
Slots	AssetSlots	Slots of the device model.
Device pins/terminals	Pins	AssetCenter creates as many pins as there are defined by the <b>Number of pins/terminals</b> field ( <b>IPins</b> ) of the model.
Ports	Ports	Ports of the device model.
<b>Ports table (amPort)</b>		
Port #	PortNo	Same as for the model.

Field label	SQL name of the field	Explanations
#	sSequenceNumber	Same as for the model.
Connection type	CabCnxType	Same as for the model.
Status	seCnxStatus	Value set to <b>Available</b> by the wizard.
Function	Duty	The <b>Duty</b> link ( <b>Duty</b> ) of the termination-field configuration duty defined for the device slot, of which the port is a part.
<b>Slots table (amSlot)</b>		
Name	Name	Same as for the model.
#	sSequenceNumber	Same as for the model.
Slot type	SlotType	Same as for the model.
<b>Pins table (amDevicePin)</b>		
Name	Name	Automatic sequential number.
#	sSequenceNumber	Automatic sequential number.
Status	seCnxStatus	Value set to <b>Available</b> by the wizard.

## Viewing the result

You can view the newly created termination field by selecting it in one of the following ways:

- Option 1:
  - 1 Display the list of termination fields (**Cable/ Termination fields**).
  - 2 Select the termination field created by the wizard.
- Option 2:
  - 1 Display the list of locations (**Portfolio/ Locations**).
  - 2 Select the location of the termination field created by the wizard.
  - 3 Select the **Termination fields** tab.
  - 4 Select the termination field created by the wizard.

## After having launched the wizard

The wizard does not populate the following links:

- **User locations** link (**UserLocs**) of the termination fields (if it concerns locations served by the termination field).
- **Device (Asset)** of the termination-field device slots.

You therefore need to:

- 1 Display the list of termination fields (**Cable/ Termination fields**).
- 2 Select the termination field created by the wizard.
- 3 Select the **Served locations** tab.
- 4 One by one, add the locations served by the termination field.
- 5 Select the **Devices** tab.
- 6 One by one, select the devices with their slots, and for each one of them:
  - 1 Click the **Magnifier**.
  - 2 Click the **Magnifier** to the right of the **Device** link (**Device**).
  - 3 Select the **Slots** tab.
  - 4 One by one, select the slots to use, and for each one of them:
    - 1 Click the **Magnifier**.
    - 2 Populate the fields and links in the detail window.
  - 5 Click **Modify**.
  - 6 Click **Modify**.
  - 7 Click **Close**.
- 7 Click **Modify**.

## Using the Expand termination field wizard in the practical case

We are going to add 1 column to the termination field that was previously created from the **Standard termination field** configuration.

- 1 Display the list of termination fields (**Cable/ Termination fields**).
- 2 Select the **Floor's termination field**.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Expand termination field** wizard.
- 5 Enter the following information:

Label displayed by the wizard	Value to enter or select
<b>Specify the options page</b>	
Line	0
Column	1
Auto-generate devices	Check this selection box.
Select the label rule for new devices	Wallfield label
<b>Select a project and a work order page</b>	
Apply all changes to a project/work order?	Check this selection box.
Projects	Expand a termination field
Work orders	Select the work order proposed by the wizard.
Device comments	Install the device in termination field.

- 6 In a real-life situation, you would have to create the modules to insert in the slots of the **ProcureSwitch 4000 M - 10 slots**. However, in this practical case, it is not required.
- 7 Look at the results:
  - Display the list of termination fields (**Cable/ Termination fields**).
  - Select the **Floor's termination field**.
  - Browse through the different tabs

## Duplicate wiring closet wizard

### Functions performed by the wizard

The **Duplicate wiring closet** wizard duplicates the termination fields of a source location into a target location.

 **Note:**

This target location can already contain termination fields.

### Prerequisites

You should have already created:

- The parent location of the new wiring closet.
- The wiring closet (location + termination fields) to duplicate.

## Launching the wizard

To access the wizard, you must select a record or a field (not a link) in the **Locations** table (**amLocation**):

- 1 Display the list of locations (**Portfolio/ Locations**).
- 2 Select any location from the list or select a field (not a link) in the **Locations** table.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Duplicate wiring closet** wizard.

## Information used when using the wizard

**Table 4.6. Duplicate wiring closet wizard - description of fields to populate**

<b>Label displayed by the wizard</b>	<b>Explanations</b>
<b>Select the source and destination locations page</b>	
Destination location	Select the location where you want to duplicate the source location.
Name of the new wiring closet	<ul style="list-style-type: none"> <li>• If you leave this field empty, the wizard will only duplicate the termination fields from the source location in the target location.</li> <li>• If you populate this field, the wizard creates a sub-location in the target location. The source termination fields are duplicated in this sub-location.</li> </ul>
Duplicate the sub-locations	If you check this option, the sub-locations of the source location are also duplicated.



Label displayed by the wizard	Explanations
Rename the new termination field automatically	<ul style="list-style-type: none"> <li>If you check this option, the wizard uses the <b>TermFieldName</b> calculated field to populate the <b>Name</b> field (<b>Name</b>) of the termination field.</li> <li>If you don't check this option, the wizard duplicates the names of the source termination fields.</li> </ul> <p>To learn more about calculated fields, refer to the chapter <b>References (Cable and Circuit)</b>, section <b>Calculated fields (Cable and Circuit)</b> of this guide.</p>
Refresh new termination-field device's labels	<ul style="list-style-type: none"> <li>If you check this option, the wizard recalculates the devices' <b>Label</b> field (<b>Label</b>) in reference to the label rule, selected by the devices' <b>Label rule</b> link (<b>LabelRule</b>).</li> <li>If you don't check this option, the wizard duplicates the labels of the source termination-field devices.</li> </ul>
<b>Select the termination field(s) to duplicate page</b>	
Select the termination field(s) to duplicate	The wizard displays the termination fields of the selected, source location.
<b>Select a project and a work order page</b>	
Apply all changes to a project/work order?	<p>Check this option if you want to:</p> <ul style="list-style-type: none"> <li>Keep a trace of the operations performed in the database at the project level.</li> <li>Describe the actions that you need to perform for (during) the work order.</li> </ul>
Projects	The project in which is stored a trace of the operations performed in the database by the wizard.
Work orders	The work orders in which is described the actions that you must physically perform for the work order.
Device comments	<p>Enter the value to create for the <b>Description</b> field (<b>Description</b>) of the <b>Assets included in projects</b> table (<b>amAstProjDesc</b>).</p> <p>This applies to all the devices created by the wizard.</p>

## Data created or modified by the wizard

The wizard creates:

- Locations (**amLocation**)
- Termination fields (**amTermField**)
- Termination field devices (**amTermFldDevice**)
- The assets corresponding to the termination-field devices (**amAsset**).
- Ports for the devices (**amPort**).
- Slots for the devices (**amSlot**).
- Pins/terminals for the devices (**amDevicePin**).

The wizard populates the following fields:

**Table 4.7. Duplicate wiring closet wizard - data created or modified by the wizard**

Field label	SQL name of the field	Explanations
<b>Locations table (amLocation)</b>		
Name	Name	<ul style="list-style-type: none"> <li>• It is the value of the <b>New wiring closet name</b> field in the wizard, if you have populated it.</li> <li>• Otherwise, it is the name of the target location that you have selected with the wizard.</li> </ul>
<b>Termination field table (amTermField)</b>		
Termination-field devices	TermFieldDevices	The wizard creates a record for each device in the source termination fields selected using the wizard.
<b>Termination field devices table (amTermFldDevice)</b>		
#	sSequenceNumber	Same as for the source device.
Horizontal position	sHoriz	Same as for the source device.
Vertical position	sVert	Same as for the source device.
Role	CableRole	Same as for the source device.
Device	Device	The device created by the wizard using the <b>Model</b> link ( <b>Model</b> ) of the source device.
<b>Assets table (amAsset)</b>		
Model	Model	Same as for the source device.
Label rule	LabelRule	Same as for the source device.

Field label	SQL name of the field	Explanations
Label	Label	<ul style="list-style-type: none"> <li>If you checked the <b>Refresh new termination field device's labels</b> option in the wizard: It is the value calculated by the wizard in reference to this device's label rule.</li> <li>If you did not check this option: It is the same value as for the source device.</li> </ul>
Slots	AssetSlots	Same as for the source device.
Device pins/terminals	Pins	Same as for the source device.
Ports	Ports	Same as for the source device.
<b>Ports table (amPort)</b>		
Port #	PortNo	Same as for the port of the source device.
#	sSequenceNumber	Same as for the port of the source device.
Connection type	CabCnxType	Same as for the port of the source device.
Status	seCnxStatus	Same as for the port of the source device.
Function	Duty	Same as for the port of the source device.
<b>Slots table (amSlot)</b>		
Name	Name	Same as for the slot of the source device.
#	sSequenceNumber	Same as for the slot of the source device.
Slot type	SlotType	Same as for the slot of the source device.
<b>Pins table (amDevicePin)</b>		
Name	Name	Automatic sequential number.
#	sSequenceNumber	Automatic sequential number.
Status	seCnxStatus	Value set to <b>Available</b> by the wizard.

## Viewing the result

You can view the newly created termination field by selecting it in one of the following ways:

- Option 1:
  - 1 Display the list of termination fields (**Cable/ Termination fields**).
  - 2 Select the termination field created by the wizard.
- Option 2:
  - 1 Display the list of locations (**Portfolio/ Locations**).
  - 2 Select the location of the termination field created by the wizard.
  - 3 Select the **Termination fields** tab.

- 4 Select the termination field created by the wizard.

### After having launched the wizard

The wizard does not populate the following links:

- **User locations** link (**UserLocs**) of the termination fields (if it concerns locations served by the termination field).
- **Device (Asset)** of the termination-field device slots.

You therefore need to:

- 1 Display the list of termination fields (**Cable/ Termination fields**).
- 2 Select the termination field created by the wizard.
- 3 Select the **Served locations** tab.
- 4 One by one, add the locations served by the termination field.
- 5 Select the **Devices** tab.
- 6 One by one, select the devices with their slots, and for each one of them:
  - 1 Click the **Magnifier**.
  - 2 Click the **Magnifier** to the right of the **Device** link (**Device**).
  - 3 Select the **Slots** tab.
  - 4 One by one, select the slots to use, and for each one of them:
    - 1 Click the **Magnifier**.
    - 2 Populate the fields and links in the detail window.
  - 5 Click **Modify**.
  - 6 Click **Modify**.
  - 7 Click **Close**.
- 7 Click **Modify**.

## Use the Duplicate wiring closet wizard for the practical case.

We are going to duplicate the termination field of the floor's wiring closet, which was previously created in the main wiring closet.

- 1 Display the list of locations (**Portfolio/ Locations**).
- 2 Select the location: **Cabled building/1st floor/1st floor wiring closet**.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Duplicate wiring closet** wizard.
- 5 Enter the following information:

Label displayed by the wizard	Value to enter or select
<b>Select the source and destination locations page</b>	
Destination location	Cabled building/2ndfloor/Main wiring closet
Name of the new wiring closet	Leave this field empty.
Duplicate the sub-locations	Do not check this option.
Rename the new termination field automatically	Check this selection box.
Refresh new termination field device's labels	Check this selection box.
<b>Select the termination field(s) to duplicate page</b>	
Select the termination field(s) to duplicate	Floor's termination field
<b>Select a project and a work order page</b>	
Apply all changes to a project/work order?	Check this selection box.
Projects	Duplicate a wiring closet
Work orders	Select the work order proposed by the wizard.
Device comments	Install the device in termination field.

- 6 Select the termination field just created:
  - 1 Display the list of locations (**Portfolio/ Locations**).
  - 2 Select the **Cabled building/2nd floor/Main wiring closet** location.
  - 3 Select the **Termination fields** tab.
  - 4 Select the new termination field.
  - 5 Click the **Magnifier** button.
- 7 Rename the termination field to **Main termination field**.
- 8 Manually add the locations served by the termination field:
  - 1 Select the **Served locations** tab.

- 2 Add the **Cabled building/1st floor/1st floor wiring closet** location.
  - 3 Click **Modify**.
  - 9 Add the modules in the slots of the **ProcureSwitch 4000 M - 10 slots** devices:
- 

 **Warning:**

This will be done later on, according to the procedure described in the chapter **Cable devices, cables and connections - manual creation**, section **Cable devices - manual creation/ Cable devices - manual creation** of this guide.

---

- 10 Look at the results of the wizard's actions by browsing through the other tabs.

# 5 | Cable devices, cables and connections - manual creation

---

## CHAPTER

The cable devices, cables and cable links can be created manually or via the cabling wizards:

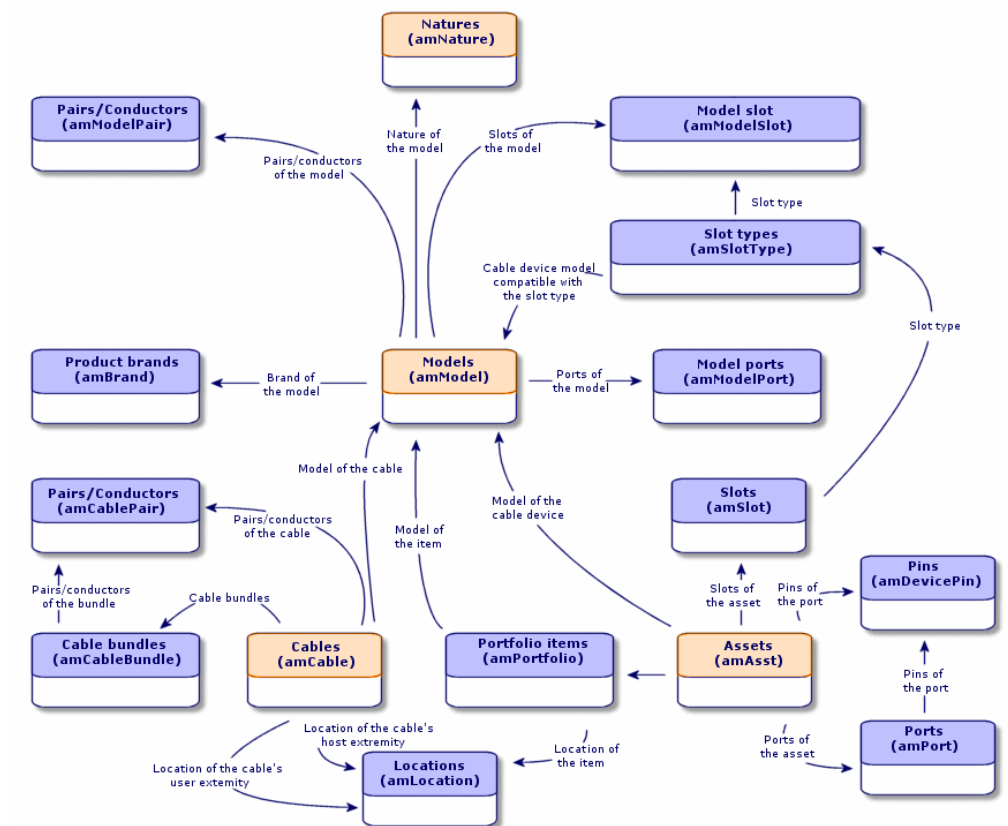
- Creating them manually requires more time, obviously, but it also allows you more control over the creation process.
  - Creating them with wizards is more rapid, but you have less control.
- 

 Note:

Let's recall that the cable devices are stored in the **Assets** table (**amAsset**), while the cables are stored in the **Cables** table (**amCable**). However, the models of these cable devices and cables come from the same table: **Models** (**amModel**).

---

Figure 5.1. Cables and cable devices - data model



## Cable devices - manual creation

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable device of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Port of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Pin/ Terminal of this guide.



See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Slot of this guide.

### Table names

- **Assets (amAsset)**
- **Ports (amPort)**
- **Pins (amDevicePin)**
- **Slots (amSlot)**

### Access menu

**Cable/ Cable devices**

### Letting AssetCenter create the ports and virtual bundles for pin connections

Certain cables/cable devices are composed of numerous bundles/pairs. It would be a tedious task to declare each bundle/pair manually. The cabling wizards are capable of creating virtual bundles and ports when they are required for a cable link. The virtual bundles and ports are also automatically deleted when the cable links that use them are no longer used.

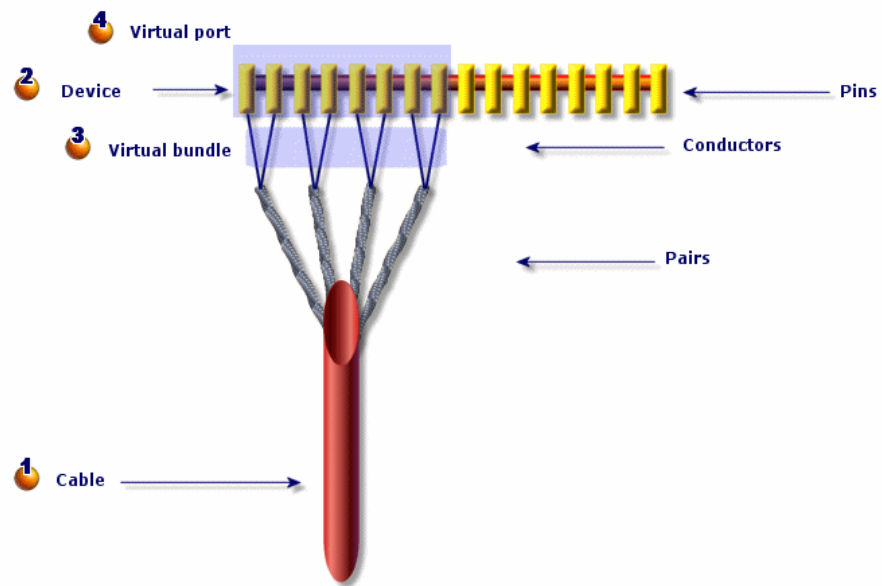
---

 **Note:**

The wizards use the topologies to identify the models of the cables/cable devices and the pairs/pins.

---

**Figure 5.2. Ports and virtual bundles - representation**



- 1 You start by creating a cable with its pairs, or you let the wizard create it.
- 2 Then, you create a cable device with its pins, or you can let the wizard create it.
- 3 The wizard creates a virtual bundle using the first available pairs.
- 4 The wizard creates a virtual port using the first available pins.

### Single or double-sided devices

The cable devices can be single or double-sided. They are single-sided when the device ports or pins are all grouped together on one side. They are double-sided when the ports or pins are present on both sides of the device.

Example:

The patch panels are double-sided devices. The back side is frequently used to connect lateral or riser cables. The front side is often used to perform a patch to another patch panel.

When a device is double-sided, the cabling wizards can create more than one cable link on a given port of the device.

The single or double-sided feature of the cable devices is defined by the **Number of sides** field (**seDevSdType**) in the model.

The following diagram illustrates the different types of double-sided devices, depending on whether the connection is by pin or by port.

In each case, you will need to:

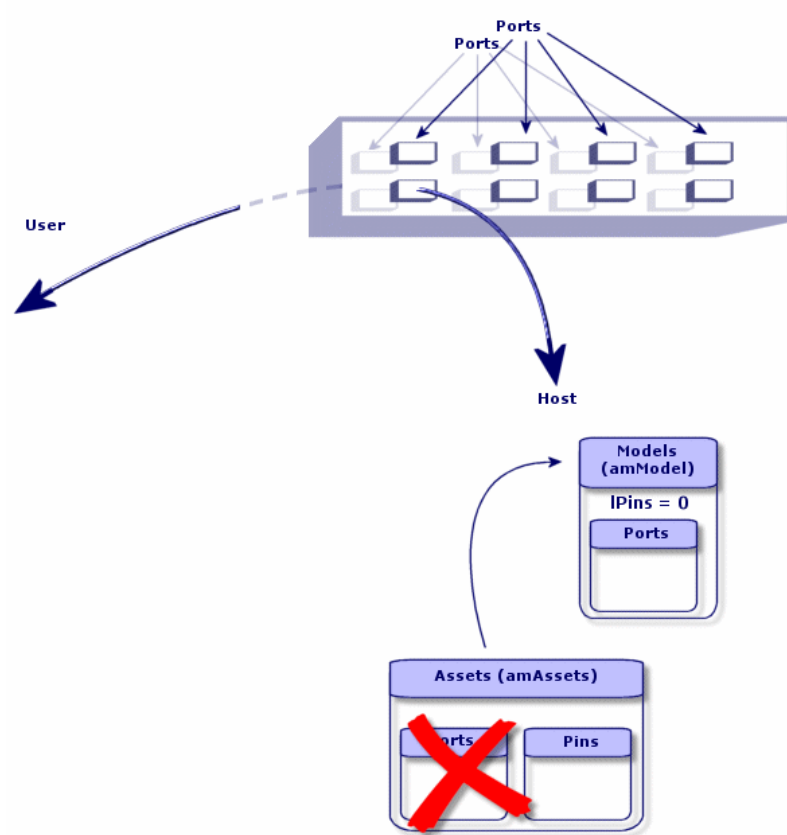
- Declare ports to the level of the device model.
- Populate the **Number of pins/terminals** field (**IPins**).

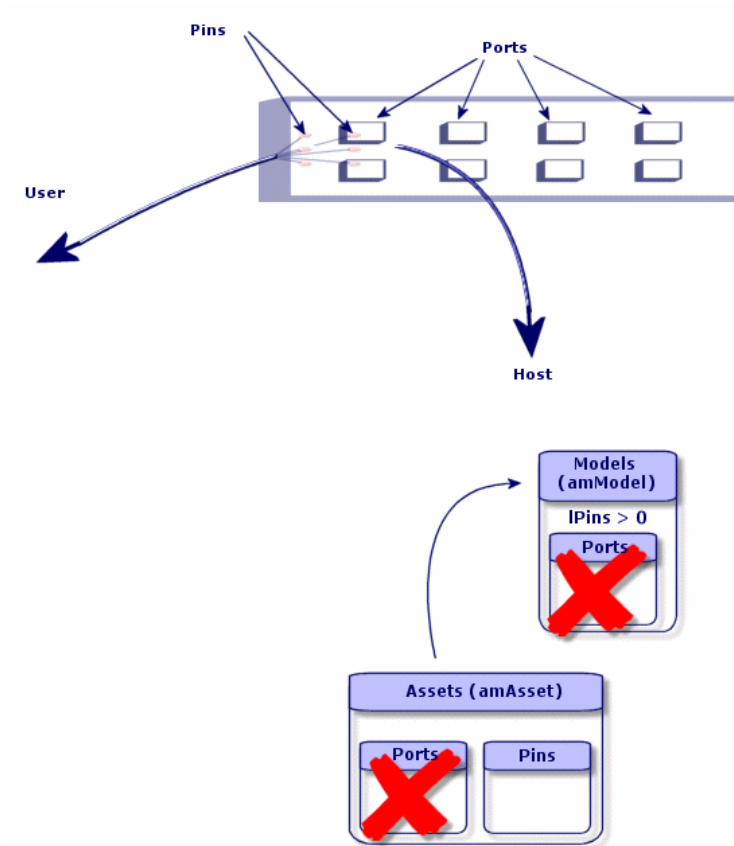
---

 **Important:**

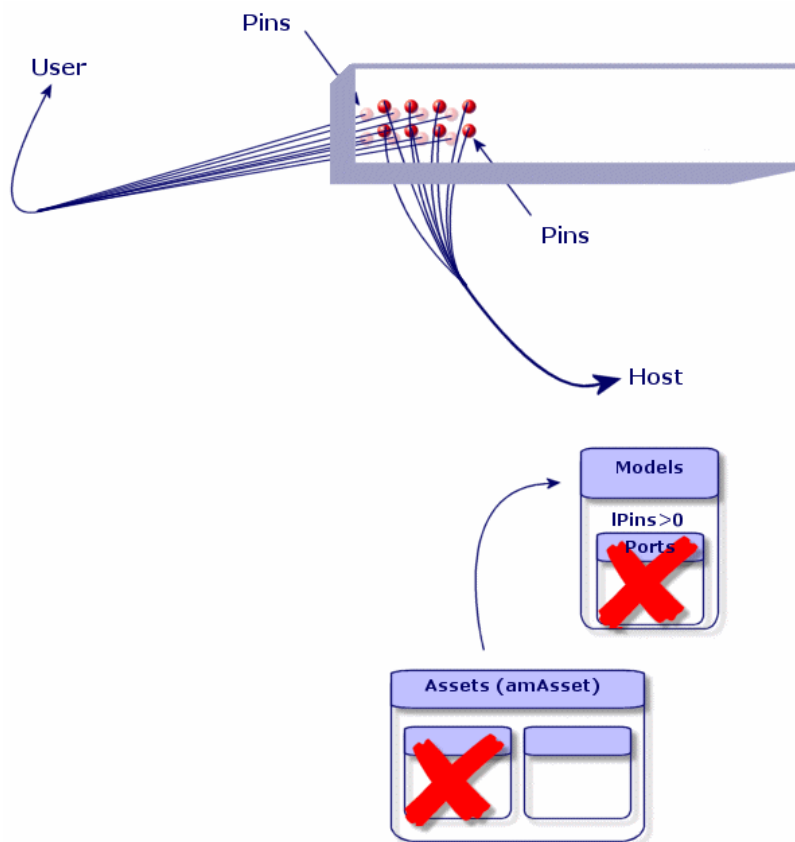
It is very important to respect the directives of these diagrams if you want the wizards to correctly create the virtual ports.

---

**Figure 5.3. Double-sided devices (port/port) - representation**

**Figure 5.4. Double-sided devices (port/pins) - representation**

**Figure 5.5. Double-sided devices (pin/pin) - representation**



## Creating cable devices manually

If you created appropriate device models, you just need to:

- 1 Display the list of assets (**Cable/ Cable devices**).
- 2 Click **New**.
- 3 Populate the following fields and links:
  - **Model (Model)**
  - **Max no. connections (sMaxCnxCount)**
- 4 Click **Create**.

The other fields and links to populate are automatically inherited from the model.

## Prerequisites

You should have already created the:

- Cable device models (**amModel**)
- Label rules of the cable devices, ports, slots and pins/terminals (**amLabelRule**)
- Device types (**amItemizedList**)
- Cable connection types of the device ports (**amCabCnxType**)
- Duties of the device ports (**amCableDuty**)
- Slot types of the devices (**amSlotType**)
- Termination fields containing the devices (**amTermField**)
- Device locations (**amLocation**)
- Modules to insert in the slots (**amAsset**)

## Fields and links that must absolutely be populated

**Table 5.1. Cable devices - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Assets table (amAsset)</b>		
Model	Model	The model must have a cable device nature.
Portfolio items	Assignment	
Status	seCnxStatus	
Max no. connections	sMaxCnxCount	If you want to receive a warning - during a manual creation - in case you create more ports than what is defined by this field.
Device pins/terminals	Pins	If the device is connected to the network by pins.
Ports	Ports	If the device is connected to the network by ports.
Slots	AssetSlots	If the device must receive connection modules in its slots.

Label of the field or link	SQL name of the field or link	Remarks
Label rule	LabelRule	
Label	Label	
<b>Ports table (amPort)</b>		
Port #	PortNo	If you create non-virtual ports.
#	sSequenceNumber	If you create non-virtual ports.
Connection type	CabCnxType	If you create non-virtual ports.
Function	Duty	If you create non-virtual ports.
Label rule	LabelRule	
Label	Label	
Status	seCnxStatus	
Port pins/terminals	DevPin	
<b>Slots table (amSlot)</b>		
Name	Name	If you create slots.
#	sSequenceNumber	If you create slots.
Slot type	SlotType	If you create slots.
Assigned asset	AssignedAsset	If you create slots, and they are occupied.
<b>Pins table (amDevicePin)</b>		
Name	Name	If you create pins.
#	sSequenceNumber	If you create pins.
Port	Port	If you create pins.
Status	seCnxStatus	If you create pins.
Label rule	LabelRule	If you create pins.
Label	Label	If you create pins.

## Connection by ports or by pins

You might find it useful to read the following chapter **Implementing cable management (Cable and Circuit)**, section **Cable device models without slots./ Connection by ports or by pins.**

## Double-sided devices

When a device contains ports and/or pins on 2 sides (a patch panel, for example), you need to proceed in one of the following manners:

- If the 2 sides contain ports:
  - 1 Create as many ports as there are on one side or the other of the device (this number should be the same on either side).



- 2 The ports thus created will appear in two cable links: a host-side link (corresponding to the port on one of the sides) and a user-side link (corresponding to the port on the other side).
- If the 2 sides contain pins:
    - 1 Do not create any pins manually, unless you are not using cabling wizards to create cable links.
    - 2 The cabling wizards that create cable links will create virtual ports according to your needs as you go. The virtual ports thus created will appear in two cable links: a host-side link (corresponding to the pins on one of the sides) and a user-side link (corresponding to the pins on the other side).
  - If 1 side contains ports and the other contains pins:
    - 1 Do not create any ports manually, unless you are not using cabling wizards to create cable links.
    - 2 Create the cable links on the pin side before creating them on the port side. The cabling wizards that create the cable links to the pins will create virtual ports according to your needs as you go. Each virtual port thus appears in a first cable link.
    - 3 Create the cable links on the port side. The cabling wizards that create the cable links to the ports will use the existing virtual ports. The virtual ports thus associated appear in a second cable link.

## Slots

If the device contains slots destined to receive connection modules:

- 1 Create the connection modules in the **Assets** table (**amAsset**).
- 2 Create the **Slots** links (**AssetSlots**) by associating them to a connection module.

## Creating the cable devices manually for the practical case

We are going to:

- 1 Create 2 modules.
- 2 Insert the first module in one of the switch slots of this floor's termination field.
- 3 Insert the second module in one of the switch slots of the main termination field.

To do this:

- 1 Create the 2 modules. For each module:
  - 1 Display the list of assets (**Cable/ Cable devices**).
  - 2 Click **New**.
  - 3 Populate the following links and fields:

Field or link to populate	Value for record 1	Value for record 2
Model ( <b>Model</b> )	Procurve 10/100 Base T - 8 ports	Procurve 10/100 Base T - 8 ports
Max no. connections ( <b>sMaxCnxCount</b> )	8	8
Asset tag ( <b>AssetTag</b> )	EXAMPLE005	EXAMPLE006

- 4 Click **Create**.
- 5 Certain fields and links are automatically inherited from the model. You can view this by looking at the different tabs of the module that was just created.
- 2 Associate one of the modules to one of the switches of this floor's termination field:
  - 1 Display the list of termination fields (**Cable/ Termination fields**).
  - 2 Select the **Floor's termination field**.
  - 3 Select the **Devices** tab.
  - 4 Select one of the devices whose **Model** field (**Model**) has the value **ProcureSwitch 4000 M - 10 slots**.

- 5 Click the **Magnifier** button.
  - 6 Click the **Magnifier** button to the right of the **Device** link (**Device**).
  - 7 Select the **Slots** tab.
  - 8 Select one of the slots.
  - 9 Click the **Magnifier** button.
  - 10 Select the **Assigned device** field (**AssignedAsset**).
  - 11 Select one of the **Hewlett Packard Procurve 10/100 Base T - 8 ports** devices that you just created.
  - 12 Click **Modify**.
  - 13 Click **Modify**.
  - 14 Click **Close**.
- 3 Associate the other module with one of the switches of the main termination field:
- 1 Display the list of termination fields (**Cable/ Termination fields**).
  - 2 Select the **Main termination field**.
  - 3 Select the **Devices** tab.
  - 4 Select one of the devices whose **Model** field (**Model**) is set to **ProcureSwitch 4000 M - 10 slots**.
  - 5 Click the **Magnifier** button.
  - 6 Click the **Magnifier** button to the right of the **Device** field (**Device**).
  - 7 Select the **Slots** tab.
  - 8 Select one of the slots.
  - 9 Click the **Magnifier** button.
  - 10 Select the **Assigned device** field (**AssignedAsset**).
  - 11 Select one of the **Hewlett Packard Procurve 10/100 Base T - 8 ports** devices that you just created.
  - 12 Click **Modify**.
  - 13 Click **Modify**.
  - 14 Click **Close**.

## Cables - manual creation

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Pair/conductor of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Bundle of this guide.

### Table names

- **Cables** (**amCable**)
- **Pairs/Conductors** (**amCablePair**)
- **Cable bundles** (**amCableBundle**)

### Access menu

**Cable/ Cables**

## Creating cables manually

If you created appropriate cable models, you just need to:

- 1 Display the list of cables (**Cable/ Cables**).
- 2 Click **New**.
- 3 Populate the **Model** link (**Model**).
- 4 Click **Create**.

The other fields and links to populate are automatically inherited from the model.

 **Tip:**

It is not necessary to create bundles manually. The cabling wizards can create virtual bundles for you.

To learn more about virtual bundles, refer to the chapter **Cable devices, cables and connections - manual creation**, section **Cable devices - manual creation/ Letting AssetCenter create the ports and virtual bundles for pin connections** of this guide.

## Prerequisites

You should have already created the:

- Cable models (**amModel**)
- Label rules of the cable devices, pairs/conductors and bundles (**amLabelRule**)
- Cable types (**amItemizedList**)
- Cable pair/conductor types (**CabPairType**)
- Duties of the cable bundles (**amCableDuty**)
- Locations of the host and user cables (**amLocation**)

## Fields and links that must absolutely be populated

**Table 5.2. Cables - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Cables table (amCable)</b>		
Model	Model	The model must have a cable nature.
Label rule	LabelRule	
Label	Label	
User location	UserLoc	
Host location	HostLoc	
Role	CableRole	
Status	seCnxStatus	
Pairs/Conductors	Pairs	

Label of the field or link	SQL name of the field or link	Remarks
<b>Pairs/Conductors table (amModelPair)</b>		
Name	Name	
#	sSequenceNumber	
Pair/Conductor type	CabPairType	
Color code entry	ColorCodeDet	If you selected a color code at the level of the cable model.

## Creating the cables manually for the practical case

We are going to create an FTP cable - Category 5 - 4 twisted pairs with a bundle:

- 1 Display the list of cables (**Cable/ Cables**).
- 2 Click **New**.
- 3 Populate the following fields and links:

Field or link to populate	Value
Model ( <b>Model</b> )	FTP - Category 5 - 4 twisted pairs
Code ( <b>Code</b> )	Example001

- 4 Click **Create**.
- 5 Certain fields and links are automatically inherited from the model. You can view this by looking at the different tabs of the cable that was just created.
- 6 Select the **Bundles** tab.
- 7 Click the **+** button.
- 8 Populate the following fields and links:

Field or link to populate	Value
# ( <b>sSequenceNumber</b> )	1
Name ( <b>Name</b> )	1
Duty ( <b>Duty</b> )	Data
Status ( <b>seCnxStatus</b> )	Available

- 9 Click **Add**.

- 10 Select the bundle from the list.
- 11 Click the **Magnifier**.
- 12 Select the **Pairs/conductors** tab.
- 13 Add the 4 pairs of this cable to the bundle.
- 14 Click **Modify**.

## Connections - manual creation

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cable link of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Trace output of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Trace of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cross connection of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Host of this guide.

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ User of this guide.

### Table names

- **Cable links (amCableLink)**
- **Trace outputs (amTraceOutput)**
- **Trace histories (amTraceHistory)**
- **Trace operations (amTraceOp)**

### Access menu

**Cable/ Traces**

**Administration/List of screens**

## Simplified data model

### Relationship between the cable links, device ports and cable bundles

#### Principals

The connections are made between cable bundles and ports of cable devices. These connections are represented by cable links. A cable link corresponds either to a port or a bundle, but not to both at the same time. Using the hierarchic link between two cable links, you can indicate that a port or a bundle is connected to a port or a bundle. There is thus no direct link between ports and bundles. Using the hierarchic links (which indicate that a such a cable link is a parent link or sub-link of another cable link), you can create a trace. The parent cable links must be on the "host" side, in other words, the most important side of the termination field.

#### Trace example

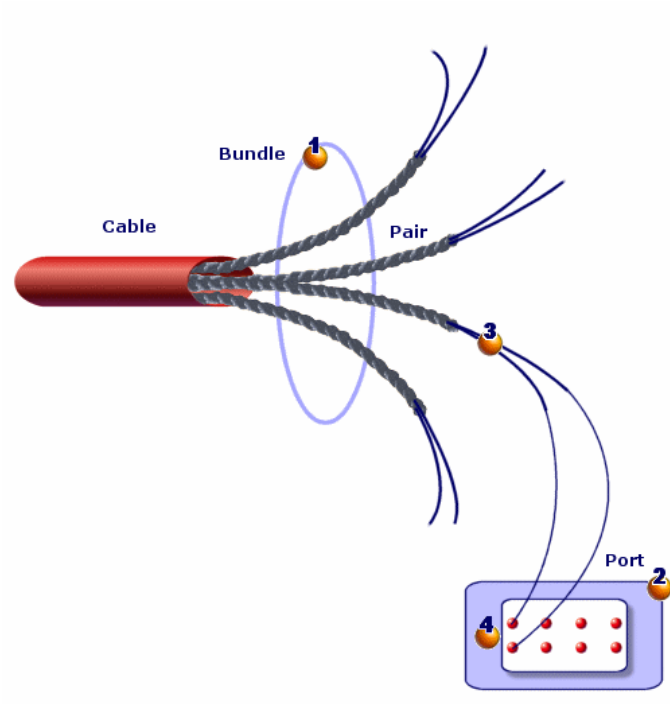
port -> bundle -> port

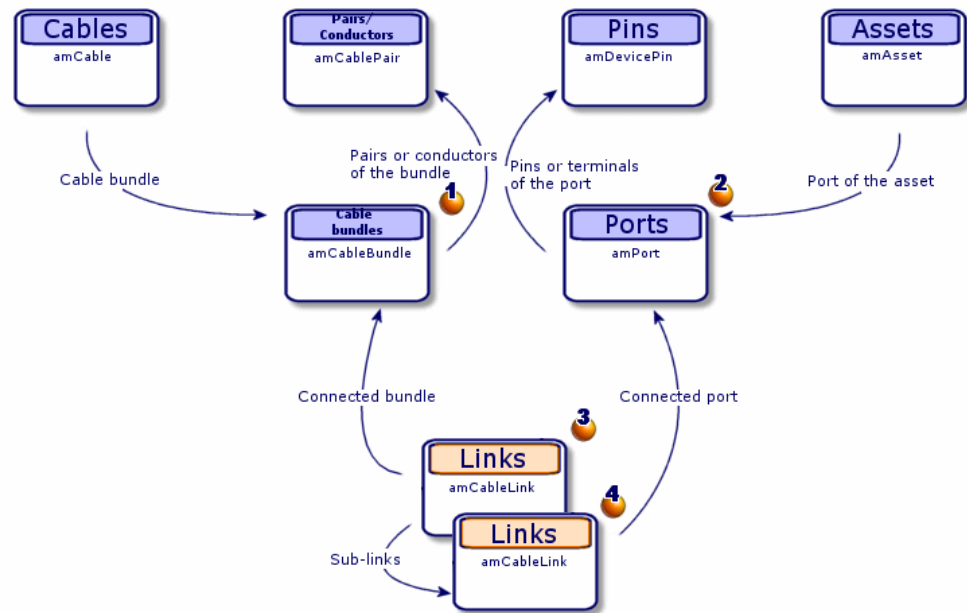
#### Correspondence between your network and the AssetCenter database

The following diagrams illustrate the way in which we represent a connection between a device port (a wall outlet, for example) and a cable bundle (a lateral cable, for example).

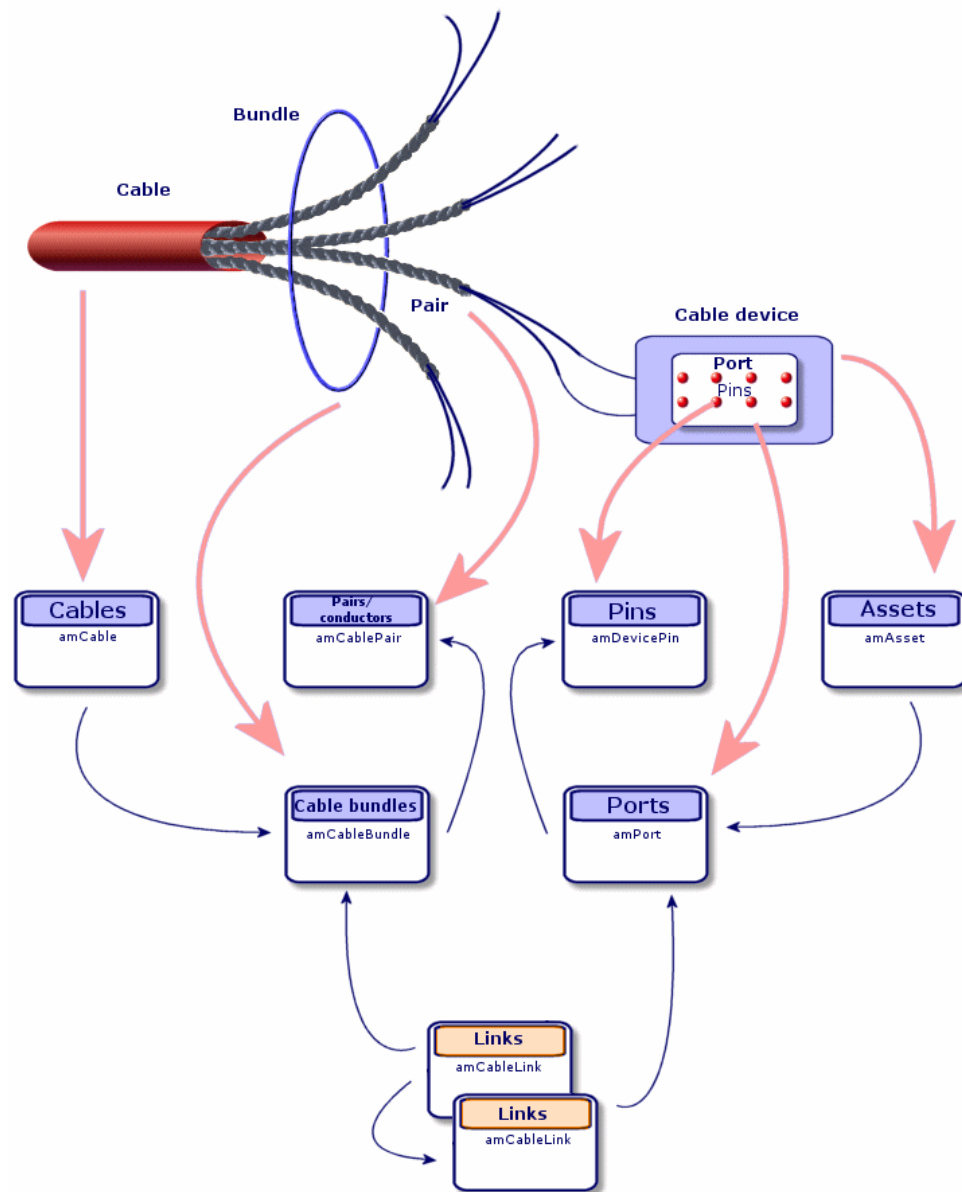
- 1 "Host" bundle to connect to "user" port.
- 2 "User" port to connect to "host" bundle.
- 3 "Host" cable link concerning the bundle. This link is the parent of the "user" link.
- 4 "User" cable link concerning the port. This link is the sub-link of the "host" link.



**Figure 5.6. Cable link - representation of implicated components**

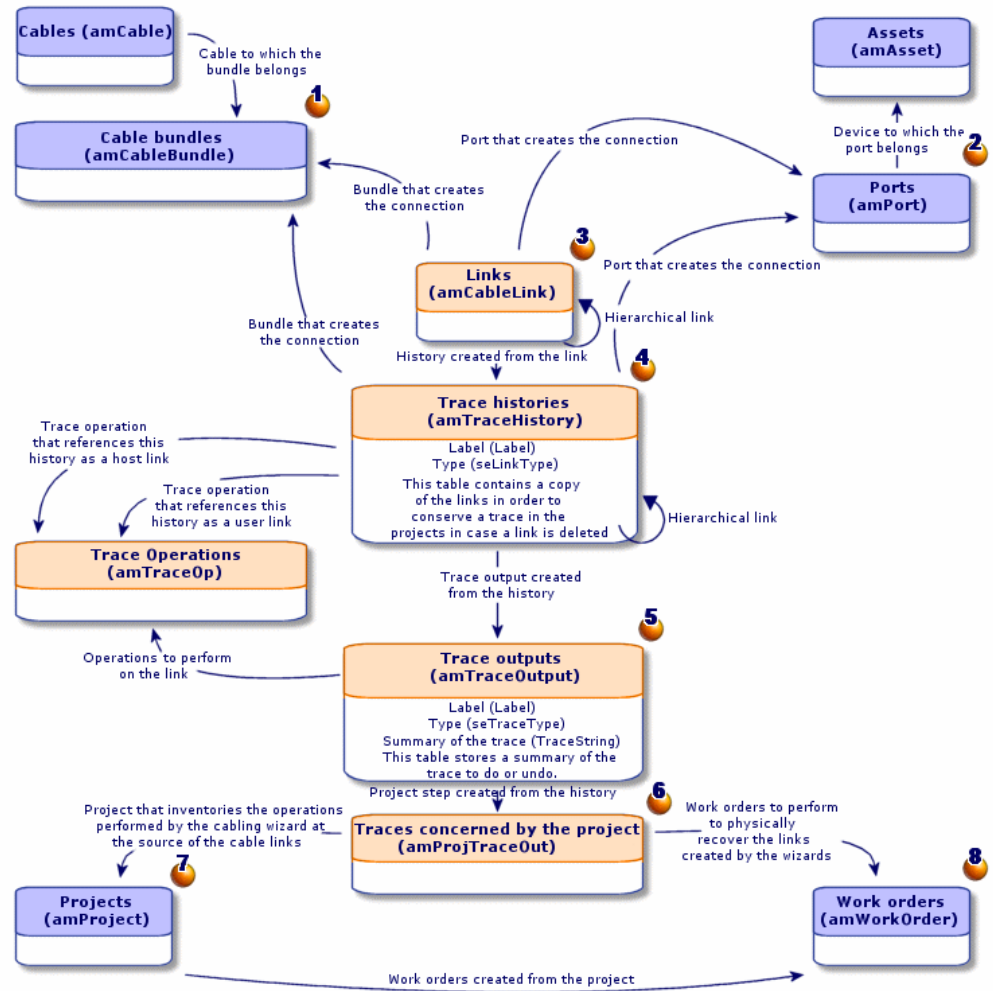
**Figure 5.7. Cable links - simple data model**

**Figure 5.8. Cable links - correspondence between the cable link to represent and the database**



## Tables used in the complete description of the connections

Figure 5.9. Cable links - detailed data model



## Comments on the diagram

This diagram enables you to understand how the numerous tables, used in the description of the connections, work together.

- 1 Connected bundle.
- 2 Connected port.
- 3 Cable links concerning either a bundle or a port.
- 4 Copy of the cable link.
- 5 Description of the connection.
- 6 Intermediary table between projects/work orders and trace outputs.
- 7 Project enabling you to find the connection detail.
- 8 Work order that enables you to manage the implementation of the physical connection.

## Creating connections manually

The following tables were not designed to be manually populated:

- **amCableLink**
- **amTraceOutput**
- **amTraceHistory**
- **Trace operations**

The explanations that we provide here are intended for those wanting to know more about how these tables function.

Before creating a connection manually:

- 1 Define the traces to represent.  
Example: wall outlet->lateral cable->termination field  
In general, a trace is composed of 2 cable devices linked by a cable.
- 2 Determine which direction you want to follow: host->user or user->host.
- 3 Begin with the very last point.  
Examples:

- 1 If you create the cable links in the user->host direction, you will begin with a termination-field device.
  - 2 If you create the cable links in the host->user direction, you will begin with a user wall outlet.
- 4 Create one cable link per connection point.  
In general: 2 device links and 1 cable link.  
Use the **Parent** link to connect the trace components.

For each trace to create:

- 1 Display the list of traces (**Cable/ Traces**).
- 2 Click **New**.
- 3 Populate the fields and links in the link window.
- 4 Display the list of screens (**Administration/ List of screens**).
- 5 Select the **Trace output** table (**amTraceOutput**).
- 6 Click **New**.
- 7 Populate the fields and links that are not inside the tabs of the detail window.
- 8 Click **+** in the following tabs:
  - 1 Trace history: This creates a record in the **Trace histories** table (**amTraceHistory**). Simply copy the information from the cable link detail and paste it here.
  - 2 Operation: This creates a record in the **Trace operations** table (**amTraceOp**).

## Prerequisites

You should have already created:

- The cable devices (**amAsset**) to connect and their ports (**amPort**).
- The cables (**amCable**) to connect and their bundles (**amCableBundle**).
- The label rules for the cable links (**amLabelRule**).
- The cable duties (**amCableDuty**).

## Fields and links that must absolutely be populated

**Table 5.3. Connections - Fields and links that must absolutely be populated**

Label of the field or link	SQL name of the field or link	Remarks
<b>Cable links table (amCableLink)</b>		
Name	Name	
Link type	seLinkType	
Parent link	Parent	
Label rule	LabelRule	
Label	Label	
Function	Duty	
Cable	Cable	If the cable link concerns a cable.
Bundle	Bundle	If the cable link concerns a cable.
Device	Device	If the cable link concerns a cable device.
Port	Port	If the cable link concerns a cable device.
<b>Trace outputs table (amTraceOutput)</b>		
Type	seTraceType	
Function	Duty	
Label	ModifiedLinkLabel	
Summary of the trace	TraceString	
Trace history	TraceHist	
Trace operations	TraceOps	
<b>Trace histories table (amTraceHistory)</b>		
Name	Name	
Type	seLinkType	
Parent history	Parent	
Label	Label	
Cable	Cable	
Bundle	Bundle	
Device	Device	
Port	Port	
Link	Link	
<b>Trace operations table (amTraceOp)</b>		
Title	Label	

Label of the field or link	SQL name of the field or link	Remarks
Host trace history	HostTraceHist	
User trace history	UserTraceHist	

## Creating the connections manually for the practical case

We are going to create a trace composed of the following cable links:

```
secondary termination-field device -> 4 twisted pairs ->
principal termination-field device
```

The direction of such a trace is user to host. We will thus begin by creating the host-side cable link.

### Creating the cable links

- 1 Display the list of traces (**Cable/ Traces**).
- 2 For each cable link, create a record and populate the following fields and links:

Field or link to populate	Value for record 1	Value for record 2	Value for record 3
Name ( <b>Name</b> )	Example002	Example003	Example004
Cable link type ( <b>seLinkType</b> )	Device	Device	Device
Parent link ( <b>Parent</b> )	Do not populate.	Device (Example002)	Device (Example003)
Label rule ( <b>LabelRule</b> )	Term-field patch-panel port label	Label by sequential pair number	Term-field patch-panel port label
Label ( <b>Label</b> )	Do not enter any values; accept the proposed default value.	Do not enter any values; accept the proposed default value.	Do not enter any values; accept the proposed default value.
Duty ( <b>Duty</b> )	Data	Data	Data
Cable ( <b>Cable</b> )	Do not populate.	Corel FTP - Category 5 - 4 twisted pairs (EXAMPLE001)	Do not populate.
Bundle ( <b>Bundle</b> )	Do not populate.	1 (EXAMPLE001)	Do not populate.



Field or link to populate	Value for record 1	Value for record 2	Value for record 3
Device ( <b>Device</b> )	Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE006)	Do not populate.	Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE005)
Port ( <b>Port</b> )	1 (EXAMPLE006)	Do not populate.	1 (EXAMPLE005)

## Creating the trace history

- 1 Display the list of screens (**Administration/ List of screens**).
- 2 Select the **Trace outputs** table (**amTraceOutput**).
- 3 Create a record and populate the following fields and links:

Field or link to populate	Value
Type ( <b>seTraceType</b> )	Connect
Duty ( <b>Duty</b> )	Data
Label ( <b>ModifiedLinkLabel</b> )	'Data' riser run from location ' /Cabled building/2nd floor/Main wiring closet' to ' /Cabled building/1st floor/1st floor wiring closet/'
Trace summary ( <b>TraceString</b> )	Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE005) - (1) <CONNECTER> Corel FTP - Category 5 - 4 twisted pairs (EXAMPLE001) - (1) <CONNECTER> Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE006) - (2)

## Creating the link histories for the trace output

- 1 Display the list of screens (**Administration/ List of screens**).
- 2 Select the **Trace histories** table (**amTraceHistory**).
- 3 Create a new record in the **Trace histories** table (**amTraceHistory**) and populate the following fields and links:

 **Note:**

Most of the information is duplicated from the cable link corresponding to the history.

Field or link to populate	Value for record 1	Value for record 2	Value for record 3
Name ( <b>Name</b> )	Example002	Example003	Example004
Type ( <b>seLinkType</b> )	Device	Device	Device
Parent history ( <b>Parent</b> )	Do not populate.	Device (Example002)	Device (Example003)
Label ( <b>Label</b> )	Same as for links	Same as for links	Same as for links
Cable ( <b>Cable</b> )	Do not populate.	Corel FTP - Category 5 - 4 twisted pairs (EXAMPLE001)	Do not populate.
Bundle ( <b>Bundle</b> )	Do not populate.	1 (EXAMPLE001)	Do not populate.
Device ( <b>Device</b> )	Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE006)	Do not populate.	Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE005)
Port ( <b>Port</b> )	1 (EXAMPLE006)	Do not populate.	1 (EXAMPLE005)
Cable link ( <b>Link</b> )	Device (Example002)	Device (Example003)	Device (Example004)

### Creating the trace operations for the trace outputs

There are two operations to perform:

- Connecting the main termination field to the cable.
  - Connecting the cable to the secondary termination field.
- 1 Display the list of screens (**Administration/ List of screens**).
  - 2 Select the **Trace operations** table (**amTraceOp**).
  - 3 Create a new record for each operation in the **Trace operations** table (**amTraceOp**) and populate the following fields and links:

Field or link to populate	Value for record 1	Value for record 3
Label ( <b>Label</b> )	Connect	Connect
Host trace history ( <b>HostTraceHist</b> )	Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE006)	Corel FTP - Category 5 - 4 twisted pairs (EXAMPLE001)
User trace history ( <b>UserTraceHist</b> )	Corel FTP - Category 5 - 4 twisted pairs (EXAMPLE001)	Hewlett Packard Procurve 10/100 Base T - 8 ports (EXAMPLE005)

# 6 | Connections - creation with the wizards

## CHAPTER

AssetCenter is provided with numerous cabling wizards that automate the creation of connections.

This chapter explains how they work.

---

 **Note:**

The cabling wizards do not populate the following tables unless you select a project and a work order at the end of the wizard's execution:

- **Trace outputs (amTraceOutput)**
  - **Trace histories (amTraceHistory)**
  - **Trace operations (amTraceOp)**
- 

## Run riser cables wizard

### Functions performed by the wizard

This wizard connects two termination fields using a riser cable.

## Prerequisites

You should have already created:

- The host termination field.
  - The devices of the host termination field to which the riser cable will connect.
- 

 **Warning:**

You must respect different conditions according to the connection to the device and whether it is made by ports or by pins.

To learn more, refer to the chapter **Implementing cable management (Cable and Circuit)**, section **Cable device models without slots/ Creating the models of cable devices without slots/ Connection by ports or by pins** of this guide.

---

- The user termination field.
  - The devices of the user termination field to which the riser cable will connect.
- 

 **Warning:**

You must respect different conditions according to the connection to the device and whether it is made by ports or by pins.

To learn more, refer to the chapter **Implementing cable management (Cable and Circuit)**, section **Cable device models without slots/ Creating the models of cable devices without slots/ Connection by ports or by pins** of this guide.

---

- The connection types you will use to connect the cable to the host and user devices.
- The label rules you will use to label the cable, the host links and the user links.
- The riser cable model to create.
- A project and a work order, if you want to store the trace of the connections carried out.

## Use the Run riser cables wizard.

### Launching the wizard

This wizard does not require any particular context:

- 1 Display the list of actions (**Tools/ Actions**).
- 2 Select the **Run riser cables** wizard.

### Information used when using the wizard

#### Warning:

Certain labels in the following table are not displayed by the wizard unless you select the appropriate option.

**Table 6.1. Run riser cables wizard - description of fields to populate**

<b>Label displayed by the wizard</b>	<b>Explanations</b>
<b>Select a host termination field page</b>	
Locations	Select the location of the host termination field that you want to connect to the riser cable.
Host termination field	Select the host termination field to connect to the riser cable.
Do you want to select the starting position?	<ul style="list-style-type: none"> <li>• If you check this option, the wizard will display the list of positions of the termination field with its roles and the termination-field device.</li> <li>• If you don't check this option, the wizard automatically searches for the first available termination-field device having a port that is:               <ul style="list-style-type: none"> <li>• Available</li> <li>• Associated with a connection type that you will select on another page.</li> </ul> </li> </ul>
Termination-field devices	Select the termination-field device from which you will connect the riser cable.
<b>Select the host termination field connectors and a label rule page</b>	

Label displayed by the wizard	Explanations
Cable connection types	<p>Select the connection type enabling you to connect the riser cable to the termination field.</p> <p>The wizards use the connection type, which you choose, as part of their criteria to select a port in order to create a cable link.</p> <p>If the connection type is <b>by pin</b> and the wizard created a virtual port to create a cable link, the connection type selected is associated with this virtual port.</p>
Do you want to search (not create) for ports of this pin mode?	<p>If you check this option, the wizard only looks for ports:</p> <ul style="list-style-type: none"> <li>• That already exist (the wizard does not create virtual ports).</li> <li>• Associated with a connection type that you will select with the wizard.</li> </ul>
Do you want to select the starting pin?	<p>Select this option if you want to specify from which pin number the wizard can start using pins to create a virtual port.</p> <p>This port will be associated to a riser-cable bundle to create a link.</p>
Starting pin	<p>This pin determines from which pin number the wizard can start using pins to create a virtual port.</p> <p>This port will be associated to a riser-cable bundle to create a link.</p>
Label rule	<p>You use this label rule to populate the <b>Label</b> field (<b>Label</b>) of the link created at the level of the host-termination-field device.</p>
Map consecutive pins to virtual port for pin-based devices (default is next available pin)?	<ul style="list-style-type: none"> <li>• If you check this option, the wizard only uses the pins with consecutive numbers to create virtual ports.</li> <li>• If you don't check this option, the wizard selects the first available pins without requiring them to have consecutive numbers.</li> </ul>

Label displayed by the wizard	Explanations
Type of cable connection for odd pins	<p>This part of the wizard handles pins that do not exist in numbers large enough to create a connection after having associated all the other pins to virtual ports.</p> <p>These pins can, however, be used in other ways. Indicate in this field what type of connection to use for the remaining pins.</p>
Type of duty for odd pins connector	Select the duty assigned to the remaining pins.
Do you want to select the starting port?	<p>Select this option if you want to specify from which number the wizard should associate a port to a bundle of the riser cable to create a link.</p> <p>This refers to a port of the termination-field device that was selected with the wizard on the previous page.</p>
Starting port	<p>This port specifies from which number the wizard can associate a port to a bundle of the riser cable to create a link.</p> <p>This refers to a port of the termination-field device that was selected with the wizard on the previous page.</p>
<b>Select a user termination field page</b>	
Do you want to select a starting position?	<ul style="list-style-type: none"> <li>• If you check this option, the wizard will display the list of positions of the termination field with its roles and the termination-field device.</li> <li>• If you don't check this option, the wizard automatically searches for the first available termination-field device having a port that is: <ul style="list-style-type: none"> <li>• Available</li> <li>• Associated with a connection type that you will select on another page.</li> </ul> </li> </ul>
Locations	<p>Select the location of the user termination field to connect to the riser cable.</p> <p>Only the locations served by the host termination field are listed.</p>
User termination field	Select the user termination field to connect to the riser cable.

Label displayed by the wizard	Explanations
Termination-field devices	Select the termination-field device to which you will connect the riser cable.
<b>Select the user termination field connectors and a label rule page</b>	
Cable connection types	<p>Select the connection type enabling you to connect the riser cable to the termination field.</p> <p>The wizards use the connection type, which you choose, as part of their criteria to select a port in order to create a cable link.</p> <p>If the connection type is <b>by pin</b> and the wizard created a virtual port to create a cable link, the connection type selected is associated with this virtual port.</p>
Do you want to search (not create) for ports of this pin mode?	<p>If you check this option, the wizard only looks for ports:</p> <ul style="list-style-type: none"> <li>• That already exist (the wizard does not create virtual ports).</li> <li>• Associated with a connection type that you will select with the wizard.</li> </ul>
Do you want to select a starting position?	<p>Select this option if you want to specify from which pin number the wizard can start using pins to create a virtual port.</p> <p>This port will be associated to a riser-cable bundle to create a link.</p>
Starting pin	<p>This pin determines from which pin number the wizard can start using pins to create a virtual port.</p> <p>This port will be associated to a riser-cable bundle to create a link.</p>
Label rule	<p>You use this label rule to populate the <b>Label</b> field (<b>Label</b>) of the link created at the level of the user-termination-field device.</p>
Map consecutive pins to virtual port for pin-based devices (default is next available pin)?	<ul style="list-style-type: none"> <li>• If you check this option, the wizard only uses the pins with consecutive numbers to create virtual ports.</li> <li>• If you don't check this option, the wizard selects the first available pins without requiring them to have consecutive numbers.</li> </ul>



Label displayed by the wizard	Explanations
Type of cable connection for odd pins	<p>This part of the wizard handles pins that do not exist in numbers large enough to create a connection after having associated all the other pins to virtual ports.</p> <p>These pins can, however, be used in other ways. Indicate in this field what type of connection to use for the remaining pins.</p>
Type of duty for odd pins connector	Select the duty assigned to the remaining pins.
Do you want to select an starting port?	<p>Select this option if you want to specify from which number the wizard should associate a port to a bundle of the riser cable to create a link.</p> <p>This refers to a port of the termination-field device that was selected with the wizard on the previous page.</p>
Starting port	<p>This port specifies from which number the wizard can associate a port to a bundle of the riser cable to create a link.</p> <p>This refers to a port of the termination-field device that was selected with the wizard on the previous page.</p>
<b>Select a riser cable page</b>	
Do you want to use an existing cable?	<ul style="list-style-type: none"> <li>• If you check this option, the wizard asks you to select an existing cable.</li> <li>• If you do not check this option, the wizard asks you to select a riser-cable model in order to create the cable itself.</li> </ul>
Cable role	<p>The selected role is used to:</p> <ul style="list-style-type: none"> <li>• Populate the <b>Role</b> field (<b>CableRole</b>) of a cable created by the wizard</li> <li>• Select a device to connect</li> <li>• Filters the existing cables that the wizard displays.</li> </ul>
Do you want to select a starting pair?	<ul style="list-style-type: none"> <li>• If you check this option, you can specify from which number the wizard can associate an available pair to a bundle of the riser cable to create a link.</li> <li>• If you do not check this option, the wizard selects the first available pairs.</li> </ul>
Available pairs for the cable:	Select the starting pair.

Label displayed by the wizard	Explanations
Pairs for the cable model:	Select the starting pair.
Number of pairs to be connected:	Define how many cable pairs must be connected to the termination fields by the wizard.
<b>Select label rule for riser page</b>	
Do you want to use a label rule for the cable label?	<ul style="list-style-type: none"> <li>• If you check this option, the wizard uses a label rule to populate the <b>Label</b> field (<b>Label</b>) of the cable.</li> <li>• If you check this option, you can directly enter the label using the wizard.</li> </ul>
Label rule	You use this label rule to populate the <b>Label</b> field ( <b>Label</b> ) of the cable.
Duty of the new cable:	<p>The selected duty is:</p> <ul style="list-style-type: none"> <li>• Part of the criteria the wizards use to select ports to connect.</li> <li>• Associated to the ports and virtual bundles created by the wizard to create the links.</li> </ul>
Number of pairs in a bundle	<p>Indicates the number of pairs to associated to each virtual bundle created by the wizard.</p> <p>You must be able to divide the total number of pairs to be connected, which you defined in the previous page, by this number.</p> <p>The default value is calculated in the following manner:</p> <ol style="list-style-type: none"> <li>1 The wizard subtracts the connection type with the least numbers of pins (from the host and user connection types selected with the wizard).</li> <li>2 It then divides the number of pins of the connection type that was subtracted by the number of pairs/conductors of the pair/conductor type of the cable selected with the wizard.</li> </ol>
Label rule of the link	You use this label rule to populate the <b>Label</b> field ( <b>Label</b> ) of the cable link created from the cable.

Label displayed by the wizard	Explanations
Apply Base 25 rule for connecting port-based devices	<ul style="list-style-type: none"> <li>If you check this option, the pairs whose numbers are a multiple of 25 are ignored by the wizard when the links are created.</li> <li>If you do not check this option, no pairs of this type are excluded.</li> </ul>
<b>Select a project and a work order page</b>	
Cable comments	Value for the <b>Description</b> field ( <b>Description</b> ) of the <b>Cables concerned by the project</b> table ( <b>amProjCable</b> ).
Connection comments	Value for the <b>Description</b> field ( <b>Description</b> ) of the <b>Traces concerned by the project</b> table ( <b>amProjTraceOut</b> ).
Connection termination field for the work order	Value for the <b>Label</b> field ( <b>Label</b> ) of the <b>Trace operations</b> table ( <b>amTraceOp</b> ).

### Data created or modified by the wizard

The wizard creates, if appropriate, the following items:

- A cable (**amCable**)
- Pairs for this cable (**amCablePair**)
- Virtual bundles (**amCableBundle**)
- Virtual ports (**amPort**)
- Cable links (**amCableLink**)
- Trace histories (**amTraceHistory**)
- Trace outputs (**amTraceOutput**)
- Trace operations (**amTraceOp**)

The wizard populates the following fields:

**Table 6.2. Run riser cables wizard - created or modified data**

Field label	SQL name of the field	Explanations
<b>Assets table (amAsset)</b>		
Ports	Ports	The wizard creates virtual ports connected to bundles of the riser cable if it is necessary.
<b>Ports table (amPort)</b>		

Field label	SQL name of the field	Explanations
Port #	PortNo	This field is only populated for the virtual ports created by the wizard. Its value is the number after the last port number existing for the device.
#	sSequenceNumber	This field is only populated for the virtual ports created by the wizard. Its value is the number after the last port number existing for the device.
Connection type	CabCnxType	This field is only populated for the virtual ports created by the wizard. Connection type selected using the wizard for the host or user termination field.
Function	Duty	This field is only populated for the virtual ports created by the wizard. Duty defined by the wizard for the cable.
Status	seCnxStatus	This field is only populated for the virtual ports created by the wizard. Its value is set to <b>Available</b> by the wizard.
Virtual port	bVirtual	This field is only populated for the virtual ports created by the wizard. Its value is set to <b>Yes</b> .
Port pins/terminals	DevPin	Pins selected by the wizard to create a cable link.
<b>Cables table (amCable)</b>		
Model	Model	Cable model selected using the wizard.
Label rule	LabelRule	This field is only modified for the cables created by the wizard. The label rule selected using a wizard for the cable.
Label	Label	This field is only modified for the cables created by the wizard. The label is calculated according to the label rule.
User location	UserLoc	This field is only modified for the cables created by the wizard. Location of the user termination field selected using the wizard.

Field label	SQL name of the field	Explanations
Host location	HostLoc	This field is only modified for the cables created by the wizard. Location of the host termination field selected using the wizard.
Role	CableRole	Role selected using the wizard.
Status	seCnxStatus	This field is only modified for the cables created by the wizard. Its value is set to <b>Available</b> by the wizard.
Pairs/Conductors	Pairs	This field is only modified for the cables created by the wizard. Pairs/conductors of the model.
Bundles	Bundles	Virtual bundles created by the wizard if it is necessary.
<b>Pairs/Conductors table (amCablePair)</b>		
Bundle	Bundle	Bundle with which the pair/conductor is associated to create a cable link.
<b>Pins table (amDevicePin)</b>		
Port	Port	Port with which the pin/terminal is associated to create a cable link.
<b>Cable bundle table (amCableBundle)</b>		
#	sSequenceNumber	This field is only populated for the virtual bundles created by the wizard. Its value is the number after the last bundle number existing for the device.
Name	Name	This field is only populated for the virtual bundles created by the wizard. Its value is the number after the last bundle number existing for the device.
Function	Duty	This field is only populated for the virtual bundles created by the wizard. Duty defined by the wizard for the cable.
Status	seCnxStatus	This field is only populated for the virtual bundles created by the wizard. Its value is set to <b>Available</b> by the wizard.
Virtual bundle	bVirtual	This field is only populated for the virtual bundles created by the wizard. Its value is set to <b>Yes</b> .
Pairs/Conductors	Pair	Pairs/conductors selected by the wizard to create a cable link.

Field label	SQL name of the field	Explanations
<b>Cable links table (amCableLink)</b>		
Name	Name	Default value of the field.
Link type	seLinkType	Populated by the wizard according to whether the cable link concerns a cable device or a cable.
Parent link	Parent	
Label rule	LabelRule	The label rule selected using a wizard.
Label	Label	The label is calculated according to the label rule.
Function	Duty	Duty selected using the wizard.
Device	Device	Device selected automatically by the wizard or by you using the wizard.
Port	Port	Port selected or created by the wizard.
Cable	Cable	Cable created by the wizard or selected by you using the wizard.
Bundle	Bundle	Bundle selected or created using the wizard.
<b>Trace histories table (amTraceHistory)</b>		
Name	Name	Copy the value defined for the same field used at the level of the cable link.
Type	seLinkType	Copy the value defined for the same field used at the level of the cable link.
Parent history	Parent	Copy the value defined for the same field used at the level of the cable link.
Label	Label	Copy the value defined for the same field used at the level of the cable link.
Device	Device	Copy the value defined for the same field used at the level of the cable link.
Port	Port	Copy the value defined for the same field used at the level of the cable link.
Cable	Cable	Copy the value defined for the same field used at the level of the cable link.
Bundle	Bundle	Copy the value defined for the same field used at the level of the cable link.
Link	Link	Cable link created by the wizard.
<b>Trace outputs table (amTraceOutput)</b>		
Type	seTraceType	Value set to <b>To connect</b> by the wizard.
Function	Duty	Duty selected using the wizard.
Label	ModifiedLinkLabel	The label is calculated by the wizard and is not based on a label rule in any way.
Summary of the trace	TraceString	Calculated by the wizard.

Field label	SQL name of the field	Explanations
Trace history	TraceHist	Histories created by the wizard.
Trace operations	TraceOps	Operations created by the wizard.
<b>Trace operations table (amTraceOp)</b>		
Title	Label	Value defined by the wizard according to the comments that you entered using the wizard.
Host trace history	HostTraceHist	Defined by the wizard.
User trace history	UserTraceHist	Defined by the wizard.

### Viewing the result

The easiest way to view the result of this wizard is to display the detail of the project selected on the last page of the wizard:

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Select the project created by the wizard.
- 3 Select the **Cables** tab.

The **Cables** tab enables you to locate the cable that connects the two termination fields:

- 1 Select the cable to examine.
- 2 Click the magnifier to display an intermediary window.
- 3 In the intermediary window, click the magnifier to the right of the **Cable** field to view the detail of the device.
- 4 Right-click on any field (not link) in the **Assets** table (**amAsset**) to display the shortcut menu.
- 5 From the shortcut menu, select either the **Actions/ Cable cross-connections** or **Actions/ Display cable traces** menu entry to view and browse through the traces.

This particularly enables you to access the termination-field devices that were connected to the cable by a wizard.

- 4 Select the **Traces** tab.

The **Traces** tab displays the list of trace outputs created by the wizard.

## After having launched the wizard

Run the riser cable at the level of your network, being sure to respect the indications listed in the project and the work order, and update the follow-up information of the project and work order.

## Resolving possible problems

If the **Select a host termination field** page or **Select a user termination field** page does not display any termination field to select:

- 1 Click **Cancel** to interrupt the execution of the wizard.
- 2 Display the list of termination fields (**Cable/ Termination fields**).
- 3 Select the host termination field (the one that was not listed by the wizard).
- 4 Select the **Served locations** tab.
- 5 Add the location to the location of the user termination field to the list.
- 6 Click **Modify**.
- 7 Click **Close**.
- 8 Execute the **Run riser cables** wizard again.

## Use the Run riser cables wizard for the practical case.

We are going to run a telephone riser cable between the floor's termination field and the main termination field.

- 1 Display the list of actions (**Tools/ Actions**).
- 2 Select the **Run riser cables** wizard.
- 3 Enter the following information:

<b>Label displayed by the wizard</b>	<b>Value to enter or select</b>
<b>Select a host termination field page</b>	
Locations	/Cabled building/2nd floor/Main wiring closet/
Host termination field	Main wiring closet
Do you want to select a starting position?	Do not check this option.
<b>Select the host termination field connectors and a label rule page</b>	



<b>Label displayed by the wizard</b>	<b>Value to enter or select</b>
Cable connection types	RJ45 - 568B - Pin
Do you want to search for ports of this pin mode?	Do not check this option.
Label rule	Term-field patch-panel port label
Map consecutive pins to virtual port for pin-based devices (default is next available pin)?	Check this selection box.
Type of cable connection for odd pins	Do not change the information displayed by the wizard; it will not be used.
Type of duty for odd pins connector	Do not change the information displayed by the wizard; it will not be used.
<b>Select a user termination field page</b>	
Locations	Cabled building/1st floor/1st floor wiring closet
User termination field	Wiring closet for each floor
Do you want to select a starting position?	Do not check this option.
<b>Select the user termination field connectors and a label rule page</b>	
Cable connection types	RJ45 - 568B - Pin
Do you want to search for ports of this pin mode?	Do not check this option.
Label rule	Term-field patch-panel port label
Map consecutive pins to virtual port for pin-based devices (default is next available pin)?	Check this selection box.
Type of cable connection for odd pins	Do not change the information displayed by the wizard; it will not be used.
Type of duty for odd pins connector	Do not change the information displayed by the wizard; it will not be used.
<b>Select a riser cable page</b>	
Cable role	Riser
Do you want to use an existing cable?	Do not check this option.
Model of the cable to create	L 120 - Category 5 - 32 twisted pairs
Number of pairs to be connected:	32
Do you want to select a starting pair?	Do not check this option.
<b>Select label rule for riser page</b>	
Do you want to use a label rule for the cable label?	Check this selection box.
Label rule	Cable label rule
Duty for the cable:	Voice
Number of pairs in a bundle	1
Label rule	Label by sequential pair number
<b>Select the project page</b>	
Apply all changes to a project/work order?	Check this selection box.
Projects	Run riser cables

Work orders	Select the work order proposed by the wizard.
<b>Label displayed by the wizard</b>	<b>Value to enter or select</b>
Create device comment	Install the new cable
Connection comments	Riser run to connect devices
Connection termination field for the work order	CONNECT

Look at the result:

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Select the **Run riser cables** project.
- 3 Select the **Cables** tab.
- 4 Select the cable just created.
- 5 Click the magnifier to display an intermediary window.
- 6 In the intermediary window, click the magnifier to the right of the **Cable** field to view the detail of the device.
- 7 Have a look at the different tabs at your own pace.
- 8 Select any field (not link) in the **Cables** table (**amCable**).
- 9 Right-click.
- 10 From the shortcut menu, select either the **Actions/ Cable cross-connections** or **Actions/ Display cable traces** menu entry to view and browse through the traces.

This particularly enables you to access the termination-field devices that were connected to the cable by a wizard.

## Run lateral cables wizard

### Functions performed by the wizard

This wizard connects wall outlets to a termination field using lateral cables. The wizard uses a group of topologies as its model.

### Prerequisites

You should have already created:

- The location of the wall outlets.

- The group of topologies to use as the model.
  - The topologies that compose the topology group.
  - The termination fields that serve the locations of the wall outlets.
  - The devices of the termination field to which the lateral cable will connect.
- 

 **Warning:**

You must respect different conditions according to the connection to the device and whether it is made by ports or by pins.

To learn more, refer to the chapter **Implementing cable management (Cable and Circuit)**, section **Cable device models without slots./ Creating the models of cable devices without slots/ Connection by ports or by pins** of this guide.

---

- A project and a work order, if you want to store the trace of the connections carried out.

## Use the Run lateral cables wizard.

### Launching the wizard

This wizard does not require any particular context.

- 1 Display the list of actions (**Tools/ Actions**).
  - 2 Select the **Run lateral cables** wizard.
- 

 **Tip:**

If you display the list of locations (**Portfolio/ Locations** menu item) and select all the locations of the wall outlets before executing the wizard, the wizard will not ask to you perform this selection again.

---

## Information used when using the wizard

### Note:

Certain labels in the following table are not displayed by the wizard unless you select the appropriate option.

**Table 6.3. Run lateral cables wizard - description of fields to populate**

Label displayed by the wizard	Explanations
<b>Select user locations page</b>	
Locations	Select one location per wall outlet to connect.
<b>Select the topology group page</b>	
Topology groups	Select the group of topologies that will be used as the connection model of the wall outlets to the termination field that serves them.
Are there any topologies in which you want to look for ports with pin-based connectors?	Check this option if you want the wizard to look for virtual ports that have already been created on the host or the user side of the topology.  This option's only result is that it displays two other options that will have an effect on how the wizard works.
Do you want to look for ports on the host side of the topology?	If you check this option, the wizard looks for virtual ports that exist at the level of the termination fields in order to create the connection with the lateral cable.  This is valid for the topologies selected from the following list.
Do you want to look for ports on the user side of the topology?	If you check this option, the wizard looks for virtual ports that exist at the level of the wall outlets in order to create the connection with the lateral cable.  This is valid for the topologies selected from the following list.
Topology in a group	Select the topologies to which apply the options previously checked.

<b>Label displayed by the wizard</b>	<b>Explanations</b>
Map consecutive pins to virtual port for pin-based devices (default is next available pin)?	<ul style="list-style-type: none"> <li>If you check this option, the wizard only uses the pins with consecutive numbers to create virtual ports.</li> <li>If you don't check this option, the wizard selects the first available pins without requiring them to have consecutive numbers.</li> </ul>
<b>Select a project and a work order page</b>	
Comments on the devices	Value for the <b>Description</b> field ( <b>Description</b> ) of the <b>Assets included in projects</b> table ( <b>amAstProjDesc</b> ).
Cable comments	Value for the <b>Description</b> field ( <b>Description</b> ) of the <b>Cables concerned by the project</b> table ( <b>amProjCable</b> ).
Connection comments	Value for the <b>Description</b> field ( <b>Description</b> ) of the <b>Traces concerned by the project</b> table ( <b>amProjTraceOut</b> ).
Connection termination field for the work order	Value for the <b>Label</b> field ( <b>Label</b> ) of the <b>Trace operations</b> table ( <b>amTraceOp</b> ).

### Data created or modified by the wizard

The wizard creates, if appropriate, the following items:

- Cables (**amCable**)
- Pairs for this cable (**amCablePair**)
- Virtual bundles (**amCableBundle**)
- Cable devices (**amAsset**)
- Pins for the devices (**amDevicePin**).
- Virtual ports for the devices (**amPort**).
- Cable links (**amCableLink**)
- Trace histories (**amTraceHistory**)
- Trace outputs (**amTraceOutput**)
- Trace operations (**amTraceOp**)

The wizard populates the following fields:

**Table 6.4. Run lateral cables wizard - created or modified data**

<b>Field label</b>	<b>SQL name of the field</b>	<b>Explanations</b>
<b>Assets table (amAsset)</b>		
Ports	Ports	The wizard creates virtual ports connected to bundles of the lateral cable if it is necessary.
Location	Rental	The wizard links wall outlets to the location selected using the wizard, if it creates wall outlets.
<b>Ports table (amPort)</b>		
Port #	PortNo	This field is only populated for the virtual ports created by the wizard. Its value is the number after the last port number existing for the device.
#	sSequenceNumber	This field is only populated for the virtual ports created by the wizard. Its value is the number after the last port number existing for the device.
Connection type	CabCnxType	This field is only populated for the virtual ports created by the wizard. Its value corresponds to the connection type defined at the level of the topology step for the device to which the port belongs.
Function	Duty	This field is only populated for the virtual ports created by the wizard. Its value corresponds to the duty defined at the level of the topology step for the device to which the port belongs.
Status	seCnxStatus	This field is only populated for the virtual ports created by the wizard. Its value is set to <b>Available</b> by the wizard.
Virtual port	bVirtual	This field is only populated for the virtual ports created by the wizard. Its value is set to <b>Yes</b> .
Port pins/terminals	DevPin	Pins selected by the wizard to create a cable link, if the connection is by pin.
<b>Cables table (amCable)</b>		

Field label	SQL name of the field	Explanations
Model	Model	This field is only modified for the cables created by the wizard. Cable model defined at the level of the topology step.
Label rule	LabelRule	Default value of the field.
Label	Label	This field is only modified for the cables created by the wizard. The label is calculated according to the label rule.
User location	UserLoc	This field is only modified for the cables created by the wizard. Location of the wall outlet.
Host location	HostLoc	This field is only modified for the cables created by the wizard. Location of the termination field found by the wizard to create the connection.
Role	CableRole	This field is only modified for the cables created by the wizard. Role defined at the level of the topology step.
Status	seCnxStatus	This field is only modified for the cables created by the wizard. Its value is set to <b>Available</b> by the wizard.
Pairs/Conductors	Pairs	This field is only populated for the cables created by the wizard. Pairs/conductors of the model.
Bundles	Bundles	Virtual bundles created by the wizard if it is necessary.
<b>Pairs/Conductors table (amCablePair)</b>		
Bundle	Bundle	Bundle with which the pair/conductor is associated to create a cable link.
<b>Pins table (amDevicePin)</b>		
Port	Port	Port with which the pin/terminal is associated to create a cable link.
<b>Cable bundle table (amCableBundle)</b>		
#	sSequenceNumber	This field is only populated for the virtual bundles created by the wizard. Its value is the number after the last bundle number existing for the device.

Field label	SQL name of the field	Explanations
Name	Name	This field is only populated for the virtual bundles created by the wizard. Its value is the number after the last bundle number existing for the device.
Function	Duty	This field is only populated for the virtual bundles created by the wizard. Duty defined at the level of the topology.
Status	seCnxStatus	This field is only populated for the virtual bundles created by the wizard. Its value is set to <b>Available</b> by the wizard.
Virtual bundle	bVirtual	This field is only populated for the virtual bundles created by the wizard. Its value is set to <b>Yes</b> .
Pairs/Conductors	Pair	Pairs/conductors selected by the wizard to create a cable link.
<b>Cable links table (amCableLink)</b>		
Name	Name	Default value of the field.
Link type	seLinkType	Populated by the wizard according to whether the cable link concerns a cable device or a cable.
Parent link	Parent	
Label rule	LabelRule	The label rule selected at the level of the topology.
Label	Label	The label is calculated according to the label rule.
Function	Duty	Duty defined at the level of the topology.
Device	Device	Device selected or created using the wizard.
Port	Port	Port selected or created by the wizard.
Cable	Cable	Cable selected or created by the wizard.
Bundle	Bundle	Bundle selected or created using the wizard.
<b>Trace histories table (amTraceHistory)</b>		
Name	Name	Copy the value defined for the same field used at the level of the cable link.
Type	seLinkType	Copy the value defined for the same field used at the level of the cable link.
Parent history	Parent	Copy the value defined for the same field used at the level of the cable link.
Label	Label	Copy the value defined for the same field used at the level of the cable link.



Field label	SQL name of the field	Explanations
Device	Device	Copy the value defined for the same field used at the level of the cable link.
Port	Port	Copy the value defined for the same field used at the level of the cable link.
Cable	Cable	Copy the value defined for the same field used at the level of the cable link.
Bundle	Bundle	Copy the value defined for the same field used at the level of the cable link.
Link	Link	Cable link created by the wizard.
<b>Trace outputs table (amTraceOutput)</b>		
Type	seTraceType	Value defined using the wizard.
Function	Duty	Duty defined at the level of the topology.
Label	ModifiedLinkLabel	The label is calculated by the wizard and is not based on a label rule in any way.
Summary of the trace	TraceString	Calculated by the wizard.
Trace history	TraceHist	Histories created by the wizard.
Trace operations	TraceOps	Operations created by the wizard.
<b>Trace operations table (amTraceOp)</b>		
Title	Label	Value defined by the wizard according to the comments that you entered using the wizard.
Host trace history	HostTraceHist	Defined by the wizard.
User trace history	UserTraceHist	Defined by the wizard.

## Viewing the result

The easiest way to view the result of this wizard is to display the detail of the project selected on the last page of the wizard:

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Select the project created by the wizard.
- 3 Select the **Cables** tab.

The **Cables** tab enables you to locate the cable that connects the two termination fields:

- 1 Select the cable to examine.
- 2 Click the magnifier to display an intermediary window.
- 3 In the intermediary window, click the magnifier to the right of the **Cable** field to view the detail of the device.

- 4 Right-click on any field (not link) in the **Assets** table (**amAsset**) to display the shortcut menu.
- 5 From the shortcut menu, select either the **Actions/ Cable cross-connections** or **Actions/ Display cable traces** menu entry to view and browse through the traces.

This particularly enables you to access the termination-field devices that were connected to the cable by a wizard.

- 4 Select the **Assets** tab.

The **Assets** tab enables you to locate the devices created by the wizard (not those that already existed):

- 1 Select the device to examine.
- 2 Click the magnifier to display an intermediary window.
- 3 In the intermediary window, click on the magnifier to the right of the **Asset** field to view the detail of the device.
- 4 Right-click on any field (not link) in the **Assets** table (**amAsset**) to display the shortcut menu.
- 5 From the shortcut menu, select either the **Actions/ Cable cross-connections** or **Actions/ Display cable traces** menu entry to view and browse through the traces.

This particularly enables you to access the termination-field devices that were connected to the cable by a wizard.

- 5 Select the **Traces** tab.

The **Traces** tab displays the list of trace outputs created by the wizard.

### After having launched the wizard

Run the lateral cable and install the cable devices as you need them, being sure to respect the indications listed in the project and the work order, and update the follow-up information of the project and work order.

## Use the Run lateral cables wizard for the practical case.

We are going to run a lateral cable between the wall outlet of Office 1 and the floor's termination field.

- 1 Display the list of actions (**Tools/ Actions**).
- 2 Select the **Run riser cables** wizard.
- 3 Enter the following information:

Label displayed by the wizard	Explanations
<b>Select user locations page</b>	
Locations	Cabled building/1st floor/Office 1
<b>Select the topology group page</b>	
Topology groups	Standard workstation
Are there any topologies in which you want to look for ports with pin-based connectors?	Do not check this option.
Map consecutive pins to virtual port for pin-based devices (default is next available pin)?	Do not check this option.
<b>Select a project and a work order page</b>	
Apply all changes to a project/work order?	Check this selection box.
Projects	Run lateral cables
Work orders	Select the work order proposed by the wizard.
Comments on the devices	Install the device.
Cable comments	Install new cable
Connection comments	Lateral run to connect devices
Connection termination field for the work order	CONNECT

Look at the result:

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Select the **Run lateral cables** project.
- 3 Select the **Cables** tab.
- 4 Select one of the cables just created.
- 5 Click the magnifier to display an intermediary window.
- 6 In the intermediary window, click the magnifier to the right of the **Cable** field to view the detail of the device.
- 7 Have a look at the different tabs at your own pace.
- 8 Select any field (not link) in the **Cables** table (**amCable**).

9 Right-click.

10 From the shortcut menu, select either the **Actions/ Cable cross-connections** or **Actions/ Display cable traces** menu entry to view and browse through the traces.

This particularly enables you to access the termination-field devices that were connected to the cable by a wizard.

## Cross connect bundles wizard

### Functions performed by the wizard

This wizard connects bundles of the same cable to one of the following components:

- Bundles of one or more cables.
- Ports of one or more cable devices.
- Ports of termination-field devices.

If the selected bundles or ports are already connected, the wizard begins by breaking the existing cable links before creating new ones.

### Prerequisites

You should have already created:

- The source cable to connect, with its bundles, its user location and its host location.
- The cable device to which the cable connects, with its ports and its location. Otherwise, the cable to which the cable connects with its bundles, its user location and its host location.
- The termination fields that serve the user or host location of the cable to connect.
- A project and a work order, if you want to store the trace of the connections carried out.

 **Warning:**

The wizard does not know how to create a virtual port.

## Use the Cross connect bundles wizard.

### Launching the wizard

To access this wizard, you must select a record or a field (not a link) from the **Cable bundles** table (**amCableBundle**):

To position yourself in the appropriate context:

- 1 Display the list of cables (**Cable/ Cables**).
- 2 Display the cable to connect.
- 3 Select the **Bundles** tab.
- 4 Select the bundles to cross connect.
- 5 Display the list of actions (**Tools/ Actions**).
- 6 Select the **Cross connect bundles** action.

### Information used when using the wizard

 **Note:**

Certain labels in the following table are not displayed by the wizard unless you select the appropriate option.

**Table 6.5. Cross connect bundles wizard - description of fields to populate**

<b>Label displayed by the wizard</b>	<b>Explanations</b>
<b>Cross connect the bundles page</b>	

Label displayed by the wizard	Explanations
Display available host bundles	<ul style="list-style-type: none"> <li>• If you check this option, the wizard only displays the cable bundles whose host side is not used by any cable link.</li> <li>• If you check this option, the wizard displays all the cable's bundles.</li> </ul> <p>If you select a bundle whose host side is used by a cable link, the wizard will break the existing cable link before creating a new one.</p>
Display available user bundles	<ul style="list-style-type: none"> <li>• If you check this option, the wizard only displays the cable bundles whose user side is not used by any cable link.</li> <li>• If you check this option, the wizard displays all the cable's bundles.</li> </ul> <p>If you select a bundle whose user side is used by a cable link, the wizard will break the existing cable link before creating a new one.</p>
Select the bundles to connect	Select the cable bundles to connect.
Select label rule for bundle(s) selected	You use this label rule to populate the <b>Label</b> field ( <b>Label</b> ) of the links created at the level of the cable bundles.
Select connection side	Indicate which side of the cable you want to connect.
Connect to	<p>Indicate to which component you want to connect the selected bundles:</p> <ul style="list-style-type: none"> <li>• Ports: to the ports of one or more cable devices.</li> <li>• Bundles: to the bundles of one or more cables.</li> <li>• Termination fields: to the ports of the termination-field devices that serve the location of the cable.</li> </ul>
<b>Select a device and ports page</b>	
Select a device	Select the cable devices to which you want to connect the bundles of the source cable.

Label displayed by the wizard	Explanations
Show available host ports	<ul style="list-style-type: none"> <li>• If you check this option, the wizard only displays the ports of the device that are not used as hosts by any cable link.</li> <li>• If you check this option, the wizard displays all the device's ports.</li> </ul> <p>If you select a port that is already used as a host, the wizard will break the existing cable link before creating a new one.</p>
Show available user ports	<ul style="list-style-type: none"> <li>• If you check this option, the wizard only displays the ports of the device that are not used as users by any cable link.</li> <li>• If you check this option, the wizard displays all the device's ports.</li> </ul> <p>If you select a port that is already used as a user, the wizard will break the existing cable link before creating a new one.</p>
Select the target ports	You must select as many ports as you have selected bundles for the cable in the previous window.
Select label rule for port(s) selected	You use this label rule to populate the <b>Label</b> field ( <b>Label</b> ) of the links created at the level of the port device.
<b>Select a cable and bundles page</b>	
Cables	Select the cable to which you want to connect the bundles of the source cable.
Display available host bundles	<ul style="list-style-type: none"> <li>• If you check this option, the wizard only displays the cable bundles whose host side is not used by any cable link.</li> <li>• If you check this option, the wizard displays all the cable's bundles.</li> </ul> <p>If you select a bundle whose host side is used by a cable link, the wizard will break the existing cable link before creating a new one.</p>

<b>Label displayed by the wizard</b>	<b>Explanations</b>
Display available user bundles	<ul style="list-style-type: none"> <li>If you check this option, the wizard only displays the cable bundles whose user side is not used by any cable link.</li> <li>If you check this option, the wizard displays all the cable's bundles.</li> </ul> <p>If you select a bundle whose user side is used by a cable link, the wizard will break the existing cable link before creating a new one.</p>
Select label rule for destination bundle	You use this label rule to populate the <b>Label</b> field ( <b>Label</b> ) of the links created at the level of the target cable bundles.
<b>Select a termination field and ports page</b>	
Termination fields	Select the termination fields to which you want to connect the bundles of the source cable.
Show available host ports	<ul style="list-style-type: none"> <li>If you check this option, the wizard only displays the ports of the termination-field devices that are not used as hosts by any cable link.</li> <li>If you check this option, the wizard displays all the ports.</li> </ul> <p>If you select a port that is already used as a host, the wizard will break the existing cable link before creating a new one.</p>
Show available user ports	<ul style="list-style-type: none"> <li>If you check this option, the wizard only displays the ports of the termination-field devices that are not used as users by any cable link.</li> <li>If you check this option, the wizard displays all the device's ports.</li> </ul> <p>If you select a port that is already used as a user, the wizard will break the existing cable link before creating a new one.</p>
Select the target ports	You must select as many ports as you have selected bundles for the cable in the previous window.
Select label rule for port(s) selected	You use this label rule to populate the <b>Label</b> field ( <b>Label</b> ) of the links created at the level of the termination-field port devices.
<b>Select project and work order information page</b>	



Label displayed by the wizard	Explanations
Connection comments	Value for the <b>Description</b> field ( <b>Description</b> ) of the <b>Traces concerned by the project</b> table ( <b>amProjTraceOut</b> ), when the wizard creates a connection.
Disconnection comments	Value for the <b>Description</b> field ( <b>Description</b> ) of the <b>Traces concerned by the project</b> table ( <b>amProjTraceOut</b> ), when the wizard deletes a connection.
Termination field connected during work order	Value for the <b>Label</b> field ( <b>Label</b> ) of the <b>Trace operations</b> table ( <b>amTraceOp</b> ), when the wizard creates a connection.
Termination field disconnected during work order	Value for the <b>Label</b> field ( <b>Label</b> ) of the <b>Trace operations</b> table ( <b>amTraceOp</b> ), when the wizard deletes a connection.

### Data created or modified by the wizard

To create a connection, the wizard creates the following items:

- Cable links (**amCableLink**)
- Trace histories (**amTraceHistory**)
- Trace outputs (**amTraceOutput**)
- Trace operations (**amTraceOp**)

To delete a connection, the wizard performs the following tasks:

- Deletes the cable links (**amCableLink**).
- Creates trace outputs (**amTraceOutput**).
- Creates trace operations (**amTraceOp**).

The wizard populates the following fields:

**Table 6.6. Cross connect bundles wizard - created or modified data**

Field label	SQL name of the field	Explanations
<b>Cable links table (amCableLink)</b>		
Name	Name	Default value of the field.

Field label	SQL name of the field	Explanations
Link type	seLinkType	Populated by the wizard according to whether the cable link concerns a cable device or a cable.
Parent link	Parent	
Label rule	LabelRule	The label rule selected using a wizard. If no label rule has been selected, this is the default value of the field.
Label	Label	The label is calculated according to the label rule.
Function	Duty	Duty of the port or bundle connected by the wizard.
Device	Device	Device selected using the wizard.
Port	Port	Port selected using the wizard.
Cable	Cable	Cable selected using the wizard.
Bundle	Bundle	Bundle selected using the wizard.
<b>Trace histories table (amTraceHistory)</b>		
Name	Name	Default value of the field.
Type	seLinkType	Copy the value defined for the same field used at the level of the cable link.
Parent history	Parent	Copy the value defined for the same field used at the level of the cable link.
Label	Label	Copy the value defined for the same field used at the level of the cable link.
Device	Device	Copy the value defined for the same field used at the level of the cable link.
Port	Port	Copy the value defined for the same field used at the level of the cable link.
Cable	Cable	Copy the value defined for the same field used at the level of the cable link.
Bundle	Bundle	Copy the value defined for the same field used at the level of the cable link.
Link	Link	<ul style="list-style-type: none"> <li>• If the wizard creates a connection: It is the cable link created by the wizard.</li> <li>• If the wizard deletes a connection: It is empty.</li> </ul>
<b>Trace outputs table (amTraceOutput)</b>		
Type	seTraceType	<ul style="list-style-type: none"> <li>• <b>To connect:</b> if it's a connection.</li> <li>• <b>To disconnect:</b> if it's a disconnection.</li> </ul>
Function	Duty	Duty of the port or the bundle connected by the wizard.

Field label	SQL name of the field	Explanations
Label	ModifiedLinkLabel	The label is calculated by the wizard and is not based on a label rule in any way.
Summary of the trace	TraceString	Calculated by the wizard.
Trace history	TraceHist	<ul style="list-style-type: none"> <li>If the wizard creates a connection: They are the histories created by the wizard.</li> <li>If the wizard deletes a connection: They are the histories that exist for the deleted cable links.</li> </ul>
Trace operations	TraceOps	Operations created by the wizard.
<b>Trace operations (amTraceOp)</b>		
Title	Label	Value defined by the wizard according to the comments that you entered using the wizard.
Host trace history	HostTraceHist	Defined by the wizard.
User trace history	UserTraceHist	Defined by the wizard.

## Viewing the result

The easiest way to view the result of this wizard is to display the detail of the project selected on the last page of the wizard.

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Select the project created by the wizard.
- 3 Select the **Traces** tab.

The **Traces** tab displays the list of trace outputs created by the wizard.

- 1 Select the trace output to examine.
- 2 Click the magnifier to display an intermediary window.
- 3 In the intermediary window, click on the magnifier to the right of the **Trace output** field.
- 4 Examine the trace output information.

You can also display the cross connections screen or the cable trace outputs screen:

- 1 Display the list of cables (**Cable/ Cables**).
- 2 Select the cable that you just connected from the list of cables.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Cable cross-connections** or **Display cable traces** action.

### After having launched the wizard

Perform the physical cross connections, being sure to respect the indications listed in the project and the work order, and update the follow-up information of the project and work order.

## Use the Cross connect bundles wizard for the practical case.

We are going to perform a modification at the level of the lateral cable that links the telephone outlet from Office 1 to the floor's termination field: We will connect the cable to another termination-field port.

Proceed in the following manner:

- 1 Display the list of locations (**Portfolio/ Locations**).
- 2 Select the **Cabled building/1st floor/Office 1** location.
- 3 Select the **Cable users** tab.
- 4 Select the cable that connects the telephone to the termination field (this bundle's duty is **Voice**).
- 5 Click the **Magnifier** button.
- 6 Select the **Bundles** tab.
- 7 Select the bundle from the list.
- 8 Display the list of actions (**Tools/ Actions**).
- 9 Select the **Cross connect bundles** action.
- 10 Enter the following information:

Label displayed by the wizard	Value
<b>Cross connect the bundles page</b>	
Select connection side	Host side
Display available host bundles	Unselect this option.
Cable bundles	Select the bundle.
Select label rule for bundle(s) selected	Label by sequential pair number
Connect to	Termination fields
<b>Select a device and ports page</b>	
Termination fields	Floor's termination field
Show available host ports	Check this selection box.

Label displayed by the wizard	Value
Select the target ports	Select a port whose function is <b>Voice</b> .
Select label rule for port(s) selected	Term-field patch-panel port label
<b>Select project and work order information page</b>	
Apply all changes to a project/work order?	Check this selection box.
Projects	Cross connect bundles
Work orders	Select the work order proposed by the wizard.
Connection comments	Connect cables
Disconnection comments	Disconnect cables
Termination field connected during work order	CONNECT
Termination field disconnected during work order	DISCONNECT

Look at the result:

- 1 Display the list of projects (**Portfolio/ Projects**).
- 2 Select the **Cross-connect bundles** project.
- 3 Select the **Traces** tab.
- 4 Select the trace.
- 5 Click the **Magnifier** button.
- 6 Click the **Magnifier** button to the right of the **Trace** field.
- 7 Examine the detail of the trace output.



# 7 | Viewing the traces

## CHAPTER

There are several ways to view a trace:

- Connection point by connection point, using the **Trace** tabs of the following tables:
  - **Cables (amCable)**
  - **Assets (amAsset)**
  - **Ports (amPort)**
  - **Cable bundles (amCableBundle)**
- In a more general manner, using the windows displayed by the following shortcut menus:
  - Actions/ Cable cross-connections
  - Actions/ Device cross-connections
  - Actions/ Display device traces
  - Actions/ Display cable traces

This chapter explains how to view the traces in a general manner.

## Cable cross-connections wizard

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cross connection of this guide.

### Functions performed by the wizard

The **Cable cross-connections** wizard displays a window that enables you to perform the following tasks:

- View the host and user links of the cable.
- Navigate through the traces, which are made up of cable links (either in the host direction or the user direction).

This enables you, for example, to answer the following questions:

- Which links are for this cable?
- Which bundles are used by links?
- To which wall outlet port is such cable bundle connected?
- To which termination field port is such a cable bundle connected?

### Prerequisites

No prerequisites.

## Use the Cable cross-connections wizard.

### Launching the wizard

To access this wizard, you need to select a record or a field (not a link) in the **Cables** table (**amCable**):

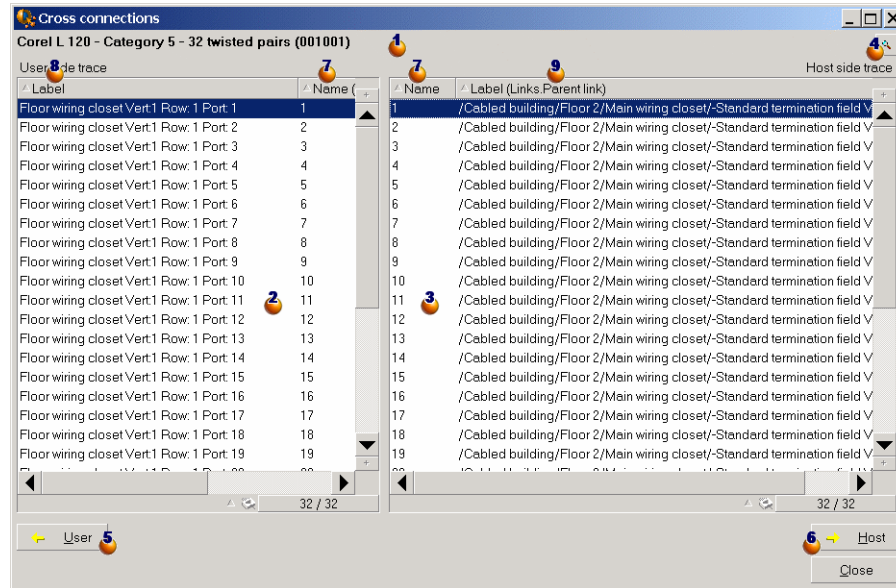
- 1 Display the list of cables (**Cable/ Cables**).
- 2 Select the cable in the list window, or select a field (not link) in the **Cables** table.
- 3 Display the list of actions (**Tools/ Actions**).



#### 4 Select the **Cable cross-connections** wizard.

### Information used when using the wizard

**Figure 7.1. Cable cross-connections wizard - browser window**



- 1 Cable or device whose 2 and 3 tables display the cable links.
- 2 User cable links and devices that connect to the cable or the device 1.
- 3 Host cable links and devices that connect to the cable or the device 1.
- 4 Click the magnifier to display the detail of the cable or the device 1.
- 5 Click this arrow to display the browser window for the user cable or device that corresponds to the selected link 2.
- 6 Click this arrow to display the browser window for the host cable or device that corresponds to the selected link 3.
- 7 Cable bundle numbers 1 (if 1 is a cable) or device ports 1 (if 1 is a device).

- 8 Label of the user link that connects to the bundle or the port 7.
- 9 Label of the host link that connects to the bundle or the port 7.

### Data created or modified by the wizard

This wizard does not create, delete or modify any data.

## Device cross-connections wizard

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Cross connection of this guide.

### Functions performed by the wizard

The **Device cross-connections** wizard displays a window to help you perform the following tasks:

- View the host and user links of the device.
- Navigate through the traces, which are made up of device links (either in the host direction or the user direction).

This enables you, for example, to answer the following questions:

- Which links are for this device?
- Which ports are used by links?
- To which cable bundle is such a device port connected?

### Prerequisites

No prerequisites.

## Use the Device cross-connections wizard.

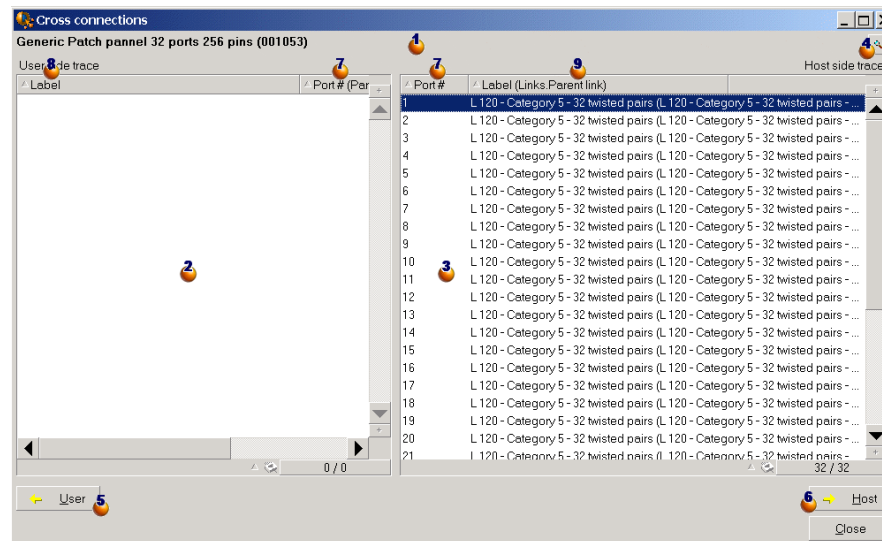
### Launching the wizard

To access this wizard, you need to select a record or a field (not a link) in the **Assets** table (**amAsset**):

- 1 Display the list of cable devices (**Cable/ Cable devices**).
- 2 Select the cable device in the list window, or select a field (not link) in the **Assets** table.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Device cross-connections** wizard.

### Information used when using the wizard

**Figure 7.2. Device cross-connections wizard - browser window**



- 1 Cable or device whose **2** and **3** tables display the cable links.
- 2 User cable links and devices that connect to the cable or the device
- 1.

- 3 Host cable links and devices that connect to the cable or the device 1.
- 4 Click this magnifier to display the detail of the cable or the device 1.
- 5 Click this arrow to display the browser window for the user cable or device that corresponds to the selected link 2.
- 6 Click this arrow to display the browser window for the host cable or device that corresponds to the selected link 3.
- 7 Cable bundle numbers 1 (if 1 is a cable) or device ports 1 (if 1 is a device).
- 8 Label of the user link that connects to the bundle or the port 7.
- 9 Label of the host link that connects to the bundle or the port 7.

### Data created or modified by the wizard

This wizard does not create, delete or modify any data.

## Display device traces wizard

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Trace of this guide.

### Functions performed by the wizard

The **Display device traces** wizard displays a window to help you perform the following tasks:

- View the host and user traces of the device.
- Print the list of traces.

### Prerequisites

No prerequisites.

## Use the Display device traces wizard.

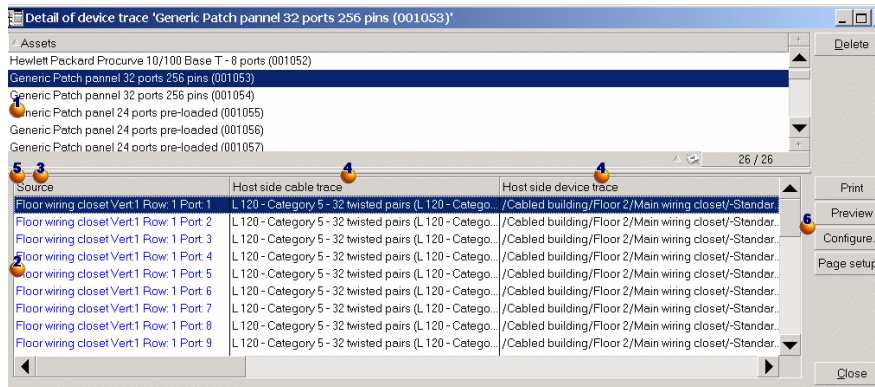
### Launching the wizard

To access this wizard, you need to select a record or a field (not a link) in the **Assets** table (**amAsset**):

- 1 Display the list of cable devices (**Cable/ Cable devices**).
- 2 Select the cable device in the list window, or select a field (not link) in the **Assets** table.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Display device traces** wizard.

### Information used when using the wizard

**Figure 7.3. Display device traces wizard - browser window**



- 1 Select the device to examine.
- 2 This table contains one row per link that is directly attached to the device 1.
- 3 The **Source** column displays the labels of the links that are directly attached to the device 1.
- 4 The **xxx Host side trace** columns are located to the right of the **Source** column. They display the labels of the traces in the host direction.

5 The **xxx User side trace** columns are located to the left of the **Source** column. They display the labels of the traces in the user direction. The blue labels designate the labels of the links in the **Source** column. The red labels designate the labels of the links in the **xxx Host side trace** column and the **xxx User side trace** column, which are directly linked to the device 4. (Consequently, they indicate that the trace passes more than once by the device 4.)

6 Use these buttons to regulate how the table will be printed.

### Data created or modified by the wizard

This wizard does not create, delete or modify any data.

## Display cable traces wizard

### Definitions

See chapter Glossary (Cable and Circuit), section AssetCenter key terms (Cable and Circuit)/ Trace of this guide.

### Functions performed by the wizard

The **Display cable traces** wizard displays a window to help you perform the following tasks:

- View the host and user traces of the cable.
- Print the list of traces.

### Prerequisites

No prerequisites.

## Use the Display cable traces wizard.

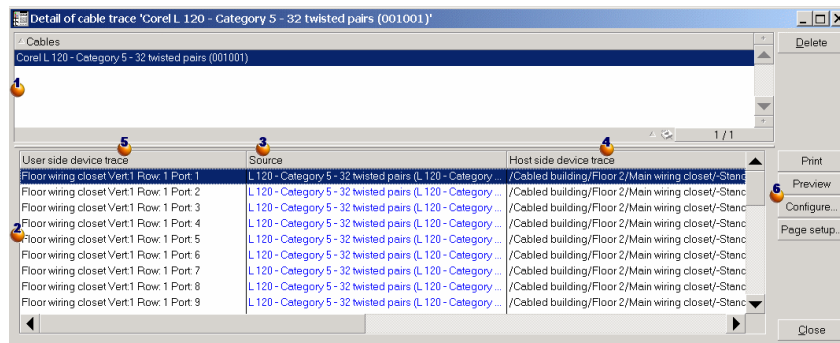
### Launching the wizard

To access this wizard, you need to select a record or a field (not a link) in the **Cables** table (**amCable**):

- 1 Display the list of cables (**Cable/ Cables**).
- 2 Select the cable in the list window, or select a field (not link) in the **Assets** table.
- 3 Display the list of actions (**Tools/ Actions**).
- 4 Select the **Display cable traces** wizard.

### Information used when using the wizard

**Figure 7.4. Display cable traces wizard - browser window**



- 1 Select the cable to examine.
- 2 This table contains one row per link that is directly attached to the cable 1.
- 3 The **Source** column displays the labels of the links that are directly attached to the cable 1.
- 4 The **xxx Host side trace** columns are located to the right of the **Source** column. They display the labels of the traces in the host direction.

- 5 The **xxx User side trace** columns are located to the left of the **Source** column. They display the labels of the traces in the user direction. The blue labels designate the labels of the links in the **Source** column. The red labels designate the labels of the links in the **xxx Host side trace** column and the **xxx User side trace** column, which are directly linked to the device 4. (Consequently, they indicate that the trace passes more than once by the device 4.)
- 6 Use these buttons to regulate how the table will be printed.

### Data created or modified by the wizard

This wizard does not create, delete or modify any data.



# 8 Glossary (Cable and Circuit)

## CHAPTER

### AssetCenter key terms (Cable and Circuit)

#### Pin/ Terminal

Component of a cable device port that creates an electronic connection (pin) or optical connection (terminal) with a connector pin/terminal or a cable wire.

The cable-device pins/terminals are associated with a port. The ports, themselves, can be associated with a bundle of cable pairs/conductors to create a cable link.

At the level of the connection types, the pins/terminals are associated with a color code entry.

#### Opposites

**Pin** is one of the two connection modes whose opposite is **Port**.

## Table in the AssetCenter database that describes these objects

### Pins (amDevicePin)

## Cable

A cable is composed of one of the following sets of components:

- A set of wire pairs, if it conducts electrically.
- A set of conductors, if it conducts optically.

The pairs or conductors are grouped into bundles in order to create a connection with a cable device.

The cables connect the cable devices together.

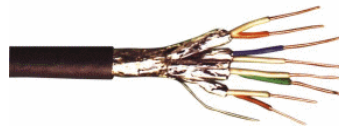
## Opposites

Cable device

## Table in the AssetCenter database that describes these objects

### Cables (amCable)

**Figure 8.1. Cable with its pairs and its wires - photo**



## Trace

Succession of links (in the logical sense) between cables and cable devices.

## Opposites

This is opposite to **Cabling path**, which describes the cabling in a physical sense.

## Color code

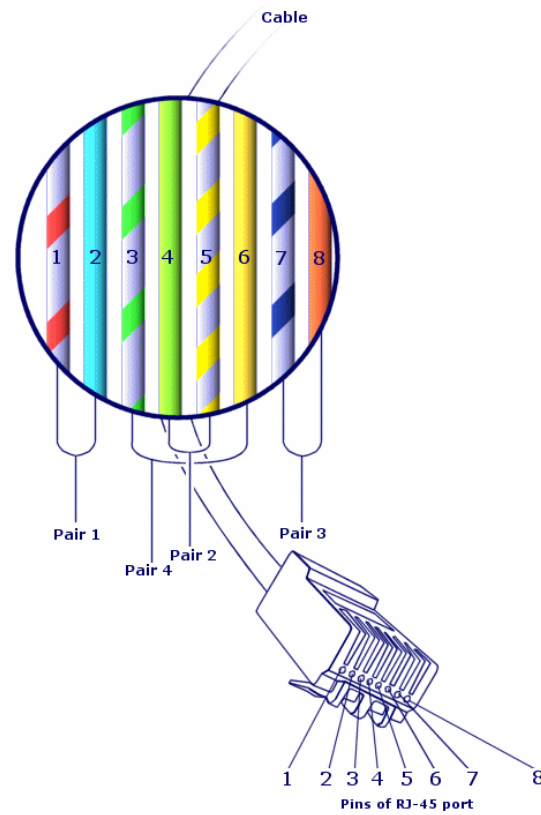
We use color codes in order find and distinguish between:

- A wire pair
- And a connector pin

Each wire and each pin are associated with a color code entry which identifies the wire.

When you create pairs using the **Create pairs** wizard, the wizard automatically assigns a color code entry to each created pair according to the pair's **Sequential number** field.

**Figure 8.2. Color code - relation between cable wires, connector pins and colors.**



If we take the **RJ-45** connector, each pin is associated with a wire having a given color and a given duty:

**Table 8.1. Color codes - description for an RJ-45 connector**

Pin number	Color of the associated pair.	Colors of the tip wire	Colors of the ring wire	Function
1	orange	white/blue	orange	Data transmission +

Pin number	Color of the associated pair.	Colors of the tip wire	Colors of the ring wire	Function
2	orange	white/orange	orange	Data transmission -
3	green	white/green	green	Data reception +
4	blue	white/blue	blue	Voice transmission +
5	blue	white/blue	blue	Voice transmission -
6	green	white/green	green	Data reception -
7	brown	white/brown	brown	Voice reception +
8	brown	white/brown	brown	Voice reception -

**Table in the AssetCenter database that describes these objects**  
**Color codes (amColorCode)**

## Column

Vertical axis of a termination field.

## Opposites

Line

## Trace output

Description of a trace.

## Table in the AssetCenter database that describes these objects

### Trace outputs (amTraceOutput)

## Termination-field configuration

Defines the typical organization of a termination field type. Specifically:

- The duty assigned to each row or column of the termination field.
- The role assigned to each row or column of the termination field (and as a consequence, the roles of the cable devices that are there).

The termination-field configuration is used by the cabling wizards to automate the creation of termination fields (with their devices).

## Table in the AssetCenter database that describes these objects

### Termination field configurations (amTermFldConfig)

## Cable device

The cable devices corresponding to the network components that are not cables.

The cable devices that connect to the cables and cable devices using:

- Pins, if it conducts electrically.
- Terminals, if it conducts optically.

The pins or connectors are grouped into ports in order to create a connection with the cable bundle or the port of another cable device.

### Examples

- Controller card
- Wall outlets
- Patch panels
- Switches
- Hubs

## Synonyms

Cable equipment

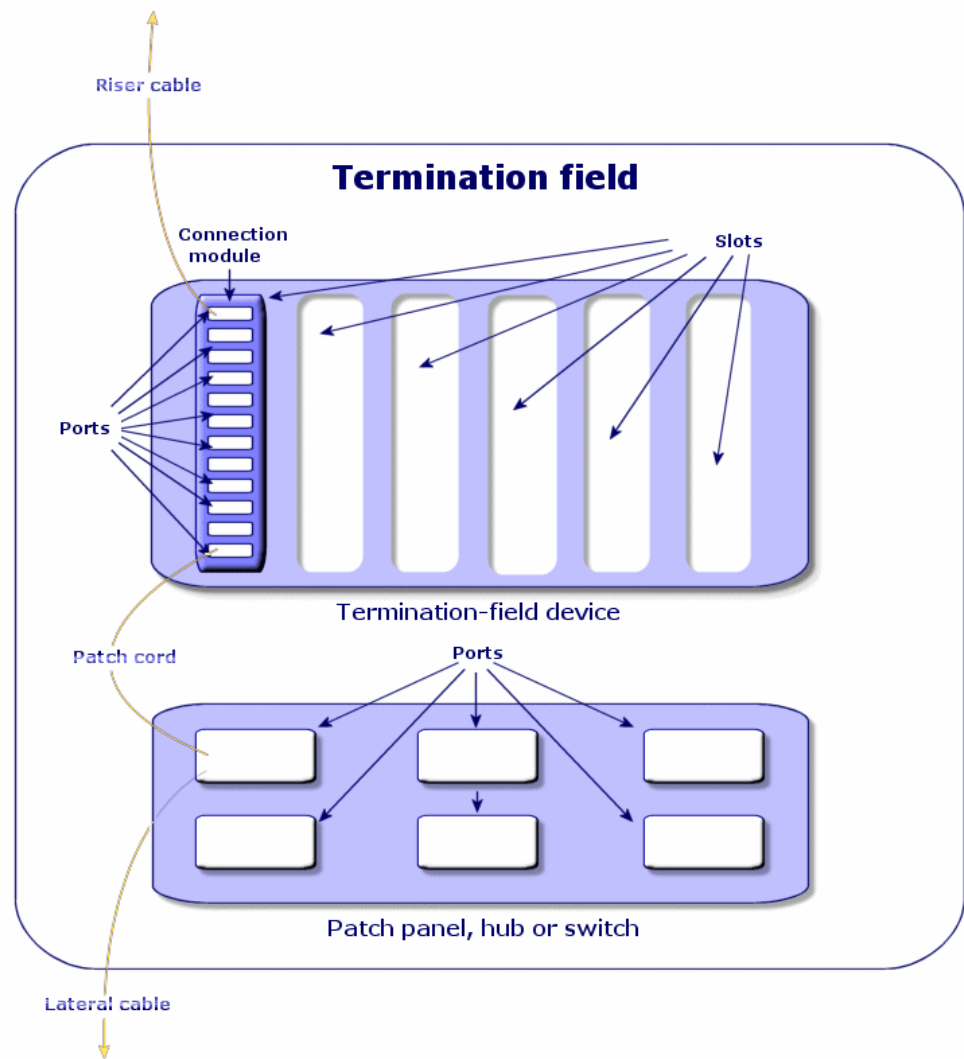
## Tables in the AssetCenter database that describe these objects

Assets (**amAsset**)

## Slot

The slot of a cable device in which you can introduce an extension card or module. These are, themselves, cable devices and create cable links with other cables or cable devices.

**Figure 8.3. Cable device slots - representation**



### Examples

A **HP Procurve 10/100 Base T - 8 ports** module which inserts itself in a **ProcurveSwitch 4000 M - 10 slots** switch.



## Synonyms

Expansion connector

### Tables in the AssetCenter database that describe these objects

- Slots (**amSlot**)
- Model slots (**amModelSlot**)

## Color code entry

One of the colors of a color code.

Each color code entry can be associated with:

- Cable pairs/conductors
- Cable-device port pins

### Tables in the AssetCenter database that describe these objects

Color code entries (**amColorDet**)

## Topology step

One of the cable links to create in order to lay out a topology. The steps of a topology are ordered.

### Tables in the AssetCenter database that describe these objects

Topology steps (**amTopologyDet**)

## Label

An identifier, in the cable network, of the:

- Cable devices
- Bundles
- Cables

- Pins/ terminals
- Pairs/conductors
- Ports
- Links

They are created in the database, then physically attached to these components in order to locate and identify them.

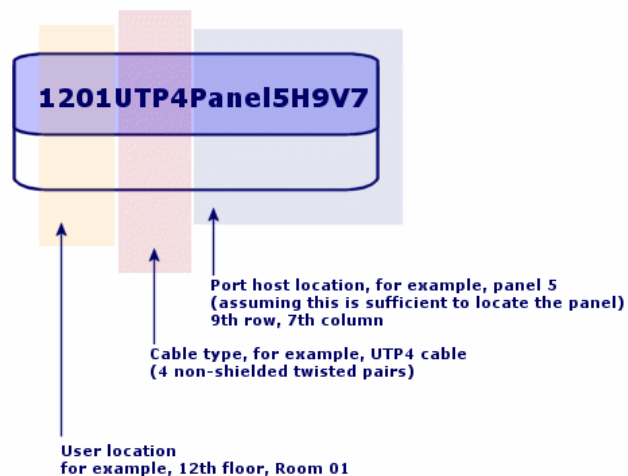
Labels are created using label rules.

The label must best represent the item that it identifies. The label rule can create, for example, labels using the following information:

- Location of the host and the user.
- Host and user ports (identifier of the asset and the port).
- Type of cable or device (4 pairs, patch panel, etc.).

The corresponding label is presented in the following form:

**Figure 8.4. Cable label - example**



## Bundle

Sub-set of pairs of a cable to which we assign a particular duty. The bundles are used for the creation of cable links between a cable and a cable device: We link a bundle of the cable to a port of the device. We make sure that the duty of the bundle is the same as the one of the port.

### Tables in the AssetCenter database that describe these objects

**Cable bundles (amCableBundle)**

## Function

Type of data transported or processed by a:

- Cable bundle
- Cable device port
- Cable link

Duties are used by the cabling wizards that create links. They enable the wizards to reconcile a ports with bundles performing the same duty.

A duty is also assigned to a:

- Termination-field configuration slot: in order that this duty be propagated to the level of the ports of the device that is created there.
- A topology: in order that this duty be searched for or populated at the level of the bundles and ports to use in laying out a topology.
- A trace: in order to represent the duty fulfilled by the links, ports and bundles that compose the trace.

### Examples

- Data
- Voice
- Video

## Tables in the AssetCenter database that describe these objects

### Cable duties (amCableDuty)

## Topology group

A topology group brings together several topologies. The groups of topologies are used by the cabling wizards to automate the creation of cables, cable devices and cable links.

A topology group can, for example, regroup a topology for the creation of each of the following items:

- Fax link
- Telephone link
- LAN link

A topology group describes a standard configuration of the cable network. You can define different topology groups according to their location, for example.

## Tables in the AssetCenter database that describe these objects

### Topology groups (amTopologyGroup)

## Host

This concept is used to define the direction of a trace. This determines which cable links will be hosts (parents) of other cable links when the wizards create the links between cables and/or cable devices.

In general the host direction is the one that goes to the main termination field.

## Opposites

User

## Cross connection

An action that consists of linking together network items (cables and cable devices).

## Cable link

A cable link represents in AssetCenter the connection point at the level of a cable device (port) or cable (bundle). The succession of the links enables you to constitute a trace.

### Tables in the AssetCenter database that describe these objects

**Cable links (amCableLink)**

## Line

Horizontal axis of a termination field

### Opposites

Column

## Ring

A jack outlet is composed of a **tip** and a **ring**, which are opposites. The jack connector uses a 2-pair cable. One of this cable's wires goes to the tip; the other to the ring. Thus, the **tip** and the **ring** help distinguish the two wires in a pair, no matter how many pairs there are in a cable.

### Opposites

Tip

## Pair/conductor

Data transmission media. Can be optic fiber or a pair of electric wires.

### Tables in the AssetCenter database that describe these objects

**Pairs/Conductors (amCablePair)**

## Tip

A jack outlet is composed of a **tip** and a **ring**, which are opposites. The jack connector uses a 2-pair cable. One of this cable's wires goes to the tip; the other to the ring. Thus, the **tip** and the **ring** help distinguish the two wires in a pair, no matter how many pairs there are in a cable.

### Opposites

Ring

## Port

Slot used to transfer data into and out of a cable device.

In the Cable and Circuit module, the ports serve as the connection point with another port or a cable bundle when the cable links are created.

### Tables in the AssetCenter database that describe these objects

- **Ports (amPort)**
- **Model ports (amModelPort)**

### Opposites

**Port** is one of the two connection modes, opposite of the **Pin** connection mode.

## Label rule

Formula for the composition of labels destined for the following items:

- Cable devices
- Bundles
- Cables
- Pins/ terminals
- Pairs/conductors
- Ports
- Links

These labels, except for those for the cable links, enable you to physically locate and identify components in a precise manner.

The label for the cable link helps you rapidly view what the link represents.

The calculation formulas are composed using Basic script.

Contrary to the default values of the fields, the label rules are never applied automatically. You must use a wizard for this.

### Synonyms

None

### Tables in the AssetCenter database that describe these objects

**Label rules (amLabelRule)**

## Termination field

Designates a cable distribution entity that enables you to link the cables coming from users to the cables going to hosts.

A termination field can be composed of:

- Patch panels
- Hubs
- Punchdown blocks

- Switches
- Etc.

## Synonyms

Patch panel

## Tables in the AssetCenter database that describe these objects

Termination fields (amTermField)

## Role

The role corresponds to the part of the network that a cable serves.

The roles are associated to the following items:

- Cables
- Termination-field device models
- Termination-field devices
- Cables in a topology step

The role enables certain cabling wizards to create adequate connections between cable devices and cables.

To do this, the wizards match the roles of the:

- Topology steps
- Cables
- Termination-field configurations
- Termination field devices

## Example of how this works

If, using a wizard that runs cables, you create cables whose roles are **Riser**, AssetCenter will automatically connect these cables to a device included in a termination field column whose role is also **Riser**.



### Examples of roles

- Lateral (termination field to user equipment).
- Riser (termination field to another termination field).

### Tables in the AssetCenter database that describe these objects

**Itemized lists (amItemizedList)**

## Sequence

Ordered number to identify items from numerous tables of the AssetCenter application.

## Terminal

See **Pin/ Terminal**.

## Topology

A topology groups together the necessary data to automate the creation of a link:

- Links to create.
- Cables and cable devices to look for or create.

### Examples

A topology describing the link that links a user to the telephone network (wall outlet -> cable -> patch panel).

### Tables in the AssetCenter database that describe these objects

**Topologies (amTopology)**

## Cable type

A cable type qualifies the models and the topology steps. This enables the cabling wizards to find or create the right type of cable from the topology step.

### Tables in the AssetCenter database that describe these objects

#### Itemized lists (amItemizedList)

## Connection type

A connection type represents a mode of connection between components of the cable network.

Example: RJ-45, RJ-11, Block of 4 pairs, etc.

It is a physical description of the pins of a port or the connectors of a terminal.

Examples:

- The ports of the workstations, PABX or servers.
- Wall-mounted telephone sockets (RJ-45, RJ-9 sockets)
- The terminals of the termination-field punchdown blocks (CAD, RAC IBM).

The connection type enables the cabling wizards to:

- Find the ports of a cable device that correspond to the connection type defined in a topology step.
- Or to create virtual ports of the given type if necessary.

### Tables in the AssetCenter database that describe these objects

#### Connection types (amCabCnxType)

**Figure 8.5. RJ-45 connector - photo**



## Cable device type

The device type qualifies the models and the topology steps. This enables the cabling wizards to find or create the right type of cable device from a topology step.

### Examples

Let's suppose that you created a connection between a cable and a cable device whose connection type is **XXX** (Connection mode = **Pins**, number of pins/connectors = **8**). Once the 8 pins of the terminal of the cable device are associated to a wire, AssetCenter automatically creates a virtual port.

### Tables in the AssetCenter database that describe these objects

Itemized lists (`amItemizedList`)

## Pair/Conductor type

A pair or conductor type is defined by its name and the number of physical conductors that compose it.

The pair/conductor type enables the cabling wizards to find the pairs/conductors of a cable that correspond to the type defined in a topology step. The pairs/conductors thus selected are grouped together

in the form of a virtual bundle, and these virtual bundles are associated to ports (in a cable link).

### **Tables in the AssetCenter database that describe these objects**

**Pair/conductor types (amCablePairType)**

## **Slot type**

The slot type defines which extension models or module it is possible to insert in a given slot of a cable device.

This link is used when you select an asset for the slot of a cable device: Only the assets whose model is compatible with the slot type are proposed.

### **Tables in the AssetCenter database that describe these objects**

**Slot types (amSlotType)**

## **User**

This concept is used to define the direction of a trace. This determines which cable links will be users (sub-links) of other cable links when the wizards create the links between cables and/or cable devices.

In general the user direction is the one that goes to the user's wall outlet.

### **Opposites**

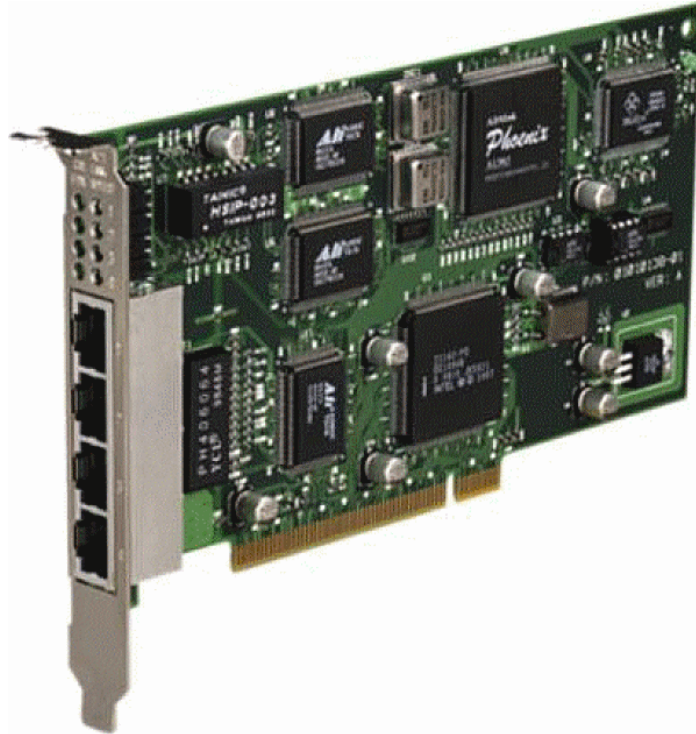
Host

## Key terms of the profession (Cable and Circuit)

### Adapter

Set of male and female connectors that enable a cable device to use a peripheral for which it doesn't have the necessary circuits and connections: models, CD-ROM drives. The adapters go into the expansion slots.

Figure 8.6. Adapter - photo

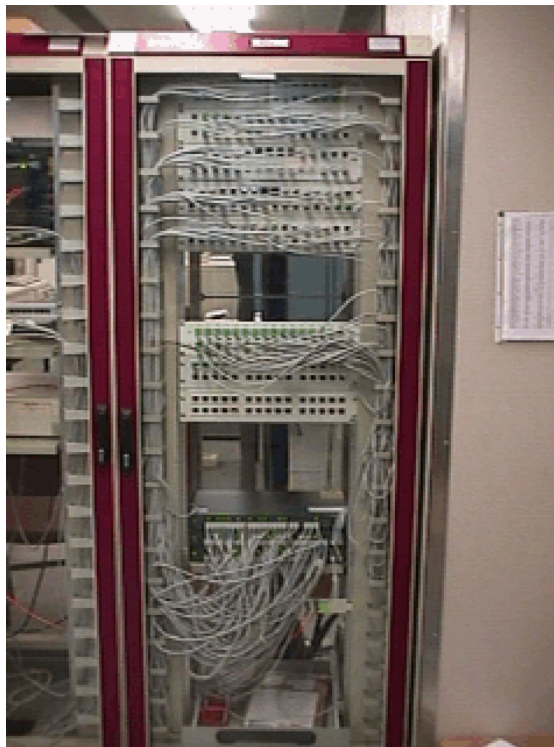




## Rack

Storage unit that contains the cable distribution devices.

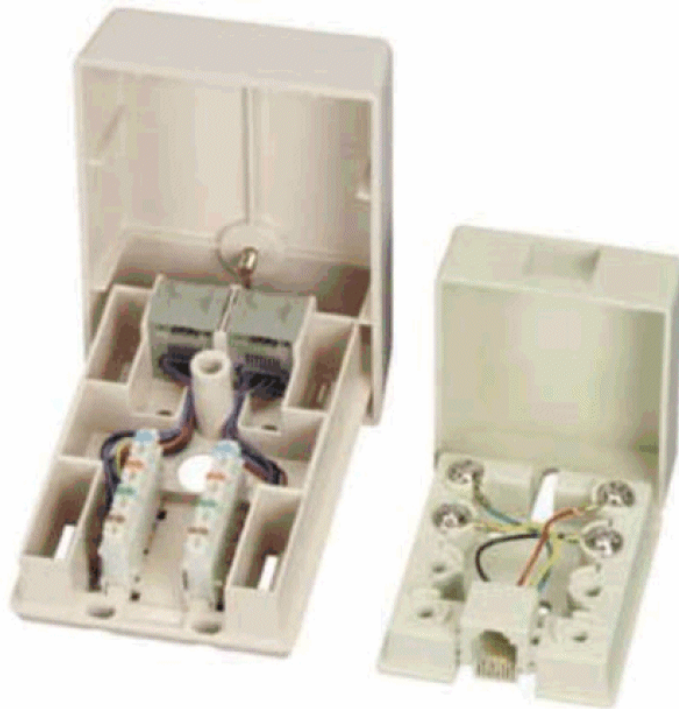
**Figure 8.7. Rack - photo**



## Punchdown block

A box enabling you to connect the wires of a cable to a port in order to facilitate the connection with the cable.

**Figure 8.8. Punchdown block - photos**



## Chassis

Metal frame upon which cable devices are mounted.

## Cabling path

Physical path of the cable, which is opposite of the trace, which provides the logical path.



## Opposites

Trace (logic)

## Converter

Device that:

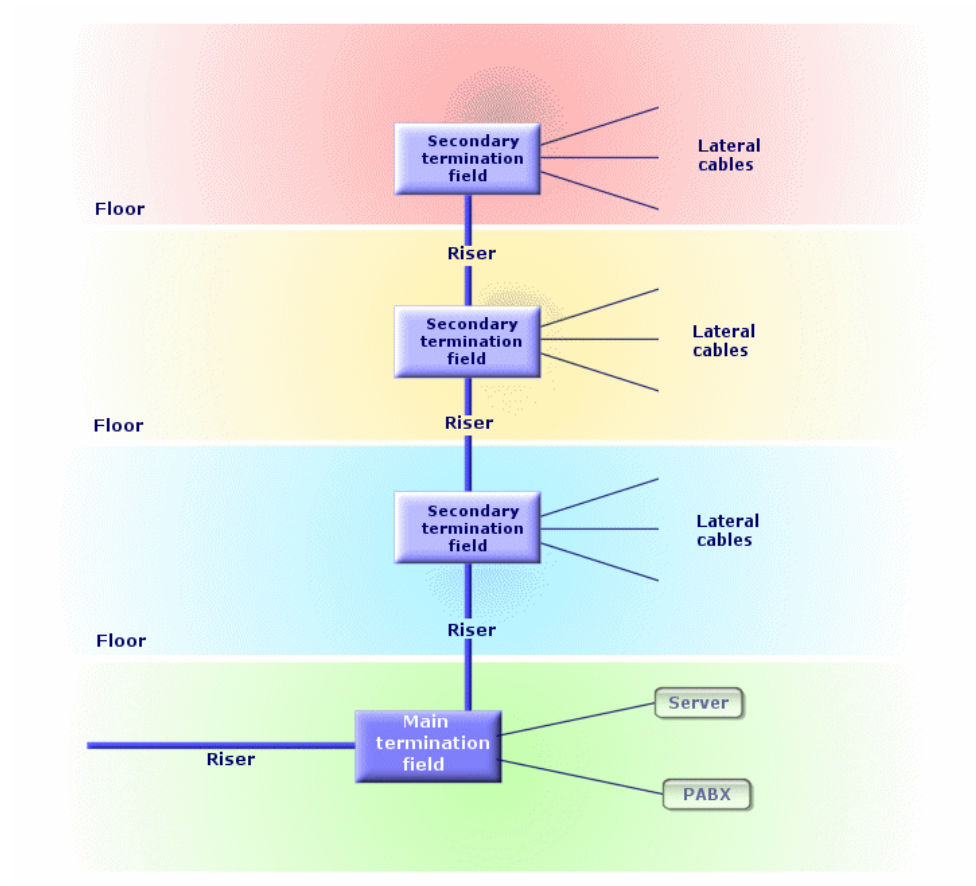
- Changes the electronic signals or the IT data from one form into another.

Example: An **ADC** converter that translates analog signals to digital signals.

- Connects equipment with incompatible interfaces.
- Converts the signal coming from one cable type in order to transmit it to another cable type.

## Vertical distribution

Distribution of the cables between different termination fields. The cables linking the termination fields are generally composed of numerous pairs, and are called risers.

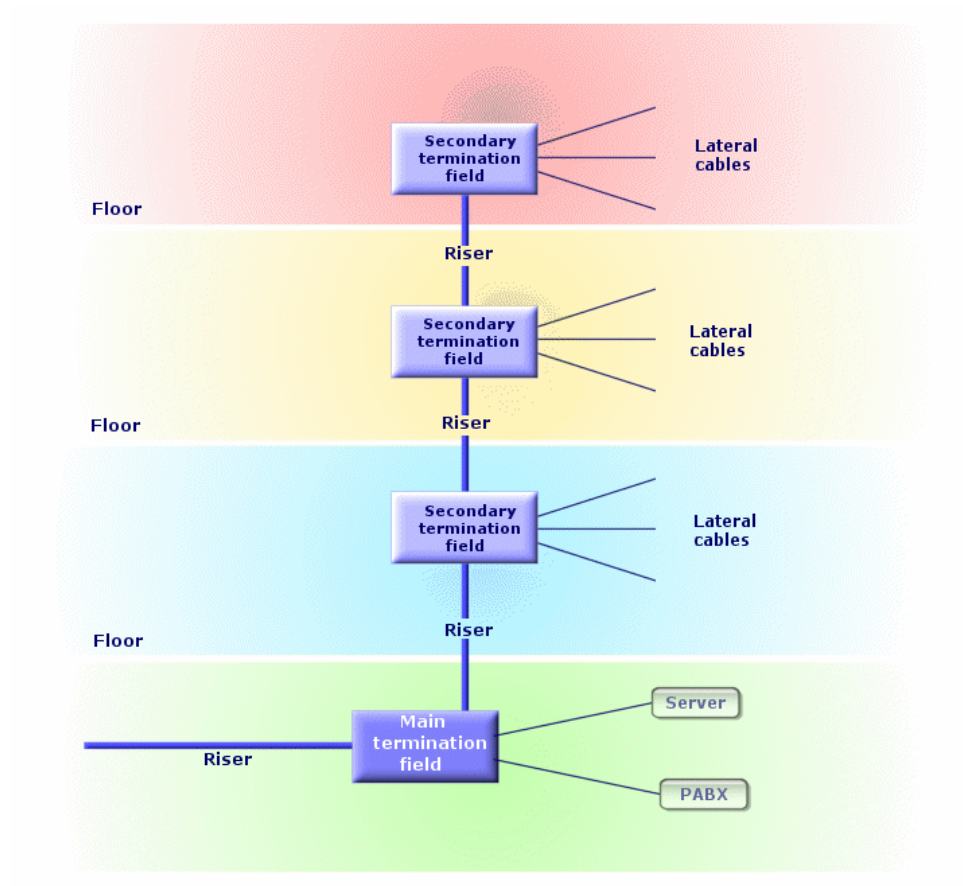
**Figure 8.9. Vertical distribution of a cable network - representation**

## Opposites

Lateral distribution

## Lateral distribution

Distribution of the cables between the users and the termination fields.

**Figure 8.10. Lateral distribution of a cable network - representation**

### Synonyms

Horizontal distribution

### Opposites

Vertical distribution

## Hub

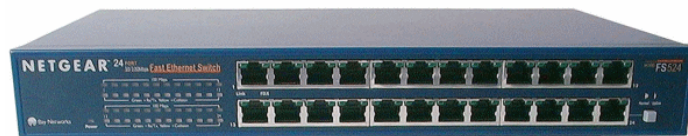
The hub is a box where cables come in from computers, servers, printers and other peripheral devices. It establishes communication between different network users.

There are passive hubs that are nothing more than simple **multiple outlet adapter**, which do not modify the signals going through them. Then there are active hubs that regenerate the signals, thus eliminating the possible errors that can occur due to the distance or the electrical interference.

It is possible to connect several hubs together, thus expanding the existing network.

Hubs do not intervene in the transmission of messages. When a computer sends information, the hub transmits it to all the other computers, and only the computer for whom the message was intended will process it. If the message's receiver sends a response, the hub transmits this message to everyone as well: Again, only the computer for whom the message was intended will receive it. The authorized debit on the network is divided between the number of computers or peripheral devices that "communicate" at the same time.

**Figure 8.11. Hub - photo**



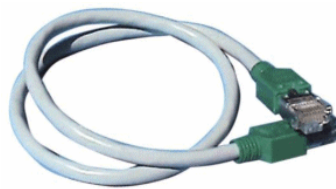
### Synonyms

- Concentrator
- Multiplexer

## Jumper/ Patch cord

Short cord used to establish a permanent, yet modifiable, connection between devices and termination fields.

**Figure 8.12. Patch cord - photo**



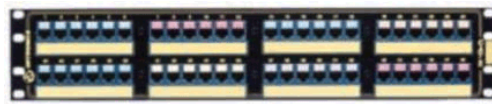
## Length

Dimension of a cable.

## Patch panel

Device of a termination field situated in the proximity of hubs, switches, etc. It comes in between them and the cables distributed throughout the location. The cables connect to the back of the patch panels. To each cable corresponds a connector on the panel. The other sides of the cables are linked to a wall outlet in an office. We use jumpers to link the panel's connectors (front side) to the ports of the termination field's active item.

**Figure 8.13. Patch panel - photo**



## Synonyms

Distribution panel

## Wall outlet

Device that enables a male connector of a cable (of a computer, peripheral device, or telephone) to connect to the network.

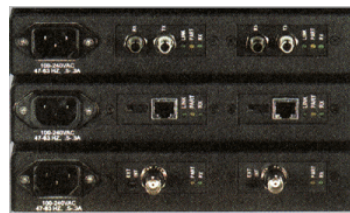
## Main termination field

Processed in AssetCenter as a termination field.

## Repeater

Device used to reduce distortion by amplifying or regenerating a signal so that it can be transmitted farther with its original form and intensity. On the network, it connects two networks - or two segments of the network - at the level of the physical layer of the OSI model and regenerates the signal.

**Figure 8.14. Repeater - photo**



## Synonyms

Regenerator

## Riser

**Vertical** distribution cable (between floors or buildings).

## Router

Even more **intelligent** than switches, the router is generally used to connect different networks together, for example, a company's internal network to the Internet network. These are veritable computers capable of filtering information according to criteria established by the user. They know how to direct information to a destination via the available paths and by choosing the most appropriate itinerary. They also know how to make two different types of networks, using different types of communication protocols, coexist.

**Figure 8.15. Router - photo**



## Wallfield

Dealt with in AssetCenter as a termination field.

## Switch

Like a hub, it also concentrates the cables coming from all the computers and peripheral devices of the network. Unlike a hub, the switch has a memory where it stores the addresses of the machines that it connects. When a computer sends a messages to another computer, the switch

knows who is "communicating" and for whom the information is intended. It sends the data to the destination without having to involve the rest of the network. The target machine receives this data at the same rate as the transmitter.

**Figure 8.16. Switch - photo**



### Synonyms

PABX

### Run (a cable)

Action that consists of laying a cable.

### Synonyms

Lay



## Run

Section of cable.



# 9 | References (Cable and Circuit)

## CHAPTER

### Menus and tabs (Cable and Circuit)

The Cable and Circuit module uses numerous menus.

The following menus are directly linked to the Cable and Circuit module:

**Table 9.1. Menus and tabs (Cable and Circuit) - list**

<b>Menu</b>	<b>Table that the menu accesses (label and SQL name)</b>	<b>Tabs dedicated to cable management</b>	<b>Important fields or links (outside of the dedicated tabs)</b>	<b>Comments</b>	<b>Section of the guide to consult</b>
<b>File menu</b>					

Menu	Table that the menu accesses (label and SQL name)	Tabs dedicated to cable management	Important fields or links (outside of the dedicated tabs)	Comments	Section of the guide to consult
Activating the modules	Does not apply.	Not available	Cable and Circuit	Enables you to activate or deactivate the Cable and Circuit module, if your license authorizes it.  This is the menu to use if you can't see the following menus in your application:	Not available
<b>Cable menu</b>					
Cables	Cables (amCable)	All	All		Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cables - manual creation</b>
Cable devices	Assets (amAsset)	Pins/Terminals Ports Slots Trace Connections	Not available	This menu displays records from the same table as the <b>Assets and Batches</b> menu, but filters the records: Only assets linked to a model with nature <b>Cable device</b> are displayed.	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>

<b>Menu</b>	<b>Table that the menu accesses (label and SQL name)</b>	<b>Tabs dedicated to cable management</b>	<b>Important fields or links (outside of the dedicated tabs)</b>	<b>Comments</b>	<b>Section of the guide to consult</b>
Links	Links (amCableLink)	All	All		Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Connections - manual creation</b>
Topology groups	Topology groups (amTopologyGroup)	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Topology groups</b>
Topologies	Topologies (amTopology)	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Topologies</b>
Termination fields	Termination fields (amTermField)	All	All		<b>Termination fields</b> chapter

Menu	Table that the menu accesses (label and SQL name)	Tabs dedicated to cable management	Important fields or links (outside of the dedicated tabs)	Comments	Section of the guide to consult
Origin of the termination fields	Termination field configurations ( <b>amTermFieldConfig</b> )	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Termination-field configurations</b>
Label rules	Label rules ( <b>amLabelRule</b> )	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Label rules</b>
Color codes	Color codes ( <b>amColorCode</b> )	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Color codes</b>
Cable duties	Cable duties ( <b>amCableDuty</b> )	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Cable duties</b>

Menu	Table that the menu accesses (label and SQL name)	Tabs dedicated to cable management	Important fields or links (outside of the dedicated tabs)	Comments	Section of the guide to consult
Cable connection types	Connection types (amCabCnxType)	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Connection types</b>
Pair/Conductor types	Pair/Conductor types (amCablePairType)	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Types of pairs and conductors</b>
Slot types	Cable/ Slot types (amSlotType)	All	All		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Slot types</b>
<b>Portfolio menu</b>					
Assets and batches	Assets (amAsset)	Pins/Terminals Ports Slots Trace Connections	Not available		Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>

<b>Menu</b>	<b>Table that the menu accesses (label and SQL name)</b>	<b>Tabs dedicated to cable management</b>	<b>Important fields or links (outside of the dedicated tabs)</b>	<b>Comments</b>	<b>Section of the guide to consult</b>
Assets	Portfolio items ( <b>amPortfolio</b> )	Not available	Not available		Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>
Natures	Natures ( <b>amNature</b> )	Not available	Cable device ( <b>bDevice</b> ) Create ( <b>seBasis</b> ) Management constraints ( <b>seMgtConstraint</b> )		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Natures for cables and cable devices</b>
Models	Models ( <b>amModel</b> )	Devices Slots Cables	Can be connected ( <b>bIsCnxClient</b> )		Chapter <b>Implementing cable management (Cable and Circuit)</b> , sections <b>Cable device models without slots</b> ., <b>Cable device models with slots</b> . et <b>Cable models</b>



<b>Menu</b>	<b>Table that the menu accesses (label and SQL name)</b>	<b>Tabs dedicated to cable management</b>	<b>Important fields or links (outside of the dedicated tabs)</b>	<b>Comments</b>	<b>Section of the guide to consult</b>
Projects	Projects (amProject)	Cables Traces	Not available		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Projects and work orders associated with cabling</b>
Locations	Locations (amLocation)	Cables Users Cables Hosts Termination fields	Not available		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Locations</b>
Brands	Product brands (amBrand)	Not available	Not available		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Brands of cable and cable device models</b>
<b>Portfolio menu</b>					

<b>Menu</b>	<b>Table that the menu accesses (label and SQL name)</b>	<b>Tabs dedicated to cable management</b>	<b>Important fields or links (outside of the dedicated tabs)</b>	<b>Comments</b>	<b>Section of the guide to consult</b>
Work orders	Work orders ( <b>amWorkOrder</b> )	Not available	Not available		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Projects and work orders associated with cabling</b>
<b>Tools menu</b>					
Actions/ Edit	Actions ( <b>amAction</b> )	Not available	Not available		Chapter <b>References (Cable and Circuit)</b> , section <b>Actions and wizards (Cable and Circuit)</b>
Actions/ <Name of action>	Does not apply.	Not available	Not available	Proposes the actions that are either non-contextual or whose contexts are active. Enables you to trigger the selected action.	Chapter <b>References (Cable and Circuit)</b> , section <b>Actions and wizards (Cable and Circuit)</b>
Customize toolbar	Does not apply.	Not available	Not available	Enables you to add or remove cable icons from the toolbar.	Chapter <b>References (Cable and Circuit)</b> , section <b>Toolbar icons (Cable and Circuit)</b>

<b>Menu</b>	<b>Table that the menu accesses (label and SQL name)</b>	<b>Tabs dedicated to cable management</b>	<b>Important fields or links (outside of the dedicated tabs)</b>	<b>Comments</b>	<b>Section of the guide to consult</b>
<b>Administration menu</b>					
Itemized lists	Itemized lists (amItemizedList)	Not available	Not available		Chapter <b>References (Cable and Circuit)</b> , section <b>Itemized lists (Cable and Circuit)</b>
Counters	Counters (amCounter)	Not available	Not available		Chapter <b>References (Cable and Circuit)</b> , section <b>Counters (Cable and Circuit)</b>
Calculated fields	Calculated fields (amCalcField)	Not available	Not available		Chapter <b>References (Cable and Circuit)</b> , section <b>Calculated fields (Cable and Circuit)</b>

<b>Screen</b>	<b>Table that the menu accesses (label and SQL name)</b>	<b>Tabs dedicated to cable management</b>	<b>Important fields or links (outside of the dedicated tabs)</b>	<b>Comments</b>	<b>Section of the guide to consult</b>
List of screens	Does not apply.	Not available	Not available	Enables you to access tables that are not accessible by the present menus.  This task is reserved for the administrator since these tables were not really designed to be modified.	

## Toolbar icons (Cable and Circuit)

Certain toolbar icons are used exclusively for the Cable and Circuit module.

To obtain this list and add these icons to the toolbar:

- 1 Select the **Tools/ Customize toolbar** menu.
- 2 Select the **Tools** tab.
- 3 Select **Cable** from the list of **Categories**.

To learn more about customizing the toolbar, refer to the **Introduction** guide, chapter **Customizing a client workstation**, section **Customizing the toolbar**.

## Interface options (Cable and Circuit)

There are no options dedicated to the Cable and Circuit module.

## Tables (Cable and Circuit)

The Cable and Circuit module uses numerous tables.

The following tables are directly linked to the Cable and Circuit module:

**Table 9.2. Tables (Cable and Circuit) - list**

<b>Table label</b>	<b>SQL name of the table</b>	<b>Menu item used to access the table</b>	<b>Section of the guide to consult</b>
Actions	amAction	Tools/ Actions/ Edit  Tools/ Actions/ <Name of action>	Chapter <b>References (Cable and Circuit)</b> , section <b>Actions and wizards (Cable and Circuit)</b>
Portfolio items	amPortfolio	Portfolio/ Portfolio items	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>
Assets	amAsset	Portfolio/ Assets and Batches	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>
Pins	amDevicePin	Administration/List of screens  Cable/ Cable devices, <b>Pins/Terminals</b> tab  Portfolio/ Assets and batches, <b>Pins/Terminals</b> tab	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>
Cables	amCable	Cable/ Cables	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cables - manual creation</b>

<b>Table label</b>	<b>SQL name of the table</b>	<b>Menu item used to access the table</b>	<b>Section of the guide to consult</b>
Cables concerned by the project	amProjCable	Administration/List of screens Portfolio/ Projects, <b>Cables</b> tab	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Projects and work orders associated with cabling</b>
Traces concerned by the project	amProjTraceOut	Administration/List of screens Portfolio/ Projects, <b>Traces</b> tab	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Projects and work orders associated with cabling</b>
Calculated fields	amCalcField	Administration/ Calculated fields	Chapter <b>References (Cable and Circuit)</b> , section <b>Calculated fields (Cable and Circuit)</b>
Color codes	amColorCode	Cable/ Color codes	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Color codes</b>
Trace outputs	amTraceOutput	Administration/List of screens	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Connections - manual creation</b>
Counters	amCounter	Administration/ Counters	Chapter <b>References (Cable and Circuit)</b> , section <b>Counters (Cable and Circuit)</b>
Termination field configurations	amTermFldConfig	Cable/ Termination-field configurations	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Termination-field configurations</b>
Termination field devices	amTermFldDevice	Administration/List of screens  Cable/ Termination fields, <b>Devices</b> tab	<b>Termination fields</b> chapter
Model slots	amModelSlot	Administration/List of screens  Portfolio/ Models, <b>Slots</b> tab	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Cable device models with slots.</b>

<b>Table label</b>	<b>SQL name of the table</b>	<b>Menu item used to access the table</b>	<b>Section of the guide to consult</b>
Slots	amSlot	Administration/List of screens Portfolio/ Assets and Batches, <b>Slots</b> tab Cable/ Cable devices, <b>Slots</b> tab	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>
Color code entries	amColorDet	Administration/List of screens Cable/ Color codes	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Color codes</b>
Itemized lists	amItemizedList	Administration/Itemized lists	Chapter <b>References (Cable and Circuit)</b> , section <b>Itemized lists (Cable and Circuit)</b>
Topology steps	amTopologyDet	Administration/List of screens Cable/ Topologies	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Topologies</b>
Cable bundles	amCableBundle	Administration/List of screens Cable/ Cables, <b>Bundles</b> tab	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cables - manual creation</b>
Cable duties	amCableDuty	Cable/ Cable duties	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Cable duties</b>
Termination field configuration duties/services	amTermFldCfgDuty	Administration/List of screens Cable/ Termination-field configurations, <b>Duties</b> tab	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Termination-field configurations</b>
Topology groups	amTopologyGroup	Cable/ Topology groups	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Topology groups</b>
Trace histories	amTraceHistory	Administration/List of screens	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Connections - manual creation</b>

<b>Table label</b>	<b>SQL name of the table</b>	<b>Menu item used to access the table</b>	<b>Section of the guide to consult</b>
Work orders	amWorkOrder	Portfolio/ Work orders	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Projects and work orders associated with cabling</b>
Links	amCableLink	Cable/ Cable links	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Connections - manual creation</b>
Locations	amLocation	Portfolio/ Models	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Locations</b>
Connection pin mappings	amCnxPinMap	Administration/List of screens Cable/ Cable connection types	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Connection types</b>
Models	amModel	Portfolio/ Models	Chapter <b>Implementing cable management (Cable and Circuit)</b> , sections <b>Cable device models without slots.</b> , <b>Cable device models with slots.</b> et <b>Cable models</b>
Nature	amNature	Portfolio/ Natures	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Natures for cables and cable devices</b>
Trace operations	amTraceOp	Administration/List of screens	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Connections - manual creation</b>
Pairs/Conductors	amCablePair	Administration/List of screens Cable/ Cables, <b>Pairs/Conductors</b> tab	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cables - manual creation</b>
Cable model pairs/conductors	amModelPair	Administration/List of screens Portfolio/ Models, <b>Cable</b> tab	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Create pairs wizard</b>



<b>Table label</b>	<b>SQL name of the table</b>	<b>Menu item used to access the table</b>	<b>Section of the guide to consult</b>
Ports	amPort	Administration/List of screens Portfolio/ Assets and batches, <b>Ports</b> tab Cable/ Cable devices, <b>Ports</b> tab	Chapter <b>Cable devices, cables and connections - manual creation</b> , section <b>Cable devices - manual creation</b>
Model ports	amModelPort	Administration/List of screens Portfolio/ Models, <b>Ports</b> tab	Chapter <b>Implementing cable management (Cable and Circuit)</b> , sections <b>Cable device models without slots</b> .
Projects	amProject	Portfolio/ Projects	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Projects and work orders associated with cabling</b>
Label rules	amLabelRule	Cable/ Label rules	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Label rules</b>
Locations - Termination fields relation	amRelTermLoc		<b>Termination fields</b> chapter
Models - Slot types relation	amSlotTypeModel		Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Slot types</b>
Termination fields	amTermField	Cable/ Termination fields	<b>Termination fields</b> chapter
Termination field configuration roles	amTermFldCfgRole	Administration/List of screens Cable/ Termination-field configurations, <b>Roles and devices</b> tab	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Termination-field configurations</b>
Topologies	amTopology	Cable/ Topologies	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Topologies</b>

Table label	SQL name of the table	Menu item used to access the table	Section of the guide to consult
Topologies in a group	amTopoGroupDet	Administration/List of screens Cable/ Topology groups	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Topology groups</b>
Connection types	amCabCnxType	Cable/ Cable connection types	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Connection types</b>
Pair/Conductor types	amCablePairType	Cable/ Types of pairs/conductors	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Types of pairs and conductors</b>
Slot types	amSlotType	Cable/ Slot types	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Slot types</b>

## Interdependence of tables used in cable management (Cable and Circuit)

The Cable and Circuit module uses numerous tables in the AssetCenter database. There are multitudes of links between these tables. It is thus convenient to optimize the order in which you populate these tables.

The order that we propose below is not mandatory: AssetCenter enables you to create missing records in linked tables whenever it is necessary.

Example: We recommend that you create the duties, label rules, roles and models before creating the termination-field configurations.

However, you can add a value on the fly to the itemized list that populates the **Role** field. Then you can create on the fly a model, a duty and a label rule. Keep in mind, though, that you will have to populate numerous, interwoven, tables, which can be quite complicated

Here is a table that optimizes the order of how you should create your records. It indicates which dependant tables you need to populate.

The practical case that is developed throughout the course of this guide respects these recommendations.

We have voluntarily excluded the tables that are indirectly linked to cable management:

- **Brands**
- **Assets and Batches**
- **Models**
- **Locations**
- **Projects**
- **Work orders**

We have also excluded the secondary tables, even if they are directly linked to the Cable and Circuit module. These tables are automatically populated when you create records in the main tables.

**Table 9.3. Interdependence of tables (Cable and Circuit) - table**

<b>Table label</b>	<b>SQL name of the table</b>	<b>Menu to access the table</b>	<b>Tables to populate first</b>	<b>Comments</b>
1 Itemized lists	amItemizedList	Administration/ Itemized lists		Itemized list must first be populated before being closed by the administrator as users will no longer be able to create values on the fly.  For the list of the itemized list in the Helpdesk module, refer to chapter <b>References (Cable and Circuit)</b> , section <b>Itemized lists (Cable and Circuit)</b> .

	<b>Table label</b>	<b>SQL name of the table</b>	<b>Menu to access the table</b>	<b>Tables to populate first</b>	<b>Comments</b>
1	Color codes	amColorCode	Cable/ Color codes		
1	Label rules	amLabelRule	Cable/ Label rules		
1	Types of pairs and conductors	amCablePairType	Cable/ Types of pairs/conductors		
1	Connection types	amCabCnxType	Cable/ Cable connection types	amColorCode	
1	Cable duties	amCableDuty	Cable/ Cable duties		
1	Locations	amLocation	Portfolio/ Locations		
1	Projects	amProject	Portfolio/ Projects		
1	Work orders	amWorkOrder	Portfolio/ Work orders		
1	Nature	amNature	Portfolio/ Natures		
1	Models	amModel	Portfolio/ Models	amNature amLabelRule amItemizedList amColorCode amCabCnxType amCableDuty amCablePairType	Cable device models without slots.
1	Slot types	amSlotType	Cable/ Slot types	amModel	
1	Models	amModel	Portfolio/ Models	amNature amLabelRule amItemizedList amColorCode amCabCnxType amCableDuty amCablePairType amSlotType	Cable device models with slots.

Table label	SQL name of the table	Menu to access the table	Tables to populate first	Comments
1 Topologies	amTopology	Cable/ Topologies	amCableDuty amLabelRule amItemizedList amCabCnxType amModel amCablePairType	
1 Topology groups	amTopologyGroup	Cable/ Topology groups	amTopology	
1 Termination field configurations.	amTermFldConfig	Cable/ Termination-field configurations	amCableDuty amLabelRule amItemizedList amModel	
1 Termination fields	amTermField	Cable/ Termination fields	amTermFldConfig amLocation amItemizedList amModel	
1 Assets	amAsset	Portfolio/ Assets and Batches	amNature amLabelRule amItemizedList amModel amCabCnxType amCableDuty amSlotType amTermField amLocation	
1 Cables	amCable	Cable/ Cables	amNature amLabelRule amItemizedList amModel amColorCode amCabCnxType amCableDuty amCablePairType amSlotType amLocation	

## Itemized lists (Cable and Circuit)

Certain fields can be populated by selecting their values from a list. These itemized lists are such lists.

You can access the **Itemized lists** table (**amItemizedList**) using the **Administration/ Itemized lists** menu item.

The Cable and Circuit module uses the following itemized lists:

**Table 9.4. Itemized lists (Cable and Circuit) - list**

Itemized list identifier	Field populated using an itemized list (label and SQL name)	Table in which field is found (label and SQL name)
amDeviceType	Device type ( <b>DeviceType</b> )	Models ( <b>amModel</b> )
	Device type ( <b>DeviceType</b> )	Topology steps ( <b>amTopologyDet</b> )
amCableType	Cable type ( <b>CableType</b> )	Models ( <b>amModel</b> )
	Cable type ( <b>CableType</b> )	Topology steps ( <b>amTopologyDet</b> )
amCableRole	Role ( <b>CableRole</b> )	Cables ( <b>amCable</b> )
	Role ( <b>CableRole</b> )	Termination field configuration roles and devices ( <b>amTermFldCfgRole</b> )
	Role ( <b>CableRole</b> )	Termination field devices ( <b>amTermFldDevice</b> )
	Role ( <b>CableRole</b> )	Topology steps ( <b>amTopologyDet</b> )
amColor	Color code entries ( <b>amColorDet</b> )	Color ( <b>Color</b> )
amTipColor	Color code entries ( <b>amColorDet</b> )	Tip color ( <b>TipColor</b> )
amRingColor	Color code entries ( <b>amColorDet</b> )	Ring color ( <b>RingColor</b> )

To learn more about itemized lists, refer to the **Advances use** guide, chapter **Itemized lists**.

## Calculated fields (Cable and Circuit)

The Cable and Circuit module uses numerous calculated fields.

These calculated fields are used in the default values of certain fields.

You can access the **Calculated fields** table (**amCalcField**) using the **Administration/ Calculated fields** menu item.

The following calculated fields are directly linked to the Cable and Circuit module:

**Table 9.5. Calculated fields (Cable and Circuit) -list**

Label of the calculated field	SQL name of the calculated field	Label and SQL name of the field that uses the calculated field	Utilization
TermFieldName	csf_sysCableTermFieldName	Termination fields (amTermField)	This calculated field is used by certain AssetCenter APIs to automatically generate a termination field name (gf_CreateTerminationField, for example).  Certain cabling wizards call on this API (the <b>Create a termination field</b> wizard, for example).

You can customize these calculated fields.

To learn more about using calculated fields, refer to the **Advanced use** guide, chapter **Calculated fields**.

To learn more about composing scripts, refer to the **Advanced use** guide, chapter **Scripts**.

To learn more about APIs, refer to the **Programmer's reference** guide.

## Counters (Cable and Circuit)

The Cable and Circuit module uses numerous counters.

These counters are used in the default values of certain fields.

You can access the **Counters** table (amCounter) using the **Administration/ Counters** menu item.

The following counters are directly linked to the Cable and Circuit module:

**Table 9.6. Counters (Cable and Circuit) - list**

SQL name of the counter	Label and SQL name of the table that uses the counter	Label and SQL name of the field that uses the counter
amCableLink_BarCode	Links ( <b>amCableLink</b> )	Name ( <b>Name</b> )
amTraceHistory_BarCode	Trace histories ( <b>amTraceHistory</b> )	Name ( <b>Name</b> )
amCable_CableTag	Cables ( <b>amCable</b> )	Code ( <b>Code</b> )

To learn more about using counters, refer to the **Administering the database** guide, chapter **Customizing the database**, section **Counters in field default values**.

## Actions and wizards (Cable and Circuit)

The Cable and Circuit module uses numerous actions to automate certain tasks. Most of these actions are performed by wizards.

You can access the **Actions** table (**amAction**) using the **Tools/ Actions/ Edit** menu item.

You can easily filter the actions linked to the Cable and Circuit module by using a simple filter on the following fields:

- Domain (**Domain**)
- Nature (**Nature**)

The following actions are directly linked to Cable and Circuit module:



**Table 9.7. Actions and wizards (Cable and Circuit) - list**

<b>Name of action</b>	<b>SQL name of the action</b>	<b>Action type</b>	<b>Context of the action (SQL name of the table)</b>	<b>Section of the guide to consult</b>
Create pairs	sysCableCreatePair	Wizard	amModel	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Cable models/ Create pairs wizard</b>
Create ports	sysCableCreatePort	Wizard	amModel	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Cable device models without slots./ Create ports wizard</b>
Create slots	sysCableCreateSlot	Wizard	amModel	Chapter <b>Implementing cable management (Cable and Circuit)</b> , section <b>Cable device models with slots./ Create slots wizard</b>
Create a termination field	sysCableCreateTermField	Wizard	amLocation	Chapter <b>Termination fields</b> , section <b>Create a termination field wizard</b>
Disconnect bundles	sysCableDisCnxBundle	Wizard	amCableBundle	
Disconnect ports	sysCableDisCnxPort	Wizard	amPort	
Duplicate wiring closet	sysCableDupCloset	Wizard	amLocation	Chapter <b>Termination fields</b> , section <b>Duplicate wiring closet wizard</b>
Expand termination field	sysCableExpTermField	Wizard	amTermField	Chapter <b>Termination fields</b> , section <b>Expand termination field wizard</b>
Hub cross-connect (generic)	sysCableHubCnx	Wizard		

<b>Name of action</b>	<b>SQL name of the action</b>	<b>Action type</b>	<b>Context of the action (SQL name of the table)</b>	<b>Section of the guide to consult</b>
Cross connect ports (internal)	sysCableInternalXCnxPort	Wizard	amPort	
Display cable trace	sysCableOutCabTr	Wizard	amCable	
Display device traces	sysCableOutDevTr	Wizard	amAsset	
Refresh asset label	sysCableRefreshAssetLbl	Script	amAsset	
Refresh bundle label	sysCableRefreshBundleLbl	Script	amCableBundle	
Refresh cable label	sysCableRefreshCableLbl	Script	amCable	
Refresh the link label	sysCableRefreshCableLinkLbl	Script	amCableLink	
Refresh pair/conductor label	sysCableRefreshPairLbl	Script	amCablePair	
Refresh pin/terminal label	sysCableRefreshPinLbl	Script	amDevicePin	
Refresh port label	sysCableRefreshPortLbl	Script	amPort	
Refresh project trace	sysCableRefreshProjectTr	Script	amProjectOut	
Refresh trace history	sysCableRefreshTrHist	Script	amTraceHistory	
Relocate cables	sysCableRelocateCable	Wizard		
Remove cables	sysCableRemoveCab	Wizard	amCable	

Name of action	SQL name of the action	Action type	Context of the action (SQL name of the table)	Section of the guide to consult
Remove cables by location and roles	sysCableRemoveCabLocRole	Wizard		
Remove lateral cables	sysCableRemoveLateralCable	Wizard		
Run lateral cables	sysCableRunLateral	Wizard		Chapter <b>Connections - creation with the wizards</b> , section <b>Run lateral cables wizard</b>
Run riser cables	sysCableRunRiser	Wizard		Chapter <b>Connections - creation with the wizards</b> , section <b>Run riser cables wizard</b>
Hub cross-connect (specific)	sysCableSpecificHubXCnx	Wizard		
Swap assets	sysCableSwapAsset	Wizard	amAsset	
Cross-connect wallfield	sysCableWallCnx	Wizard		
Cross connect bundles	sysCableXCnxBundle	Wizard	amCableBundle	Chapter <b>Connections - creation with the wizards</b> , section <b>Cross connect bundles wizard</b>
Cross connect ports	sysCableXCnxPort	Wizard	amPort	
Transfer project assets	sysCableXferAsset	Wizard	amAstProjDesc	
Transfer project cables	sysCableXferCable	Wizard	amProjCable	
Relocate project connections	sysCableXferTrace	Wizard	amProjTraceOut	

Name of action	SQL name of the action	Action type	Context of the action (SQL name of the table)	Section of the guide to consult
Cable cross-connections	sysCableCableXCnx	Script	amCable	Chapter <b>Viewing the traces</b> , section <b>Cable cross-connections wizard</b>
Device cross-connections	sysCableDeviceXCnx	Script	amAsset	Chapter <b>Viewing the traces</b> , section <b>Device cross-connections wizard</b>
Display cable traces	sysCableCableTrace	Script	amCable	Chapter <b>Viewing the traces</b> , section <b>Display cable traces wizard</b>
Display device traces	sysCableDeviceTrace	Script	amAsset	Chapter <b>Viewing the traces</b> , section <b>Display device traces wizard</b>

To learn more about using actions, refer to the **Cable** guide, chapter **Actions**.

To learn more about composing scripts, refer to the **Advanced use** guide, chapter **Scripts**.

To learn more about APIs, refer to the **Programmer's reference** guide. You can create new actions or customize existing ones.

## Modules of the AssetCenter Server (Cable and Circuit)

There are no modules dedicated to the Cable and Circuit module.

## System data and Line-of-business data (Cable and Circuit)

AssetCenter is provided with a set of data that can be imported to a demonstration database or your own database.

---

 **Note:**

Certain of these sets of data are already imported in the installation database installed with AssetCenter.

---

These data sets are a part of one of the following groups:

- **System data:** data that is indispensable in order for AssetCenter to function.
- **Line-of-business data:** basic data to insert into your production database if you find it useful.  
This data is divided into functional areas.
- **Sample data:** data that is useful to familiarize yourself with AssetCenter.

### System data specific to the Cable and Circuit module

For everything concerning the Cable and Circuit module, the **System data** contains data for the following tables:

- **Actions (amAction)**  
Example: cabling wizards
- **Calculated fields (amCalcField)**

The **System data** relating to the Cable and Circuit module is already included in the demonstration database installed with AssetCenter.

The **System data** relating to the Cable and Circuit module will be part of your working database if you select this option while creating your database with AssetCenter Database Administrator (refer to the **Implementing cable management (Cable and Circuit) chapter**, section **Preliminary steps** of this guide).

### Line-of-business data for the Cable and Circuit module

Here are a few examples of **Line-of-business data** specific to the Cable and Circuit module:

- **Label rules (amLabelRule)**
- **Color codes (amColorCode)**

- **Topologies (amTopology)**
- **Termination field configurations (amTermFldConfig)**
- **Models (amModel)**

The **Line-of-business data** relating to the Cable and Circuit module is still part of the demonstration database installed with AssetCenter. It will be incorporated in your production database if you select this option with AssetCenter Database Administrator (refer to the **Implementing cable management (Cable and Circuit) chapter**, section **Preliminary steps** of this guide).

## Reports and forms (Cable and Circuit)

AssetCenter is provided with reports and forms. Certain are specific to the Cable and Circuit module.

In order for these reports and forms to be available in your database, you must import them from the AssetCenter Database Administrator.

### Importing and identifying reports specific to the Cable and Circuit module

To find out how to import reports, refer to the **Advanced use guide**, chapter **Crystal Reports**, section **Operation and installation of the report generator**, sub-section **Installing preconfigured Crystal Reports in your database**.

To identify the reports specific to the Cable module, refer to the **Advanced use guide**, chapter **Crystal Reports**, section **Identifying Crystal reports specific to a given module**.

### Importing and identifying forms specific to the Cable and Circuit module

To find out how to import forms, refer to the **Advanced use guide**, chapter **Forms**, section **Installing preconfigured forms into your working database**.

To identify the forms specific to the Cable module, refer to the **Advanced use guide**, chapter **Forms**, section **Identifying forms specific to a given module**.

## Automatic actions (Cable and Circuit)

To see the list of actions that are automatically executed in the background by AssetCenter, refer to the **Database structure** document. You will find the actions' references in the **Introduction (Cable and Circuit)** chapter, section **Other sources of information (Cable and Circuit)** of this guide.

## APIs (Cable and Circuit)

Certain AssetCenter APIs are used in the Cable and Circuit module. These APIs perform the following functions:

- Verification of the integrity rules of the database.  
Example: They verify that the pins of a port belong to the same cable device as the port itself.
- Triggering of certain agents on the database.  
Example: They duplicate the pairs of a cable model when a cable is created.

To obtain a list and description of the APIs used in cable management, refer to the documentation: **Programmer's reference**.

## Views (Cable and Circuit)

There are no views dedicated to the Cable and Circuit module.

To learn more about using views, refer to the **Introduction** guide, chapter **Using views**.

## Other sources of information (Cable and Circuit)

The **AssetCenter 4.1.0 - Cable and Circuit** guide was only written to give you information directly related to the Cable and Circuit module. To obtain associated information not covered in this guide, we recommend that you read the following documents:

**Table 9.8. Other documentation (Cable and Circuit) -list**

The document ...	Covers information relating to the ...	Format	Location in the AssetCenter installation folder
Installation	• Installation of AssetCenter	Printed	<code>\doc\pdf\installbook*.pdf</code>
		Online	<code>\doc\chm\installbook*.chm</code>
Core tables	• Location management	Printed	<code>\doc\pdf\core*.pdf</code>
		Online	<code>\doc\chm\core*.chm</code>
Introduction	• General interface of the application	Printed	<code>\doc\pdf\intro*.pdf</code>
		Online	<code>\doc\chm\intro*.chm</code>
Portfolio	• Management of natures, models, assets, projects and work orders in general	Printed	<code>\doc\pdf\port*.pdf</code>
		Online	<code>\doc\chm\port*.chm</code>
Administration	• Customization of fields	Printed	<code>\doc\pdf\admin*.pdf</code>
		Online	<code>\doc\chm\admin*.chm</code>
Advanced use	• Itemized-list management • Use of wizards • Creation of scripts • Use of calculated fields	Printed	<code>\doc\pdf\advan*.pdf</code>
		Online	<code>\doc\chm\advan*.pdf</code>



The document ...	Covers information relating to the ...	Format	Location in the AssetCenter installation folder
Help on fields and links	<ul style="list-style-type: none"> <li>Use of database fields and links</li> </ul>	Online	<p>This help is accessible using one of the following methods, after having selected the field or link:</p> <ul style="list-style-type: none"> <li>Right-click and select <b>Help on this field</b> from the shortcut menu.</li> <li>Press <b>Shift+F1</b>.</li> <li>Select the <b>Help/ Help on this field</b> menu.</li> </ul>
Programmer's reference	<ul style="list-style-type: none"> <li>Use of APIs</li> </ul>	Printed Online	<p><b>\doc\pdf\progref*.pdf</b> <b>\doc\progref*.chm</b></p>
Database structure	<ul style="list-style-type: none"> <li>List of the database's tables, fields, links and indexes</li> <li>Automatic agents triggered by AssetCenter.</li> </ul>	Text file Printed Online	<ul style="list-style-type: none"> <li><b>\infos\database.txt</b></li> <li><b>\infos\tables.txt</b></li> </ul> <p><b>\doc\pdf\dbstruct*.pdf</b> <b>\doc\chm\dbstruct*.chm</b></p>
General online help	<ul style="list-style-type: none"> <li>The functioning of the entire application</li> </ul>	Online	<p>This help is accessible using one of the following methods, after having selected the field or link:</p> <ul style="list-style-type: none"> <li>Press <b>F1</b> on the keyboard.</li> <li>Select the <b>Help/ Index</b> menu.</li> </ul>





