



File Import Format

Two methods are available for importing devices into your network inventory:

- Comma-Separated Values (CSV) File
- Device Integration File (DIF)

For ease of use, Cisco strongly recommends the CSV format. Samples of each type of file are in this appendix.



Note

The information in each file type must be entered in the order shown.

Comma-Separated Values (CSV) File

You can create a CSV file to import devices. Select **Resource Manager Essentials > Administration > Inventory > File Import** to import the CSV file you created.

The CSV format provides the following device information:

- Full device name or IP address (required)
- Read-only community string (required)
- Read-write community string (optional)
- Serial number (optional)
- User Field 1 (optional)
- User Field 2 (optional)

- User Field 3 (optional)
- User Field 4 (optional)
- Telnet password, enable password, enable secret, TACACS user, TACACS password, TACACS enable user, TACACS enable password, local user, local password, RCP user, and RCP password (optional)

The following is a sample CSV-formatted file.

```
; The following header line is mandatory - only the value of the
; source attribute can be modified (e.g. source = My Excel spreadsheet).
cisco Systems NM data import, source = Hand edit; Version = 2.0; Type = Csv
;
; Here are the columns of the table.
;
;Col# = 1; Name = Device name (include domain unless your stie has
;unqualified device names registered in the name services
;- or -
;IP address in dotted decimal notation
;Col# = 2: Name = RO community string
;Col# = 3: Name = RW community string
;Col# = 4: Name = Serial Number
;Col# = 5: Name = User Field 1
;Col# = 6: Name = User Field 2
;Col# = 7: Name = User Field 3
;Col# = 8: Name = User Field 4
;Col# = 9; Name = Telnet password
;Col# = 10; Name = Enable password
;Col# = 11; Name = Enable secret
;Col# = 12; Name = Tacacs user
;Col# = 13; Name = Tacacs password
;Col# = 14; Name = Tacacs enable user
;Col# = 15; Name = Tacacs enable password
;Col# = 16; Name = Local user
;Col# = 17; Name = Local password
;Col# = 18; Name = Rcp user
;Col# = 19; Name = Rcp password; Comment = not used, leave blank
;
; Here are the rows of data.
;
bigrouter.yourcompany.com,public,private,,
dev-2501.yourcompany.com,"Not so, "" public as, thought",private,sn2501,
dev-2502.yourcompany.com,public,"private",sn2502,
dev-2503.yourcompany.com,public,private,sn2503,""
dev-2504.yourco.com,public,private,sn2504,us1,us2,us3,us4,tPass,ePass,eSecret,tUsr,tPass,t
eUsr,tePass,LUusr,LPass,rUusr,rPass
dev-2505.yourco.com,public,private,sn2505,usr1,,usr4,,esecret,,tUsr,tPass,,LUusr,lPass
dev-2507.yourcompany.com,public,private,sn2507,
dev-2509.yourcompany.com,public,private,sn2509,
dev-2510.yourcompany.com,public,private,sn2510,
dev-2511.yourcompany.com,public,private,sn2511,
dev-2512.yourcompany.com,public,private,sn2512,
dev-2513.yourcompany.com,public,private,sn2513,
dev-2514.yourcompany.com,public,private,sn2514,
dev-2515.yourcompany.com,public,private,sn2515,
dev-2516.yourcompany.com,public,private,sn2516,
```

Device Integration File (DIF)

```

dev-4000.yourcompany.com,public,private,,Big Boys
dev-4500.yourcompany.com,public,private,,Big Boys
dev-7000.yourcompany.com,public,private,,Big Boys
dev-7010.yourcompany.com,public,private,,Big Boys
dev-2517.yourcompany.com,public,private,,nm 25xx
dev-2518.yourcompany.com,public,private,,mylabel2
dev-2520.yourcompany.com,public,private,,mylabel2
dev-2521.yourcompany.com,public,private,,mylabel2
dev-2522.yourcompany.com,public,private,,mylabel2
dev-2523.yourcompany.com,public,private,,mylabel2
dev-2524.yourcompany.com,public,private,,mylabel2
dev-2525.yourcompany.com,public,private,,mylabel2
dev-4700.yourcompany.com,public,private,,yourlabel1,,yourlabel3,yourlabel4
dev-7206.yourcompany.com,public,private,,
dev-7505.yourcompany.com,public,private,,,,yourlabel4
dev-7507.yourcompany.com,public,private,,
dev-7513.yourcompany.com,public,private,,
dev-1200.yourcompany.com,public,private,,
dev-2900.yourcompany.com,public,private,,
dev-3000.yourcompany.com,public,private,,
dev-5000.yourcompany.com,public,private,,
111.222.33.44,public,public,,

```

Device Integration File (DIF)

You can create a DIF to import devices. Select **Resource Manager Essentials > Administration > Inventory > File Import** to import the DIF file you created.

The DIF is currently encoded in the ISO Latin-1 character set using an extended BNF notation as described in the Essentials online help. The DIF specifies the following characteristics of each device:

- Generic format
- Generic attributes
- Header
- Table area
 - Generic table attributes
 - Device table
 - Group table
 - User annotation table

- Serial number table
- TACACS table

The following is a sample DIF, incorporating these characteristics. The sample file was imported from CiscoWorks.

First, the DIF is defined.

```
cisco Systems NM data import, source=CW; Version = 1.0;
```

The device table is defined.

```
Table name = Device basic inventory; Version = 1.0; Column count = 7;  
Separator = |;
```

Columns for the device table are defined.

```
Col# = 1; Name = Row#;  
Col# = 2; Name = Device name;  
Col# = 3; Name = Domain;  
Col# = 4; Name = RO community string;  
Col# = 5; Name = RW community string;  
Col# = 6; Name = Telnet password;  
Col# = 7; Name = Enable password;
```

Rows of data for the device table are defined.

```
000001|111.22.333.4|||fooey|more  
000002|landfall|cisco.com|public|private||  
000003|yet_another_router||read|write|main|charlie  
000004|Pinpointed_router|organized.org|read|write|viper|eric  
999999
```

An administrative domain table is defined.

```
Table name = Device grouping; Version = 1.0;  
Column count = 4; Separator = $
```

Columns for the domains table are defined.

```
Col# = 1; Name = Row#  
Col# = 2; Name = Group  
Col# = 3; Name = Device name  
Col# = 4; Name = Domain
```

Rows of data for the domain table are defined.

```
000001$CW_World$111.22.333.4$
000002$CW_World$yet_another_router$
000003$CW_World$landfall$cisco.com$
000004$CW_Smaller than world$yet_another_router$
999999
```

The user annotation table is defined.

```
Table name = Device annotations; Version = 1.0; Column count = 7;
Separator = $
```

Columns for the annotation table are defined.

```
Col# = 1; Name = Row#
Col# = 2; Name = Device name
Col# = 3; Name = Domain
Col# = 4; Name = Annotation 1
Col# = 5; Name = Annotation 2
Col# = 6; Name = Annotation 3
Col# = 7; Name = Annotation 4
```

Rows of data for the annotations table are defined (the first annotation holds location; the second annotation holds the contact name).

```
000001$111.22.333.4$$San Jose: Bldg F$Joe Smith
000002$yet_another_router$$San Jose: Bldg A$Jill Jones
000003$landfall$cisco.com$San Jose: Bldg F$Joe Smith
000004$yet_another_router$Santa Clara: Bldg 1$George Black
999999
```

The serial number table is defined.

```
Table name = Device serial numbers; Version = 1.0; Column count = 4;
Separator = $
Col# = 1; Name = Row#
Col# = 2; Name = Device name
Col# = 3; Name = Domain
Col# = 4; Name = Serial number
```

RCP data is provided.

```
000001$111.22.333.4$$jsmith$1dasf8
000002$yet_another_router$$jjones$1ruf7dhgd
000003$landfall$cisco.com$jsmith$1dasf8
000004$yet_another_router$gblack$7fghs4
999999
```

The TACACS table is defined.

```
Table name = Device Tacacs access data; Version = 1.0; Column count =  
7;  
Separator = $  
Col# = 1; Name = Row#  
Col# = 2; Name = Device name  
Col# = 3; Name = Domain  
Col# = 4; Name = Tacacs user  
Col# = 5; Name = Tacacs password  
Col# = 6; Name = Tacacs Enable User;  
Col# = 7; Name = Tacacs Enable Password;
```

TACACS data is provided.

```
000001$111.22.333.4$$jsmith$3dfg6$stillJsmith$butNot3dfg6  
000002$yet_another_router$$jjones$adf6789  
000003$landfall$cisco.com$jsmith$3dfg6  
000004$yet_another_router$gblack$jh3df7  
999999
```

