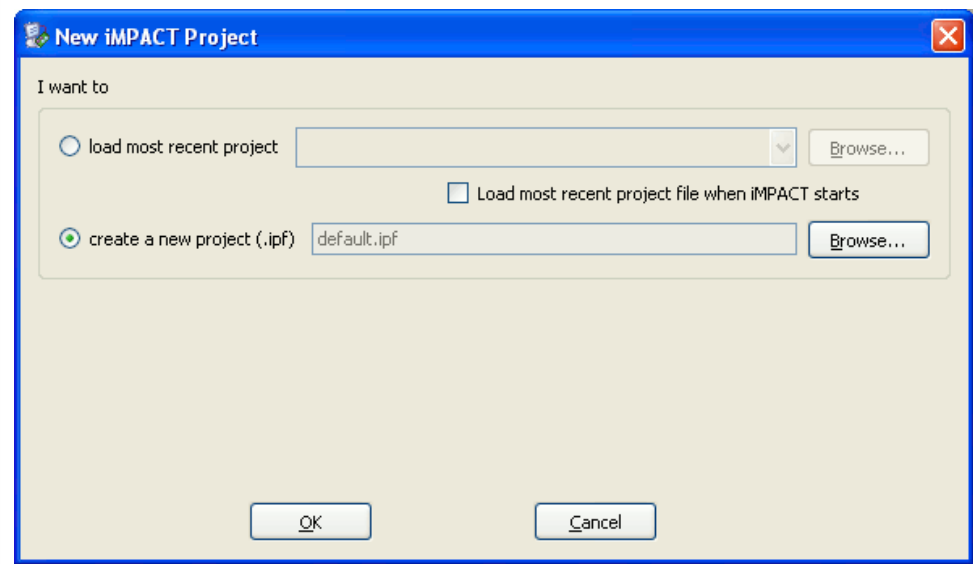
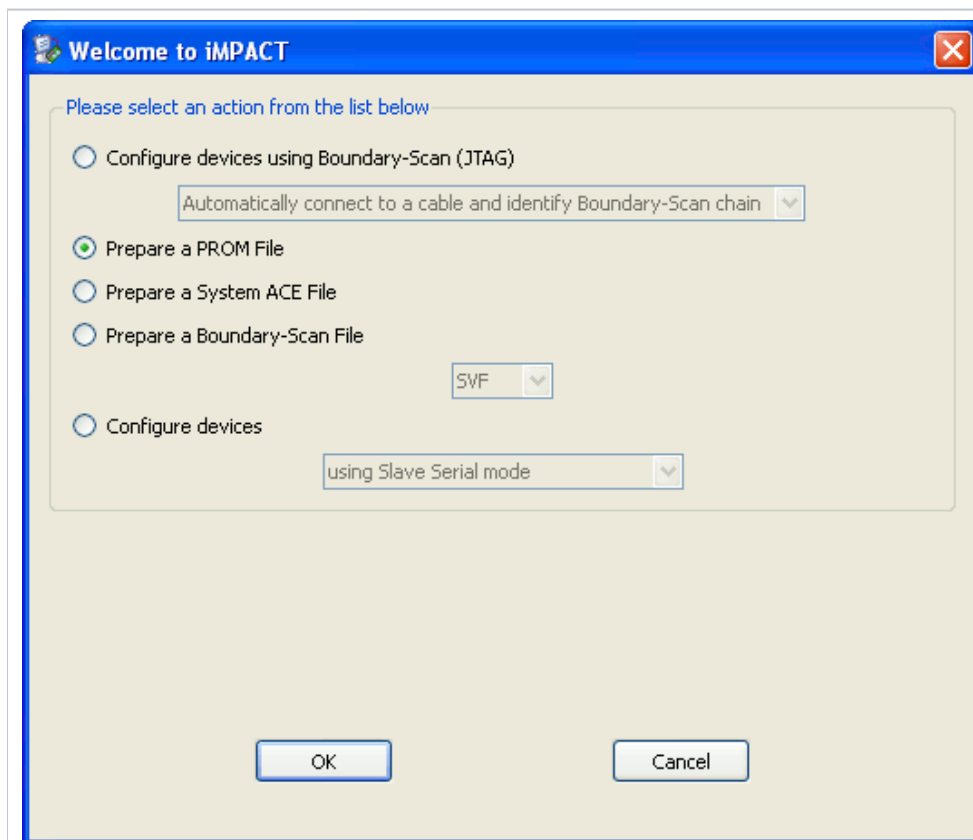


PROM file from the bitstream file (XILINX Flash .mcs example)

In order to generate a .mcs PROM file from the bitstream file download.bit, start Xilinx iMPACT. The following example shows the case of Xilinx iMPACT 11.3 (for other version the procedure doesn't change):

	<p>Select "file / new project".</p> <p>Choose "create a new project".</p> <p>Press "OK".</p>
---	---



Select "*prepare a PROM file*".

Press "**OK**".

New iMPACT Project

Select **step 1. "storage target / Xilinx Flash/PROM"** of the left panel and press the left green arrow.

PROM File Formatter

Step 1. Select Storage Target

Storage Device Type :

- Xilinx Flash/PROM
 - Non-Volatile FPGA
 - Spartan3AN
 - SPI Flash
 - Configure Single FPGA
 - Configure MultiBoot FPGA
 - BPI Flash
 - Configure Single FPGA
 - Configure MultiBoot FPGA
 - Configure from Paralleled PROMs
 - Generic Parallel PROM

Step 2. Add Storage Device(s)

Target FPGA: Spartan3E

Storage Device (bits): 512K

Add Storage Device Remove Storage Device

Auto Select PROM

Step 3. Enter Data

General File Detail	Value
Checksum Fill Value	FF
Output File Name	Untitled
Output File Location	C:\Xilinx\

Flash/PROM File Property	Value
File Format	HEX
Use Power-of-2 for Start Addr	No
Number of Bitstream	2
Bitstream 0 Start Address	0
Bitstream 1 Start Address	675840
Add Non-Configuration Data Files	Yes
Number of Data File	

Description:

The PROM File Formatter will guide you through the steps to format bitstream BIT files into a PROM file that is compatible with Xilinx® and third-party PROM programmers. The programmed PROM device can then be used to configure the target FPGA.

Additional capabilities of the PROM File Formatter include:

- Generation PROM files containing specific FPGA configuration instructions required to support daisy-chained FPGA bitstream BIT files.

OK Cancel Help

PROM File Formatter Step1

Select **step 2. "add storage device(s) / auto select PROM"** of the middle panel and press the right green arrow.

In **step 3. "enter data"** of the right panel

PROM File Formatter

Step 1. Select Storage Target

Storage Device Type :

- Xilinx Flash/PROM
 - Non-Volatile FPGA
 - Spartan3AN
 - SPI Flash
 - Configure Single FPGA
 - Configure MultiBoot FPGA
 - BPI Flash
 - Configure Single FPGA
 - Configure MultiBoot FPGA
 - Configure from Paralleled PROMs
 - Generic Parallel PROM

Step 2. Add Storage Device(s)

PROM Family: Platform Flash

Device (bits): xcf01s [1 M]

Add Storage Device Remove Storage Device

☒ Auto Select PROM

Step 3. Enter Data

General File Detail		Value
Checksum Fill Value	FF	
Output File Name	Untitled	
Output File Location	C:\Xilinx\	

Flash/PROM File Property		Value
File Format	MCS	
Enable Revisioning	Yes	
Number Of Revisions		
Enable Compression	No	

Description:

In this step, you will enter information to assist in setting up and generating a PROM file for the targeted storage device and mode.

- Checksum Fill Value:** When data is insufficient to fill the entire memory of a PROM, the value specified here is used to calculate the checksum of the unused portions.
- Output File Name:** This allows you to specify the base name of the file to which your PROM data will be written
- Output File Location:** This allows you to specify the directory in which the file named above will be created
- File Format:** PROM files can be generated in any number of industry standard formats. Depending on the PROM file format your PROM programmer uses, you output a TEF.

OK Cancel Help

PROM File Formatter Step 3

Type **fpga** (or another name) in the "Output File Name" input field



Using OpenFut or OpenFutNet, there is no longer any restriction in the name of output file: any name for the output file name input field is allowed.

With the old 2nd generation program FWU any other name than **fpga** for the output file name input field is not allowed.

Choose a suitable path for the "Output File Location" input field;

Select **mcs** from the drop-down menu file format in the flash/PROM file property sub-panel;

PROM File Formatter

Step 1. Select Storage Target

Storage Device Type :

- Xilinx Flash/PROM
- Non-Volatile FPGA
 - Spartan3AN
- SPI Flash
 - Configure Single FPGA
 - Configure MultiBoot FPGA
- BPI Flash
 - Configure Single FPGA
 - Configure MultiBoot FPGA
 - Configure from Paralleled PROMs
- Generic Parallel PROM

Step 2. Add Storage Device(s)

PROM Family: Platform Flash

Device (bits): xcf01s [1 M]

Add Storage Device Remove Storage Device

☒ Auto Select PROM

Step 3. Enter Data

General File Detail	Value
Checksum Fill Value	FF
Output File Name	fpga
Output File Location	C:/Daten

Flash/PROM File Property	Value
File Format	BIN (Swap Bits ON)
Enable Revisioning	MCS
Number Of Revisions	EXO
Enable Compression	HEX (Swap Bits ON)
	HEX (Swap Bits OFF)
	BIN (Swap Bits ON)
	BIN (Swap Bits OFF)
	UFP ('C' format)
	ISC

Description:

In this step, you will enter information to assist in setting up and generating a PROM file for the targeted storage device and mode.

- Checksum Fill Value:** When data is insufficient to fill the entire memory of a PROM, the value specified here is used to calculate the checksum of the unused portions.
- Output File Name:** This allows you to specify the base name of the file to which your PROM data will be written
- Output File Location:** This allows you to specify the directory in which the file named above will be created
- File Format:** PROM files can be generated in any number of industry standard formats. Depending on the PROM file format your PROM programmer uses, you output a TEF.

OK Cancel Help

Prom File Formatter Step 3, MCS selection

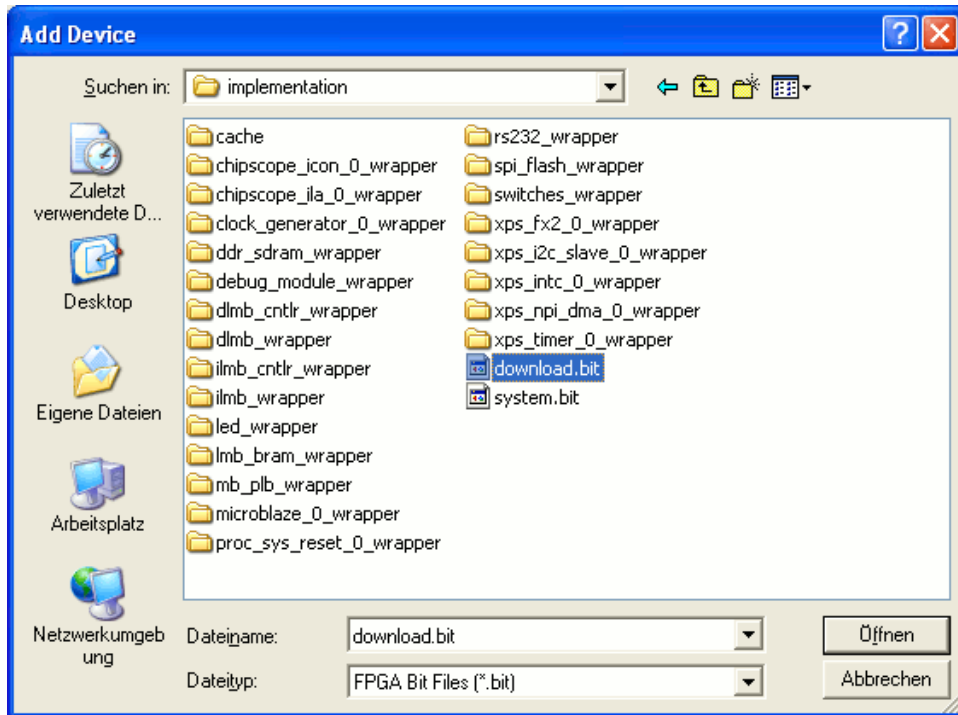
Press the "OK" button in the bottom left corner of the current window.

Add Device

Start adding device file to
Revision: 0

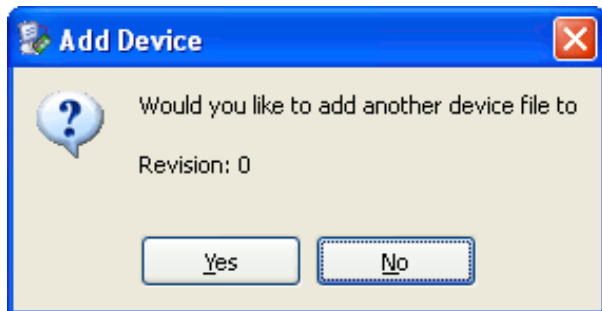
OK

Just acknowledge the pup-up message.



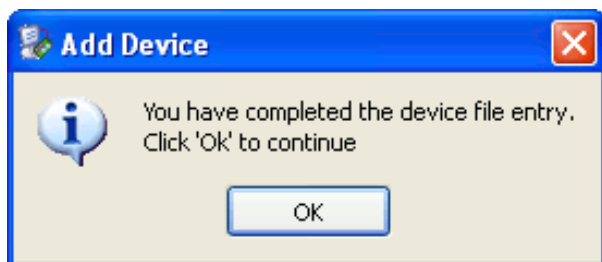
Browse to the "./implementation/" folder of your "." project folder and select the bitstream file download.bit.

Press the **"open"** button in the bottom left corner of the current window.



Your design likely consist of just one device file.

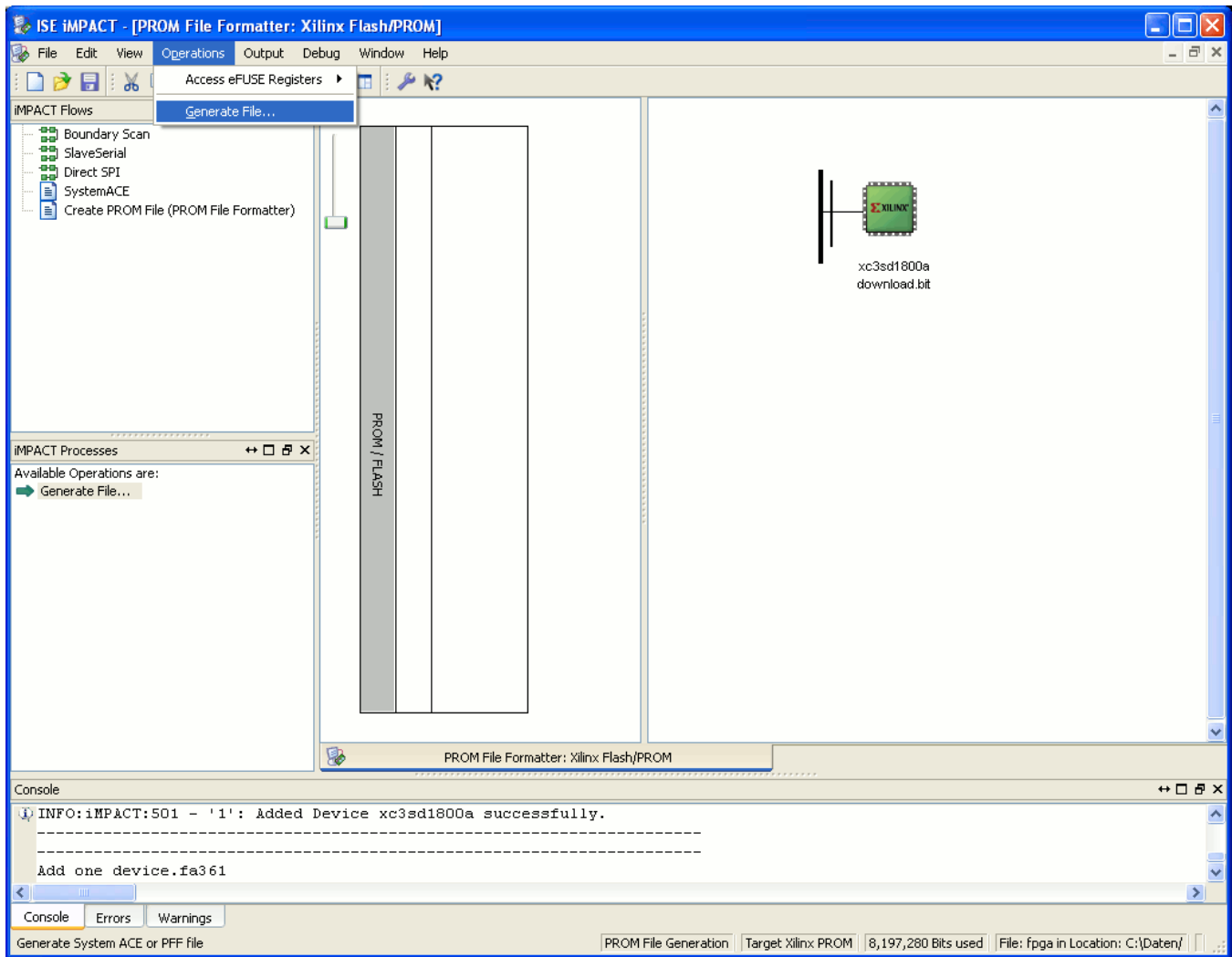
So deny the request by pressing the **"NO"** button.



Just acknowledge the pup-up message.

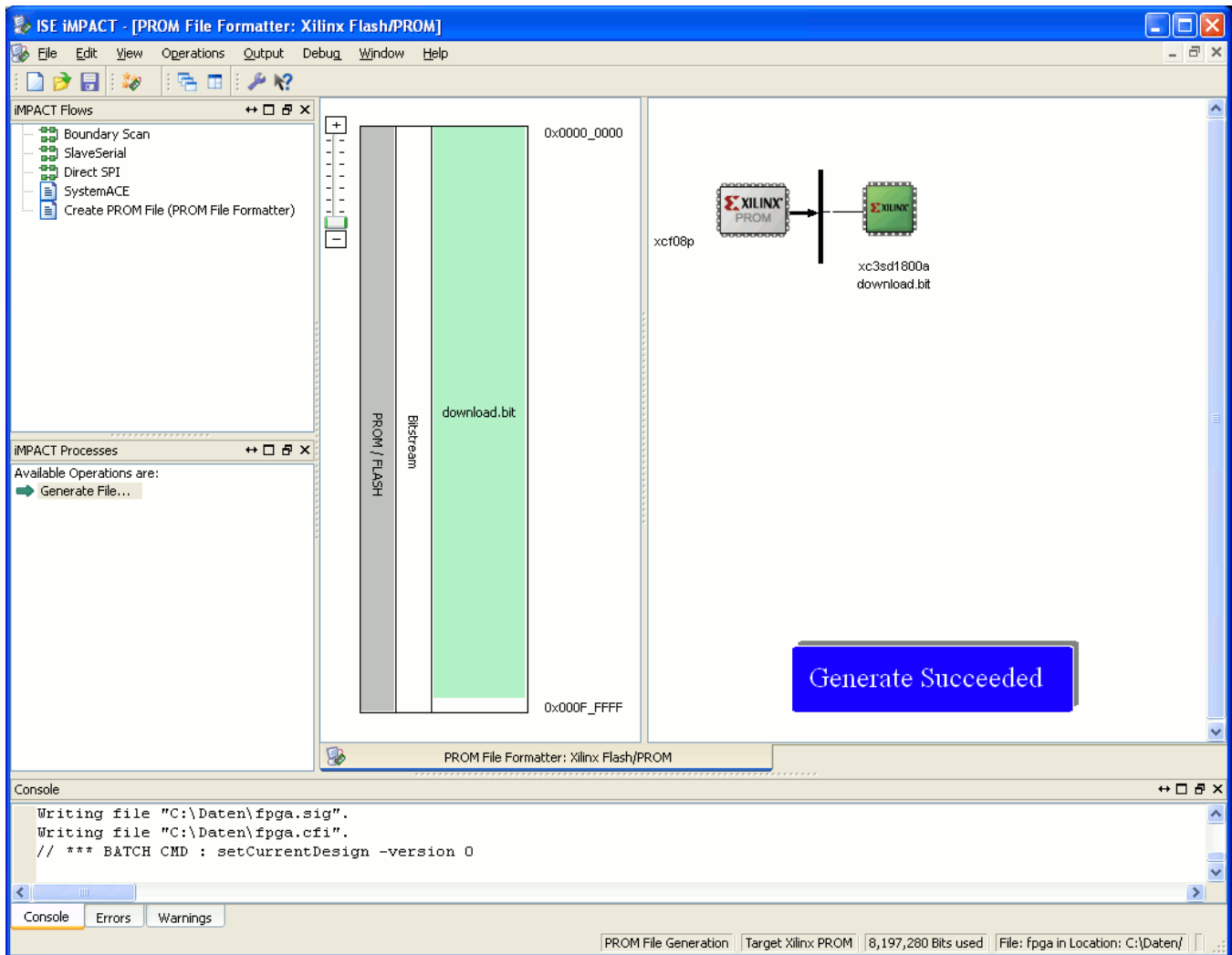
PROM File Formatter after Step 3

Select **"operations / generate file..."** or double click **"generate file..."** from the iMPACT processes panel.

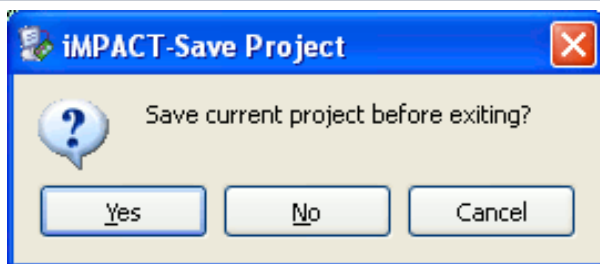


PROM File Formatter: Generate File...

You should see the following message in the main panel: generate succeeded.



PROM File Formatter: Generate Succeeded



You might now want to save your Xilinx iMPACT project settings for future use.

iMPACT Save Project

In the folder corresponding to the path you chose as the output file location, you should find the fpga.mcs PROM file.