

NAME

llvm-dwarfutil - A tool to copy and manipulate debug info

SYNOPSIS

llvm-dwarfutil [*options*] *input output*

DESCRIPTION

llvm-dwarfutil is a tool to copy and manipulate debug info.

In basic usage, it makes a semantic copy of the input to the output. If any options are specified, the output may be modified along the way, e.g. by removing unused debug info.

If "-" is specified for the input file, the input is read from the program's standard input stream. If "-" is specified for the output file, the output is written to the standard output stream of the program.

The tool is still in active development.

COMMAND-LINE OPTIONS**--garbage-collection**

Removes pieces of debug information related to discarded sections. When the linker does section garbage collection the abandoned debug info is left behind. Such abandoned debug info references address ranges using tombstone values. Thus, when this option is specified, the tool removes debug info which is marked with the tombstone value.

That option is enabled by default.

--odr-deduplication

Remove duplicated types (if "One Definition Rule" is supported by source language). Keeps first type definition and removes other definitions, potentially significantly reducing the size of output debug info.

That option is enabled by default.

--help, -h

Print a summary of command line options.

--no-garbage-collection

Disable *--garbage-collection*.

--no-odr-deduplication

Disable *--odr-deduplication*.

--no-separate-debug-file

Disable *--separate-debug-file*.

--num-threads=<n>, -j

Specifies the maximum number (*n*) of simultaneous threads to use for processing.

--separate-debug-file

Generate separate file containing output debug info. Using **llvm-dwarfutil** with that option equals to the following set of commands:

```
:program:'llvm-objcopy' --only-keep-debug in-file out-file.debug
```

```
:program:'llvm-objcopy' --strip-debug in-file out-file
```

```
:program:'llvm-objcopy' --add-gnu-debuglink=out-file.debug out-file
```

--tombstone=<value>

<value> can be one of the following values:

- ⊕ *bfd*: zero for all addresses and [1,1] for DWARF v4 (or less) address ranges and exec.
- ⊕ *maxpc*: -1 for all addresses and -2 for DWARF v4 (or less) address ranges.
- ⊕ *universal*: both *bfd* and *maxpc*.
- ⊕ *exec*: match with address ranges of executable sections.

The value *universal* is used by default.

--verbose

Enable verbose logging. This option disables multi-thread mode.

--verify

Run the DWARF verifier on the output DWARF debug info.

--version

Print the version of this program.

SUPPORTED FORMATS

The following formats are currently supported by **llvm-dwarfutil**:

ELF

EXIT STATUS

llvm-dwarfutil exits with a non-zero exit code if there is an error. Otherwise, it exits with code 0.

BUGS

To report bugs, please visit [<https://github.com/llvm/llvm-project/labels/tools:llvm-dwarfutil/>](https://github.com/llvm/llvm-project/labels/tools:llvm-dwarfutil/).

AUTHOR

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