# h5check

Version: 1.0

Syntax:

`h5check [options] file`

Purpose:

`h5check` is a validation tool that verifies that an HDF5 file is encoded according to the HDF File Format Specification. The purpose is to ensure data model integrity and long term compatibility between evolving versions of the HDF5 Library.

Description:

Given a file, `h5check` scans through the encoded content, verifying it against the defined library format. If it finds any non-compliance, it prints the error and the reason of non-compliance and tries to continue the scanning, if possible. If `h5check` does not find any non-compliance, it prints an approval statement at the end. The tool does not link with the HDF Library and does not use any HDF5 Library API calls.

By default, the file is verified against the latest version of the file format; as of this writing, that is the format written by the HDF5 Library release 1.8.*x* series. A format version can be explicitly specified with the *-fn* (or *--format=n*) option. For example, *-f16* (or *--format=16*) would specify verification against the format written by release 1.6.7.

Options:

| | | |
|---|---|---|
| *-h* or *--help* | | Print a usage message and exit. |
| *-V* or *--version* | | Print version number and exit. |
| *-vn* or *--verbose=n* | | Set verbose mode: |
| *n*=0 | Terse | Indicates only whether file is compliant |
| *n*=1 | Default | Prints progress and all errors found |
| *n*=2 | Verbose | Prints all known information, usually for debugging |
| *-fn* or *--format=n* | | Specify library release version against which file is to be validated: |
| *n*=16 | | Validate according to HDF5 Library release 1.6.6. |
| *n*=18 | | Validate according to HDF5 Library release 1.8.0. (*Default*) |
| *-oa* or *--object=a* | | Check object header, where *a* is the address of the object header to be validated. |