

## News Release

*For Immediate Release*

Attention:

- Design Editors
- CAD/CAM/CAE Editors
- Multimedia Editors
- Graphics Editors
- New Product Editors
- Product Review Editors

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Editors:

Additional openNURBS  
information is available on  
[www.openNURBS.com](http://www.openNURBS.com)

What: The **openNURBS™** Initiative formed  
News: A reliable method for accurately transferring 3-D geometry between applications  
Who Uses: CAD, CAM, CAE, multimedia, and graphics software developers  
Price: Free  
Available: Now  
Platform: Windows 95/98/NT, Mac, and Linux

### The openNURBS Initiative Announced

**Seattle—January 3, 2000**—Today Robert McNeel & Associates announced the openNURBS Initiative, an upgrade to their widely used Rhinoceros® developers I/O toolkit. The openNURBS Initiative provides CAD, CAM, CAE, and computer graphics software developers the tools to accurately transfer 3-D geometry between applications.

“We believe that the inability to accurately transfer geometry between applications is a primary factor stifling designers' use of 3-D.” explains Bob McNeel, President of Robert McNeel & Associates, “There is no point in a designer finishing a 3-D model if it is just going to be rebuilt for product engineering, again for analysis, and yet again for tooling.”

The tools provided by the openNURBS Initiative include:

- A file format specification and documentation.
- C++ source code libraries to read and write the file format. Windows, Mac, and Linux are supported.
- Quality assurance and revision control.
- Various supporting libraries and utilities.
- Technical support.

Unlike other open development initiatives, alliances, or consortia:

- Commercial use is encouraged.
- The tools, support, and membership are free.
- There are no restrictions. Neither copyright nor copyleft restrictions apply.
- No contribution of effort or technology is required from the members, although it is encouraged.

## The openNURBS toolkit includes:

- ◆ A file format specification.
- ◆ Documentation.
- ◆ C++ source code libraries to read and write the file format.
- ◆ Windows, Mac, and Linux are supported.
- ◆ Quality assurance.
- ◆ Revision control.
- ◆ Various supporting libraries and utilities.
- ◆ Technical support.

## Unsuccessful initiatives

There have been many unsuccessful initiatives to solve the problem of accurately transferring geometry between applications.

Examples include:

- IGES, STEP, and VDA/FS - committee-based solutions burdened with bureaucracies that have failed to keep up with rapidly changing technology.
- ACIS, Parasolid, SMLib, and Designbase - commercial geometry kernel providers whose strategy is to solve problems by becoming the industry standard. Unfortunately, all are excellent products with wide distribution.
- CATIA, UG, and many others - single-source suppliers of all CAD, CAM, and CAE needs. Can be effective but often expensive and not always the best tools for individual tasks.
- Affiliate programs - where a CAD developer encourages third parties to develop add-on functionality to their core product. Ineffective, since no single core product has yet emerged as the standard for 3-D modeling.

## A new approach

The openNURBS Initiative embraces the best concepts of other open software development initiatives, including:

- Source code is free and available to anyone.
- Wide use is encouraged.
- Diverse development is encouraged.

## Cost and ordering

The openNURBS toolkit is free. There are no restrictions. Neither copyright nor copyleft restrictions apply. No contribution of effort or technology is required from the members, although it is encouraged. The toolkit can be downloaded free from [www.openNURBS.com](http://www.openNURBS.com).

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Founded in 1980, Robert McNeel & Associates is a privately-held, employee-owned corporation providing technical professionals with productive tools shaped from emerging technologies.

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