

GETTING STARTED GUIDE



The information in this document is subject to change without notice and does not represent a commitment on the part of Native Instruments GmbH. The software described by this document is subject to a License Agreement and may not be copied to other media. No part of this publication may be copied, reproduced or otherwise transmitted or recorded, for any purpose, without prior written permission by Native Instruments GmbH, hereinafter referred to as Native Instruments. All product and company names are $^{\mathsf{TM}}$ or $^{\mathsf{RM}}$ trademarks of their respective owners.

Getting Started guide written by Alexander Stamm and Patryk Korman

Document Version: 1.0 (07/2009)

Product Version: 4.0 (07/2009)

Special thanks to the Beta Test Team, who were invaluable not just in tracking down bugs, but in making this a better product.

Germany

Native Instruments GmbH
Schlesische Str. 28
D-10997 Berlin
Germany
info@native-instruments.de
www.native-instruments.de

USA

Native Instruments North America, Inc. 5631 Hollywood Boulevard
Los Angeles, CA 90028
USA
sales@native-instruments.com
www.native-instruments.com



© Native Instruments GmbH, 2009. All rights reserved.

Table Of Content

1.	Welcome to GUITAR RIG 4			5
	1.1	What is GUITAR RIG 4?		
	1.2	2 What's new in GUITAR RIG 4?		
2.	Things You Should Know			7
	2.1	_		
	2.2	About Real-Time Audio Processing		
	2.3	_		
		2.3.1	Stand-Alone Mode	
		2.3.2	Plug-in Mode	
3.	The First Session with GUITAR RIG 4			9
	3.1		ng GUITAR RIG 4 for the First Time	
	3.2			
		3.2.1	Global Header	
		3.2.2	Main Area	11
		3.2.3	Toolbar and Rack	13
		3.2.4	Virtual Rig Kontrol	13
		3.2.5	SideKick	14
	3.3	Using the Rack Tools		15
	3.4 Building a Rack from Scratch		17	
		3.4.1	Setting Up an Amp	19
	3.5	Contro	lling Parameters with the Rig Kontrol	21
	3.6	Workin	ng with Presets	22
		3.6.1	The Preset Browser	23
		3.6.2	How to Create Tags	25
		3.6.3	Using Component Presets	27
4.	What's Next?			

1. Welcome to GUITAR RIG 4

Thank you for purchasing GUITAR RIG 4. We hope you enjoy using this product as much as we did creating it!

This Getting Started guide provides you with the essential information needed to use GUITAR RIG 4 and explains how to accomplish fundamental tasks.

The following documents are also available:

- ► The **Setup Guide** tells you how to install, activate and configure GUITAR RIG 4 on your system.
- ► If you want to dig deeper into GUITAR RIG 4 and its possibilities, check out the GUITAR RIG 4 **Application Reference**. It explains every function of the platform in greater detail.
- ► To learn about each and every knob that controls the amps, distortion pedals and other components for shaping and modulating GUITAR RIG'S sounds, refer to the **Components Reference**.
- ► If you have obtained GUITAR RIG 4 in a hardware bundle (MOBILE/SESSION/ KONTROL), please read the according **Hardware Reference** to correctly set up your hardware and software.

All manuals can be accessed through the program menu by selecting *Help > Open Manual > Your Language*.

You can also visit the community forums at native-instruments.com/forum where beginners and experienced users exchange knowledge on Native Instruments products every day.

But now let's get going...

1.1 What is GUITAR RIG 4?

GUITAR RIG 4 is a really powerful software for creating guitar and bass tones, as well as complex effect chains for virtually any musical purpose.

It is like a room filled with legendary amplifiers, endless arrays of cabinets, each with different microphones, any effect you desire, a loop machine and other amazing tools for crafting sounds at your immediate disposal.

GUITAR RIG 4 comes in four different editions: GO, LE, ESSENTIAL and PRO – differing in the number of included components. But no matter which version your GUITAR RIG 4 platform came in, you can easily load it up with COMPONENT PACKS, expanding the selection of amps and effects with coveted, ultra-rare models. Additional GUITAR RIG 4 COMPONENT PACKS will be released regularly in future.

1.2 What's new in GUITAR RIG 4?

GUITAR RIG 4 implements a multitude of improvements to the software. Here is what's new in comparison to older versions:

- New, exciting components (in the Pro edition): Top Lead, Hot Plex, Control Room, Grain Delay, Octaverb, Iceverb, Twin Delay
- ► Improved, even more intuitive user interface
- ► Improved, tag-based Preset Browser
- Improved workflow for component presets
- ► Enhanced amp sound
- Reworked controls for time-based effects modules
- ► Improved sound for pitch-based effects
- New cabinet technology
- True stereo processing (optional for CPU-intense components)
- New controller assignment concept
- ► MIDI controller support for Rig Kontrol 2/3
- Dynamic host automation parameter list

2. Things You Should Know

This chapter will shed light on some fundamental aspects of using GUITAR RIG 4 for music production and performance.

2.1 For Your Protection

GUITAR RIG 4 – in combination with headphones or amplifier-driven speakers – can produce sounds in decibel ranges that may cause hearing damage. For your protection, set all volume levels to a minimum before using GUITAR RIG 4. Gradually raise the volume controls while music is playing to set the desired listening level. If you experience any hearing problems or persistent ringing in the ears, consult an audiologist immediately.

2.2 About Real-Time Audio Processing

Real-time audio processing – like recording a guitar with GUITAR RIG 4 live into your PC – requires an audio device to convert the analog signal into digital data in a very short time. On-board audio devices of most Windows machines are usually not suitable for the task, because their drivers are not optimized for fast signal processing. The result is an audible delay from the moment you play a note on your instrument until you hear the output from your speakers. This delay is measured in milliseconds and called latency.

We recommend using an audio device designed specifically for audio production applications such as the audio interfaces of the GUITAR RIG family (GUITAR RIG MOBILE I/O, SESSION I/O, RIG KONTROL). They keep latency at an unperceivable minimum level while providing you with professional sound and a stable performance.

If a professional audio device is out of reach for you at the moment, you could also use a third party ASIO audio device driver for your audio device. This freeware tool can make the audio processing capabilities of a conventional on-board audio device sufficient for real-time audio processing.

ASIO sound device drivers such as ASIO4ALL are available for free on the internet.

Apple computers are equipped with a relatively powerful audio system straight away, but there may still be sound quality issues with on-board audio.

2.3 GUITAR RIG 4 Usage Modes

There are two basic operation modes of GUITAR RIG 4:

- ► In Stand-alone mode GUITAR RIG 4 will work independently of any other software.
- ▶ In Plug-in mode GUITAR RIG 4 will run as plug-in of a host application.

2.3.1 Stand-Alone Mode

As a Stand-alone application, GUITAR RIG 4 turns your computer into a ready to use guitar rack all by itself – build presets, practice to backing tracks, record ideas or play gigs without needing anything else.

2.3.2 Plug-in Mode

In Plug-in mode, GUITAR RIG 4 is hosted by a DAW (digital audio workstation). It supports VST / RTAS / AU compatible DAWs such as GarageBand, Cubase, Logic, Pro Tools, Live, Sonar etc. It can work as an insert and as an FX plug-in.

During installation on a Windows computer, you need to specify the folder where your DAW looks for VST plug-ins. You can move the plug-in file called "Guitar Rig 4.dll" at anytime in case you changed your plug-in folder or made a mistake.

3. The First Session with GUITAR RIG 4

Make sure that GUITAR RIG 4 and your audio device are set up correctly before proceeding – see the Setup Guide to learn how!

During this session, we will use the Stand-alone mode of GUITAR RIG 4. However, the basic operation is quite similar in both modes so you will be able to follow the instructions whether you use it in Plug-in mode or Stand-alone mode.

3.1 Starting GUITAR RIG 4 for the First Time

Start the application by double-clicking the shortcut on your desktop. Alternatively you can double-click the program file in the installation folder.

Starting GUITAR RIG 4 for the First Time, you will have to select your audio device from the "Audio and MIDI Settings..." window. This applies to Stand-alone mode only, as the sound output in Plug-in mode is managed by the host application.

To select or change your audio device at a later stage:

- 1. Open the "File" menu (on Windows XP/Vista) or respectively the "Guitar Rig 4" menu (on Mac OS X).
- 2. Go to "Audio and MIDI Settings..."
- 3. Select your audio device and driver from the relevant drop-down menus.
- 4. Click Ok to confirm.

3.2 User Interface (Overview)

Learn about the areas and elements of the user interface in this section.

3.2.1 Global Header

The Global Header holds the most important controls. It is always visible in GUITAR RIG 4.



This element might not seem that interesting at first glance but understanding the Global Header is crucial for working with GUITAR RIG 4. In and Out are the input and output meters, featuring an integrated volume fader to control input and output amplification.

- ► The L/R buttons control the input routing. When using a guitar, deactivate the right channel (by clicking on R once) to route the mono signal to both stereo inputs.
- ► The button (de-)activates the Limiter to prevent the output level from reaching harmful volume peaks.
- ► The button controls a basic noise gate, killing the hiss while you are not playing. Turn it on and off by clicking on the button, and adjust the threshold with the knob. Double-click the knob to activate a learn function do not play for some seconds, and the threshold will be set automatically.

3.2.2 Main Area

Beneath the Global Header there is the Main Area. It offers two different basic viewing modes:

- Standard view
- ► Live view



The Standard view

In **Standard view**, GUITAR RIG 4 is a laboratory giving you all the options to build and organize your presets. Stack up and combine the countless effect units, prepare live gigs, record tracks or experiment with effect chains to shape unheard sounds.

Click the Live button, or hit F1 to switch between the Live View and the Standard View. The **Live view** hides all the sound creation tools, but puts the most important performance features into a clear layout – perfect for on-stage use.



The Live view

3.2.3 Toolbar and Rack

Go to Standard view by clicking the button again. In Standard view, the Rack is on the right hand side of the screen. Note the Toolbar on top of it:



This is your one-stop-shop to access the Virtual Rig Kontrol, the Rack Tools and some handy features. Press the buttons to see what each of them does!

The Rack itself holds all components processing your sound giving a clear overview of the signal flow. It is the heart of GUITAR RIG 4's functionality. Go to section 3.4 to learn how to fill it with your content of choice!

3.2.4 Virtual Rig Kontrol

On bottom of the Rack, there is the Virtual Rig Kontrol. Click the button in the toolbar or press F3 to show/hide it. The Virtual Rig Kontrol is the graphical representation of the RIG KONTROL foot controller. It conveniently shows which functions are assigned to the RIG KONTROL's buttons and foot pedal. Even if you are not using the physical RIG KONTROL, you can assign any external controller to the Virtual Rig Kontrol to benefit from its graphical representation, especially in Live view. Refer to the Application Reference for details.



The Virtual Rig Kontrol

3.2.5 SideKick

The SideKick is a multifunctional area that displays different content depending on which of the tab buttons (Browser, Components or Options) is activated. It is not necessary at all times and can be hidden by clicking the button next to the tab buttons or by pressing F2.



The SideKick in its three viewing modes.

- ► Click on Browser to open the Preset Browser in the SideKick. You can organize your presets and perform a text- or tag-based search to easily find your presets.
- ► Click on Components to open the Components Pool. It contains all available components along with their presets. You can simply drag components from here and drop them into the Rack. Refer to the Components Reference for detailed information on each of them.
- ► Click on Options to open the Options Menu. It serves to configure external controllers and their assignments, preferences such as the window height and other details. Refer to the Application Reference for more details.

3.3 Using the Rack Tools

Tapedeck Pre and Post



Both tapedecks basically work the same way, and very similar to the ones you may still know from physical racks. Yet, due to their fixed position as first (Pre) or last (Post) component in the Rack, they are performing different functions.

- ► Tapedeck Pre is for playing back and recording audio at the beginning of GUITAR RIG's signal chain (except when Play at output is activated). It will pick up the dry, unprocessed signal.
- ► Playback in Tapedeck Pre will send it through all modules currently in the RACK. This enables you to keep an unprocessed version of the signal in Tapedeck Pre.
- ► Tapedeck Post is for playing back and recording audio at the end of GUITAR RIG's signal chain. Recording your guitar will pick up the processed signal, just as you hear it at the output.
- ► Use Tapedeck Post if you want to record your guitar part with the actual sound, e.g. if you want to export a track to another program.
- ► When Sync is activated, Tapedeck Post starts and stops simultaneously with Tapedeck Pre.
- ► To save a recorded file, just click on the <a>■ button and select a name and location.

Tuner



The Tuner not only helps you to keep the standard tuning, but also offers some common tunings you can select from the dropdown menu on its left hand side.

- ► The buttons allow switching between two alternative display modes.
- ► The button is doing what it says and especially convenient when using the tuner live.

Metronome



The Metronome is for keeping yourself in time, and also serves as the clock for all synchronized rack modules, such as modulation and delay effects.

- You can dial in any tempo between 20 and 400 beats per minute. Click on the BPM display and drag up or down to change its value, or double-click it to enter a numerical value straight away.
- Another way to set the tempo is to click on the button repeatedly. The Metronome will determine your average speed and set the BPM control accordingly.
- ► You can choose different time signatures using the dropdown menu in the Signat. display.

The Sync setting defines if the Metronome obtains its tempo setting from any other source. The three available sync settings are:

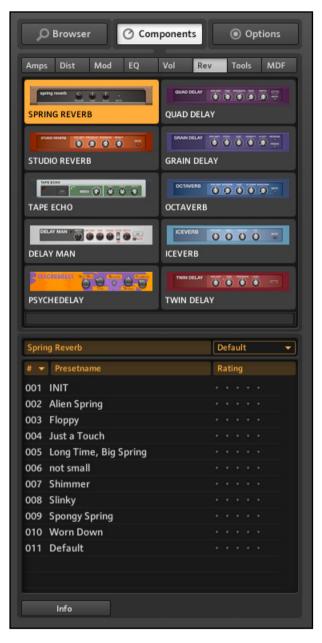
- Exit: The Metronome is synchronized to an external tempo via MIDI.
- ➤ Sound: The current tempo is saved and loaded with the Rack Preset.
- Free: The Metronome can run freely at the tempo you set.

3.4 Building a Rack from Scratch

Before starting, please refer to the Setup Guide to connect your instruments, hardware and software correctly.

On the first start, the Rack is empty. You will hear a dry, amplified guitar sound when you play: perfect time to try out the various components. On future starts, the software will always retain the Rack's last state. Click on in the Toolbar to empty the Rack.

The Components Pool



Open the Components Pool by clicking on Components in the SideKick's Tab Button bar. It contains all sound-shaping and modulating components and component presets ordered by 8 categories. Click on the respective header below the Tab Button bar to get to the content listed below.

- AMPS: Guitar and bass amps, cabinets
- ► Dist: Distortion, Overdrive and Fuzz pedals
- ► Mod: Time- and pitch-based modulation effects and synthesizers (Flanger, Octaver, etc.)
- ► EQ: Equalizers, filters and wah-wah pedals
- ► Vol: Volume-based effects (Compressor, Noise Gate, etc.)
- ► REV: Reverbs and Delays
- ► Tools: Loop Machine and tools for parallel signal processing
- ► MDF: Modifiers allowing for elaborate parameter modulation of other components

When you select any component by clicking on it, a list of all available component presets is shown below.

To view additional information on a particular component, click on the bottom of the SideKick.

3.4.1 Setting Up an Amp

A common start for designing sounds with GUITAR RIG 4 is adding an amp to the Rack. If you want to create a guitar sound, try the Lead 800:

- ▶ Double-click on the amp's icon in the Components Pool to quickly add it to the Rack.
- ► The amp and a Matched Cabinet will simultaneously be added to the RACK. If you play now, you will hear the famous Plexi sound (or rather a tastefully gain-spiced version of it).

All the knobs and switches you see are actually controlling the amp's sound. Clicking with the mouse flips the switches, clicking and dragging the mouse up and down (while holding the mouse button down) turns the knobs. If you want to check out some amp settings prepared by our sound designers, try component presets to configure the Lead 800.

- ► Click on the Component Preset box (of the amp. The component should be highlighted in orange both in the Rack and in the Components Pool now.
- ► Double-click one of the Component Presets listed below in the Components Pool to load it.

Basics of Rack-Building

Now you can tweak the amp yourself, add distortion modules, modulating effects or try out whatever you please. But before, there are a few more basic principles to know:

- ► The audio signal runs through the chain of rack modules from top to bottom, except if you are using special tools that create parallel processing paths (like the Split).
- ➤ You can add components to the Rack by dragging them from the Components Pool and dropping them into any position you want. You can also add the component pre-configured to a particular sound by dragging a component preset into the Rack
- ➤ Selected rack modules will be replaced if you double-click on another component in the Components Pool (or another component preset will be loaded, respectively). If no rack module is highlighted, double-clicking will add the component to the end of the rack.
- ➤ You can remove components from the rack by highlighting them and pressing DEL or by dragging and dropping them anywhere outside of the rack.
- ▶ All modules in the rack feature a small column on the right: The ▶ button allows for true bypassing of the module. The ▶ button minimizes the module's display. The ▶ toggles its expert panel, if available.

3.5 Controlling Parameters with the Rig Kontrol

If you are using GUITAR RIG KONTROL, controlling GUITAR RIG 4 with the included RIG KONTROL foot pedal is child's play. For details on controller assignments and how to use other controllers, please consult the Application Reference. Make sure that your RIG KONTROL is connected via USB 2.0 and activate the Virtual Rig Kontrol by clicking its button in the Toolbar.

- ► On the Virtual Rig Kontrol, each button is headed with an LED indicating its status (on/off). The LED bar left of the foot pedal shows the degree to which it is pressed down. The buttons, as well as the foot pedal, can also be operated with the mouse.
- ► The labels below the buttons and left of the foot pedal precisely show which function is currently assigned to them. You can drag and drop them to various controls to assign functions such as play or record to them.
- ► The buttons of the RIG KONTROL are best suited for controlling ON/OFF switches of rack modules and the likes, whereas the pedal is perfect for continuous parameters like the wah-wah slider or volume.

3.6 Working with Presets

The tag-based Preset Browser and a powerful search function make navigating and managing presets easy. Component Presets allow for a modular approach to preset building. At this point, it is important to understand the two different kinds of presets in GUITAR RIG 4:

Rack Presets

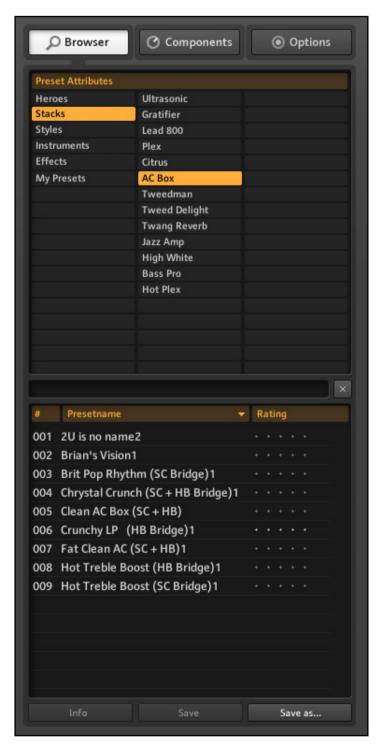
Rack Presets allow you to store and recall complete Rack setups and organize them in a convenient way. Each Rack Preset consists of a chain of components with their exact. GUITAR RIG 4 ships with a huge amount of Rack Presets of any style, and you can easily create your own ones.

Component Presets

A Component Preset contains all settings for one single component, e.g. the knob positions of an amp. After highlighting one of the items in the Components Pool, all its available presets are shown in a list below.

3.6.1 The Preset Browser

In the SideKick, click on the Browser button to open the Preset Browser.



The Preset Browser

- ► Three columns with Preset Attributes (also referred to as tags) define which presets are shown in the Preset List below.
- ► If no tag is highlighted (orange), all available presets are shown.
- ► A text-based search bar sits on top of the Preset List, providing a quick way to find a particular preset in the current list by name.
- ► You can sort the Preset List by List Number, Name and Rating.
- ► The Rating is very helpful for keeping order in your growing archive: Give each preset a quality rating by clicking on one of the 5 dots in the line of its name.
- ► The buttons on the bottom of the SideKick allow for saving presets, and for switching to the Info page of a preset.

Saving Rack Presets

- ▶ Pressing the Save button will make any changes to the currently loaded preset permanent.
- ▶ Pressing the Save As button will open the Save Page to create a new preset. It will automatically be tagged with the currently highlighted Preset Attributes.
- ➤ You can still change these, as well as entering additional information for the preset, before confirming by clicking on Save.

Using Tags on Three Levels

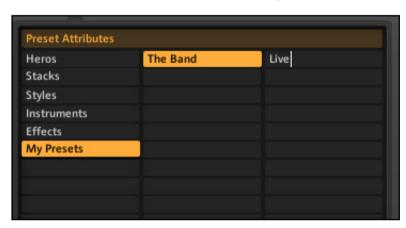
The tags in the Preset Attributes list are hierarchic, detailing a category or description from left to right. This is useful when searching for presets. Each tag of the first and second level can contain sub-tags that allow you to further narrow down what you are looking for. For example, the tag "Guitar Styles" (1st column) could contain a "Rock" tag (2nd column). The tag "Rock" could contain "80s Punk Heros" (3rd column) – among others.

You can create and relate tags to bring your presets into the structure that fits your needs best. As each preset can appear under multiple tags of different levels, you have a lot of organizational power at hand.

3.6.2 How to Create Tags

Let us create an exemplary three-level tag for presets you want to use on stage with your band. The levels could read something like this: "My Presets – The Band – Live":

- 1. Create a new tag. Right-click in the first column, select *Create a new tag* (or simply double-click on an empty field). Type in a text label ("My Presets") and press Enter.
- 2. Click on the newly created tag to select it it must be highlighted. Double-click into the middle column and create a new tag ("The Band"). This is your first sub-tag.
- 3. Creating a sub-tag on the third level works exactly the same way, just highlight "The Band" and create a new tag called "Live" in the right-most column.



Tagging Presets

Adding tags to presets works with drag and drop: Just click on one of the presets in the Preset list and drag it onto one of the tags in the left column of the Preset Browser.



The preset will now be listed both under the tag that was activated before you dragged it, and under the new tag. To delete a tag, just delete the preset from the according list – no worries, the preset itself is not deleted by this action!

3.6.3 Using Component Presets

GUITAR RIG 4 comes with plenty of factory presets for components. They are a time-saving alternative to adjusting sound manually for each component. After selecting an item of the Component Pool, a list of all available Component Presets is displayed in the lower part of the SideKick.



Double-clicking the Component Preset in the list has the same effect as double-clicking the basic component in the Component Browser:

- ► If no rack module is highlighted, the component will be added to the end of the rack with the stored settings.
- If a different component is highlighted, it will be replaced with the new, adjusted component.
- ▶ If the same component is highlighted in the rack, its settings will be updated with the component preset. This is useful if you quickly want to check out different settings of a component in the context of your current rack.

You can even drag and drop a Component Preset anywhere into the Rack!



Once you have found a "perfect setting" for components you use regularly, you can save your own Component Preset. Click on the triangular arrow right of the Component Preset Display (left on each rack module) and select *Save As*. This will create a new entry in the according list of Component Presets. Type in a name and press Enter.

4. What's Next?

Congratulations, you now know about the most important functions of GUITAR RIG 4. For further steps in exploring the software, we recommend both reference manuals, depending on your individual learning goal:

- ▶ The Application Reference deepens the aspects touched in this short introduction and should leave no question unanswered. It is the place to go if you want to learn how to control the software via MIDI (section 8.1), how to fully exploit the Preset Browser (section 3.1), but also how to realize overdub recordings using the Tapedecks (section 5.2.2), and much more!
- ➤ The Components Reference introduces all of GUITAR RIG 4's components, explaining all their parameters and the way they treat the sound. This is your next stop if you want to quickly build your own Racks, exactly understanding what each module can do for you.
- ➤ Regardless where you go from here, have fun and success using GUITAR RIG 4 make it your tool for perfect custom tone.