rekordbox™

rekordbox dvs Setup Guide
# Table of Contents

1  Before Start................................................................................................................................. 1  
1.1  Prior to use................................................................................................................................... 1 
1.2  Overview of rekordbox dvs ........................................................................................................ 1 
1.3  Required equipment .................................................................................................................... 2 
1.4  System requirements ................................................................................................................... 3 
2  Preparing application...................................................................................................................... 4 
3  Audio Setup .................................................................................................................................... 11 
3.1  Connecting to a DJ mixer or controller ....................................................................................... 11 
3.2  Connecting to a stand-alone audio interface ............................................................................. 13 
4  rekordbox dvs setup ...................................................................................................................... 14 
4.1  Enable/disable DVS function ...................................................................................................... 15 
4.2  Routing Setting ............................................................................................................................ 18 
4.3  Calibrating the control signal .................................................................................................... 20 
4.4  Waveform display ....................................................................................................................... 23 
4.5  Control Vinyl ............................................................................................................................... 23
1 Before Start

1.1 Prior to use

This Setup guide explains rekordbox dvs. For instructions on rekordbox in general, see the Operating Instructions of rekordbox.


rekordbox dvs can be activated in rekordbox 4.1.0 and later. Please update rekordbox to the latest version if its version is earlier than 4.1.0.

1.2 Overview of rekordbox dvs

rekordbox dvs is a Plus Pack to add DVS* function to rekordbox dj (rekordbox Performance mode). Activate rekordbox dvs to control rekordbox virtual decks using dedicated control vinyl, turntables and DJ units supporting rekordbox dvs.

*DVS…Digital Vinyl System

You can control rekordbox virtual decks using turntables. Playback direction, tempo, scratching and playback position are reflected to the track loaded on the deck.
**1.3 Required equipment**

The following equipment is necessary for DVS.

- **Computer**
  
  See 1.4 System Requirements for system requirements.

- **Turntables (or CDJ/XDJ)**
  
  Recommended turntable:
  
  PLX-1000

- **Control Vinyl (Control signal WAV file for CDJ/XDJ)**
  
  Pioneer DJ Control Vinyl dedicated for rekordbox dvs:
  
  RB-VS1-K

**Please note:** We do not support any control vinyl, CD nor control signal WAV data of other manufacturers. If you use them, they won’t work properly, for example, the marker on the vinyl and the cue point and the playhead positions may not match.


Click [rekordbox dvs], open [What is necessary to use DVS with rekordbox?], download rekordbox Control Signal WAV file and burn it on CD-R, save it in a USB storage device, etc.

- **DJ units supporting rekordbox dvs** (as of June 2018)
  
  - DJ mixer
    DJM-TOUR1, DJM-900NXS2, DJM-900NXS, DJM-900SRT, DJM-850, DJM-750MK2, DJM-750, DJM-450, DJM-250MK2, DJM-T1, DJM-S9
  - Controller
    DDJ-1000, DDJ-RZX, DDJ-RZ, DDJ-RX, DDJ-RR, DDJ-SZ, DDJ-SX2
  - Stand-alone audio interface
    INTERFACE 2

For the latest information, please see: rekordbox.com/en/support/link.php


1.4 System requirements

Regarding the supported OS and required system (minimum operating environment), please refer to rekordbox.com [Support] > [System requirements].
2 Preparing application

Select either of the following procedures to use rekordbox dvs.

1. Activate rekordbox dvs using a bundled license key
   If you have a rekordbox dvs license key bundled with your DJ units, please use it.
   See (rekordbox.com/en/support/bundle.php) to find the latest information on DJ units with bundled license keys.

   STEP 1. Install rekordbox
   • Install the latest version of rekordbox on your computer.
   • Launch rekordbox.
   • Set up your account in rekordbox.
   Please refer to the Operating Instructions of rekordbox for details of account setup.

   STEP 2. Activate rekordbox dj
   • Open [Preferences] > [License] > [rekordbox dj] and click the [Activate] button.

   ![rekordbox interface showing the License tab with options to activate rekordbox dj]
• Enter the bundled rekordbox dj license key.

→ You can use rekordbox dj (rekordbox [PERFORMANCE] mode).

**STEP 3. Activate rekordbox dvs**

• Launch rekordbox and select [PERFORMANCE] mode.

• Open [Preferences] > [License] > [rekordbox dvs] and click the [Activate] button.
Enter the bundled rekordbox dvs license key.

→ You can use the DVS feature in rekordbox PERFORMANCE mode.

2. Buy rekordbox dj and rekordbox dvs license keys and activate them.
Buy a rekordbox dj license key and a rekordbox dvs license key and activate them to use the DVS feature.

STEP 1. Install rekordbox
- Install the latest version of rekordbox on your computer.
- Launch rekordbox.
- Set up your account in rekordbox.
  Please refer to the Operating Instructions of rekordbox for details of account setup.

STEP 2. Buy rekordbox dj
Buy rekordbox dj at Store page < rekordbox.com. (rekordbox.com/en/store/)
→ After the process is completed, your rekordbox dj license key will be sent via e-mail.

STEP 3. Activate rekordbox dj
- Open [Preferences] > [License] > [rekordbox dj] and click the [Activate] button.
  • Enter the rekordbox dj license key sent via e-mail.
→ You can use rekordbox dj (rekordbox [PERFORMANCE] mode).

**STEP 4. Buy rekordbox dvs**
Buy rekordbox dvs at Store page < rekordbox.com. (rekordbox.com/en/store/)
→ After the process is completed, your rekordbox dvs license key will be sent via e-mail.

**STEP 5. Activate rekordbox dvs**
* Launch rekordbox and select [PERFORMANCE] mode.
* Open [Preferences] > [License] > [rekordbox dvs] and click the [Activate] button.
Enter the rekordbox dvs license key sent via e-mail.

→ You can use the DVS feature in rekordbox PERFORMANCE mode.
3. **Subscribe rekordbox dj (monthly subscription)**

When you subscribe to rekordbox dj, you can activate all Plus Pack applications including rekordbox dvs. Follow the steps below to activate them. If you already subscribe it, update rekordbox to ver. 4.1.0 or higher to use the DVS feature of rekordbox PERFORMANCE mode.

**STEP 1. Install rekordbox**
- Install the latest version of rekordbox on your computer.
- Launch rekordbox.
- Set up your account in rekordbox.

Please refer to the Operating Instructions of rekordbox for details of account setup.

**STEP 2. Start subscription**
- Start subscription at Store page < rekordbox.com.(rekordbox.com/en/store/)

→ Your subscription license key will be sent via e-mail.

**STEP 3. Activate rekordbox dj and all other Plus Pack applications**
- Open [Preferences] > [License] > [rekordbox dj] and click the [Activate button].
• Enter the subscription license key sent via e-mail.

→ You can use rekordbox dj (rekordbox PERFORMANCE mode) and the DVS feature.

4. 30-day free TRIAL
Install rekordbox and start TRIAL. You can use all features of rekordbox dj and rekordbox dvs for 30 days. (TRIAL will be expired once the 30 days have passed.)

STEP 1. Install rekordbox
• Install the latest version of rekordbox on your computer.

STEP 2. Start TRIAL
• Launch rekordbox and tick the [TRIAL] button.

→ The TRIAL starts and you can use rekordbox dj (rekordbox [PERFORMANCE] mode) and the DVS feature.
3 Audio Setup

3.1 Connecting to a DJ mixer or controller

- Connect your computer to a DJ mixer (controller) using a USB cable.
- Connect turntables (or CDJs/XDJs) to the DJ mixer (controller) using RCA audio cables.
  
  For turntable users:
  
  The turntable must be connected to a channel with [PHONO] or [PHONO/LINE].

  For CDJ/XDJ USERS:
  
  The CDJ/XDJ must be connected to a channel with [CD/LINE], [LINE] or [PHONO/LINE].

- Input selector of the mixer (controller) channel connected to the turntables (or CDJs/XDJs) must be set as follows:
  
  **DJM-TOUR1, DJM-900NXS2:**
  
  [USB-A] or [USB-B]

  **DJM-900NXS, DJM-900SRT, DJM-850, DJM-750, DJM-T1, DDJ-RZX, DDJ-RZ and DDJ-SZ:**
  
  [USB] (or [USB 1/2], etc.)

  **DJM-750MK2, DJM-450, DJM-250MK2 and DJM-S9:**
  
  [ ]

  **DDJ-RX and DDJ-SX2:**
  
  [PC]
• Use Pioneer DJ Control Vinyl (RB-VS1-K) for DVS control.

For CDJ/XDJ users, download rekordbox Control Signal.wav* file and burn it on CD-R or save it in USB memory, etc. and insert the media device to the CDJ/XDJ (*see details to 1.3 Required equipment).
3.2 Connecting to a stand-alone audio interface

- Connect your computer to a stand-alone audio interface using a USB cable.
- Connect turntables (or CDJs/XDJs) to the stand-alone audio interface using RCA audio cables.
  
  For turntable users:
  Select [PHONO] for the input selector switch of the audio interface.
  Connect the turntables to the input terminals of the audio interface.
  
  For CDJ/XDJ users:
  Select [LINE] for the input selector switch of the audio interface.
  Connect the CDJs/XDJs to input terminals of the audio interface.
  
- Connect output terminals of the audio interface to CD/LINE terminals of a DJ mixer using RCA audio cables.
- Use Pioneer DJ Control Vinyl (RB-VS1-K) for DVS control.

For CDJ/XDJ users, download rekordbox Control Signal.wav file* and burn it on CD-R or save it in USB memory, etc. and insert the media device to the CDJ/XDJ (*see details to 1.3 Required equipment).
4 rekordbox dvs setup

Open [Preferences] > [DVS] in rekordbox PERFORMANCE mode.

1. Enable DVS Function
2. Routing setting
3. Control signal setting
4. Waveform display
5. Control Vinyl

- When the tempo is changed: "The beat position intervals of the enlarged waveform are changed.
- When the needle is placed on the lead-in part of the vinyl, the playback position jumps to the beginning of the track.
4.1 Enable/disable DVS function

Tick the checkbox for [Enable DVS Function], and select DVS mode for DECK.

DVS modes: ABSOLUTE, RELATIVE and INTERNAL
(Stand-alone audio interface: ABSOLUTE, RELATIVE, INTERNAL and THROUGH)

Select one of the DVS modes by clicking the DECK number.

Click REL and select the mode from the drop-down menu.

...ABSOLUTE mode

- Location of the needle on the vinyl is linked with the playback position of rekordbox DECK.
- Direction, tempo, scratch and other performances on the vinyl are linked to the DECK.
- Digital features such as Hot Cue and Needle Search do not work in this mode.

Note: See Restricted features in the ABSOLUTE and RELATIVE mode in page 17 for details.
...RELATIVE mode
• Location of the needle on the vinyl is not linked with the playback position of rekordbox deck.
• Direction, tempo, scratch and other performances on the vinyl are linked to the deck.

Note: See Restricted features in the ABSOLUTE and RELATIVE mode in page 17 for details.

...INTERNAL mode
• Location of the needle, direction, tempo, scratch and other performances on the vinyl are not linked to the deck.
• You can use all features on the deck.

...THROUGH mode (This appears only when using a stand-alone audio interface)
• Audio from a turntable is sent through an audio interface to an output terminal as is.
• The deck will pause.

…is displayed except for the INTERNAL mode.
Click this icon to switch to the INTERNAL mode.
Use this feature in the ABSOLUTE mode when you temporarily switch to the INTERNAL mode, e.g. when the needle is approaching to the end of the control vinyl.
Restricted features in the ABSOLUTE and RELATIVE mode

<table>
<thead>
<tr>
<th>Features on the deck</th>
<th>ABSOLUTE mode</th>
<th>RELATIVE mode</th>
</tr>
</thead>
<tbody>
<tr>
<td>PLAY/PAUSE</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>CUE</td>
<td>N/A</td>
<td>N/A</td>
</tr>
<tr>
<td>AUTO BEAT LOOP</td>
<td>N/A</td>
<td>✓</td>
</tr>
<tr>
<td>LOOP IN / OUT</td>
<td>N/A</td>
<td>✓</td>
</tr>
<tr>
<td>QUANTIZE</td>
<td>N/A</td>
<td>✓</td>
</tr>
<tr>
<td>SLIP</td>
<td>N/A</td>
<td>✓</td>
</tr>
<tr>
<td>TEMPO SLIDER</td>
<td>N/A *1</td>
<td>N/A *1</td>
</tr>
<tr>
<td>TEMPO RANGE</td>
<td>N/A *1</td>
<td>N/A *1</td>
</tr>
<tr>
<td>BPM SYNC</td>
<td>N/A</td>
<td>✓ *2</td>
</tr>
<tr>
<td>NEEDLE SEARCH</td>
<td>N/A</td>
<td>✓</td>
</tr>
<tr>
<td>PAD / GRID Panel</td>
<td>N/A</td>
<td>✓</td>
</tr>
</tbody>
</table>

*1...Tempo Control is available by using Tempo Slider or Tempo Range on the turntable (or CDJ/XDJ).

*2...BPM Sync on the deck in the Relative mode works as follows:
  • Click [BPM SYNC] you wish to synchronize.
    → The deck is synchronized to the master deck (not grid).
  • When you change the master deck tempo using the tempo slider,
    → The BPM of the deck with [BPM SYNC] turned on is the BPM of the master deck.
    If you change the tempo of a deck (other than the master deck), only the BPM of the deck is changed.
  • To cancel Sync, click [BPM SYNC] again (toggle feature).
    → The BPM remains the same even though you clicked [BPM SYNC].

To return the BPM to the speed you changed using the tempo slider on the turntable (CDJ/XDJ), click [RESET]* (*shown as [R] in the 2 deck/4 deck horizontal mode).
To display [RESET], hover your mouse over a virtual deck.
4.2 Routing Setting

This audio routing setting procedure is available on DJ units supporting rekordbox dvs (*1) excluding the following DJ units (*2).

(*1)...DJ units supporting rekordbox dvs (rekordbox.com/en/support/link.php)
(*2)...DDJ-RX / DDJ-RR / DDJ-SX2 (as of October, 2017)

To use the DVS function, open [Preferences] > [Audio] and complete the following settings.

1. [Input Channel]
3. [Output Channel]

The audio routing setting makes these settings simple and easy.

Once you completed the procedure, all the settings (1, 2 and 3) will also be completed.

Please note that this audio routing setting is only for the configuration using 2 turntables (or 2 CDJs/XDJs) for the DVS control. For other configuration, complete each setting at [Audio] in the [Preferences] one by one.

• Control hardware

  ![Control hardware options](image)

Click one of the three options above to select the DJ player.

• To use 2 turntables, click [Turntables].
  → The input to your computer is set to [Control tone PHONO].

• To use 2 CDJs/XDJs, click [CDJs].
  → The input to your computer is set to [Control tone CD/LINE].

• For configuration except for the above 2 cases, click [Custom].

  When you select [Custom], complete each setting at [Audio] in the [Preferences] one by one.
• Audio Routing

This illustrates an audio routing setting of input and output channels in rekordbox. You can change the setting by yourself.

Click ● and reconnect between deck and the channel number of connected DJ equipment supporting rekordbox dvs to make it the same as the real configuration.

→ The connection will be reflected to [Input Channel] and [Output Channel] in [Audio] in the [Preferences].
4.3 Calibrating the control signal

This section describes how to calibrate the control signal from the turntable to rekordbox. The control signal is described as dual rings. (The number shown in the upper left describes intensity of the signal.)

**Important**: Be sure to calibrate each deck. If not, scratching and other plays on the turntables may not work correctly.

Select [AUTO] or [MANUAL] for calibration. First, select the [AUTO] mode to calibrate the signal automatically. Then start the turntable and scratch it. If playback on the deck is not stable when scratching, switch the mode to [MANUAL] and calibrate the signal by hand.
STEP 1. Adjusting the control signal.
Start the turntable and click [Start] for L/R, P/A Balance.
When the calibration is completed, [Complete] will be displayed in the upper part of the [Start] button.
If the rings of the control signal are close to circular, the signal is adjusted.

STEP 2. Adjusting the threshold for the reading of the control signal based on measurement of noise due to vibration from the turntable.
Stop the turntable. Switch the deck mode to [INT] and play the deck. With sound coming from the speaker, click [Start] at Noise Level.
When the calibration is completed, [Complete] will be displayed in the upper part of the [Start] button.
STEP 1. Adjusting the control signal (L/R Balance, P/A Balance).

Start the turntable. Move sliders for L/R, P/A Balance to make the rings of the control signal as close to circular as possible.

STEP 2. Adjusting the threshold for the reading of the control signal.

Adjust the threshold by moving Noise Level slider. As you move the slider to the right, the application ignores more noise occurred due to the vibration from the turntable. As you move the slider to the left, you can hear scratching more precisely as more signals can be received.

You can change size of the control signal display by Size slider.

Note: You can enlarge the size of the rings.
4.4 Waveform display

| When the tempo is changed | ✔ The beat position intervals of the enlarged waveform are changed. |

When ticked, the beat position intervals of the enlarged waveform are changed when you change the tempo of the track. (The scrolling speed does not change.)

When unticked, the scrolling speed of the enlarged waveform is changed when you change the tempo of the track. (The beat position intervals do not change.)

This is available only when [Enable DVS function] is ticked.
(When [Enable DVS function] is unticked, the beat position intervals of the enlarged waveform are changed.)

4.5 Control Vinyl

| Needle operation | ✔ When the needle is placed on the lead-in part of the vinyl, the playback position jumps to the beginning of the track. |

This is available only in RELATIVE mode.

When ticked, the playback position jumps to the beginning of the track when the needle is placed on the lead-in part of the control vinyl.
(When using the control signal WAV file, place the playback position of the player to the beginning of the WAV file to use this feature.)
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