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## BMS 24 bit Radio - Take the highway to professional radio



Well if you plan to fulfill your listeners request  
Travel the BMS way, take the highway that's the best  
You will earn more on BMS Route 24

BMS 24 bit radio It's the easy way  
Get that professional radio station today  
You will get a high level quality of your sound  
Give the music life and start to rock around  
Get your roar on BMS Route 24

Well instead of a 16 bit radio solution  
You'll get a 256 times better resolution  
The BMS 24 bit radio is the best,  
You'll even hear it while the sound is compressed  
It's hardcore on BMS Route 24

Won't? you get hip to this kind of tip  
And go take that BMS trip  
Explore the BMS Route 24

*A tribute to: Bobby Troup, Lyrics "Route 66"*

## BMS 24 bit Radio - You sound better

### Bits, the wave of the future?

Digital audio is saved as bits, where each bit is a digit one (1) or a digit zero (0). The most common amount of bits is 16, because that's the amount of bits used on CD's.

### 16 bit radio gives you 65536 levels

16 bit radio gives you 65536 different levels is a reasonably good quality of the sound but only if all of the 16 bits are used.

### 24 bit radio gives you 16,7 million levels

24-bit radio gives you 256 times higher resolution than 16 bit. That's 16,7 Millions different levels. With 24 bits you're able to reduce the level of a 16 bit recorded sound to 1/256 and then increase it again without losing any audio quality at all.

### 13 bits is not for professionals

Of course no professional sound technician would record a music CD with only a 13 bit resolution. But in fact during the editing process at a radio station, the levels of a sound could be reduced below 13 bits. Then later in the process when the audio is increased to 16 bits, the harm has already been done.

### 24 bits, the best a professional can get

Of course, every professional sound technician would like to give the listeners the best sound experience possible. Now you can give your listeners the feeling of joining the musicians on the stage or in the studio if you're using a 24-bit audio instead of a 16 bit.

### You will earn more on BMS Route 24

With BMS 24 bit radio you are able to put your station on the map, to become your listeners favourite only because you sound better.

Earn your listeners faithfulness



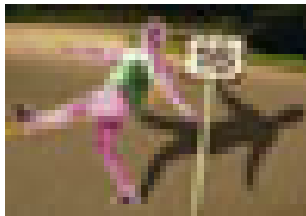
## The graphics describes differences

The loss of quality between 24 and 16 bits is rather hard to describe only by using words instead of listening the audio itself. In this document, audio is unfortunately not possible to use. That is why we are using pictures and illustrations.

The two photographs below has gone through the same process as audio files has to go through during the production of a show.

Lets look at the differences!

### A 16 bit resolution photograph - the loss of quality is dramatic



The first picture has gone through the same process as a sound reduced below 16 bits and then back again. The quality is gone and it's almost impossible to see what it shows.

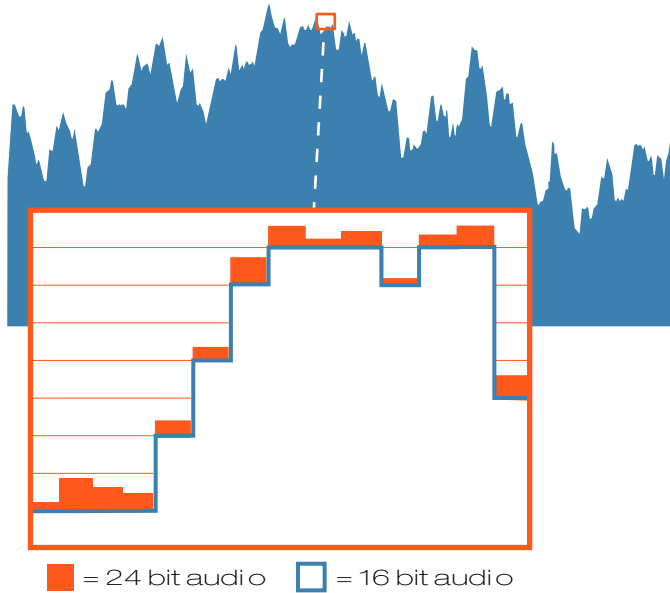
### A 24 bit resolution photograph - keep the quality through the whole process



The picture to the right is a 24 bit picture that also gone through the same process of reduction and induction. The difference is not hard to notice. The 24 bit picture has not lost anything in quality.

## Keep the shape of the wave

The illustration shows the loss of levels and quality between 16 and 24 bit audio. It's easy to see how much the 16 bit audio loses in relation to the 24 bit audio.



The 24 bit audio keeps its original form and it's not losing any levels at all while the 16 bit audio flattens and loses in quality and shape. The improvement between the two systems is enormous.



## BMS 24 bit Level supervisor

Different levels, no problem!



In radio the two most important things are Level and Time. The Timing problem was solved by BMS a long time ago and now we have a unique solution to the Level problem as well.

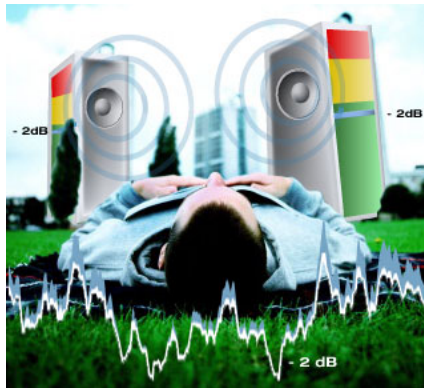
24 bit radio perhaps sounds as an overkill but the truth is that nothing sounds better in your listener's ears than what it did from the start. Every single step your signal goes thru deteriorates the signal and the better from the start the better it sounds when it reaches your listener's ear. Taking competition from TV, video, CD and other media in consideration it is necessary to compete with them and the other radio stations in your market as well.

BMS 24 bit Level Supervisor



This module provides the level control to your settings with respect to the "BMS Levelyzer" data and the minimum, maximum and normal level plus the inertia of the control. This means that 16 bit audio is scaled upwards to 24 bit audio without deteriorating the quality and adding the level control.

## BMS 24 bit Levelyzer - Analyser and Normalizer



First it goes up and then down...

The waveforms are changing rapidly and they are different in every audio file. When you are broadcasting, the first song got a really high level, the second got a low and then the levels in the third song is something in between. Now you have to start normalize all these audiofiles and many others that you are about to use in your broadcast. It's really a problem that will waste a lot of time on your daily schedule.

### Relax while BMS Levelyzer is taking care of business

With our latest completely automatic tool, the BMS Levelyzer we are able to solve your problem in a few minutes. You are saving a lot of work and you are able to relax while BMS Levelyzer is taking care of business.

### A non destructive tool for analysis and normalizing of levels

BMS Levelyzer is really taking care of your business and it helps you through the whole process of analysing the audiofiles, and then normalize them. BMS Levelyzer is doing this work automatic and it is doing it without the destruction of the audio files.

#### Software features:

- Non destructive audio analysis
- Non destructive process
- Multiple level-analysis
- Measured levels produce one level value
- Complete automated process
- Value of level saved as BWF-files and/or database.

