

THE EVOLUTION OF MUSIC BOXES

THE NEED:

A way to enjoy live music anytime, anywhere — without a live musician!

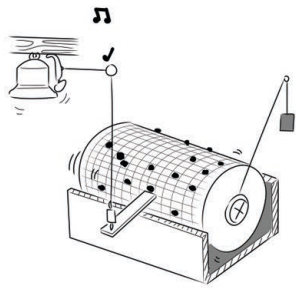
THE INVENTION:

100+ years of music box innovation.

Music boxes got their start in an unlikely place — the wonderful world of watchmaking!



It all began in 14th-century Europe, when clock towers equipped with automated carillon bells helped townspeople keep time. Inside each tower was a barrel covered in a specific pattern of protruding pegs. As the barrel rotated, the pegs set off a chain reaction that triggered a series of hammers, each of which sounded a bell that played a certain musical note. This led watchmakers to wonder — could the same technology be miniaturized to build personal music machines?



It took a few centuries, but in 1796, a watchmaker named Antoine Favre patented the world's first **cylinder music box**, swapping out the large pegged barrel for a spring-powered cylinder covered in tiny pins. As the cylinder rotated, the pins plucked the teeth of a metal comb, producing a mighty melody.

Favre's mechanism was small enough to be set inside a pocket watch!

But Favre's music box and its early successors had one major flaw — they could only play a single song. And as much as people loved having live music at their fingertips, they could only stand to listen to "Für Elise" so many times. Manufacturers soon introduced **shifting cylinders** with multiple sets of pins. When one song finished, the cylinder would shift sideways, lining up the next set of pins with the metal comb to play another song — for up to 12 songs.

In 1860, inventor Charles Paillard upped the ante further with his **interchangeable cylinder music box**,

which allowed cylinders to be swapped out, so users could enjoy a theoretically unlimited selection of tunes. But since cylinder pins were pretty fragile, switching songs was a high-risk hassle — and a good way to break your \$200 music box. *(That's about \$6000 today!)*



Cylinder music box photo by Cory Doctorow / flickr.com (CC BY-SA 2.0)

In the 1880s, inventor Paul Lochmann decided to think outside the *(cylinder music)* box. He patented the first **disc music box**, which used rotating punched-metal discs that were easier to swap out and store than cylinders. Plus, the



Disc music box photo from pixabay.com

discs could measure up to a whopping' 27 inches (68 cm) wide, for longer playback time. As companies around the world started mass-producing these boxes, cylinder music boxes fell out of favor.

Most music boxes today have gone back to the cylinder design. But they're much cheaper to build, so instead of swapping out cylinders for new songs, you can just buy more boxes!

Alas, the disc music box's reign was short-lived. The start of World War I meant a drop in disposable income, and many quality music boxes were disassembled for scrap metal. On top of that, most music-lovers switched their attention to the new *(and cheaper)* phonographs.

But the music box still played a key part in music history, and it's enjoyed today as a novelty item. Some would even argue that it's experiencing a comeback, as people realize that there are many ways to enjoy recorded music, but only one way to enjoy live music in a box.

