

Re: MRI Machines

Source: <http://sci.tech-archive.net/Archive/sci.electronics.design/2008-06/msg04314.html>

- *From:* Jim Thompson <To-Email-Use-The-Envelope-Icon@xxxxxxxxxxxxxxxx>
 - *Date:* Tue, 24 Jun 2008 11:48:38 -0700
-

On Tue, 24 Jun 2008 11:34:07 -0700, John Larkin
<jjlarkin@xx> wrote:

On Tue, 24 Jun 2008 13:28:46 -0400, RFI-EMI-GUY
<Rhyolite@xxxxxxxxxxxxx> wrote:

Well I spent a half hour of my life under the magnet of an "open" MRI machine yesterday. Still a bit claustrophobic. While I sort of understand the theory of the MRI, what I don't understand is what creates all the noise and racket. Any experts out there that can tell me whats going on?

Pulsed gradient coils. These are "small" 3-axis coils that sweep a gradient field across your innards, modulating the nuclear resonant frequencies of your molecules to produce the spatial resolution. These are generally water-cooled, with ballpark 20 KW constant-current drivers per axis, playing all sorts of weird waveforms.

They scanned my head last year, with the gradient coils around my head like some horror mask: noisy and boring.

John

A few years ago they scanned my sinuses.

I must admit a claustrophobic feeling also :-(

...Jim Thompson

—
| James E. Thompson, P.E. | mens |
| Analog Innovations, Inc. | et |
| Analog/Mixed-Signal ASIC's and Discrete Systems | manus |
| Phoenix, Arizona 85048 Skype: Contacts Only | |
| Voice:(480)460-2350 Fax: Available upon request | Brass Rat |
| E-mail Icon at <http://www.analog-innovations.com> | 1962 |

Re: MRI Machines

||

| America: Land of the Free, Because of the Brave |

||

| Due to excessive spam, googlegroups, UAR & AIOE are blocked! |

.