

# *How EMFs* AFFECT YOUR PATIENTS

**Quick Guide For  
Health Professionals & Coaches**

*by*  
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Do you have clients who ask you about EMFs and you're not sure what to tell them?

I've been in your shoes... as an investigative health journalist it took me almost 3 years before I even started grasping this complicated topic, where credible and scientific information is often drowned in conspiracy-theory-looking nonsense.

My goal with this easy cheat sheet is to help you skip thousands of research hours and learn the foundational information every health practitioner in the world needs to know about how this new "electrosmog" affects his or her patients/clients.

Enjoy the read,

— Nick "The EMF Guy" Pineault

## Is Non-Ionizing Radiation Really Causing Biological Harm?

5 scientific facts most practitioners don't know:

**1.** Microwave radiation emitted from cell phones, Bluetooth, wifi and cell towers was declared a Class 2B "possible" carcinogen in 2011 — but several researchers think it should be re-classified as a Class 2A "probable" or Class 1 "definite" carcinogen.<sup>1</sup>

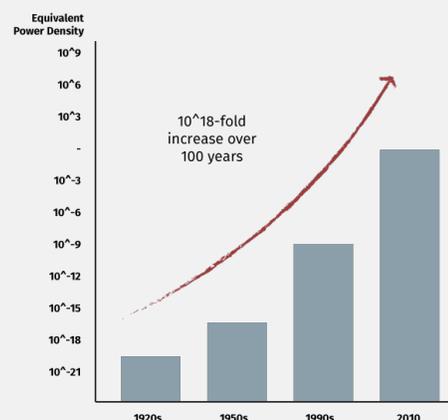
**2.** Many countries like the US and Canada set standards based on the false assumption that there are no adverse health effects of EMFs other than those that are caused by tissue heating, even though more than 20,000 peer-reviewed papers show biological effects that have nothing to do with heat.<sup>2</sup>

**3.** Growing children's brains are especially at risk, and their head absorbs twice the radiation compared to adults.<sup>3</sup> Regardless of that fact, a 2015 survey showed that 75%

### Did You Know?

The average levels of "ambient electrosmog" in the microwave radiation range (cell phones, wifi, Bluetooth) has increased by 1,000,000,000,000,000-fold (a quintillion) in the last 100 years.<sup>4</sup>

Typical Daily Human EMF Exposures Over Time



of 4-year old children own their own cell phone.<sup>5</sup>

4. According to the most conservative estimates of independent EMF researchers, at least 35% of the population suffers from “mild to moderate” symptoms of electro sensitivity, including fatigue, sleep disturbance, headaches, difficulty concentrating, depression, memory loss, hearing disruptions, skin problems and cardiovascular issues.<sup>6</sup>

5. The new generation 5G (5th generation) wireless networks will require adding millions of antennas in the US alone, and are being rolled out without a single biological study demonstrating their safety.

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### Doctors Agree: EMF-related Symptoms Are Extremely Easy To Miss

EMF-related symptoms are extremely easy to miss, mainly because they tend to vary in a non-linear way that’s counterintuitive.

**As Dr. Magda Havas from Trent University in Ontario explains, some individuals are known to react to specific sources of EMFs, such as cell phones, or utility “smart” meters.<sup>7</sup>**

Other individuals cannot tolerate high levels of magnetic fields one would be exposed to when living near high voltage power lines.

Some react to acute exposures (standing next to a wifi router), while some react over time – and might become symptomatic after spending a few hours to a few weeks in a high-EMF city environment.

The symptoms also tend to vary depending on individual genetics, morphology, current state of health, mitochondrial status, heavy metal load and a lot of other factors.

Top 10 Most Common Symptoms of “EMF Sensitivity” <sup>8</sup>	
1. Fatigue/ weakness	6. Memory loss
2. Sleep disturbance/ insomnia	7. Visual disruptions/ light sensitivity
3. Headaches/ migraines	8. Skin problems
4. Brain fog/ difficulty concentrating	9. Heart palpitations
5. Depression or anxiety	10. Dizziness

## If 35% Of People Are Electro Sensitive, How Does It Affect The Other 65%?

The latest scientific research shows that 65% of your patients who might not necessarily “feel” the effects of EMF exposure are still being affected on a cellular and mitochondrial level.

Research by Swedish researcher Prof. Olle Johansson<sup>9</sup> has even shown that several healthy “non-EMF sensitive” students who had their back near a computer screen or TV set (both sources of electrical and magnetic field EMFs) saw an abnormal number of histamine-containing mast cells migrate to their dermis – as if their body had an allergic reaction.

## How EMFs Affects Everyone on a Cellular Level

The work of Dr. Martin Pall has shown clearly that extremely low levels of EMFs (thousands of times lower than what a cell phone emits) can activate the cells’ voltage gated calcium channels, leading to 14 distinct downstream **biological effects such as oxidative stress, DNA breaks, melatonin depletion, infertility and cancer.**<sup>11</sup>

EMF Activation of VGCCs Increases Free Radical Production

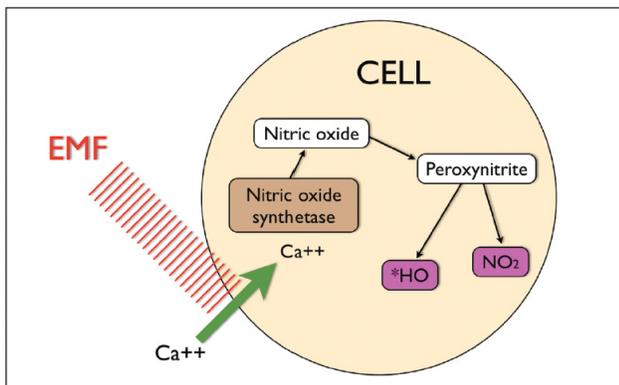


Image Credit: Dr. Paul Dart and Dr. Martin Pall

Papers by Pall (see on the left), Dr. Paul H eroux<sup>10</sup> and many other researchers have each demonstrated that the man-made “electrosmog” we’re surrounded by acts as an added layer of biological stress in each one of us.

For that very reason – just like people who don’t feel sick from when exposed to chemicals should reduce their exposure nonetheless – reducing EMF exposure needs to be included in the top preventative measures you give out in your functional medicine protocols or recommendations.

## Key EMF Exposure Questions You Need To Ask Every Patient

Questions	Interpretation
<p><b>Do you own a cell phone? How do you use it (on the ear, speaker phone, texting), and for how many hours on an average day?</b></p>	<p><i>When used near the head:</i> suspect effects to brain, ears, eyes, and thyroid gland. Heavy and long-term use (30+ min daily) linked with increased risks of multiple types of tumors of the head.</p> <p><i>When used near the gut or lap:</i> suspect effects on the gut, heart or chest-level organs if the device is used for several hours every day. Important probable link with leaky gut and autoimmunity.</p>
<p><b>Where is your wifi router located at home, and at work?</b></p>	<p>Suspect an increase in symptoms if patient/client spends a lot of waking or sleeping hours within 10 feet of the router.</p>
<p><b>How many different wifi networks can you detect around your home?</b></p>	<p>Gives you a vague estimation of patient/client overall exposure to background levels of EMFs. The only way to precisely assess real exposure is through the use of an EMF meter, though proximity cell phone towers or other outside sources of EMFs can still lead to tremendous exposure even in rural areas.</p> <p>If no other network is detectable besides the one provided by patient/client's wifi router, it usually means they live in a rural or area with very low population density, which might correlate with lower background levels of EMFs.</p> <p>15+ detectable wifi networks signifies fairly elevated levels of electrosmog, likely in a city environment. These levels might be sickening to some electro sensitive individuals, in which case advanced EMF mitigation strategies or a move might be granted.</p>

Questions	Interpretation
<p><b>Did your utility company install a new “smart” meter (e.g. electricity, water, gas) at home?</b></p> <p>Note: “Smart” meters are equipped with a digital display, while older “analog” meters usually have 5 mechanical spinning quadrants.</p>	<p>Can be a source of EMFs comparable to a wifi router, or a nearly irrelevant source. Some models emit pulses of microwave radiation up to multiple times a second, while other models emit only once a day.</p> <p>Unfortunately, a list of models and how much they emit isn’t available at the moment. Can also be a major source of dirty electricity, which some building biologists think is the primary reason 98% of people (in a survey 2012 survey) reported feeling more symptomatic since their old analog meter was replaced by a smart meter.<sup>12</sup></p>
<p><b>Do you own a hybrid or electric car?</b></p>	<p>Potential source of electrical fields, magnetic fields and dirty electricity. Anecdotal evidence of people becoming electro sensitive after using their new car for several months/years.</p> <p>Most of these cars are recent and also come equipped with a Bluetooth-enabled system and wifi hotspot which in most cases cannot be turned off.</p> <p>If patient/client uses his car for multiple hours every day, asking questions about how they use their cell phone in the car or if it has a 4G/LTE wifi hotspot inside is also extremely relevant.</p>

## Reduce Your Patients/Clients EMF Exposure By 90%

EMF mitigation (removal) can get overwhelming, but the good news is it's relatively easy to cut down on exposure tremendously just by creating additional distance between an EMF-emitting source and the body.

Here are 3 tips which, when combined, can literally reduce your patients/clients EMF exposure by 90%:

### **1) Always keep your personal wireless devices – cell phone, tablet, laptop, etc. – one foot from the body.**

This means using the laptop on a table instead of the lap, using speakerphone or wired headphones when talking on the phone and hitting "Airplane Mode" when carrying the phone in the pocket or bra.

### **2) Minimize phone use inside your car or in areas of low connectivity, such as staircases and elevators.**

Phones will increase their EMF emissions by up to 10,000-fold when the connectivity is low<sup>13</sup> (including when it's on "idle" in a pocket), so this step alone can tremendously reduce EMF exposure.

### **3) Encourage the use of wired ethernet over wifi, especially for patients with a compromised immunity, children, pregnant women, the elderly and those who are clearly sensitive.**

If compliance is an issue, at least make sure that patients keep any wifi router at home or at work at least 10 feet from their body, and that it's turned off at night or when not in use. This step alone can increase their sleep tremendously, bettering every supplement, food or lifestyle modification you also include in your protocols or recommendations.

**Important Note:** For electro sensitive patients, the 3 steps above will be a start in the right direction, but will probably not be sufficient to alleviate symptoms. For those cases, a thorough home and work assessment by a professional Geovital consultant or Building Biologist is highly recommended.

### Did You Know?

#### *EMFs Increase Sensitivity To Other Environmental Toxins*

Health practitioners who regularly see cases of electro sensitivity have realized that EMF exposure acts in synergy with the following toxic offenders:

- Heavy metals
- Chemicals in air, food and water such as glyphosate
- Lyme disease and co-infections
- Viruses such as Epstein-Barr
- Mold toxins
- Excessive consumption of sugar, caffeine or stimulants contributing to excitotoxicity

On the other hand, the stressors above also generally make people more sensitive to EMFs.

## About The Author

Nicolas Pineault is an investigative health journalist and bestselling author of the acclaimed “The Non-Tinfoil Guide to EMFs”. His work has been endorsed by Dr. Joseph Mercola, Ben Greenfield, Paul Chek and many more of the world’s leading health authorities.

His mission is to educate practitioners and the public alike on the possible dangers of electro pollution, and spark innovation towards the creation of safer technologies.



## Sources:

1. <http://www.degruyter.com/view/j/reveh.2013.28.issue-2-3/reveh-2013-0006/reveh-2013-0006.xml>
2. <https://www.ncbi.nlm.nih.gov/pubmed/30025338>
3. <https://www.ncbi.nlm.nih.gov/pubmed/21999884>
4. This is not a typo or an attempt at fear mongering. See electrical engineer Alasdair Phillips' graphic here: <https://s3.amazonaws.com/esrx1811/philips-lamburn-EMF-RF-exposure-graph-v8.jpg>
5. <http://pediatrics.aappublications.org/content/early/2015/10/28/peds.2015-2151>
6. <https://www.ncbi.nlm.nih.gov/pubmed/24192494>
7. Interview between Dr. Magda Havas and Dr. Joseph Mercola, September 2018. See <https://www.youtube.com/watch?v=hXzVhxPT17o>
8. <https://www.ncbi.nlm.nih.gov/pubmed/11737520>
9. Compilation of various studies gathered as I was creating Module 3 of my Electrosmog Rx course. This paper on the top 10 symptoms experienced by Swedish sufferers of electro hypersensitivity (EHS) is one of them: <http://www.feb.se/feb/blackonwhite-complete-book.pdf>
10. See Héroux's interview with Dr. Joseph Mercola here: <https://articles.mercola.com/sites/articles/archive/2018/04/29/electromagnetic-fields-health-effects.aspx>
11. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3780531/>
12. <http://www.mainecoalitionstopsmartmeters.org/wp-content/uploads/2013/01/Exhibit-10-Smart-Meter-Health-Effects-Report-Survey2.pdf>
13. <https://www.sciencedirect.com/science/article/pii/S0013935118305024>