



MIGRAINE WORLD SUMMIT

INTERVIEWS WITH WORLD-LEADING EXPERTS

TRANSCRIPT



**COMPLEMENTARY AND INTEGRATIVE TREATMENTS
FOR MIGRAINE**

ELIZABETH LEROUX, MD, FRCPC



Introduction (00:05): A lot of natural approaches and complementary approaches can provide a sense of control and safety in patients. So, it's so important for my patients to be empowered and to feel like, you know, they're doing something good for their migraine, but also for their global health. And any ritual that will be self-care, that will be trusted, that will be safe, can actually really improve the global health just by increasing empowerment feelings.

Paula K. Dumas (00:32): Is your medicine cabinet filled with orange prescription bottles or a collection of supplements, creams, and devices? Even people who manage migraine with pharmaceutical therapies are interested in finding natural alternatives to help treat and prevent attacks. Maybe you've tried diet, physical therapy, acupuncture, or devices. The good news is now, more than ever, there are a number of proven natural options worth considering. One of the leading experts on this topic is Dr. Elizabeth Leroux, president of Migraine Canada, world-leading headache specialist, and author of the book *Migraines: More Than a Headache*. Dr. Leroux, welcome back to the Migraine World Summit.

Dr. Leroux (01:16): Such a pleasure to be here, Paula. Thank you.

Paula K. Dumas (01:20): Well, what is the difference between these terms: complementary, integrative, and alternative?

Dr. Leroux (01:27): I actually went to the NIH website to look this up. And so, when a nonmedical approach is used in combination with medical care, then we call it "complementary." And when it is used in place of medical care, then we use "alternative." So that makes sense. But my favorite term is "integrative" because that's the way I practice. And I just love to put all the approaches together and that's the term I prefer.

Paula K. Dumas (01:54): And I believe that the American Headache Society is now using that term, "CIM:" complementary and integrative medicine. So that's helpful. What are the broad types of treatment approaches in complementary and alternative medicine? Uh — I just did it myself! Complementary and *integrative* medicine.

Dr. Leroux (02:14): It's perfectly fine. So, usually we will refer to medical treatments as prescribed medications, surgeries, procedures, and medical neuromodulation devices. So, the rest is considered complementary or integrative or alternative. And so, we can define broad categories: anything related to food, supplements, plants, natural products, essential oils. Then all the mind-body therapy: cognitive behavioral therapy, mindfulness, breathing exercises. Devices that would be nonmedical could include hot or cold — you know, the famous caps that keep your head cold; the earplugs; the glasses. And then there's also all the world of the electric lights and protectors. And then the physical therapy, exercise ... and acupuncture, usually we would put in there, but in Asia I suspect acupuncture would actually be considered a more traditional thing.

Paula K. Dumas (03:13): So, do all these treatment approaches have evidence to support their use?

Dr. Leroux (03:17): So, I see many of them do have evidence. And for me, just to make clear to people what evidence means for us as health care providers: It means that there are articles that have been published in a scientific publication and peer reviewed, so reviewed by a scientist. And so, when I look for evidence, I look to PubMed or to Google Scholar, or to any book or publication that will be recognized by our institutions.



Dr. Leroux (03:44): And so, let's just make a little tour. A lot of supplements actually have evidence, including magnesium and vitamin B2 for prevention; ginger and mint, for example, for acute care. There's very strong evidence for mind-body therapies, CBT, mindfulness, breathing techniques. Exercise has a bit of evidence, mostly for episodic migraine. I have to say for chronic, the evidence is lower; and you know, so many people with chronic [migraine] struggle with exercise. I think it's worth just mentioning. There's also ... so acupuncture is fascinating because there is evidence that it does work for migraine prevention, but if we look more carefully, we see that a lot of this effect is actually not necessarily based on the meridians of Chinese medicine. But ... it could occur through a strong placebo response, which is, you know, not to be disregarded at all.

Paula K. Dumas (04:36): So, how do you determine what is effective in the absence of double-blind placebo-controlled trials?

Dr. Leroux (04:42): So, you're right. It's ... how do we manage all this? So, the first thing for me as a doctor is "Do no harm." So I want to make sure that the approach is safe, and that's physically and mentally safe. And then, of course, I want to make sure that my patients do not fall into a financial scam. And then, so I look at the treatment: Does it make sense? Is it affordable? Is it accessible? Does it fit the interests of my patients? Because sometimes, you know, some person will be very interested. And that leads me to the fact that a lot of natural approaches and complementary approaches can provide a sense of control and safety in patients. So, it's so important for my patients to be empowered and to feel like they're doing something good for their migraine, but also for their global health. And any ritual that will be self-care, that will be trusted, that will be safe, can actually really improve the global health just by increasing empowerment feelings. So that's why I strongly support these approaches. Whether or not they work, then, you know, we just observe if they work for the person in the same way that I observe all my other medical treatments.

Paula K. Dumas (05:51): Which natural or complementary and integrative medicine therapies do you and your colleagues use for patients?

Dr. Leroux (05:59): So, if I look at my own practice and those of my Canadians, and I dare say, I think Americans, we practice in a similar fashion. And those are the ones that are supported by some level of evidence. So, most of us will be very familiar with supplements. Like I mentioned, magnesium, vitamin B2. Sometimes we'll use feverfew, butterbur. There have been some concerns over hepatic toxicity for butterbur — so it's less prescribed — and then CoQ10. A lot of us will endorse a lot of basic counseling on hydration, sleep, exercise. We will strongly support anything based like mindfulness or CBT. And many of us are perfectly able to counsel about acupuncture, for example, or other basic things. Where sometimes we feel a little bit ... off limits for our knowledge, is when people ask us about things we don't know about: like pillows, for example, or essential oils or other foods like turmeric I've seen, I am asked a lot. And then ... we don't know exactly where to go because we don't have those guiding principles to assist us.

Paula K. Dumas (07:06): Yeah. But this is where you have to ask the patient to be doing some tracking.

Dr. Leroux (07:12): I will make a point here that I actually learned a lot from my patients, and that helps me to counsel other patients. So, I learned, for example, about the migraine hat, you know, the cooling devices. And about the glasses, the FL-41. And in all my patients, I do a follow-up on whatever they are trying so they can tell me, "Was it worth my time? Was it worth my



money? And then, how did it go? Any tricks?" So, I become a bit of a hub for future patients, and I think more doctors should do that. Because even, you know, I was talking about published evidence. But for me, experience-based medicine is also very important. The only way to get that is to listen to your patients. And then to act through patient associations, for example, and to gather this knowledge. And if something is safe, the real question is, does it work? Do you have any tricks? And I think there's actually a way to collect this data. So we can advise people better in the future.

Paula K. Dumas (08:07): We talked about integration before. How do you integrate complementary and integrative therapy with more medically driven approaches like CGRP or triptans or neuromodulation devices?

Dr. Leroux (08:20): I think the first way, the first thing is, I always support my patients and I support them to speak up about what they are interested in. This is a message to my colleagues out there, because we are very busy and sometimes, you know, we go fast. But I want to support my patients' interests and questions. Then, of course, you know, I don't want to confound our efforts. So, if I try — we are to start a preventive medication, for example — well, I will steer away from a trial of a supplement because then we won't know what's going to work or not. So I don't want to lose my patient's time. You know, we want answers. On the other side, if I'm trying a preventive with the patient, but then the patient is interested in starting exercise or meditation, or anything that has actually more global benefits and could be really helpful and takes time to put these practices in place, well, then that is less of a confounder, and we can do more things at the same time.

Dr. Leroux (09:09): So, and then I really want to reinforce the point that another part of my conversation with patients is to keep their mind open about medicines. Because I would say a hundred percent of my patients tell me they prefer not to take medication. And I think that that's perfectly normal. I would do the same. But I have seen my fair share of stories where someone spent 10-15 years, you know, navigating the world of natural approaches, trying one thing after the other, spending a lot of money sometimes. And then they try a medication and then it works. And it's, "Oh my God, what did I, I should have tried this 10 years before." I know the audience of the Migraine World Summit may have tried already a lot of medications, but for those of you who are a bit concerned or scared, just discuss with your provider, because there are some of these medications, they might work very well for you. And in the end save you a lot of time and pain.

Paula K. Dumas (10:07): Many people are interested in these therapies, but they don't yet hear about them from their local doctors. Why is that?

Dr. Leroux (10:15): Because we're not trained that way. You know, doctors are trained to mostly diagnose and prescribe, and a lot of our training does not include these things. I would say that primary care physicians receive more training about what we call behavioral change and motivational interviewing; so, to help their patients fare over their global health over time. But for me as a neurology resident, you know, I heard a big zero about all of these things. That's why I'm saying thank you to my patients for bringing that up to me. And so, we don't get this training and also we are very, very strongly trained to respect evidence. And so that's why we are a bit limited in a way to accept other things. But we also have to be a bit of safeguard against quackery and that's also important.



Paula K. Dumas (11:01): You mentioned safety before. Do most doctors feel safe recommending these things?

Dr. Leroux (11:06): I think they do. You know, most of us, I would dare say, they say these things: "It's a vast field, I don't know a lot about these things. It's probably not my role to prescribe them. I don't have to prescribe them, and I will leave all this complexity to my patients' own care and research." But safety is very rarely a concern, I would say. And I think that's true because medical things are also moderated and regulated because they might be sometimes dangerous. Medications can be dangerous, but plants can be dangerous, too. So, I think some of the things that people see as very safe should be regulated. And I'm thinking once again about things like psilocybin or cannabis.

Paula K. Dumas (11:46): Right, and even butterbur had partial recall in some areas. So something to be mindful of. What about payment for them? Do insurance companies typically reimburse them?

Dr. Leroux (11:59): Yeah, well, you know, evidence — once again, we are a bit of victims of lack of evidence — because these insurance companies, they will do cost-effectiveness analysis based on published data. And so, if there's no proof and it's not considered "medical," quite often, they will not pay for it. So even if doctors spend the time, then we hit the affordability and accessibility question. So, many patients have told me about the cost of supplements, the cost of acupuncture treatments. So, in the end, you know, they try it and sometimes it does work, but the cost is just too high. So once again, we should do probably more research in these things and get the evidence.

Paula K. Dumas (12:36): So, I have found, in the U.S. at least, using an HSA [health savings account] or an HSA debit card is one way to be able to purchase and try some of these things without as much expense. Let's go through a number of these CIM therapies and discuss the pros and cons of each one with some questions that have come in from our community. So, Gavin asked about a recent study at the University of Tehran where an omega-3 and nanocurcumin, daily, were used in migraine prevention. Is this actionable or too early to consider?

Dr. Leroux (13:15): Ha ha. I want to thank Gavin for asking this question, because what did I do? I went on PubMed and I could review part of the studies from this team. It's actually a very solid approach, where they use inflammatory parameters in the blood of patients and also in animal models. But the only clinical study I could find was on a very small number of patients split in four groups. So, I think I could not access the full article, but I think it's too small of a number to really action on it. This being said, omega-3's have benefits for health; curcumin, as well. So, once again, why not? But if you do it, you know, does it work? Do your diary and check it out.

Paula K. Dumas (13:55): And there was a major study this year on omega-3's versus omega-6's as being very effective, and it was published in the BMJ, the *British Medical Journal*. I think people should take a look at that study if they're considering omega-3's. Leah asked: "What about specific essential oils that can help migraine?"

Dr. Leroux (14:19): Well, that's another quite interesting thing. Mint rollers or mint is interesting, because there's actually a lot of plants that act on sensory nerves, what we call a channel. So, you know, things that communicate the sensory input. And so, we call this the TRP [transient receptor potential] family. This is just for the scientific geeks out there. And mint



actually acts on such receptors, which is called TRPM8, and TRPM8 plays a role in migraine. So, mint applied as a rolling on the temples, for example, was actually a treatment in France in the 19th century. And a lot of my patients — and this is one of the things I learned from my patients — they love the mint rollers. They really do something. Lavender has been, actually, studied for migraine with some evidence; and there's a lot of, let's say, popular knowledge that suggests lavender as a relaxing scent. And then, I found also interesting, we were in Iran. Well, Iran is ancient Persia, and in Persian medicine, there's old studies — there's actually knowledge about the Damascus rose oil being used for migraine. This being said, I think about rose scent. And if I had osmophobia, I'm not sure I would like it. So, I think there's probably a wide variability of response to essential oils in people with migraine.

Paula K. Dumas (15:33): That's one of the most beautiful things about the Migraine World Summit being global. And we learn from people in 90 or 100 different countries who are watching this program and watching interviews like yours. So, they're using different things, and it's helpful to learn, and be a sponge. Meredith is wondering if aromatherapy is an option for people with scent-sensitive migraine.

Dr. Leroux (16:00): I'll say, if you are scent sensitive, my friend, you will know. Because some people just cannot tolerate any scents. And osmophobia, we call it the fear of scents, is something that can evolve over time. And I've seen some of my patients who had to let go of their favorite soap, their favorite perfume, because it triggered migraine. So, we know that this is a way that scents do trigger migraine through different ... once again, those are very chemical triggers. And if you're sensitive to this, well, you can read all the blog posts on lavender you want, but if it doesn't work for you, it doesn't work for you.

Paula K. Dumas (16:37): Yeah. Liz is interested in EFT [Emotional Freedom Technique] and tapping. Is there any proof that these can help migraine or help relieve stress?

Dr. Leroux (16:47): So, the tapping techniques have become much trendier, and they are also based on Chinese meridians, which is interesting. The technique is — you can find it online for free, you know — it's very easy and you can tap on your temple, yes, and on your chest. And so here again, if you ask me what I told you about acupuncture and the meridians and how part of it is a placebo response, and we also mentioned this kind of safe, calming effect. So, if you do such techniques, what's going to happen is your focus is going to go on your body and your breath, and you're going to feel empowered and feel calm. And this might actually be a very powerful pain reducer. So, looking into the tapping, does it move to the meridians? Maybe not. But I believe that, like I said, any ritual that you find calming and will bring your awareness and slow your breathing will improve your pain. Actually, there's no doubt about that.

Paula K. Dumas (17:45): Good point. Bronwyn asked about psilocybin for migraine and cluster and how effective that might be.

Dr. Leroux (17:52): So, psilocybin is a very fascinating substance found in the different varieties of mushrooms. I am following many cluster headache patients, and I've done research in this field. So, of course, I've been interested in that. There is a rationale. So, there is scientific facts and research why psilocybin could impact the cluster headaches through the serotonin mechanism. So it makes sense to use it. And now, is there proof? And once again, I have to thank cluster patients for their advocacy and efforts at doing patient-led research to kind of support the benefits of psilocybin and cluster headache. So we have some good theories about this. But due to the legal status of this substance, real scientific research has been really



stopped. And I think now the laws are changing actually, at least in Canada. And I think also in the U.S. for research, we might see true discoveries regarding psilocybin for cluster [headache]. My patients have certainly tried it with some success. And this is a substance that has no major risk of, you know, respiratory problems like opioids. The addiction risk is also quite low. So, I would say, I hope to see more research on this, and I hope for a benefit.

Paula K. Dumas (19:08): And I would give a little shout-out to our friends at the advocacy group Clusterbusters, because they're doing some important work on psilocybin right now. So, to stay up to speed on that, clusterbusters.org. So, a different Liz is curious about drinking electrolytes to help prevent and treat migraine. Is there any merit to that?

Dr. Leroux (19:30): So first, any migraine clinic will start with a little spiel about the importance of hydration. And I think it makes perfect sense. And I have actually seen surprising results in people who were just chronically dehydrated. So yes, this being said, you know, migraine is a neurological disease, and just drinking enough water will not do it for many of us. About the electrolytes: Oh, I have seen heated debates on the media and the patient forums about which to drink. A lot of them have, you know, colorants, and artificial sugars that are not good. So you have to find your way through that. I would say that if you have a migraine attack with profuse vomiting and diarrhea, yes, absolutely, using electrolytes — just like you would do for, you know, a child who has gastroenteritis — makes a lot of sense. Now, which exact electrolytes? To me as a doctor, I think if you get a bit of just sodium, potassium, and chloride to replace what you're losing, probably makes sense. And then remember, if you are in a bad state of migrainosus and cannot eat or drink anything, sometimes you have to go to emergency so you can have an IV infusion and be rehydrated.

Paula K. Dumas (20:41): That's a good point. We got a lot of questions about various symptoms associated with migraine: vestibular symptoms, dizziness, depression, anxiety, vomiting, diarrhea, facial pain. Can CIM, and some of these natural treatments, help these symptoms?

Dr. Leroux (21:00): Yes, they can. Absolutely. And I think I will not go into details for each of these for one reason: that you have to see the brain as an organ that has actually natural control networks for all of the symptoms that you're naming. So, pain, dizziness, nausea, and all of these will be significantly increased by anxiety. And what we call "catastrophization," which is just like a natural response of our brain to see things as how bad they could get. And I see this also a lot on patient support groups. You know, things people say like, they feel they're gonna die or a catastrophe is going to happen. When this happens, your body turns into a different way of function. You will breathe shallower. You will tense your muscles. A lot of things — very, very concrete, physical things — will happen.

Dr. Leroux (21:51): And so that's why all those techniques — namely the meditation, actually, breathing control — can help. A regular exercise practice can help. And then you will just kind of strengthen those natural control breaks that you have in your brain. And all these symptoms — pain, nausea, dizziness — can improve significantly. I work with a vestibular migraine clinic, and I see a lot of patients with dizziness. And quite often I don't do a lot of vestibular physio. I teach the patients about getting the sense back of control and breathing exercises, and that, sometimes, it does wonders.

Paula K. Dumas (22:26): That's fascinating. Yeah. People with vestibular migraine are really confounded by the best treatment options for them. So, thank you for mentioning that. Who



should consider natural remedies or CIM treatments? Who's it good for? Who's it maybe not so good for?

Dr. Leroux (22:43): I would say everybody, OK? I would not have said that as a young and naive, you know, freshly out-of-the-school doctor. But now [the] more and more I practice, and a lot of these actually have benefits for global health. So, I think everybody can. When I present care for migraine to my patients, I look at everything, and I always include the lifestyle and diet, and this is something very important in my practice. But of course, certain groups of patients might have more advantages. So, namely of course, people who have restrictions for medications, children, elderly, pregnant women, and also patients who might have medical contraindications to drugs. And then they might find some relief. And then, of course, people who have tried a lot of medications, they did not find their match. They are still in a difficult place.

Dr. Leroux (23:32): And then, optimizing all the CIMs can actually lead to an improvement in the quality of life. So they're worth it to try. And it's a way — a patient once told me — you know, it's a path. And sometimes I realized it was just not the right moment for me to try this. Like for example, exercise or meditation or breathing or psychotherapy, because they were going through other things in their lives. So, she taught me about the concept of the right time to try something. And that's also something I took home. And so, I just revisit this on a regular basis with my patients.

Paula K. Dumas (24:07): That's right. There would be times when someone would suggest that I drink more water and I would have a hostile response to that. Like, "You've gotta be crazy." But then there's another time when I actually began to, you know, measure it and see how much I was getting. Same thing with sleep: "Get more sleep." "No, don't talk to me about sleep. I've got a real problem here, right?" When you're ready, you're ready. And then when you hear it and then approach it in a methodical way, it can help. What sometimes is difficult is, if you're working with an HCP [health care professional] who's unfamiliar or uncomfortable with these approaches, what do you suggest in a situation like that?

Dr. Leroux (24:47): Mmm, so it depends, you know. I know in the States, people can sometimes find another health care provider because the access is easier. I can tell you in Canada, finding a family doctor at present time is a crusade, and finding a headache doctor is even worse. So, sometimes maybe your HCP would expect your doctor to counsel you, but maybe your doctor is not the right person, right? Maybe your doctor will just say, "You know what? I think it's a fantastic idea," and that's going to be it. So, I really encourage to go to the professional that's the best to help you. I'm a huge fan of, actually, kinesiologists for exercise. Any way you can find to learn cardiac coherence, mindfulness, Jacobson Relaxation. Nutritionists can be great.

Dr. Leroux (25:43): Patient groups can be also great, but just beware in the patient groups — remember that the experience of one person may be different than yours. And so, it's good to get a grasp of things. But don't necessarily get scared by someone's bad experience, I think is my message. Look for encouragement more than discouragement. So, look for the professionals who can help you. There's tons of apps these days as well, and whatever you decide to do, stick to it, because sometimes it's not complicated, but it's just about doing the thing, right? And finding the right way to do it consistently. So, I'm telling you, it's not [that] I don't want doctors to get involved, but they might not be your ideal allies. But if you find something, tell them, because then they will learn from you. So, if you find something that really helps you, just share with them.



Paula K. Dumas (26:29): Good advice, and also good strategy to try it and give it enough time. And then track it to see if it's made a difference. Not just, "Oh, I think this is helping me. I like this. This is comforting." You know you'll know whether it's making a difference. Are there any risks for combining certain CIM therapies with, say, pharmaceutical treatments? You talked about integrative care as the goal. Is there any risk here?

Dr. Leroux (26:57): So, apart from the supplements, where sometimes we're careful, especially in pregnant women, a lot of the CIMs are safe. So, for example, acupuncture in pregnancy is considered to be perfectly safe. The other exception to that would be maybe daith piercing, where people pierce their ear. And it's very ... I'm not sure I want to consider that CIM but it is a procedure. And this can lead to infections and pain. And so, I would be ... But otherwise, most of these practices are safe.

Dr. Leroux (27:30): A word about mindfulness, because I've mentioned mindfulness many times. There are actually contraindications to mindfulness in people with PTSD, psychotic disorders, addiction. So, if you have a mental health issue and you want to engage in mindfulness, it might be a good idea to check if it's the right approach for you. So, otherwise of course, exercise, you know, if you jump to a CrossFit class, you just be careful. Go progressively, take some advice, but otherwise, no, usually those approaches have actually multiple benefits for your health and can help you in the long term. You just have to stick to it.

Paula K. Dumas (28:11): Stick to it. Important. So, you've talked about a number of different resources. Which ones would you recommend if somebody wants to go deeper on some of these topics that you've addressed?

Dr. Leroux (28:25): There are so many. So, I'll do a little shout-out for my fellow Canadians out there to have a look at our website at Migraine Canada. There's no doubt that Migraine World Summit is a fantastic reference. I wrote a book as well, which is called *Migraines: More Than a Headache*, which goes a bit over migraine in general. And I'm very touched to say that some patients that I meet have read the book and found it helpful. We have podcasts ...

Paula K. Dumas (28:50): I read it. I'm gonna give you a shout-out for the book. I read it. And I felt like it was truly an integrative approach. And that's what I loved about it. Especially everything we've talked about today. Many of those things are in there and a very clear communication. So, thank you for writing that.

Dr. Leroux (29:09): Thank you. And then, sometimes you just ... my advice would be to start with recognized associations, recognized things linked to an institution, academic institution, government. Try to stay away from anything that's selling you something with advertisement and that makes claims of miracle and cure-all. I know this is a very common thing that you share with Migraine World Summit: Be careful if someone tells you "cure" and "cost," right? I'll cure you for a fee — not very good for migraine. So, a lot of these things have excellent ... exercise, meditation, supplements. Stick to recognized sources first. And remember just not to trust that if for someone, it didn't work? That's OK. Listen to people it helped. And if you want to try it, give it a try.

Paula K. Dumas (30:02): Well said, Dr. Leroux. Thank you so much for sharing your expertise with us today, your insights. I think a lot of people have some new options to try and new ways to try them.



Dr. Leroux (30:13): Thank you once again, for a great interview.