

# ***Are phosphates the hidden enemy?***

*By Kathy Longley BSc*

On 12th June I attended a lecture at the University of Westminster given by Dr St Amand, the author of the book *"What your doctor may NOT tell you about fibromyalgia."* It had been arranged by the UK Guaifensin Support Group, who had invited Dr St Amand and his assistant Claudia Marek to come to the UK to talk to medical professionals and individuals with fibromyalgia on their treatment protocol using the drug guaifenesin. It was an interesting day, where I had the opportunity to listen to Dr St Amand explain his theories behind the cause of fibromyalgia and the success of his treatment protocol.

## **DR ST AMAND'S THEORY**

Dr St Amand is an endocrinologist by background and has fibromyalgia himself along with his three daughters. He believes that chronic fatigue syndrome, myofascial pain syndrome, ME, fibromyalgia, systemic candidiasis and vulva pain syndrome are all one and the same thing, "*energy deficient syndromes*". He proposes that these conditions result from a build up of phosphates within the cells of our bodies, due to a failure to excrete phosphates successfully in our urine. Phosphate ions accumulate in the bloodstream and when they fail to be excreted they are deposited in the bones, muscles and tendons, where they begin to interfere with energy production within the mitochondria of our cells.

Energy production involves turning the substance ADP (adenosine diphosphate) into the substance ATP (adenosine triphosphate) by the addition of a phosphate ion.



ATP is needed to perform every activity within our body, so without a sufficient supply our cells become tired very quickly and are unable to carry out their specific functions. Dr St Amand explains that in an attempt to prevent the accumulation of phosphates blocking energy production calcium is released from inner stores within the cell to buffer the excess phosphate by forming calcium phosphate. Calcium, however, is a powerful messenger that instructs the cell to perform its function, for example, calcium triggers muscle cells to contract. Any excess calcium, therefore, needs to be returned into storage or the muscle cell will remain stimulated to contract. Unfortunately, the removal of calcium depends on pumps driven by ATP, so not all of it can be successfully removed and calcium continues to stimulate the cell until it is completely exhausted. Water is also drawn into the cells in an attempt to dilute the excess phosphate and excess calcium. The water collects under considerable pressure and causes swelling. Dr St Amand believes that these swellings around areas of contracted muscle account for the numerous '*lumps & bumps*' found throughout the body, which cause pain by pressing on nerve endings.

So why is the excess phosphate not excreted? The problem is believed to arise in the kidney tubules responsible for the excretion of ions. Failure within these tubules causes the phosphate ions to be retained rather than excreted. Dr St Amand believes that the defect is genetic, and therefore inherited, and that there are several genes involved. As far more women are affected by these conditions than men it is likely that the major defective gene will be found on the X chromosome.

## **THE ACTION OF GUAIFENESIN**

Guaifenesin is proposed to enable the kidney tubules to function normally and therefore excrete the excess phosphates. When an individual begins taking guaifenesin it initiates a cycle of purging the body cells of phosphates, releasing them back into the bloodstream to be excreted by the kidneys. Symptoms tend to increase during this purging process due to more water entering the cells to draw out the excess phosphates. The increased swelling can put more pressure on the nerve endings producing more pain. The blood quickly becomes overloaded with the purged phosphates, as despite working at top speed the kidneys are unable to clear the full amount. The cells, therefore, have to accept back some phosphates, until another purging cycle begins. Dr St Amand is very clear that this reversal process is not an easy ride and can take a long time depending on how responsive an individual is to the guaifenesin. For example, responsive people begin the cyclic process on 600mg per day, whereas others require 2400mg per day or more. He estimates three months for every year

of having symptoms. As treatment continues the experience of good days should increase until all the body areas have been purged of phosphate. Once this has been achieved a person should be symptom free as long as they remain on guaifenesin.

### THE IMPORTANCE OF SALICYLATES

Dr St Amand describes salicylates as “*the bane of his existence*”. They block the action of guaifenesin so it is vitally important to avoid them. Salicylates are produced by plants as part of their defence system and are found in all plant products. For example, in medications like aspirin, which is made from willow bark, in herbal remedies and in all hand or body creams, cosmetic and hair products that include a single plant product. They are absorbed very effectively through the skin and then widely distributed by the blood stream throughout the body.

Salicylates block the action of guaifenesin at the kidney tubules. Guaifenesin is believed to bind to specific receptors to exert its effect and salicylates are competitors for these sites and rapidly fill them leaving no room for guaifenesin. Only very small amounts of salicylates are required to occupy all the available sites, rendering guaifenesin useless.

Dr St Amand is the first to point out that his theory is simply that, a theory. At present there are no scientific research studies to support it. However, he bases his theory and his belief in guaifenesin on his years of experience in treating patients with fibromyalgia and watching them go through the reversal process towards a newfound health.

*(The only double blind/placebo controlled study conducted showed that guaifenesin was no better than a placebo. However, the extensive effects that salicylates have on the action of guaifenesin was not fully understood at this stage and it is likely that participants were using salicylate products. Therefore, Dr St Amand believes the study was flawed and hopes to conduct a further study in the future.)*

### FOLLOWING THE PROTOCOL

1. **Understand the treatment process:** If you wish to follow the guaifenesin protocol it is advisable to read Dr St Amand's book or to contact the UK Guaifenesin Support Group to ensure that you completely understand the treatment process. This is not a quick, easy solution and you will probably require support from other people on the same protocol. Guaifenesin is not a cure for fibromyalgia. If you manage to cycle successfully then your symptoms should reduce in intensity and possibly disappear altogether. Both Dr St Amand and Claudia Marek have fibromyalgia, but now claim to be symptom-free due to the guaifenesin treatment. However, symptoms will return if you stop taking guaifenesin or if guaifenesin's action is blocked by salicylates.
2. **Get yourself mapped:** Dr St Amand monitors the progress of his patients by using a process of mapping. The fluid retained in the cells in the attempt to dilute the excess phosphates cause areas of swelling. Using the correct method these areas of swelling can be carefully mapped and monitored to check if the guaifenesin is working properly. Once you achieve your correct dosage and begin to cycle these areas of swelling should begin to decrease. Interestingly, Dr St Amand has noted that, the area of the left thigh always responds first, so monitoring the swelling areas on the left thigh is a good indication that the purging is under way. Finding a physical therapist to map you using Dr St Amand's method can be quite tricky in the UK. The UK Guaifenesin Support Group have a list of mappers on their website and presently have a DVD of Dr St Amand teaching the mapping process available for sale.
3. **Establish the correct dose:** It is of utmost importance to discover the correct dosage level for you individually. It is recommended to begin at 300mg twice per day and then increase to 600mg twice per day if your symptoms fail to increase (the indication that you have begun cycling.) Some patients will require a dosage of 1200mg twice per day. Treatment will only successfully commence when your correct dosage level has been established.
4. **Remove all salicylates:** It is vital to check all your cosmetics, creams, shampoo and hair products for any plant ingredients that will contain salicylates. The UK Guaifenesin Support Group offers great advice on alternative products on their website. The only ingested plant products to watch are herbal medicines and mint, present in nearly all toothpastes. Mint is absorbed in the mouth before the stomach can digest the salicylates.

5. **Hypoglycemia:** Dr St Amand believes that many people with these conditions also suffer from hypoglycaemia and suggests as part of his protocol that you reduce the intake of sugar and carbohydrates in your diet.

#### **USEFUL CONTACTS & RESOURCES**

1. **UK FMS GUAI website:** <http://ukfmsguai.tripod.com>
2. **The US Fibromyalgia Treatment Centre website:**  
[www.fibromyaliatreatment.com](http://www.fibromyaliatreatment.com)
3. **What Your Doctor May *NOT* Tell You About Fibromyalgia by Dr St Amand** (available from [www.amazon.co.uk](http://www.amazon.co.uk) and the UK FMS GUAI site)
4. **DVD: The Guaifenesin Protocol** (available at present from UK FMS GUAI)
5. **Guaifenesin Sources:** There are no UK sources of guaifenesin at the present time. Please check the sources page of the UK website for any updates.  
Sources from abroad: (sources abroad are available without prescription)  
Pro Health Inc: [www.immunesupport.com/shop](http://www.immunesupport.com/shop)  
Marina del Rey Pharmacy: [www.fibroconnection.com](http://www.fibroconnection.com)  
Fludan in Canada: [www.fludan.com](http://www.fludan.com)
6. **Salicylate-Free Products:** Andrea Rose: [www.andrearose.com](http://www.andrearose.com)  
Dr Stay: [www.drstay.com](http://www.drstay.com)
7. A list of mappers and therapists is available on the UK FMS GUAI website.