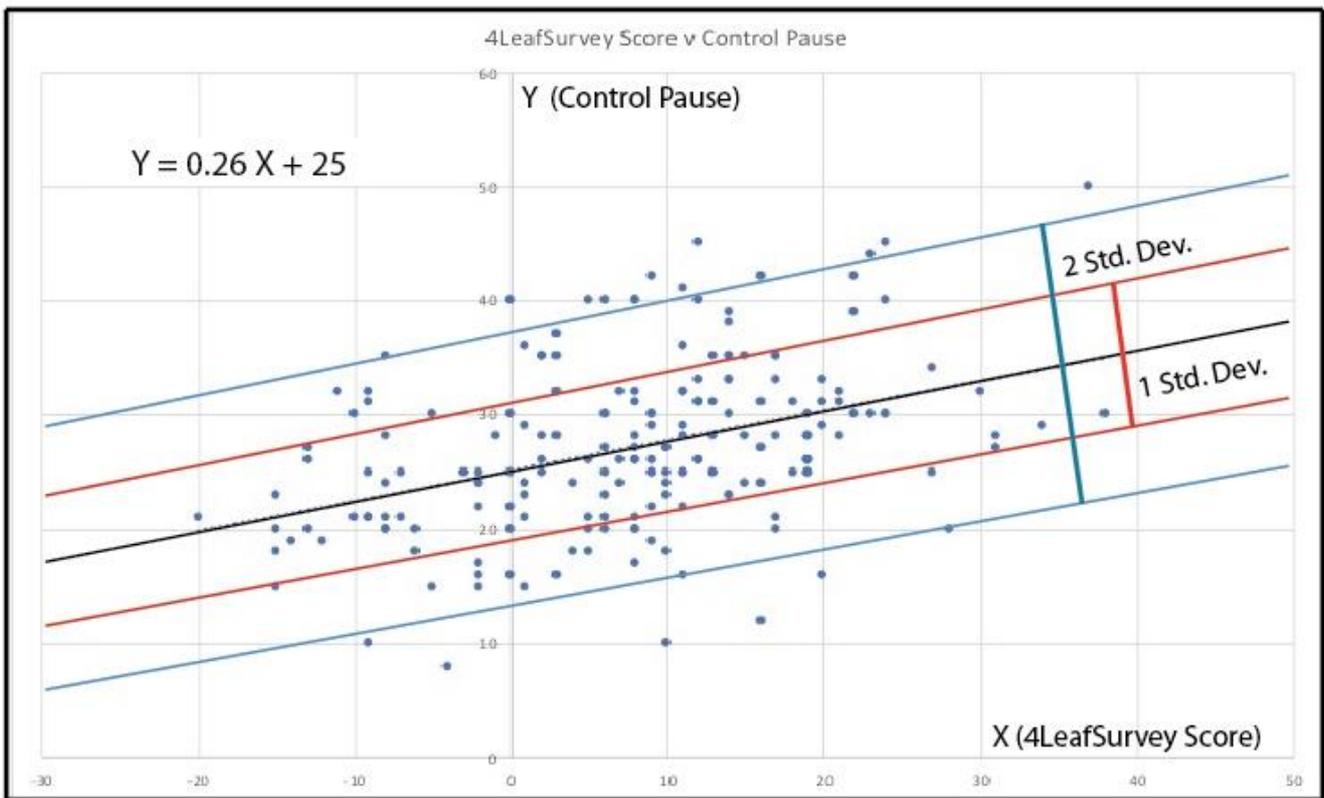


Diet v Breathing Relationship

Diet measure used: The 4LeafSurvey that estimates the %age of calories derived from Whole Plant Foods (Ranges from -40 to +40) (www.4leafsurvey.com)

Breathing measure used: The Control Pause that estimates the degree of chronic hidden hyperventilation (CHHV) or the %age of CO2 in the lungs. (Ranges from 0 to 60 +)

CHHV is related to stress, diet and bad breathing habits. Diet appears to be a major factor perhaps because a stressful lifestyle usually leads to bad eating habits, as well as directly affecting breathing due to the fight/flight responses to stressors.



The above graph is based on 191 data points. $Y = 0.26X + 25$. Standard deviation = 5

4LeafSurvey Score (X)	Control Pause Score (Y)	CP Range
- 40	14	9 to 19
- 35	15	10 to 20
- 30	16	11 to 21
- 25	18	13 to 23
- 20	20	15 to 25
- 15	22	17 to 27
- 10	23	18 to 28
- 5	24	19 to 29
0	25	20 to 30
+ 5	26	21 to 31
+ 10	28	23 to 33
+ 15	29	24 to 34
+ 20	30	25 to 35
+ 25	32	27 to 37
+ 30	33	28 to 38
+ 35	35	30 to 40
+ 40	37	32 to 42

Comments: It takes less than five minutes to have clients complete the 4leafsurvey and establish an estimate of the %age of calories they derive from whole plant food. As I have explained in previous articles, it is important to have a measure of a client's diet before they make major changes in their breathing, especially if they are eating a very acid forming diet that will present a 4leafsurvey score with a high negative value. This was not as important when Professor Buteyko did his research in Russia, as the typical diet was radically different from the Standard American Diet (SAD diet). Nevertheless he did establish the fact that certain foods could increase CHHV and advised patients to abstain from eating them when ill. Today, in the West that list would be much longer as our diets have become increasingly based on heavy consumption of animal based foods, dairy and convenience processed foods.

There are many instances where patients in the USA have changed to a whole plant diet and their asthma has totally cleared. Hypertension and many gut problems have responded quickly to such a dietary shift. As CHHV is a 21st century epidemic in the West, there is no doubt that breath training is usually needed to break old breathing habits that may have arisen from stress, trauma, illnesses, mis-guided efforts to do deep breathing as well as lack of physical exercise and dietary excesses.

The potential danger of having clients eliminate CHHV who are eating an acid forming diet could be depletion of bone calcium or development of kidney stones as the alternative buffering by increased breathing and elimination of carbon dioxide is taken away. I am sure that in time the improved breathing would result in more mindful eating habits, but why not help the patient with advice on their diet as well as teaching them to breathe better? The evidence is now overwhelming that the SAD diet is a direct precursor to heart disease, hypertension, diabetes, obesity, cancer and many other modern chronic diseases. If we are serious about helping our clients to better health we should at least pass this information on to them; whether they decide to make any changes in their eating habits, that is their decision, but a decision they will make with better information that they will not get from most doctors.

My training was as an osteopath, and although osteopathy was originally meant to be a total system of healing baring surgical interventions, I do not think there are many osteopaths who have the same dedication and understanding as our earlier founders to offer patients sufficient care with just physical therapy. It was for this reason that I trained as a Buteyko Educator and now give advice and support on diet and general lifestyle matters. I would strongly encourage all Buteyko Educators to make themselves acquainted with the China Study and the Whole Plant Nutrition diet and to introduce the on-line 4leafsurvey to their clients as a routine. Even better why not take the excellent on-line training offered by eCornell University to gain a Whole Plant Nutrition Certificate? For me it has been the best investment in health education I have ever made.

Michael Lingard BSc. DO. WPNCert.

www.totalhealthmatters.co.uk