

Speech: Low Carbon Spa & Beauty Initiative Launch

1. History of our Planet

Around 3.5 billion years ago, very basic chemical reactions began occurring around thermal vents at the sea floor. As a result, particles began replicating, mutating and transforming. The result of these mutations was the prehistoric ancestor of every living thing on our earth; the autotroph.

Autotrophs were the first self-feeding organisms on our planet. They could harness the energy of our sun through photosynthesis, and they thrived in an atmosphere abundant with carbon dioxide and water.

These single celled organisms started the very long process of converting our atmosphere from a carbon dioxide dominated environment to the oxygen rich atmosphere we have today. Eventually plant life grew more complex, with mosses and fungi moving out of the sea and further absorbing CO₂.

These life forms were so effective in reducing CO₂ that they removed nearly all of it from our atmosphere, which brought about a 100 million year long ice age around 800 million years ago. It took vast amounts of CO₂ to escape through volcanic out gassings to trigger a greenhouse effect that raised global temperatures and melted the ice.

During the ice age, with an abundance of oxygen and lack of Carbon Dioxide, the ozone layer began to form. Over the next 300 million years, large quantities of ozone molecules got trapped in our upper atmosphere, creating a barrier that protects the earth from harmful UV radiation until today.

With the newly formed Ozone layer and warming temperatures, animals and plants began moving from the sea onto land. A more stable greenhouse gas layer formed and life evolved and grew more complex.

Over the next 500 million years, a number of catastrophic events led to mass extinctions of former species from which life as we know it today evolved. About 230 million years ago, 95% of all life on earth was wiped out by a series of volcanic events know as the *Siberian Traps*. The eruptions threw so much greenhouse gas into our atmosphere that temperatures on earth increased rapidly. The oceans became warmer and more acidic through the absorption of CO₂. Coral reefs died and migration patterns changed, resulting in a great disruption to the food chain, and eventually in a great extinction.

A similar greenhouse event was caused by a comet hitting earth around 65 million years ago. As a consequence, more than 60% of all life on earth was wiped out. The dinosaurs, it is believed, were extinct as a result of this impact.

From here on mammals took control of the earth; and eventually one species would come to dominate nearly every corner of our planet: humans.

Only 150 years ago we witnessed an *industrial revolution* fueled by the carbon energy stored throughout 3.5 billions years of evolution that had started with the single celled autotroph. This revolution allowed our economies and populations to grow rapidly. In 1850 the human population was approximately 1.2 billion people, today it counts 6.5 billion, and it is estimated we will have 9 billion in 2050.

I question the sustainability of this when we have finite resources.

2. So what could our future look like?

Unmitigated climate change will not only affect our environment; it will devastate economies, create massive humanitarian crises, and significantly reduce the standard of living we grew so accustomed to for nearly everyone on this planet.

If we don't take immediate action against climate change, our future could be very bleak.

Imagine that over the next 12 years, we continue with businesses as usual, releasing vast amounts of greenhouse gases into our atmosphere. This is what our future could look like:

- Arctic ice has already completely disappeared in summer and the Greenland ice sheet melt has accelerated to alarming levels. By 2020, temperatures would have risen another 1 degree causing the vast ice shelves all round Antarctica to break apart, exposing the heads of the continents glaciers to the warm ocean.
- Cold melt waters from the Greenland ice sheet will create turbulent currents around the North Atlantic Ocean, resulting in fierce winter snow storms and devastating summer heat waves all across Europe.
- It is predicted that with rising sea levels and warmer temperatures, the likelihood of a hurricane hitting and practically wiping out Bangladesh will increase manifold by 2030. This would result in one of the greatest humanitarian crises the world has ever seen.

- By 2050, sea levels would have risen by 18cm and global temperatures would have risen by over 2°C. As temperatures rise, the oceans become more acidic. The Great Barrier Reef will bleach and die, thus no longer functioning as a food source for the billions of fish that inhabit it. Here and across the globe, we could see millions of bird, fish and animal species go extinct. This will have catastrophic impacts for the Australian tourism industry and economy. Our envied biodiversity, jobs; money and security are at stake.
- Climate change is also a great risk to our insurance industry. In Australia, damage from increased storm activity (such as severe cyclones in Brisbane) would force our insurance industry to its knees. Insurance companies throughout the world would start closing down with insurance becoming unaffordable for all but the rich. People unable to afford insurance find themselves being unable to purchase property, which will collapse our housing market and economy as a whole.
- The world population has now reached 9 billion. Food shortages already occur throughout the world, and they are intensified by the drying up of many of the world's food sources like the Murray Darling Basin. Food prices are rising so dramatically that they are causing economic hardship for many. We might soon be faced with more than 1 billion refugees from famine.
- Few Australians will be able to afford luxuries, and industries like the Spa & Beauty industry will collapse under growing economic pressures.

3. Our Government

Following the last federal election, our new government immediately ratified Kyoto and promised the creation of an Emissions Trading Scheme (ETS). Recently this promise was fulfilled with the introduction of the Carbon Pollution Reduction Scheme (CPRS), which forces carbon-intensive industries to report and lower their emissions and raises the price of carbon intensive products and services. Ideally, the CPRS will enforce the use and further development of clean technology on an even playing field.

While in theory the scheme is meant to discourage the use of carbon intensive technology, practice often betrays gloomy theories. Looking at how many Sydney office building lights are still switched on late at night - costing companies money for nothing - I believe we are yet to put in extra work and effort to truly make it effective.

4. The Low Carbon Spa & Beauty Initiative

So how can the Spa & Beauty industry go about reducing its impact on our climate and the environment as a whole? Tonight, the *Carbon Reduction Institute* and the *International Spa & Beauty Expo* are proudly launching the new Low Carbon Spa & Beauty Initiative.

The Initiative is specifically designed to help Spa & Beauty businesses reduce their carbon footprint. Through the Initiative, CRI and industry associates aspire to reduce the climate change impact of the industry as a whole by 20% by 2015.

Businesses who wish to take part in the initiative will be required to undergo an assessment to determine their carbon footprint and purchase carbon credits based on the desired reduction strategy and claim they wish to make. Every one of you can take part; and with the financial savings often exceeding the cost of the emissions assessment or carbon credits, partaking in the Spa & Beauty Initiative is a rewarding and lucrative undertaking with many benefits.

Once you have undertaken an emissions assessment, the Carbon Reduction Institute will suggest customized, feasible reduction strategies which will lower the carbon emissions output of your business as a whole.

An example of such a strategy could be the application of timer switches to appliances throughout your business:



Timer switch

If your hot towel cabbie is left on every night, then the timer switch could save you as much as \$350.00 per year and prevent as much as 1.75 tonnes of CO₂ from entering our atmosphere. Applied to a hot stone heater, a timer switch could save over 16 kg of CO₂ and \$3.00 worth of electricity each night.

Once you take part in the Low Carbon Spa & Beauty Initiative, you will become certified as a carbon neutral or low carbon business and get to use the well-established *NoCO2* or *LowCO2* certification logos, allowing you to promote your environmental actions to your customers.

As a member you will also have access to expert advice on sustainable waste, energy use and water consumption.

By joining the Initiative, you are not only taking action on climate change, but you are also demonstrating leadership; creating competitive advantages, and preparing your business for new legislations under the upcoming Carbon Pollution Reduction Scheme (CPRS).

5. Concept Spa

This concept spa is a wonderful example of some of the simple things you can do to reduce the impact your Spa may have on our environment. I encourage all of you to go around and examine the plaques that describe some of the techniques.

6. Climate Change Questions

- Can we continue to treat 3.5 billion years of evolution with such contempt?
- How far can we continue to grow with finite resources in a finite world?
- What is the cost of acting versus not acting?
- If the worst effects do occur, how we will justify to our children and grandchildren that we knew climate change was a chance but failed to act because we were not certain?
- So how can we act, what do we need to do?

Stopping Climate Change is up to us. Our actions today will determine the climate of tomorrow; and while the outlook is bleak, we can limit the damage if we act now. The only alternative is an environmental, economic and humanitarian catastrophe of our own making.

I encourage you all to take part in the Low Carbon Spa and Beauty Initiative and assist in keeping our world the way we know and like it.

Thank you.

Rob Cawthorne
CRI Managing Director