

The Cool Down Series # 4, 26 June 2020

The fourth webinar of The Cool Down series took place on 26th June with guests Janice L. Thompson, a Professor of public health nutrition and exercise, and Emma Thacker, professional netball player for London Pulse and England's Under 21s.

Janice's research looks to find ways to reduce physical inactivity and support healthy eating behaviours to help decrease risks for conditions such as obesity, type 2 diabetes, and cardiovascular disease. Janice works with high-risk groups in community-based settings to examine the factors that influence people's physical activity levels and food choices. Her most recent project aims to find out how people are engaging on social media during COVID-19 and how this may reflect or impact on people's eating and exercise habits.

Emma began her professional netball career being selected for the Roses Academy squad for the 2018/19 season. At 15, Thacker was given a place in the 20-strong long squad for the World Youth Cup in 2021. Emma was previously part of the cohort of U19s that went on a tour of New Zealand and Australia in June 2019 and was a member of the England squad which triumphed at the Netball Europe U17 Championships a few months prior. Already a netballer for nine years, Emma represents Vitality Netball Superleague franchise London Pulse, having previously represented Surrey Storm.

Myth-busting

There are many fads and myths out there about what food is best to eat when. Janice set the record straight for a few of these in accordance with her research and expertise.

Is it all about vitamins?

There is a wealth of vitamins available on the market that are very similar yet vary so much in price. Comparing vitamin labels and looking out for the percentage of vitamins and minerals in each vitamin product may give you a clue as to the difference between the products and hint at why there is a difference in price. Sometimes there will be two identical products at extreme prices; "go for the cheaper one, why not!" Janice recommends. Pharmaceutical companies generally charge more for organic vitamins. Vitamin supplements are not regulated like drugs, Janice notes, meaning that they have no legal responsibility for their products; however, there is usually a symbol of quality on the product's packaging that provide a benchmark for good vitamin products to buy.

Is it bad to take too many vitamins? Janice explains that a balanced diet does not need an A-Z supplement. "Most people who take them are the 'worried well'"; they do not need them but take it as insurance, which is not a problem as long as it is within a 'safety level'. If you're pregnant or have a certain disability then it is a different situation, which would need to be a question for a specialist.

Despite the rumours, B vitamins don't give you energy. In fact, "no vitamins give us energy", says Janice. Other nutrients such as carbohydrates, proteins, and minerals have the energy we need. While B vitamins are crucial to generate the energy, we don't get the energy directly from these vitamins.

A vitamin D deficiency has been recognised as being common in COVID-19 patients. But there are not enough studies into what vitamins can do, if anything, to help with Coronavirus to confirm or

debunk the role of vitamin D in Coronavirus cases. Indeed, Janice points out that most UK citizens are vitamin D deficient, especially during the winter months where there is not much sunshine and we stay inside a lot of the time out of the rain. During lockdown, despite the sunny weather, many of us are still inside isolating or staying safe, and are therefore not absorbing enough vitamin D naturally. However, food is very important, and the nutrients we get from food can help us to optimise our immune function and health that may mediate risks to infection.

Is eating fats bad?

Eating fats does not necessarily make you fat, Janice says. We are not metabolically identical to each other and so how much of certain nutrients we need varies between individuals. But generally speaking, when we eat anything in excess it saturates our stores of that nutrient. So those who have a high fat diet, for example, will gain body fat.

Are superfoods worth it?

“I don’t think there are such things as super foods; there are foods that are high in nutrient per calorie,” Janice says. Greens such as kale are really good, but green superfoods are not necessarily *better* than other green foods. “You can have a diet of superfoods that is a good diet, but I wouldn’t target a certain superfood per se.”

Should we continue to shake up the protein?

Most people are worried about protein when they are active, notes Janice, but getting enough carbohydrates is what people should be more worried about. Carbohydrates are important because they are the most efficient nutrient to get energy. Most people can get enough protein from eating at least two animal products a day and don’t need additional protein supplements. If there is enough excess of protein then you can actually build up fat from it.

With regards to ‘when’ to consume protein: this timing is specific to the individual. Janice points out that there is a lot of good research out there about timing when to eat protein, such as Louise Burke, exercise physiologist at the Australian Institute of Sport, and [Gatorade Sport Science Institute](#). Sleep effects how much protein can be useful. Age too; for example, older people don’t build as much from protein, but consuming before sleep can have a beneficial effect for some people.

Putting nutrition where the mouth is

Emma talked about her eating habits, and said that the best thing to do is to eat in variety. “Food is the best thing,” she says. Making sure you know what your body needs to be healthy is really important. “I eat what I need to fuel my body” rather than following anything that is said on social media. While lots of athletes take supplements, such as protein powders, the industry does not specifically encourage this, and Emma chooses to rely on natural food intake to get what she needs.

Janice agrees that the more varied our diet regarding the different types of food we consume, the more likely we will get the nutrients we need for our body. “It’s the lack of variety and over-focus on a few foods [like superfoods] that can be problematic.” Athletes are some of the most informed people about what they need to eat but different people have different styles of eating, and reasons why they don’t eat certain foods, such as veganism or vegetarianism. In the UK, though, we are well

resourced such that we can be vegan, for example, and still have access to alternatives that make up a balanced and healthy diet.

Both Emma and Janice agreed that we should consider our own needs for our diet. Janice suggested that there are plenty of apps for tracking and mapping diet and nutrient intake that are quite informative.

Nutrition advice for training

Emma and Janice discussed their take on the 'what and when' for managing motivation, nutrition, activity, and injuries whilst training.

How do you manage your motivation for training during lockdown?

Emma talked about her experience in trying to stay connected with training partners and groups in lockdown. Emma believes that social media really helps to keep in touch with your team during training, especially in the early stages of lockdown. Emma shares her achievements in training with her team mates via 'chat' in addition to having online meetups with her coaches about her physical but also mental fitness. Sometimes knowing everyone is in the same position as you can be quite comforting but also having a strong and supportive network around you can keep you motivated. Although, it will never replace real life interaction; training is made easier being physically with your team mates. Social media can be a bit toxic at times; for example, when other people are constantly sharing workouts, it can sometimes be good for motivation sometimes, but other times it can be hard not to compare yourself to those people and thus increase anxiety about your own workout routine. Making sure you have a constructive group around you who are willing to share their training ups and downs can be very productive, however.

How much weight should you lose per week and what would you recommend for a competitive athlete?

Two pounds a week is the most common answer. Many people use dehydration as a weight loss method but this is not a good technique; although, it is part of the culture of certain sports. Losing weight and changing diet can affect energy levels that might impact your competitive performance, so Janice recommends athletes that you work on your weight loss when you're not in competitive season.

For muscle growth, how many grams of protein do we need to eat to achieve hypertrophy/building muscle?

It is dependent on the type of exercise you do and how you balance that with nutrients. A standard recommendation is to consume .8 gram of protein per kg bodyweight per day. For endurance sports and training, this could be raised to 1.2, 1.4, or 1.6; for strength training, up to 2.0 per kg of bodyweight. Resistance training is best with the appropriate nutrients, and if you're consuming more protein but not the appropriate energy nutrients, there will be limited, if no, effect. There may also be a ceiling effect, where it doesn't go any further than a certain point. Overall, it is the right balance of energy, the activities you do to build muscle, and the nutrients you consume that gets you the results.

How did you manage your injuries?

Emma reflects on her experience when she injured her ankle in 2018 and missed out on a whole competitive season. “Motivation is biggest challenge” in managing an injury, says Emma, “but there are the physical challenges of injury itself as well”. Following advice from coaches and physiotherapists can help one come back from injuries a better athlete. Emma kept going to training sessions to familiarise herself with the environment and get to know the team. She also went to all the matches and camps to stay involved with the activity and the people.

Concerns over global food consumption

During the webinar, some very big topics were discussed regarding the impact of eating meat, and global warming and climate change on food production. Janice provided her expert opinion on these topics.

Should we be eating less meat?

This is a nuanced and complex issue and there is not a simple answer. Wealthier countries with a diverse food landscape are capable of having a high nutrition diet without being deficient. Vitamins iron and zinc are naturally in meat and we can find alternatives to meat but some countries and cultures don't have alternatives and so need meat to survive.

“I don't think we need to completely obliterate eating meat,” argues Janice.

We need an integrated food consumption map available to know what resources we have available so we can look for a balance and not damage the environment by overeating meat products. There is not 100% production on alternatives to meat. “Not all of us have to become vegan, and perhaps some of us can't” because we require specific nutrients afforded only by meat.

Another thing to keep in mind is that if we change our diet drastically all at once, it will impact the economy and also the prices of foodstuffs. There are some high quality meat products out there, but these can be more expensive. We therefore need to balance consumption of meat and other food products because only having high quality meat available for those people who can afford will exclude those who can't and therefore impact their diet.

Genetically modified (GM) foods need to be clearly labelled too. The impact of GM is a challenging area because not all GM foods are bad either. We need to make food trade not only about economics but also about health. Being more informed about our choices and the resources available to us as a country may go some way to balance these concerns over meat consumption.

Do you think global warming will change our diets in our future?

Rethinking how we eat may help us to prepare for the impact of global warming on food availability and cost. Climate change and its extremes means that certain crops might not thrive in places where it has done previously, thus there may not be the same level of product in the market, which affects the cost of the product. Sometimes buying imported goods is better when local production is more costly – monetarily and environmentally speaking – because growing produce that is not natural to a specific country's climate can have a worse impact than compared to where it grows naturally in another country and gets imported. We need to be savvy with our food choices at the supermarket. We maybe won't get to eat all the fruits and vegetables we like all year round, and might have to go back to a more seasonal approach.

The Cool Down series is back in August 2020. Meanwhile, ActionPact are running the City Champs Summer Heats that involves individuals working in a team throughout July. To find out more, go to [ActionPact.life](https://www.actionpact.life).