DNAfit

Sample Report Health Fit

healthsample

Your Report

Meet the Team

Result Summary

Your Results

Stress Tolerance

Warrior/Strategist

Chronotype

Sleep Quality

Caffeine and Sleep Disturbance

Sample Report Health Fit

Your Stress & Sleep Report

Hi
Sample Report,

We have now processed your sample and developed your own, personal genetic stress and sleep profile. These results will tell you about your genetic traits and any lifestyle changes you might benefit from.

We've analysed your genes, so we can reveal a clearer picture of how you're built to sleep and cope with stress, understand your body's response to caffeine and whether you're more productive in the morning or at night. We champion an approach to wellbeing that focuses on lasting research-based changes that can add up to meaningful health improvements over time.

At DNAFit we don't use your results for anything other than supporting you in your wellness journey. Unlike many other genetic profiling services, we're not in the business of mining data. Your results are yours, and yours alone. We will never sell or share your data with anyone else.

Welcome to your personal DNAFit report

Dear Sample Report,

At DNAFit, we've been pioneering the use of personal genetics for a truly individualised approach to wellbeing for many years now. We are really pleased to welcome you to your personal genetic report. We believe that real wellness comes from finding the right path for you, and understanding the basis of how your genetics impact your stress and sleep report helps kick start your health journey.

Within your report, you'll discover how your DNA can impact everyday decisions to allow a better personalised lifestyle. We'll show you the genetics variants we analysed, how they affect you, and what sort of action you can take in your lifestyle based on these results.

To build your report, we've used hundreds of scientific papers to create a selection of genes that have been repeatedly shown to impact your nutrition, fitness or wellbeing response.

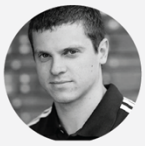
Genetics is only one part of the picture, but an integral part in our health journey. Who we are is built on the unique interaction between our nature and our nurture, so let's get started and help you understand more about your nature, so we can help you personalise your nurture.

If you have any questions or queries about your report, please contact us anytime at info@dnafit.com or via your personal wellness coach using the DNAFit app.

Wishing you all the best on your personalised wellness journey!

The research behind your report was created by the DNAFit Scientific Advisory Board

Dr. Keith Grimaldi
Chief Scientific Officer



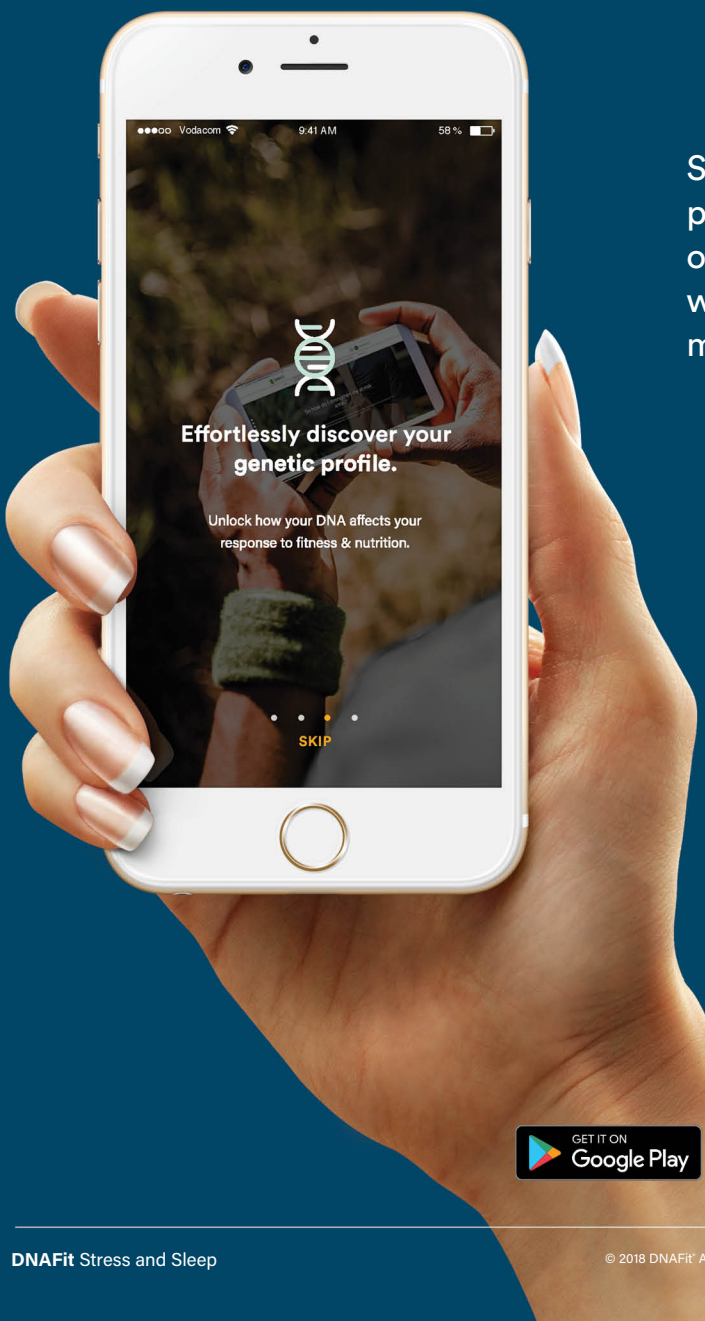
Craig Pickering
Head of Sport & Exercise Science

Dr. Senthil Sundaram
Chief Clinical Officer

Dr. Lawrence Tzang
Group Chief Scientific Officer

Prof. Ildus Ahmetov
GWAS Research Lead

Take your DNAFit journey to the next level



Stress and sleep is only one piece to the puzzle. Unlock your entire genetic journey on the DNAFit app. You can even chat live with one of our expert wellness team members!

GET IT ON Google Play

Download on the App Store

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What This Report Will Cover

01 Genetics 101
Get to grips with the basics of genetics to help you understand your results and discover how we interpret your genes.

02 Results Summary
A one-page infographic overview of all your individual genetic nutrition profile results.

03 Stress Tolerance
Understand how your genetics may affect your individual tolerance to stress.

04 Warrior or Strategist
When it comes to performance under pressure, there is a sliding scale of responses. This is a result of a gene called COMT

05 Genetic Chronotype
Discover the role genetics can play in how well you perform in the morning compared to the evening.

06 Sleep Quality
We'll help you understand how your genetic profile can affect your sleep quality.

07 Caffeine & Sleep Response
Certain versions of the ADORA2 gene have been specifically linked to the effects of caffeine on sleep quality.

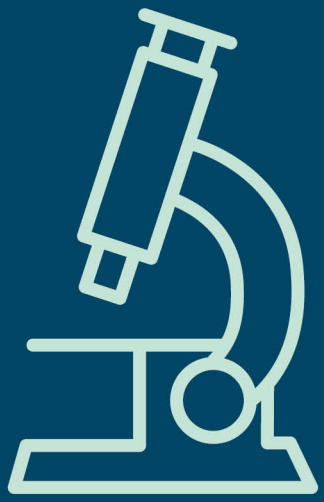
01

FIRSTLY

Genetics 101

To help you get the most out of this report, here's a quick 'Genetics 101.' Once you've got an understanding of the basics of genetics, you'll be all set to make the best use of your results and help apply them to make the lifestyle changes that are right for you.

We've brought together the latest genetic research to help you optimise your stress and sleep.



IMPORTANT TO KNOW

What's a gene?

A gene is a specific segment of your DNA. It contains instructions for your body to make the thousands of different types of proteins it needs to function. Each gene has a specific job to do, and we're focusing on those genes that affect many factors around wellbeing & everyday health.

What's a genotype?

With every gene, the specific version of that gene that you carry is called your genotype. Depending on your individual genotype, you may have a different genetic response to certain lifestyle factors.

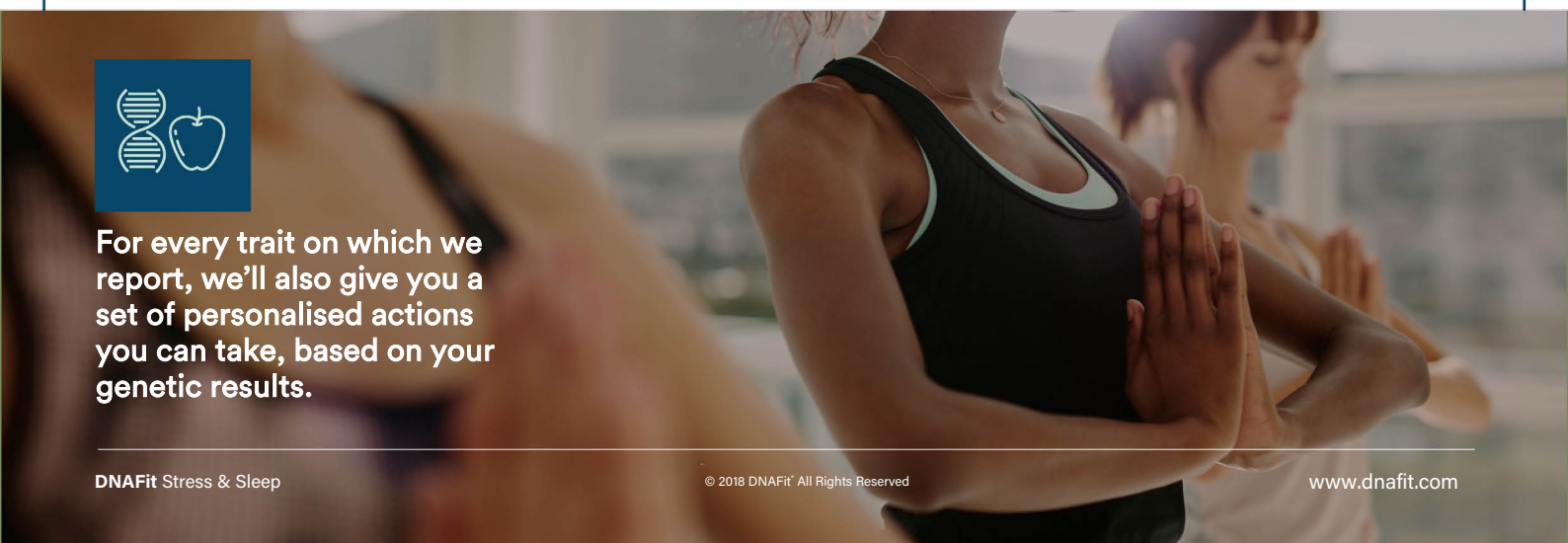
What do the letters in my genotype mean?

Each gene is comprised of smaller molecules, and these are represented by a combination of letters. These letters are called 'Alleles' - they are tiny variations on a section of a gene. There are most commonly shown by the following four letters:

A C G T

With each section of your DNAFit report, we'll give you a set of easy to understand actions and explanations of your genetic profile. In each section, we'll take you through:

- Which genes we've analysed & why
- How these genes affect each trait
- The version of these genes that you carry
- The impact that your genotype has on each trait



For every trait on which we report, we'll also give you a set of personalised actions you can take, based on your genetic results.

Introducing the role of genetics in Stress & Sleep

Although your genes may affect your individual response to stress, environmental factors and your upbringing also play a significant role.

We all experience stress at one point or another in our lives but not everyone responds in the same way. Our lives, upbringing and experiences can all have an impact on individual responses to stress. Research has shown that certain genes can make us more sensitive to life's stresses and strains.

Stress is a major issue facing people in all walks of life, and we consider this a normal and everyday factor. However, you may be surprised to learn that only 50 years ago the term 'stress' was not even in regular use.

Though we tend to think of stress as negative thing, this is not strictly true. We can break stress down into two categories:

Eustress, which is considered positive and Distress, which is considered negative. If we manage our stress successfully then Eustress enables successful adaptation which improves performance and resilience. The word 'stress' in itself, should be considered neutral.

Genetic data is all about personalisation. Because you're unique.

Let's start your personalised journey →

02

NEXT

Your Results Summary

Let's make your stress and sleep choices more personal. We've analysed your DNA sample for a selection of the most-researched genetic variants connected with response to stress & sleep. We are looking at everything from stress tolerance to your individual response caffeine has on sleep.

Your Stress and Sleep Result Summary

Your stress and sleep result summary

Your Name
Sample Report Health Fit

Sample no.
healthsample

Report date
2019-06-27

Sleep and stress have a two-way relationship; being stressed makes you less likely to sleep, and sleeping poorly reduces your psychological coping capacity, increasing the chances of feeling stressed.

STRESS RESPONSE

Stress tolerance

Medium tolerance

Your genetic results detected variations in the genes tested that indicate an intermediate overall tolerance to stress. This may position you as someone with a medium tolerance to stress.

Warrior to strategist

Strategist result

Your result of AA is often referred to as the "strategist" genotype. This is associated with more exploratory tendencies, lower COMT enzymatic activity and therefore higher dopamine levels; that appears to signal a lowered pain threshold, yet also a more efficient processing of information under most conditions. People who carry this version of the gene also appeared to possess more adventurous tendencies than others.

SLEEP RESPONSE

Genetic chronotype

Night owl bias

Your results suggest you have a genetic predisposition to having a bias toward being a night owl! This means your circadian rhythms are regulated in a way that lends you to have higher hormonal activity later in the day.

Sleep quality

Medium result

Your results indicate that you are at the mid point of our genetic sleep quality scale. Individuals with your genotype tend to wake a normal amount of times over night, and have average sleep depth.

Caffeine and Sleep

Higher sensitivity

Your genotype indicates that you are predisposed to sleep disturbances if you have caffeine too close to your bedtime.

03

NEXT

Your Stress Tolerance

In this section of the report, we have looked at genetic variants that are associated with an individual's stress tolerance. Individuals may have a high or low genetic predisposition towards being more tolerant to stress. Awareness of a genetic predisposition to potentially low stress tolerance may help reveal areas of focus towards improving mental wellbeing.

Your Stress Tolerance

Your Results

Medium tolerance

Your genetic results detected variations in the genes tested that indicate an intermediate overall tolerance to stress. This may position you as someone with a medium tolerance to stress.

Others like you | **33%** of our users have the same result as you

Did you know?

The word 'stress' comes from the latin term 'stringere' which means 'to draw tight'. Interestingly, laughing has even been shown to actually reduce stress hormones.

Your Genotype Table

These genes are linked to factors such as individualised dopamine response to different stimuli in our lives which affects our overall stress tolerance.

Your stress tolerance gene profile

Genes Tested	Your Genotype	Effect
XKR6	CC	-
MIR2113	AA	●●
BDNF	AG	●
COMT	AA	-
DCAF5	AG	●
FKBP5	TT	-
FKBP5	CC	●●
HTR2A	TT	-
LINCOO461	CC	●●
LINC00461	AG	●
NOS1	CC	●●
OXTR	AG	●

Understanding Your Result

It's important to understand that whatever genetic variants you may hold in terms of response to stressful impetus, genetics is only one side of the story. Lasting change comes from understanding how you can alter your habits, your environment and your lifestyle in order to feel more in control and able to cope with demands of day-to-day life.

Your Action Items

Based on your genetic result, we recommend the following action points:

01

Heart rate variability training

Practise heart rate variability (HRV) training in the form of cardiovascular exercise 3-4 times per week, such as walking, jogging or cycling. This can reduce your resting HRV which is linked to a better response to stress, improving your ability to adapt quickly in stressful environments.

02

Breath control training

To improve stress tolerance, try practising breathing control. When we get stressed, our breath often becomes shallow. To break the stress cycle, try shifting to slow deep breaths by slowly breathing in through your nose, allowing your chest and lower belly to rise as you fill your lungs, and breathing out slowly through your mouth.

04

NEXT

Your Warrior or Strategist Response

How well an individual can process information whilst under stress and pressure varies from person to person. When it comes to performance under pressure, there is a sliding scale of responses, and this is a result of a gene called COMT.

Your Warrior or Strategist Response

Did you know?

No matter what your genes, research shows that with the right training, you can cope with stressful situations well. Even elite military soldiers are often strategists rather than warriors.

Your Results

Your result of AA is often referred to as the "strategist" genotype. This is associated with more exploratory tendencies, lower COMT enzymatic activity and therefore higher dopamine levels; that appears to signal a lowered pain threshold, yet also a more efficient processing of information under most conditions. People who carry this version of the gene also appeared to possess more adventurous tendencies than others.

Your Genotype Table

Studies link the COMT gene to an individual's ability to cope with stress. Analysing this gene can help to predict how you respond to high pressure situations – at work, at home or when exercising.

Your warrior or strategist gene profile		
Genes Tested	**Your Genotype**	**Effect**
COMT	AA	-

Others like you | **25%** of our users have the same result as you

Understanding Your Result

Neither version of this gene should be considered 'good' or 'bad' they're just different. Understanding your genotype allows you to better understand your lifestyle to suit your warrior or strategist response.

Your Action Items

Now that we've learnt about your warrior or strategist response, let's take a look at the actions you can take, especially if you are being affected by negative stress:

01

Mindfulness practise

Mindfulness is the practice of bringing your focus to the present moment. Feelings of stress and pressure typically stem from our thoughts about what 'could' happen. Mindfulness helps to mitigate these feelings by training the ability to keep your attention on the here and now. As you have a mixed warrior strategist response it is recommended that you engage in mindful meditation 3-4 times per week.

02

Cognitive behavioural therapy

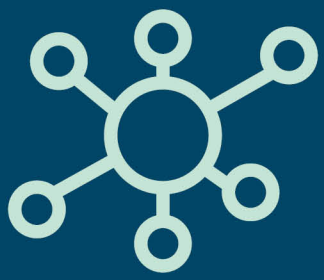
As you have a strategist response you will benefit most from practising CBT in high pressure situations. CBT is the practice of recognising your internal thought processes and reframing them in a way that is beneficial to you. For example, in high pressure situations, thoughts of nervousness can be reframed as excitement.

05

NEXT

Your Genetic Chronotype

Have you ever noticed how some people can get up early and be really energetic, whilst some of us don't feel alive until after 10am and a bit of coffee? The same is true at the opposite end of the day; some people prefer to go to sleep earlier, whilst others find getting to sleep before midnight difficult. This is linked to differences in our circadian rhythms.



Your Genetic Chronotype

Did you know?

Some people are able to exist on very little sleep, but Albert Einstein is said to have slept for over 10 hours every night.

Your Results

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Night owl bias

Your results suggest you have a genetic predisposition to having a bias toward being a night owl! This means your circadian rhythms are regulated in a way that lends you to have higher hormonal activity later in the day.

Others like you | **55%** of our users have the same result as you

Your Genotype Table

We have tested six genes that can indicate whether you are more likely to be a morning or evening person. Here they are combined to give you an insight into your chronotype.

Your genetic chronotype gene profile

Genes Tested	Your Genotype	Effect
RNASEL	TT	-
VIP	TT	-
PER3	AA	-
PER2	GT	●
RASD1	GG	●●
FBLX3	TT	●●
PLCL1	CT	●
RGS16	AA	-
HCRTR2	CG	●

Understanding Your Result

Your genetic chronotype influences your circadian rhythm; your brain's sleep-wake cycle. This determines when you're alert and when you're sleepy over a 24-hour period. It's the internal clock that your brain uses to signal when to release certain hormones.

Your Action Items

Based on your genetic result, we recommend the following action points:

01

Boost productivity

As you have a bias towards being a night owl consider starting work later in the day for peak productivity! Whilst this might not always be possible, whenever it is realistic, you may find some extra productivity if you can start work later in the day.

02

Plan your day

Working on something really hard? Get the easy stuff out of the way in the morning, then use you night owl tendencies to complete more complex tasks later in the day.

06

NEXT

Your Sleep Quality

Sleep is one of the most important factors in helping manage our stress and wellbeing. However, when it comes to our sleeping habits, we're all very different. Some of us find it very easy to fall into a deep sleep, or stay asleep in a noisy environment, while others are the opposite. In this section of your report we'll look at your genetic sleep quality predisposition.

Your Sleep Quality

Did you know?

Sleep and stress have a two-way relationship; being stressed makes you less likely to sleep and sleeping poorly reduces your psychological coping capacity.

Your Results

Medium result

Your results indicate that you are at the mid point of our genetic sleep quality scale. Individuals with your genotype tend to wake a normal amount of times over night, and have average sleep depth.

Your Genotype Table

We have analysed two genes to determine how your genetics affect your sleep quality.

Your sleep quality gene profile

Genes Tested	Your Genotype	Effect
ADA	CC	●●
MEIS1	GG	-

Others like you | **82%** of our users have the same result as you

The Power of Sleep

Sleep, both quality and duration, is also linked to stress. In fact, this relationship works both ways – lack of sleep and poorer sleep quality appear to increase the likelihood of feelings of stress and anxiety, whilst stress itself reduces the quality and duration of sleep.

Your Action Items

Based on your genetic result, we recommend the following action points:

01

Sleep hygiene

Everyone should follow good sleep hygiene routines, in your case you should place a strong importance on these. Sleep hygiene includes avoiding overly stimulating activities in the hour before bed such as watching a scary film, consuming alcohol, or spending time on electronic devices. Instead, aim to progressively wind down before bed.

02

Sleep routine

Sleep quality is impacted by your day-to-day routine. Introducing a sleep routine where the focus is going to bed at the same time every night and waking up at the same time every morning will regulate and prepare your body for sleep. You should consider a sleep routine if you often experience disrupted sleep.

07

NEXT

Your Caffeine and Sleep Response

Caffeine is the most common stimulant we ingest on a regular basis. As we all know, we primarily get our caffeine from coffee, but also from energy drinks, tea and even certain medicines. The stimulant effects that caffeine are famed for may also disrupt our sleep.

Your Caffeine and Sleep Response

Did you know?

Caffeine makes us feel more awake, it does this by competing with adenosine for adenosine receptors.

Your Results

Higher sensitivity

Your genotype indicates that you are predisposed to sleep disturbances if you have caffeine too close to your bedtime.

Your Genotype Table

Certain versions of the ADORA2 gene have been specifically linked to the effects of caffeine on sleep quality and insomnia risk.

Your sleep quality gene profile

Genes Tested	Your Genotype	Effect
ADORA2	CC	●●

Others like you | **26%** of our users have the same result as you

Caffeine and Health

While a moderate amount of caffeine is usually harmless, in some people excessive caffeine intake can cause anxiety, insomnia, headaches, and stomach irritation. For some people, excess caffeine intake has also been linked to high blood pressure. Take a look at your DNAFit nutrition report to find out more about your body's response to caffeine.

Your Action Items

Based on your genetic result, we recommend the following action points:

01

Caffeine timing

Based on your results, we recommend that you limit caffeine intake after 4pm in order to improve your sleep quality.

02

Caffeine sources

You fall in the highest bracket for the impact of caffeine on your sleep, and as such we recommend that you adjust your caffeine intake. Try drinking more herbal teas, decaffeinated coffee and caffeine-free fizzy drink options throughout the day to reduce your caffeine intake.

Terms and Conditions

You are at all times responsible for any actions you take, or do not take, as consequence of the assertions or recommendation in this report, and you will hold DNAFit, its officers, employees and representatives, harmless against all losses, costs and expenses in this regard, subject to what is set out below.

To the fullest extent permitted by law, neither DNAFit nor its officers, employees or representatives will be liable for any claim, proceedings, loss or damage of any kind arising out of or in connection with acting, or not acting, on the assertions or recommendations in this report. This is a comprehensive exclusion of liability that applies to all damage and loss, including, compensatory, direct, indirect or consequential damages, loss of data, income or profit, loss of or damage to property and claims of third parties, howsoever arising, whether in tort (including negligence), contract or otherwise.

Nothing in this statement is intended to limit any statutory rights you may have as a consumer or other statutory rights which may not be excluded, nor to exclude or limit our liability to you for death or personal injury resulting from DNAFit's negligence or that of its officers, employees or other representatives. Nothing in this statement will operate to exclude or limit liability for fraud or fraudulent misrepresentation.

The information contained within this report cannot be used as specific medical or diagnostic advice, but rather provides you with information to better understand wellness traits associated with your genotype.

Furthermore, DNAFit do not provide any information about your ancestry. If you have any specific concerns related to health status, genetic testing or lifestyle changes in relation to your own personal health then please consult with a qualified healthcare professional.

We will use the information you give to us in product 'R&D' (Research and Development) to enhance the DNAFit Services, the quality of the products and the customer journey. Information for this purpose will be used only within DNAFit and will be de-identified. Our analytics for this will include but not be limited to web behaviour, product acquisition, user demographics, campaign results and complaints.

The purpose of the DNAFit service is to give you the power to use your Genetic Information to explore personalised solutions to reach your wellness goals. We aim to give you further understanding of your own macro- and micronutrient needs, your response to power or endurance exercise and recovery speed and sports injury risk.

Genetics is only one part of the picture, and so the value comes from understanding your genetic profile so that you can make sustainable changes that support your own goals, lifestyle and environment.