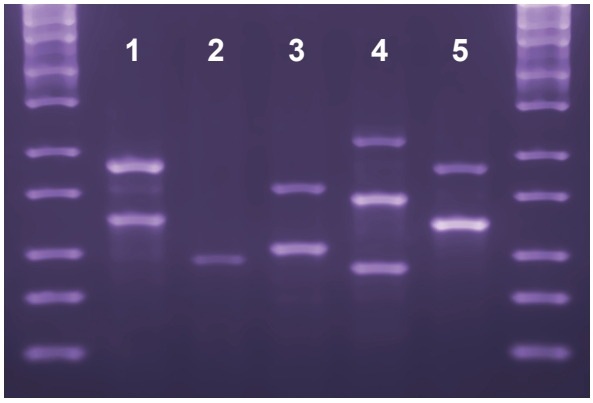
Matt Dixon

Play DNA Sports



Lane	Your Genotype	Description
1	**PPARA** **GG** 'Fat Burning'	**You have two copies of the G allele.** The G allele has been found to be present in elite endurance athletes more often than would be expected by chance. Individuals with this genotype tend to have a higher percentage of 'endurance-friendly' slow twitch muscle fibres and are also more efficient at switching their metabolism to fat burning, a rich source of energy for the body. As a result, individuals with this genotype tend to be well suited to endurance-orientated sports.
2	**ACE** **DD** 'Endurance'	**You have 2 copies of the "power" D allele.** This genotype is associated with better 'strength endurance', where a high anaerobic energy contribution is required. It appears to be correlated with a predominance of fast twitch muscle fibres and greater redirection of blood flow from slow twitch to fast twitch fibres. As a result, individuals with this genotype tend to be better suited to sprint/power sports. This could an optimal genotype for elite sprinters and throwers, weight lifters.
3	**ACTN3** **XX** 'Speed'	**You have two copies of the 'endurance' X allele.** Individuals with this genotype are unable to produce any functional alpha-actinin-3 protein, a protein associated with a 'boost' in muscle strength and performance. Although not harmful, it appears to be detrimental to the rapid, forceful muscle contraction needed in speed/power sports. However the X allele has been linked to improved endurance performance. As a result, individuals with this genotype tend to be better suited to endurance sports such as long distance running.
4	**UPC2** **AV** 'Metabolism'	**You have one copy of the A allele and one copy of the V allele.** Individuals who have this genotype tend towards having a metabolic rate and metabolic efficiency intermediate between the two alternative genotypes. Intriguingly, a study of American Indians showed that those who had this particular genotype tended to have higher metabolic rates during sleep than both alternative genotypes.
5	**PPARGC1A** **SS** 'Aerobic Capacity'	**You have two copies of the S allele.** Found less frequently in elite endurance athletes, the S allele is linked to lower aerobic capacity. Despite this it does not appear to affect an individuals ability to perform in speed/power-based sports. Individuals with this genotype may actually be more capable of improving cardio-respiratory fitness (i.e. will see greater overall improvement from baseline levels), when physically active; regular aerobic exercise is likely to be particularly beneficial to the health of these individuals.

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