

# Talent identification and development in Women's Artistic Gymnastics in Australia

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## Sports Profile: Women's Artistic Gymnastics

Research in talent identification over the past 25 years has focused on a debate between natural abilities as a determinant of elite sporting success versus the influence of training environment as being the major factor. In reality both factors play a part, forming a continuum determine an athlete's ultimate success within a sport. As an individual artistic sport gymnastics is categorised 2 on a 1 to 5 scale, closer to the natural abilities end of the spectrum.

Women's gymnastics is typified with athletes demonstrating a unique physique and clear, identifiable physical attributes. Elite gymnasts are identified early, characteristically small for their age with low body weight (under the 30%ile for height and weight), good body posture, high strength to weight ratio and an extremely high level of coordination. This is a critical factor in allowing the athlete match the biomechanical requirements of the sport.

Figure 1 outlines the specific performance factors considered

critical in the identification and selection of gymnastics talent.

Identification is not an exact science and athletes are able to compensate for weaknesses in one area for strength in another.

The GA Pathways team are responsible for the identification and development of talent and lead a two pronged approach with a standardised assessment process for both talent identification (of raw athletic talent) and talent selection (for athletes already in the gymnastics pathway).

Identification of talent occurs early (ideally between the ages of 6-9) with national testing protocols conducted by clubs and national high performance centres. It is a combination of objective and subjective testing involving anthropometric measures, physical testing and observation.

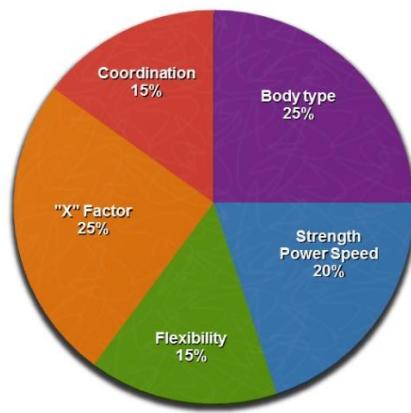


Figure 1: Performance factors in talent identification in women's gymnastics



Figure 2: Women's Artistic Gymnastics talent pathway

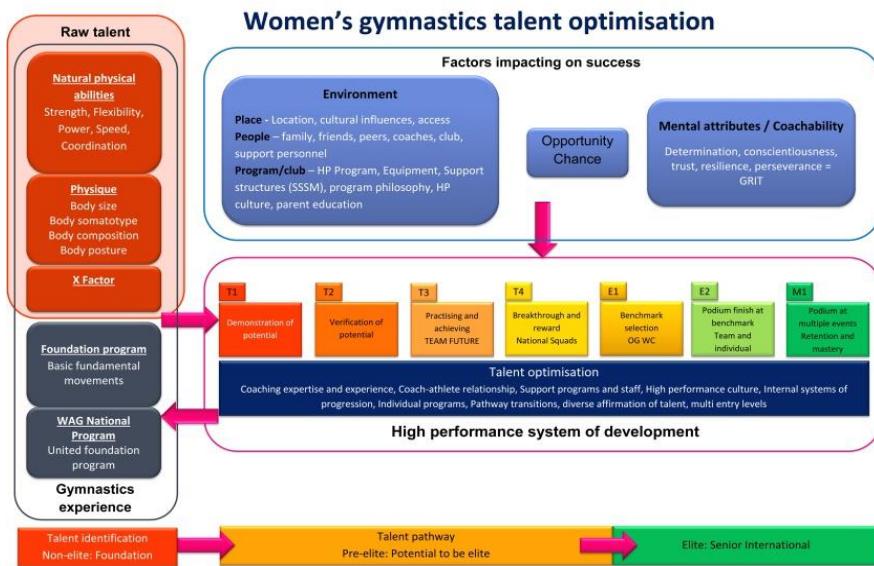
The WAG competition pathway is based on the FTEM model.

Figure 2 outlines the current athlete development pathway for athletes participating in women's gymnastics in Australia. The development of talent through the high performance pathway is through the GA IDEAL Skills and Team Future program. This is a multidimensional program, focusing on physical, technical, mental and competitive development through an ongoing age and developmental stage testing program.

Possessing the optimal physique and natural abilities for gymnastics is more likely to result in high performance success in gymnastics, however this alone will not achieve the elite success. An athlete's coachability must be considered along with the influences of an optimal learning environment in which to foster the holistic development of a gymnast. The international changes to the scoring system have altered the

increase in focus on power and difficulty, impacting on the identification, selection and development of talent.

The transition process into the pre-elite pathway and placement into an optimal training environment is a challenge for talent selectors. Australia's remote landscape and the equipment, personnel and structural resources required for elite level training can be a large barrier to opportunity. However most clubs can provide the equipment at the low level but require a stronger network facilitating education of coaches and club structures. The development of broad networks with identified satellite clubs to support the national high performance clubs and programs can overcome this.



**Figure 3** endeavours to highlight the identification and optimisation of gymnastics talent in Australia. This model has been formulated by the author, applying the concepts developed by Gagné and FTEM model of sporting development.

**Figure 3: Identification and optimisation of talent in Women's gymnastics in Australia**

Provision of flexible entry points into the pathway will allow for the non-linear developing athlete to be identified at later stages. Difficulties may arise with late selection if the athletes are older as the potential for safe, slow development of technical skills can be challenging however experienced coaches, carefully monitoring and individual planning can overcome this.

In summary, the methods of gymnastics talent identification are a combination of subjective and objective factors. Increased education around testing protocols will improve consistent application and the revised competition program will broaden the TI opportunities. The transition into and out of the high performance pathway is complicated and needs to remain flexible with strong education and support for parents, athletes and coaches and potential transition into coaching to be explored further. The talent pathway is well structured with a strong systematic and holistic development program for athletes and coaches. Challenges arise with effective implementation of the Team Future program. The ability to establish broader satellite network to facilitate coach mentoring and development will strengthen the high performance pathway. Identification and development for emerging coaches, particularly in the areas of technical and interpersonal skills will further optimise gymnastics talent in women's gymnastics.