



# NUTRITIONAL SUPPLEMENTS IN WEIGHTLIFTING

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# Nutritional Supplements

- Most of the Athletes und Coaches believe in the use of Nutritional Supplements as „powerful“ Performance-Enhancers:
- But there is only a poor scientific evidence about!
- But there is a lot of Marketing by the Producers, it's a Billion-\$-Market & they like to be linked to your success to earn more money;
- But there is a high risk of „Cross-Contamination“ with the consequence of an adverse analytical finding.



# The right way

- You will have **more** performance-enhancing effects while focussing on the following recommendations:
- active REGENERATION,
- the right NUTRITION,
- stop of NICOTINE,
- avoid ALCOHOL,
- enough SLEEP at the right time,
- check and improve (when necessary) DENTAL HEALTH
- avoid PAINKILLER'S (e. g. diclofenac, ibuprofene and other NSAID's.).



# Active Regeneration

- ❑ A lot of people think, without using forbidden substances, we need to train more and harder. This is **WRONG**.
- ❑ You need **MORE QUALITY** in your training, especially in technical performance, but **NOT MORE VOLUME/INTENSITY**.
- ❑ You need more „**ACTIVE REGENERATION**“, especially than „older“ the athlete.
- ❑ Contact your Team Doctor, your Olympic Committee or the IWF MC for more information about the active regeneration.



# Nutrition

- High quality food, rich on vegetables and fruits („5 a day“-rule) is scientifically proven better, than taking „Powders and Pills“, because everything, what is coming out of its natural matrix (f. ex. Vitamine C from an Orange or a Kiwi) is better used in the human body.
- Too high dosage of Vitamines can even have **NEGATIVE** effects on your performance!
- Even the high performant weightlifting athlete does **not need more than 1,8g/kg b.w. of Protein** (by nutrition, e.g. milk) per day, but it depends on the timing!
- „Powders and Pills“ cannot compensate a bad nutrition!
- Contact your Team Doctor, your Olympic Committee (IOC Consensus on Sports Nutrition 2010) or the IWF MC for more information about the right sports nutrition.



# Nicotine & Alcohol

- Nicotine has 7 different pathophysiological ways to interfere with the human body in a negative way.
- Therefore, Nicotine impairs your performance about **15%**!
- Alcohol weakens your muscles while inducing loss of electrolytes, vitamins & micronutrients.
- Alcohol turns your efforts about a better nutrition into nonsense!
- Contact your Team Doctor, your Olympic Committee or the IWF MC for more information about these issues.



# Sleep & Painkillers

- A good performance improvement requires:
- enough sleep, good quality of sleep & regular wake-up time, as well as
- the right time to go for sleep (due to the natural peak of the human growth hormone).
- There is an evidence about the negative impact on performance by using painkillers (NSAID 's)!
- Contact your Team Doctor, your Olympic Committee or the IWF MC for more information about these issues.



# Dental Health

- 18% of OG 2012-athletes felt reduced in their performance due to dental problems, 50% of them hadn't have had any dental check-up in the last 12 months.
- Brush twice a day your teeth with a high-fluoride toothpaste and rinse at least once a day with mouthwash (at a different time than brushing).
- Go at least twice a year for dental check-ups to avoid reduced performance in training ad/or competition due to dental problems.





# Risk assessment I

- Never forget: the risk of cross-contamination is certainly higher than the possible increase of performance by supplementation and it is the athlete who is responsible for what is found in his/hers body!
- If you still believe in the need of nutritional supplements, the procedure to minimize the risk of cross-contamination should be as follows:
- First check which supplement might be useful and has at least a certain evidence:  
[http://www.ausport.gov.au/ais/nutrition/supplements/classification\\_test](http://www.ausport.gov.au/ais/nutrition/supplements/classification_test) (Group A is recommended only!)



# Risk assessment II

- ❑ Purchase only from suppliers who are **regularly quality-certified** and have a **regular testing** of their products for forbidden substances in **regularly quality-certified** laboratories.
- ❑ Purchase only products you *really* know from, where they are *produced* (not sold).
- ❑ If only one answer is „No“, don't purchase there!



# Key Message

- Think about the way you train, especially do more active regeneration and avoid overtraining,
- improve what and the way you eat & drink,
- improve your lifestyle &
- stop smoking
- to get a real and fair world class high performance weightlifter without forbidden means!
- If you still believe in the need of nutritional supplements, then you should follow the risk assessment procedure to avoid Adverse Analytical Findings.