

PHYSIOLOGICAL STANDARDS



This section provides the benchmarks for the WCL senior national team (men and women) by the number of years before the Olympic Games. The benchmarks and the way they are measured are as follows:

1. **Aerobic capacity** (i.e., endurance), measured in ml/kg/minute
2. **Power clean:** We use a calculation of the weight lifted divided by the individual's body weight, in kilograms.
3. **Back squat:** idem.
4. **Bench press:** idem.
5. **Pull-ups:** we measure the maximum number of repetitions with good technique.
6. **Squat jump:** we measure the number of watts per kilogram of body weight for the individual.
7. **Counter-movement jump:** idem.
8. **Horizontal jump:** the total distance in centimeters.

Note: with any strength exercise or Olympic lift used as test, it is imperative that the athlete maintains good form. If their technique is not good, that repetition does not count.

MEN: PHYSIOLOGICAL BENCHMARKS SIX TO EIGHT (6-8) YEARS BEFORE THE OLYMPIC GAMES

TEST	MEASUREMENT	GOLD	SILVER	BRONZE
AEROBIC CAPACITY	ml/kg/min	54.1 to 59	49.1 to 54	<49
POWER CLEAN	Kilograms lifted divided by athlete's body weight in kilograms	1.05 to 1.25	0.86 to 1.05	<0.85
BACK SQUAT	Same as above	1.31 to 1.5	1.11 to 1.3	<1.1
BENCH PRESS	Same as above	1.01 to 1.1	0.81 to 1	<0.8
PULL-UP	Number of repetitions	16 to 25	9 to 15	<8
SQUAT JUMP	The amount of power measure in watts, divided by the athlete's body weight in kilograms	50.1 to 55	40.1 to 50	<40
COUNTER MOVEMENT JUMP	Same as above	60.1 to 65	50.1 to 60	<50
HORIZONTAL JUMP	Distance in centimeters	241 to 260	221 to 240	<220