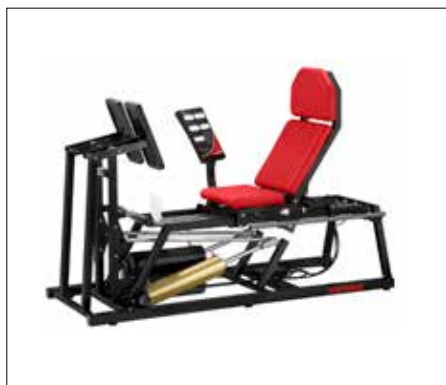


KEISER STRENGTH



KEISER AIR420

NOT JUST BETTER MACHINES, BETTER SCIENCE

Keiser is always challenging the status quo of fitness science by exercising the most powerful muscle: the brain. While competition starts and ends within the limits of a machine, Keiser starts with the potential of the human body and develops smarter technology to unknow the limits of speed, efficiency and safety.

KEISER®
BECAUSE...
**'GOOD
ENOUGH'
ISN'T.™**

KEISER STRENGTH

Introduce precision to your strength training programs. Our machines are equipped with patented Keiser Pneumatic Technology to give everyone from first-time gym members to pro athletes a safer, easier, more efficient way to boost power output, improve core stability and gain overall muscle performance.

KEISER AIR420

THE KEISER AIR420 IS A STATE OF THE ART MACHINE DEVELOPED FOR THE PURPOSE OF RESEARCH AND PERFORMANCE TESTING

Designed to produce accurate velocity, power and acceleration information, the AIR420 electronics can be added to virtually all Keiser strength equipment. It is capable of capturing data at any moment throughout the range of motion which can then be charted to provide an accurate look at a user's performance.

PERFORMANCE TESTING

The AIR420 performs tests designed to help determine the resistance at which a user would need to work to achieve maximum power. Based on the principal that as resistance increases, the maximum possible velocity will decrease at a relatively linear rate. These tests estimate the shape of the force versus velocity curve without the need to make a very large number of measurements.

One of these tests, the ten-repetition test, operates by inputting the user's estimated One Repetition Maximum (1RM) limit. During the test, the software automatically adjusts the machines' resistance and prompts the user for each repetition. Starting at a low resistance, the value increases for each subsequent repetition until the 1RM is reached. When this data is processed, the software graphs the user's predicted power and velocity while also testing reaction time. This information is useful to determine a user's current performance and improvements over time.



DATA CAPTURED

- Machine type, positioning and resistance setting
- Duration for each rep start and stop, and total duration
- Number of reps based on limb
- Peak velocity, acceleration, force and power for each rep
- Workout averages of velocity, acceleration, force and power
- Workout peak velocity and force at peak power
- Position, velocity, force and time for peak power
- Peak range of motion
- Peak power per limb in watts
- Total work and work per limb in joules
- User reaction time