

Source: http://caloriesproper.com/nutrient-timing-op-101/

## **Nutrient Timing**

NUTD337

# What is Nutrient timing?

Why is it important?

When is it important? when on micro level?

What nutrient does it consist of?



## **Promoting MPS**

### ANABOLIC

The phase of metabolism in which simple substances are synthesized into the complex materials of living tissue.

#### WHY IT'S IMPORTANT

Your body is building or repairing muscle. This is the state in which your body experiences considerable muscle growth.

### CATABOLIC

The metabolic breakdown of complex molecules into simpler ones, often resulting in a release of energy.

#### WHY IT'S IMPORTANT

Although a necessary process during intense exercise, an extended catabolic state will lead to existing muscle being used to repair newly torn muscle, not good.

## When is it important

### Continuum of Nutrient Timing Importance\*

MINIMAL IMPORTANCE VARIABLE IMPORTANCE MAXIMAL IMPORTANCE

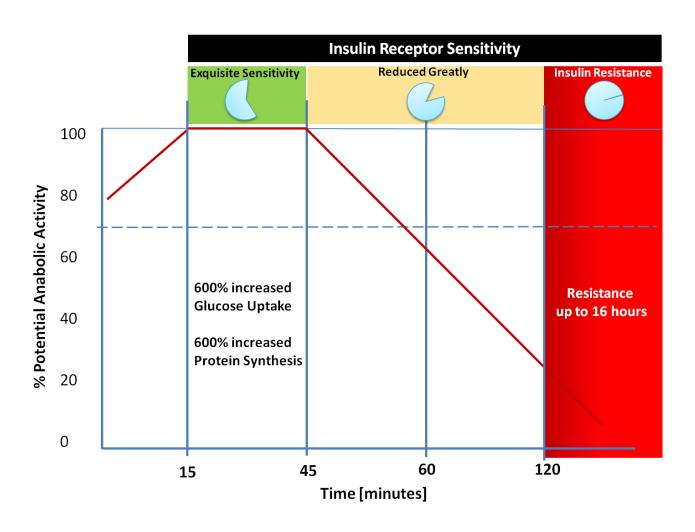
- Overweight/obese persons seeking weight loss for general health
- Novice & intermediate trainees seeking to improve body composition
- Non-fasted resistancetraining bouts lasting 1 hour or less
- Non-competitive training sessions or events
- Goals that do not involve endurance competition
- Goals that do not involve extremes in muscle gain or fat loss

- Advanced/competitive trainees looking to push the limits of hypertrophy, strength, or fat loss.
- Exhaustive/continuous training sessions that occur shortly after an overnight fast
- Exhaustive/continuous training sessions that significantly exceed 1 hour, especially sessions that approach 2 hours

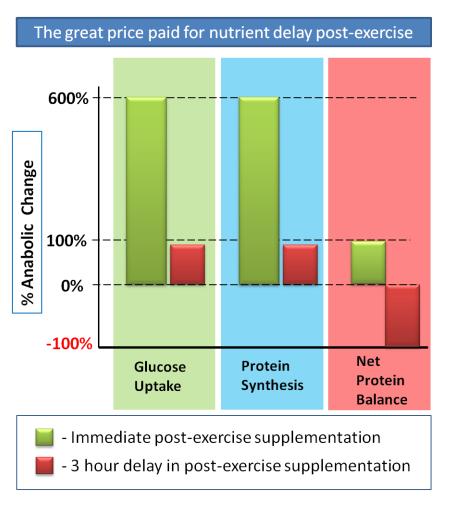
- Competitions involving more than one glycogendepleting event in a single day, separated by only a few hours
- Competitions or training bouts that significantly exceed 2 hours, especially bouts that approach or exceed 3 hours

\*Aragon AA. Continuum of nutrient timing importance (original schematic). NSCA Personal Trainers Conference. April 2012.

## Anabolic window of opportunity



### On the cellular level



Source: http://www.nutridesk.com.au/post-exercise-metabolic-window.phtml