

Lifestyle Management of
PCOS:
Nutrition, Exercise and Stress
Reduction

Susan B. Dopart, MS, RD, CDE

What DO I Eat?

With so much information and misinformation what to eat and not to eat, how do I go about taking care of myself in a reasonable lifestyle way?



Why Change?

Studies show those with PCOS who manage their diet and lifestyle have:

- ❖ **Less** metabolic and weight issues
- ❖ **Improvement** in ovulation and fertility
- ❖ **Lowered risk** of diabetes and heart disease

Considerations

- ❖ **Balance** of your Food
- ❖ **Specific foods** to include and avoid
- ❖ **Amounts** of Food
- ❖ **Lifestyle:** Exercise, Sleep, Stress
- ❖ **Supplements**



Anti-Inflammatory Eating

- ❖ Lower **INFLAMMATION** of any kind caused by foods
- ❖ Choose real non-man made foods over processed packaged foods, mostly organic and pastured protein



PCOS and Hormones

- ❖ Increased stress in the body
- ❖ Less resiliency for change
- ❖ Energy and weight challenges caused by moderate to high levels of insulin resistance

Balance of the Diet

❖ 3 Major **Macronutrients:**

Carbohydrate:

Types & amounts

important!



Protein



FAT



© SGJ Consulting, Inc.

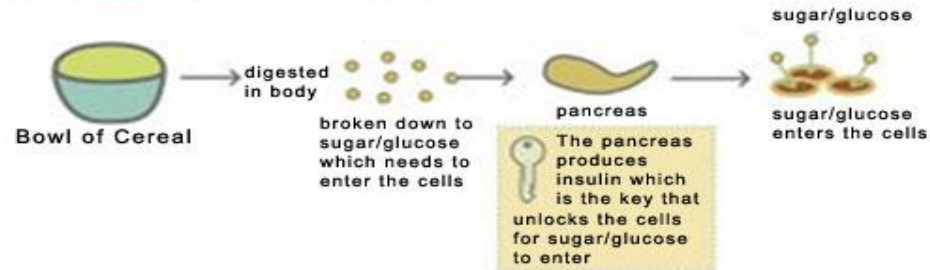
What's the Magic Balance?

- ❖ **Diet Balance** is individual and varies according to:
 - ❖ Genetics, level of insulin resistance
 - ❖ Weight distribution
 - ❖ Medical history/labs
 - ❖ Activity/exercise
 - ❖ Age

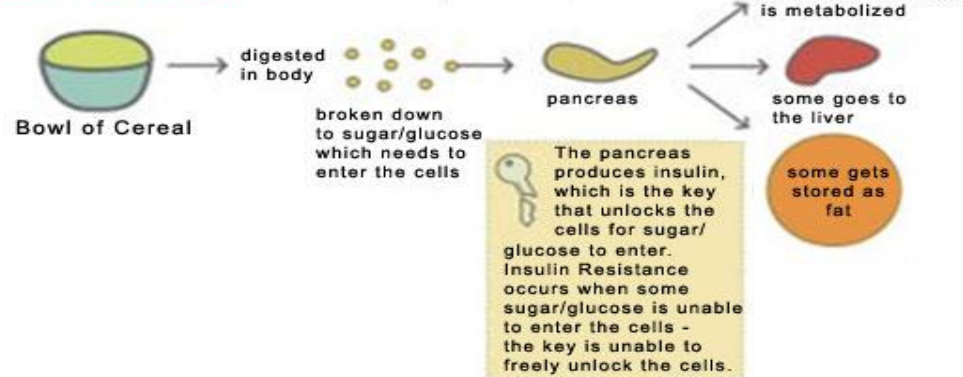


Insulin Resistance

Regular Metabolism of Carbohydrate



Insulin Resistance: there are three possible scenarios



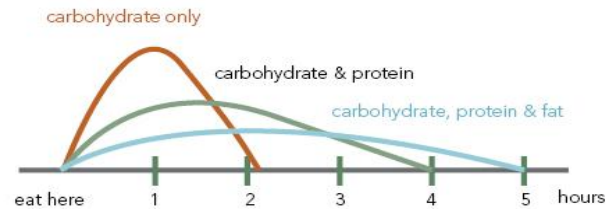
Insulin Resistance

- **Insulin Sensitive** – when eating carbs the pancreas secretes insulin to efficiently allow food/glucose to enter the cells for fuel
- **Insulin Resistant** – when eating carbs either not enough, too much or inefficient insulin is released
- **Levels of Insulin Resistance** – large spectrum

Insulin Resistance

- ❖ **Slower metabolism** – store fat and weight more quickly, especially in the belly
- ❖ **Less energy** and get up and go
- ❖ Increased **levels of hunger** and lower satiation with meals
- ❖ **Increased risk** for gestational diabetes and type 2 diabetes

Meal Balance and Insulin Resistance



Meal balance

If you eat a high-carbohydrate, low-protein breakfast, insulin levels can increase sharply, causing your blood sugar to crash within 2 - 2½ hours, stimulating hunger. If you eat a balance of protein, healthy fat, and moderate amounts of carbohydrate, insulin levels will rise more moderately, causing your blood sugars and appetite to be at a more even keel.

Healthy Carbohydrates

- ❖ Whole real food sources – vegetables, salads, fruits, nuts/seeds, yams, squash, and some grains such as brown rice, and quinoa
- ❖ Avoiding packaged/processed sources which trigger increased insulin release
- ❖ Limit sugars and sweets which
...drive insulin resistance



Count and Monitor all Carb sources

- **Recommended Sources:** vegetables, salad, and some fresh fruit, nuts/seeds, organic dairy
- **Healthy sources/limited amounts:** beans, yams, brown rice, quinoa, grains
- **Avoid:** pasta, white rice, potatoes, bread, cereal, desserts, sugar, candy, dried fruit, juices, sodas, etc.



Inflammation

- ❖ Starchy processed carbohydrates, and high amounts of carbohydrate increase **insulin release** and trigger **inflammation**



Protein

- ❖ Protein helps keep one's blood sugar even keeled and contributes the most to satiation to prevent overeating
- ❖ Recommended protein sources – grass-fed meat, pastured poultry and eggs, wild fish, nuts/seeds, organic dairy and grass-fed or European cheeses, beans/lentils



Fat

❖ Types of Fat:

❖ **Saturated Fat** – butter, animal sources

❖ **Polyunsaturated** –

❖ **Omega 6 fats** versus **Omega 3 Fats** – vegetable fats

❖ **Monounsaturated** – avocado, olive oil, nuts/seeds

❖ **Trans Fats** – omega 6 fats that have been hydrogenated to increase shelf life (packaged crackers, cookies, etc.)

Healthy Fats

❖ Omega 3 Fats –

1. **ALA** – found in ground flax seed

2. **DHA and EPA** –

found in fish and fish oil



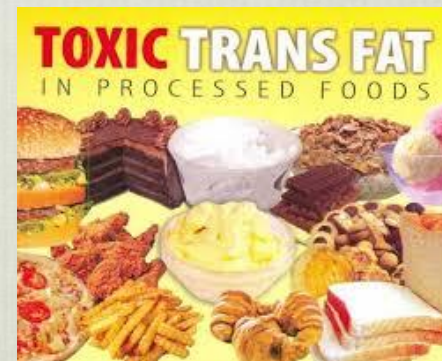
****These 3 omega 3 fats essential with PCOS**

❖ Monounsaturated Fats – found in avocado, nuts/seeds, olive oil



Limit Omega 6 and Trans Fat

- ❖ Limit oils that are **omega 6 fats**- soybean, vegetable, corn, etc.
- ❖ Limit **packaged foods** that contain these oils even if package states “no trans fat”



A Healthful Meal: Anti-Inflammatory Eating

- ❖ Start meal with **a protein** source
- ❖ Balance with a **healthy sources of carbohydrate**, such as a vegetable, salad, fruit or healthy grain
- ❖ Round out the meal with a source of **monounsaturated or omega-3 rich fat** source



Ingredients or Label?

- ❖ How many **ingredients** does the food have?
- ❖ Try to limit to no more than **5-6**
- ❖ Are any of the ingredients names for **sugar**?
- ❖ How many **preservatives or stabilizers** does the product contain?
- ❖ Are there any **names you don't recognize** or can't pronounce?

White Cake with Buttercream Frosting



Contains: sugar, enriched wheat flour (wheat flour, ferrous sulfate, niacin, thiamin mononitrate, riboflavin, folic acid), partially hydrogenated soybean and/or cottonseed and/or palm and/or palm kernel and/or coconut oils, water, milk, skim milk, corn syrup, strawberry apricot (sulfur dioxide), cocoa (alkali), contains 2 % or less of: salt, natural and artificial flavors, emulsifiers (propylene glycol monoesters, mono and di-glycerides, soy lecithin, sodium stearoyl lactylate, polyglycerol esters of fatty acids, glycerol mono-stearate, sorbitan tristearate, polysorbate 60), egg whites, corn sugar, modified foods starch, leavening (sodium bicarbonate, sodium aluminum phosphate, mono and dicalcium phosphate), cellulose, corn starch, high fructose corn syrup, carbohydrate gum, sodium citrate disodium phosphate, cheese culture, lactic acid, whey buttermilk, modified tapioca starch, sodium phosphate corn syrup solids, sodium caseinate, BHA, citric acid, potassium sorbate, sodium benzoate (preservatives), xanthan and locust bean gums, caramel color (sulfur dioxide), vanillin, beta carotene (color), FD &C color (reds #40 and #3, yellow #6 and #5, blue #1 and #2, titanium dioxide), vitamin D3.

Versus an Apple

LABEL?



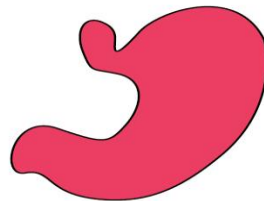
Hunger and Satiation

Mindful Eating: Questions to Ask

1. Am I truly **physically** HUNGRY (vs. INSULIN RESISTANT HUNGRY)?
2. **How much** do I need to eat to be just satisfied (versus full)?
3. How will this meal **affect me?** Will I be more hungry vs. satisfied?

Muscle Memory

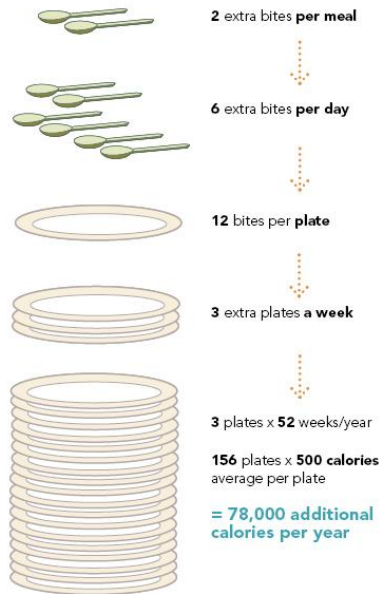
Of the Stomach CAN be changed: your Stomach is only a little bigger than your fist!



actual stomach and relationship to a fist

Additional Bites DO Matter!

The Extra Bites Add Up



$$\frac{78,000 \text{ calories}}{3,500 \text{ cal/pound}} = 22 \text{ extra pounds per year}$$

What about Exercise? Movement Throughout The Day



Susan B. Dopart, MS, RD, CDE

Exercise Dramatically Lowers Insulin Resistance!

- Exercise increases **insulin sensitivity** and glucose uptake in skeletal muscles by 20-50 fold
- Exercise increases the amount of aerobic enzymes in skeletal muscles by as much as **20-fold**
- Exercise lowers insulin resistance by **30-50%** depending on the level of activity

Activity/Exercise

- ❖ Regular consistent **exercise** - even 30 minutes per day – can lower insulin resistance by as much as **50%** for 24 hours

- ❖ 10 minute walks

...following a meal

dramatically



Insulin Resistance



Lowering Stress

Yoga and Meditation:

significant improvements in insulin resistance, lab parameters, anxiety and overall well-being



Sleep

Sleep is Critical since it affects:

- ❖ **Weight** gain or loss
- ❖ **Hunger** levels
- ❖ How well insulin works which affects **all aspects of weight, stress and energy levels**



Sleep and Insulin

- Normal **insulin sensitivity** is associated with 7.5 hours of sleep
- Less than 7 hours of sleep exponentially increases insulin resistance with less than 5 hours associated with 58% less insulin sensitivity
- Sleep disturbance **decreases leptin** by 20% and **increases ghrelin** by 28%
- **Appetite** increased by 25-30% with sleep deprivation

Appetite and Sleep Deprivation

- **Salty foods** increased by 40-45%
- **Sweet foods** increased by 30-35%
- **Starchy foods** increased by 30-35%

Supplements

- ❖ **NAC** – antioxidant and amino acid which lowers insulin resistance
- ❖ **Myo-inositol** – relative of B-complex vitamins, lowers insulin resistance, anxiety, and assists in hormone balance

Supplements

- ❖ **Vitamin D** – a hormone that helps with multiple metabolic functions in the body
- ❖ **Magnesium** – an essential mineral involved in more than 300 different enzyme systems; critical in carbohydrate metabolism & regulation of glucose

Supplements




- ❖ **Omega 3 fats** – fish oil and ground flax seed daily (ALA, DHA, EPA)
 - ❖ Lowers insulin resistance
 - ❖ Lowers triglycerides levels, liver fat
 - ❖ Lowers inflammation and c-reactive protein levels
 - ❖ May improve fertility

Breastfeeding

- ❖ **More research** is needed and is quite individual
- ❖ **Metformin** has been used successfully with helping increase milk supply since it lowers insulin resistance
- ❖ **Herbal supplements** not scientifically tested but used by some to increase milk supply (fennel, fenugreek)

Supplements

Helpful to the body's system with:

- ❖  lowering insulin resistance
- ❖  assisting w/ weight challenges
- ❖  hormone stabilization

Putting it All Together

- ❖ How you put it together is your **Recipe for Life**
- ❖ Consider **Diet Balance**, Choices of **Fresh vs. Processed** foods, **Activity/Exercise**, **Sleep**, **Supplements**, and stress reduction
- ❖ Even **small** changes can **BIG** results



Information

Susan B. Dopart, MS, RD, CDE

12304 Santa Monica Blvd. Ste. 218

Los Angeles, CA 90025

310-828-4476 **Website: susandopart.com**

Blog: susandopart.com/blog

Twitter: [@smnutritionist](https://twitter.com/smnutritionist), [@arecipeforlife](https://twitter.com/arecipeforlife)

Facebook: [A Recipe for Life](https://www.facebook.com/ARecipeforLife)

Instagram: [Instagram.com/susandopart](https://www.instagram.com/susandopart)