Preparing the Body for Pregnancy and Birth

Preconception and pregnancy are sacred times in the lives of women and their partners. It takes a great deal of strength and faith to conceive, carry, birth and raise a child. No other series of events are so life-changing.

Whether you are thinking about getting pregnant, or are already pregnant, now is the time to fine-tune your health. The following are suggestions to optimize conception and pregnancy outcomes. Blessings on this journey!

---

We have a secret in our culture, and it's not that birth is painful. It's that women are strong." - Laura Stavoe Harm

---

How to Plan Conception

Consider reading *Taking Charge of Your Fertility: The Definitive Guide to Natural Birth Control, Pregnancy Achievement, and Reproductive Health* by Toni Weschler. It is available at most libraries and online.

Nutrition

Preconception and/or Prenatal Nutrition Program

- **Consume 1800-2000 Calories per Day.** It is ideal to start a pregnancy with a BMI between 20 and 25. Once pregnant, you should gain 25-30 pounds. If your BMI is 27 or higher, you should only gain about 10 pounds during your pregnancy. If your BMI is less than 20, you should gain 30-35 pounds.

- **Eat Three Meals a Day.** Include a minimum of 5 servings of fruits and vegetables, preferably organic. Breakfast is the most important meal of all.

- **Eat Organic, Whole Foods.** Include in your diet fresh fruits, vegetables, nuts, whole grains, beans, seeds, soy, low-fat dairy, eggs, and organic meats. Avoid processed and "fast" foods.

- **Eat Enough Protein.** Eat some protein with each meal. You have an increased need for protein during pregnancy. The average-sized woman needs about 60 grams per day.
Preparing the Body for Pregnancy and Birth

- **Drink Filtered Water.** Take your weight in pounds and divide it by 2. That's how many ounces of pure water you should drink daily.

- **Get Plenty of Omega-3 Fats.** These important fats are essential for development of baby's brain and nervous system. They can also help prevent post-partum depression. Food sources include wild sock-eye salmon, sardines, omega-3-enriched eggs, dark green leafy vegetables, ground flax seed and flax oil, and ground hemp seed. You can also take a nightly supplement of DHA + EPA in capsule form to be sure you are getting enough.

- **Avoid Partially Hydrogenated Fats and Trans Fats.** These interfere with the absorption on other important nutrients and may be linked to Attention Deficit Hyperactivity Disorder (ADHD), depression, and learning problems in children.

- **Avoid White Foods.** Avoid foods such as white pastas, white rice, pastries, sugar, and white bread. These cause blood sugar instability.

- **Decrease your Intake of Sweets.** If you must sweeten a food or drink, use a natural sweetener such as honey, agave, maple syrup, or stevia.

- **Avoid Chemical Food Additives.** This includes preservatives, food colorings, such as yellow #5 (tartrazine), artificial sweeteners, such as aspartame, and the flavor-enhancer MSG.

### Supplements and Botanicals

Follow a daily supplement regimen. Look for vitamins which are manufactured according to GMP standards (Good Manufacturing Practices). Look for the GMP label on the back of the packaging. It may require taking more than one pill daily to get in all of these nutrients. You will need an extra omega-3 supplement. You will also need a separate vitamin D3 supplement, as it is difficult to find a multivitamin with enough D3.

Here is more on the 3 most important components:

- **Multivitamin**
  - This is your insurance to cover gaps in the diet. Even if you eat 7 servings of fruits and 7 servings of vegetables a day, you can't be sure of the quality of soil they were grown in. You need to cover your bases. Take it with a meal in the first half of the day. Ideally your prenatal multivitamin should have the following characteristics:
    - Should include a minimum of 400 mcg of folic acid. 600-800 mcg is even better.
    - Should contain a minimum of 150 mcg of iodine.
    - Should NOT contain more than 2000-3000 IU vitamin A acetate/palmitate

  One which meets these requirements is the Rainbow Light Certified Organic Prenatal. It costs $20.99 for a one month’s supply on www.iherb.com. It’s not cheap but is still less than $1 per day. Consider buying several at once to save on shipping.
Preparing the Body for Pregnancy and Birth

- **Vitamin D**
  For women living in Wisconsin or other northern regions, I recommend 5000 IU of D3 daily. We don’t get much sun in the winter, and the sun we get in the summer doesn’t do us much good because of our northern latitude. Low vitamin D levels in pregnancy have been linked to increased risk of preeclampsia and cesarean-section (aka c-section). (Preeclampsia is a disorder that can occur late in pregnancy. Symptoms include high blood pressure, swelling—especially of the hands and feet due to a buildup of fluid, and too much protein in the urine.) If you have not had your vitamin D level checked, now is the time to do it. Your vitamin D supplement should be taken either with a fatty meal, or with your omega-3 supplement, as fat aids in the absorption. Taking 1000 IU of Vitamin D3 generally increases your vitamin D level by 8-10 points.

  There are many cheap, good brands available. Right now on www.iherb.com, you can get 5000 IU per capsule by Healthy Origins, 360 softgels for $14.95. That’s a year’s supply for $14.95!

- **Omega-3’s**
  Coming from someone who has been a die-hard vegetarian since age 12, I will tell you that as a fertile woman, there is no way to get enough omega-3’s for your baby’s development, and to keep your own body’s stores adequate, without taking a fish oil supplement during your pregnancy. It is essential. Flax, chia, and hemp cannot get you there. There is no way around it. Your children and grandchildren will thank you. Store it in your fridge and take it at bedtime with your vitamin D.

  Omega-3 supplements can be pricy and misleading. What you’re looking for is at least 1000mg of DHA + EPA. That’s NOT just 1000mg of fish oil. There are many oils of fishes. It’s the DHA and EPA you’re looking for. Beware, DHA-only supplements will not help your baby, as they must be paired with EPA to cross the placental barrier. Nordic Naturals is a great and reputable brand, but very pricy. Here are 2 other options I recommend:

  - Willy St. Co-op Brand “concentrated” fish oil has close to the desired 1000mg in 2 capsules. It runs about $30 for a 2 months’ supply.
  
  - Carlson Labs Fish oil, 16.8 fl oz, (500 ml) on www.iherb.com for $28. It comes in lemon flavor and is not bad tasting at all. You only take a teaspoon at bedtime. This bottle should last you over 3 months.

  Consider also adding trace minerals from a marine mineral complex or from eating sea vegetables such as nori, wakame, dulse, or hiziki.

You might also consider probiotics and botanicals.

- **Probiotics**
  If you or your partner has a personal or family history of allergies, consider taking a daily probiotic for two weeks before your due date and continuing for 2 weeks after delivery.
Preparing the Body for Pregnancy and Birth

This can encourage the growth of healthy bacteria in your newborn’s intestines that have been associated with a reduced risk of allergic conditions such as eczema. You should choose a high-quality probiotic, such as Floragen 3, Culturelle, or Udo’s Choice. You should also take these during, and for 10 days following, the use of any antibiotic.

• Botanicals

There are a number of botanicals which are safe for use during pregnancy. Work with an experienced midwife or integrative physician during your pregnancy to choose which botanicals might be helpful for you. Here are a couple of examples:

  o **Red Raspberry Leaf tea** is safe to drink throughout pregnancy, works as a uterine tonic, and may shorten labor.

  o **Evening Primrose Oil** can be purchased in capsule form and placed intra-vaginally, by the cervix, nightly for cervical ripening starting at 38 weeks of gestation.

**Exercise/Physical Activity**

• **Physical Activity.** Women who are physically fit have easier, more comfortable pregnancies, and better labors. The only 3 sports that you should not participate in while pregnant are sky-diving, scuba-diving, and water-skiing. Walking, yoga and pilates are especially helpful in preparing for labor. Aim to exercise at least 3 days per week. Strenuous exercise is OK, but be sure to drink plenty of water and not to get overheated.

• **Book.** Consider reading *Essential Exercises for the Childbearing Year* by Elizabeth Noble. This is a great resource written by a physical therapist. You can find it online.

• **Prenatal Yoga.** It is nice to be together with other pregnant women for this activity. Check out: [www.yogamoms.net](http://www.yogamoms.net) for an option in Madison, Wisconsin.

**Manual Therapies**

Good chiropractic care, prenatal massage, and acupuncture can be invaluable during pregnancy. Acupuncture has also been shown in several research studies to be effective for promotion of fertility.

Here are some recommendations in the Madison, Wisconsin, area:

• **Chiropractic:** Discover Family Chiropractic (608) 663-8809
  o Renewed Life Chiropractic (214) 202-8330
  o Julie Qualle Massage Therapy and Chiropractic (608) 445-2603
• **White Lotus Acupuncture** (608) 241-4060
• **Belly Prenatal Massage** (608) 225-0103
Preparing the Body for Pregnancy and Birth

**Lifestyle**

- **Get Natural Light Daily.** If you can’t get outside in natural light at least 1-2 hours daily, change the light bulbs in your house to full-spectrum light bulbs, which duplicate all the rays of the sun.

- **Sleep in Total Darkness.** No nightlight, no light from windows, no TV. Sleeping in the dark increases levels of the hormone melatonin, which increases fertility.

- **Don’t Drink Alcohol.** This is also true for your partner when trying to conceive. Alcohol decreases sperm count, decreases sperm motility, and can cause sperm to be deformed. Even one drink daily during pregnancy can decrease your baby’s IQ.

- **Don’t Smoke Tobacco.** Tobacco increases the risk of prematurity, low birth weight, and birth defects.

- **Avoid Caffeine.** Caffeine should be limited to no more than 200mg per day. This is about 1 regular-sized cup of coffee or 2 shots of espresso.

- **Don’t use Marijuana or any Recreational Drugs.** Not only can these cause birth defects, but they may increase the chance your child will develop drug-seeking behavior later in life. Marijuana use during pregnancy has been associated with long and difficult labors.

- **Don’t Use Birth Control Pills for at Least 3 Months Before Trying to Conceive.** Birth control pills lower levels of many nutrients in your body, including zinc, manganese, vitamin A, magnesium, and several of the B vitamins.

- **Avoid Pharmaceuticals.** This includes prescription and over-the-counter drugs. If there is a drug you really need, discuss with your doctor the risks vs. benefits of staying on this drug before conceiving.

- **Avoid Industrial Toxins.** For more information, read Reproductive Hazards of Industrial Chemicals: An Evaluation of Animal and Human Data by Barlow and Sullivan.

**Spirituality**

Here are two practices to consider:

- **Call in a Soul.** Consider envisioning your child and inviting him or her in during love making.

- **Meditation.** In many cultures, women who plan to conceive go off alone in nature and sit in meditation or prayer. You can try this practice near your time of ovulation. When you feel your mind is clear and your heart is open, invite a child to come to you with this next ovulation. After this practice, let go, and release the future to what may come.
Preparing the Body for Pregnancy and Birth

Two books to consider reading include:


"The moment a child is born, the mother is also born. She never existed before. The woman existed, but the mother, never. A mother is something absolutely new" - Bhagwan Shree Rajneesh

*The information in this handout is for general education. It is not meant to be used by a patient alone. Please work with your health care practitioner to use this information in the best way possible to promote your health and the health of your future child.*

This handout was created by Jill Mallory MD, Fellow in the Integrative Medicine Program, Dept. of Family Medicine, University of Wisconsin-Madison School of Medicine and Public Health.

*Date revised: November 30, 2010*