



Women's Health Literature Review

Winter
2010/2011

*Texas Department of State Health Services
Health Service Region 1*

Reducing low birth weight takes more than supplementation of just iron and folic acid

"Dietary insufficiency of major and minor nutrients is widely prevalent among women of child-bearing age. Supplementation of iron and folic acid has been in existence for years, but now **13 studies of more than 30,000 women** show a clinical and statistically significant reduction in the risk for low-birth-weight (LBW) births among women who received multiple micronutrients (MMN) compared to those that took iron and folic acid only. This translates into an 18% reduction in low birth weight births with MMN supplementation. Globally, a staggering **1.5 million LBW births could be avoided annually if all pregnant women received MMN during pregnancy.** Interestingly, timing of initiation did not seem to matter

as one would expect. Women who started MMN before 20 weeks gestational age had similar benefit to those who started after 20 weeks. While authors were unable to determine an exact clear composition of what would be the perfect MMN, the components present in the majority of studies showed effectiveness with > 2,640 IU of vitamin A, >200 IU of vitamin D, >10mg of vitamin E, 1.4mg of vitamin B1, >400 units of folic acid, >70mg of vitamin C, >15mg of zinc, and >30 mg of iron. The beneficial action is most likely improvement in immune function, reduction of risk of infection, improvement in energy metabolism, improvement in anabolic processes, appropriate reactions to stressors (as compared to heightened stress exhibited by malnourished mothers), higher

fluid retention, increased plasma volume expansion, and improved hemoglobin. These findings have clear implications for maternal-child health initiatives in North America and around the world." (*The Female Patient*, July 2010)



Music may help
stroke recovery

"A group of researchers in Finland have determined music can help patients recover more quickly from strokes. One study showed patients who listened to a few hours of music each day soon after a stroke improved their verbal memory and were in a better mood compared to patients who did not listen to music or used audio books. *Three months after a stroke, music listeners showed a 60% better improvement in verbal memory as compared to 18% for those using audio books and 29% for those who used neither.*" (*NurseWeek*, March 2008)



"Google yourself and see what the rest of the world is saying about you"



"One tech-savvy doctor told another doctor to Google himself if he wanted to know how he was perceived by others.

The physician did just that, and was astounded to find how much there was on a popular ratings website. There was also a section for individual patients to tell their stories. Not all was so rosy on that page: 'being in a rush',

'unsympathetic', and 'talked about the rising cost of his malpractice insurance', were among things he found posted. While devastated, the physician found there was a lot to learn from reading patient's comments once he got beyond his sensitivity to criticism. There are a variety of rating services such as HealthGrades, Angie's List, Vitals.com, Rate MDs, and many more. One can also sign up for a free service that provides Google alerts so that one knows when a new comment comes in. The article went so far as to

suggest physicians encourage their patients to give honest feedback. A significant number of patients visiting and using the site would avoid the possibility of one or two angry folks skewing the profile of that physician. By registering for these sites, the physician can also be assured that accurate and updated information is present as to one's background and practice. If a provider finds an obvious mistake at the site, the that provider can also type in comments." (*The Female Patient*, July 2010)



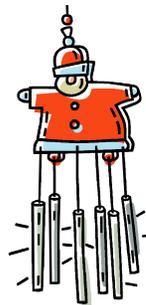
Intuition– harnessing an inner power

"Sometimes we, as nurses just have a bad feeling about a patient or situation. Mothers have the same intuition. Intuition has five features: rapid perception, lack of awareness of the process in use, the presence of emotion, a holistic understanding of the situation, and a good overall understanding of the proposed solution. Intuition is basically how you quickly tap into your subconscious mind, which is where one archives all the kinds of information we don't use at a conscious level. Without intuition, we are no different than a computer, we would only make decisions solely based on fact. Our intuition is our internal navigation system. To hone into your intuition; pay attention to what you actually hear and see. Next, focus on what you do not hear. Only 19% of communication between people is in what they say. Of course, body language factors in. Hone in on people-watching. What is the family member in the room relaying by his/her body language? Look at everything about the person: clothes, demeanor, hygiene, what he or she is carrying, etc. What do those things say about the patient and how he/she is functioning? Beware of the negative impact of technology if it is dominating the situation. The majority of the time, it is the history and exam that leads one to the diagnosis. Finally, smart thinkers always check their intuitions against available evidence." (*Advance for Nurse Practitioners*, August 2010)

The effects of lifestyle on fertility

"For so many couples (five million annually), when they stop their birth control method in preparation for getting pregnant, they are often surprised that it does not happen as quickly as they planned. Typically, fertility specialists do not intervene until a couple has tried unsuccessfully for a year. During that time, and prior to a full expensive workup, there are certain lifestyle changes that can improve their chances of conception. Women whose diets include greater amounts of vegetable, fruits, and whole grains have been shown to have the highest chances of fertility. Those with highest fertility rates eat less trans fat and sugar from carbohydrates, more protein from vegetables than animals, more fiber and iron, and more high-fat dairy products. Women who follow these diet strategies have a 6-fold difference in ovulatory fertility than those who do not. In addition, women who drink more than 6 cups of coffee or tea a day are 1.5-fold more likely to be infertile. Caffeine consumption is inversely correlated to estradiol in pregnant women and positively correlated to levels of sex hormone binding globulin. Caffeine also correlates to de-

creased levels of prolactin and may inhibit ovulation or corpus luteum function. Alcohol consumption is still inconclusive. Of note, heavy alcohol use in men (>20 drinks a week) has actually shown a 2-fold increase in the time to pregnancy. Cigarette smoking (both active and passive) has been proven to have an adverse impact on fertility. Chemicals in cigarette smoke appear to accelerate follicular depletion and loss of reproductive function, affect follicular microenvironment, and alter hormone levels in the luteal phase. Smoking results in chromosomal and DNA damage to human germ cells. Smoking also decreases sperm production, motility, and morphology in men, and is associated with early miscarriage in women. Moderate exercise increases fertility. Men who sit for prolonged periods of time have a lower sperm count, as well as men to spend time in hot tubs, saunas, and ride bikes excessively. Excessive weight reduces fertility for both men and women." (*The Female Patient*, February 2010).

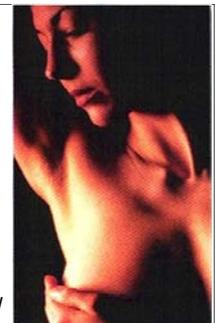


Outpatient hysterectomy– home in 4 hours

"Fewer than 40% of women are aware of minimally invasive options as alternatives to the traditional hysterectomy. Not all hospitals respond amicably to the potential loss of revenue by replacing the more expensive traditional hysterectomy with the lesser invasive option. The traditional hysterectomy keeps the patient in the hospital longer and generates a much larger bill. The hospitals featured in this article who have performed more than 500 laparoscopic hysterectomies stated all but 2 patients were sent home in 4 to 6 hours postoperatively." (*The Female Patient*, February 2010)

'Pre-vivor' a newer clinical term

"The term 'pre-vivor' refers to women who are aware of their advanced risk but have not yet developed cancer. These women would be those with a strong family history, those with a hereditary cancer, or those who have genetically tested positive. A helpful website for support is www.facingyourrisk.org" (*NurseWeek*, March 2008)



Editor's note: It is now possible to be tested for the breast and ovarian cancer gene right in the physician's office. The test done in the exam room, basically the patient gargles a mouthwash solution and spits back in a cup. This test is covered by most insurance companies. The company is Myriad Genetic Laboratories.





The chance of surviving a cardiac arrest may be better in a casino than hospital

"A *New England Journal of Medicine* study found that 53% of people who had ventricular fibrillation in casinos that had AEDs and nonmedical staff trained in their use survived to hospital discharge. In comparison, the percentage of people who survive in-hospital ventricular fibrillation to discharge is only 34%. Too often, precious seconds are ticking away for the patients in cardiac arrest in our nation's hospitals. Delayed defibrillation is common in the hospital setting and occurs 30% of the time. The solution is to turn nurses back into first responders, rather than wait for the code team. It is a common

belief and public expectation that expert resuscitation teams provide optimal responses to in-hospital cardiac arrest survival. In reality, those teams have not significantly affected the 17% survival rate of all cardiac arrests. Despite an organized alert and response system, it often takes too much precious time for the team to get there, and nurses are not trained to intervene. This delay does not seem to occur outside the hospital if the AED is available. Other factors linked to a delayed response in the hospital are events that happen after hours and on week-ends. Another interesting observations were that nurses in the hospital would run past crash

carts to get needed equipment in locations further away. Nurses seldom open crash carts since they are more likely to be reserved for the team. AEDs cost as little as \$2,500 and should be located strategically throughout hospitals to make defibrillation possible within 3 minutes." (*Nurse Week*, March 2008)



A better way to ask old questions

"Since the majority of mental health disorders are treated by the primary care provider and not by a referral to a mental health specialist, asking the right questions is critical. So often, those vague complaints of headaches, abdominal pain, etc, are really symptoms of underlying psychiatric disorders. An older physician once said, **'the sorrow that has no vent in tears may make other organs weep.'** There are numerous tools and questionnaires available to assist in this determination. But this article was chosen for the review for the simplicity of asking three questions, and why they are more appropriate than others. Instead of asking how the patient is doing, which

typically is answered by 'fine 'or 'OK', a better simple question is 'what is going on in your life?' It is possible that this question might generate more information than there is time for, and if this happens one can follow with 'I understand there is a lot going on in your life, but how does this make you feel?' A second simple question can be, 'What is troubling you the most?' followed by, 'How are you handling that?' The answer to the later question can provide insight into the patient's coping skills. Finally, it is appropriate to give the patient an empathetic response to validate the patient's feelings and provide support." (*Consultant*, June 2010)

One less sugar drink a day can lower your blood pressure



"According to a study of 810 participants with average blood pressures of 134.9/84.8 at baseline who drank an average of 10.5 ounces per day of non-diet soft drinks, fruit drinks, lemonade, or fruit punch, that by reducing one serving a day of those beverages was associated with a small decrease in both systolic and diastolic blood pressure over 18 months, even after adjusting for weight change over the same time period. Neither diet drink or caffeine intake had any significant bearing on BP, suggesting that sugar may in fact be the nutrient affecting blood pressure. (*The Clinical Advisor*, July 2010)

Tidbits on marathon runners– exercise-associated collapse

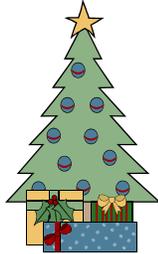
"Exercise-associated collapse (EAC) is generally benign and usually occurs *following the completion* of the marathon (85% of the time). Athletes who collapse *during* exercise are more likely to be experiencing a life-threatening condition. The runner should be continually monitored for improvement or deterioration. Improvement in the athlete's signs and symptoms should be evident within 10 minutes. Most runners are able to walk and stand within 20 minutes. If no improvement occurs within 20 minutes, the runner should be transported to the emergency room. Signs and symptoms of EAC are dizziness, headache, nausea/vomiting, muscle cramps, and excessive sweating. (*Clinician Reviews*, May 2010)



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Managing post-partum hypertension– While preeclampsia is ultimately ‘cured’ by delivery, it *may worsen* in the immediate postpartum period. Blood pressures must be followed carefully until the patient is completely stabilized and the B/P has returned to normal. Reminder: magnesium sulfate is given to prevent eclamptic seizures, but is not an *antihypertensive* agent. (*The Female Patient*, February 2010)

Clinical pearl: ~Tremor- While some tremors are obvious, for fine tremors difficult to detect, place a sheet of paper on the patient’s out-stretched hands and fingers, the vibrating paper will reveal the tremor. (*Consultant*, July 2010)

Clinical Pearl: Better shower seal– Advise patients who need to cover a wound or dressing when they shower to use ‘press and stick’ plastic wrap. It provides a much better seal than just regular plastic wrap or plastic bags. (*Consultant*, July 2010)

Clinical Pearl: Reliable route to functional status assessment– A simple way to quickly assess a patient’s functional status and social network is to ask at some point during the exam, ‘How did you get here today?’ Patients may report that a family member dropped them off, that they drove themselves, that they walked, or that they had a friend bring them. Their answers provide clues to their cognitive and physical capabilities. For example, it may reveal their ability or inability to drive a car, and their level of, or lack of, family and social support. Sometimes the patient appreciates the break from illness-oriented conversation as well. (*Consultant*, June 2010)

Medicare audit expansion: The Medicare recovery audit contractor (RAC) program was piloted in California, Florida, and New York, Massachusetts, and South Carolina from 2005 to 2008. This pilot recovered \$20 million in overpayments for physician’s claims, and over a billion recovered from hospitals. This program is expected to expand and bring in at least 2 billion dollars in the next three years.



Self-service check in at the emergency room

A new biomarker for ovarian cancer

“HE4 is available in the United States for use as an aid in patients already diagnosed with ovarian cancer to monitor the recurrence and progression of disease. Seventy percent of patients whose HE4 did not change in value correlated to no progression of the cancer. 60% of patients whose HE4 went up correlated with a progression of the cancer. HE4 is used in conjunction with other clinical methods to determine disease status.” For more information: www.taketherightpath.com (*Contemporary OB/GYN*), May 2010



“If one can do self-service check-in at the airport, why not in an emergency room? Parkland Hospital in Dallas did just that. The touch screen machines are located in the waiting areas, and patients go directly to them unless they have a critical need such as a gunshot wound, chest pain, etc. The waiting room is also staffed with a technician for assistance when needed, as well as monitoring the waiting room for folks acutely ill or becoming more ill during the wait. The touch screen asks for name, date of birth, and chief complaint (has a body diagram to touch as well). Patients are also screened for specific high risk conditions such as diabetes, heart disease, etc, and if they need to be seen by a nurse immediately.

The information sent goes directly to a screen monitored by a nurse. It takes about two minutes to complete the registration. The outcome is the process of registering is much faster, the lines and waits are much shorter, and critical patients are identified more quickly. Other patients can register and sit down instead of waiting in line and exacerbating their conditions. While there will always a wait, it’s at least 4 times faster, folks are not as angry, and incidents have dropped from at least one major one a day to less than one a week.” (*Nurse Week*, March 2008)

