Treatments and Medication for Nausea and Vomiting During Pregnancy

Disclaimer: None of the information provided in this leaflet is meant to suggest any medical course of action. It is intended as a summary for healthcare professionals. The responsibility for any medical treatment rests with the prescriber.

Safe & Effective Treatments

A number of evidence based clinical guidelines for the treatment of nausea and vomiting in pregnancy have been published which provide summaries of the evidence for the efficacy and safety of various treatments and gives treatment algorithms.

You or your doctor may want to obtain this research. A full reference list is available at: https://www.pregnancysicknesssupport.org.uk/downloads/

Early recognition and management of NVP could have a profound effect on women's health and quality of life during pregnancy, as well as a financial impact on the healthcare system.

The principal for treating NVP and HG is with a ladder approach, starting on the first rung and stepping up by adding in as required until symptoms are under control. Because each of the different treatments work in different ways there is evidence which suggests combining them may be more effective.

First Line Treatment

ANTIHISTAMINES IN THE UK

A wide body of evidence suggests that H1 receptor antagonist antihistamines have no human teratogenic potential. Pooled data from 7 controlled trials indicate that these antihistamines are effective in the treatment of NVP. Some of the H1 receptor antagonist antihistamines that are available in the UK include Cyclizine at the dose of one of the 50mg tablets three times a day and another is promethazine (Avomine), the dose can be two of the 25mg tablets at night, one in the morning and one after midday. These antihistamines can cause drowsiness and should not be taken without medical advice. Antihistamines are recommended in the NICE antenatal care guideline and a recent article in the British Medical Journal as first line treatment for NVP where they are requested and needed.

PYRIDOXINE (VITAMIN B6)

It has been shown to be effective in helping the nausea of NVP in 2 randomised controlled trials (one trial at 30mgs / daily, the other at 75mgs / daily). A retrospective cohort study concluded that pyridoxine monotherapy had no increased risk for major malformations. There are no apparent side effects. The recommended dose of pyridoxine is one 10mg tablet four times a day. By taking B6 in combination with an anti-histamine, such as cyclizine, a first line treatment like Diclectin is, in effect, being used (see below).

For many women with NVP this first line of treatment will be enough to get symptoms under control and a normal pregnancy will continue from there. However, for some women this treatment will not be sufficient and other treatments need to be used.
ANTIHISTAMINE WITH VITAMIN B6 INTERNATIONALLY

Doxylamine is an antihistamine that has been shown to be effective in treating nausea and vomiting of pregnancy. In combination with pyridoxine (Vitamin B6) it was called Bendectin which has been shown to be effective and safe in at least 3 randomised controlled trials. Although Bendectin had been used by 33 million pregnant ladies it was withdrawn by its manufacturer in the early 1980’s because of exhaustive defence costs against liability suits for foetal defects. Eventually all these legal cases against Bendectin, which went to court, were unsuccessful. Doxylamine and pyridoxine are now among the very few therapies that are classed as having no risk to the foetus. As no credible evidence of human or animal harm or other undesirable effects existed, a Canadian company began to make a generic form of doxylamine – pyridoxine in delayed release form (Diclectin) in 1984. This has been licensed for the treatment of NVP in Canada since then and is now also licensed in the USA under the brand name Diclegis for use in pregnancy. The evidence based guidelines (approved by the Society of Obstetricians and Gynaecologists of Canada) state that Diclectin should be the initial treatment of choice since it has the greatest evidence to support its efficacy and safety. A randomized controlled trial published in 2010 has confirmed the safety and efficacy of Diclectin in the treatment of NVP, which is included with 17 papers concerning the safety and efficacy present on our website. It is not yet available in the UK and therefore similar alternatives are generally used as first line treatments.

Second Line Treatment

PHENOTHIAZINES

Prospective and retrospective cohort studies, case-control, and record linkage studies of patients with exposure to various and multiple phenothiazines have failed to demonstrate an increased risk of major malformations. Significant therapeutic effect on NVP was demonstrated in 3 randomised controlled trials in severe NVP (One of the phenothiazines available in the UK is prochlorperazine (Stemetil or Buccastem). Side effects include drowsiness, restlessness and occasional extra pyramidal effects. These are prescription only medications.

Recently phenothiazines have been linked with a possible increased risk of breathing difficulties for infants after birth where high levels of the drugs have been used during or prior to labour. Therefore they are sometimes discontinued in the third trimester.

METOCLOPRAMIDE (MAXOLON)

There is limited information on the safety of metoclopramide in pregnancy, although what has been published is reassuring. There are a very limited number of studies that indicate the effectiveness of metoclopramide in the treatment of NVP.

Recent European recommendations are that maxolon/metoclopramide should only be given for 5 days continuously. This is because it is felt that longer courses are more likely to produce side effects in the person taking this therapy. Specifically, there is concern that beyond 5 days there is more chance of oculogyric crisis and dystonia developing, which put into more understandable terms is facial and skeletal muscle spasms and dizziness.

Please note, there is no new concern about foetal problems. This recommendation refers only to side effects for the mother.

Third Line Treatment

ONDANSETRON

If your nausea and vomiting is so severe that the first and second line treatments have not suppressed symptoms to an adequate level then your doctor may prescribe Ondansetron (known also as Zofran). It is a relatively new medication (it has been used for 18 years, where as many of the medications discussed so far have been used for over 40 years) which was originally used to treat nausea and vomiting caused by chemotherapy for cancer patients but is increasingly being used for hyperemesis gravidarum and you are likely to read about it on internet forums and websites.

Research regarding the safety of this drug is increasing. A study in Canada by the Motherisk program looked at foetal outcomes for mothers who had taken Ondansetron as well as mothers who had taken other anti-emetics and compared them to the baseline rate of birth defects. It was found that there was no increase in the rate of birth defects for mothers who had taken Ondansetron. An abstract of the study and others can be seen on the link at the top of the leaflet and the website HelpHer.org also has further information.
A more recent study in Denmark by Pasternak et al (2013) looked at 1,233 women exposed to ondansetron between weeks 7-12 of pregnancy (from last monthly period) and compared the birth defect rate with that of 4,932 women not exposed to ondansetron. They found that the birth defect rate was 2.9%, at birth, for both groups. The literature review found the baseline risk of 1-3% for a major congenital birth defect at birth for all pregnancies which is in line with this research. The reference and abstract for the article is on the link at the top. This is very encouraging research.

It is a prescription only medication and side effects include constipation and headaches. It can be taken orally, as an injection, as a suppository (inside your rectum) or as an ‘oro-dispersal’ tablet (melted on the tongue).

The normal doses for Ondansetron is up to 16mg per 24 hours. Sometimes cost is considered a barrier to prescribing ondansetron for pregnant women and indeed the branded tablets can be expensive, however 4mg generic ondansetron is not expensive and the medication should never be refused on this ground alone.

**Fourth Line Medication**

**CORTICOSTEROIDS**

There may be a small increased risk of oral clefting associated with the use of corticosteroids during the first 10 weeks of pregnancy and therefore some authorities say that they should not be used to treat NVP in this period. However, this risk is considered to be very small (an increase from 1 to 1.3 in 500-750) and other studies have not found an increased risk. There is emerging data on the effectiveness of corticosteroids to treat severe and persistent NVP/HG and a protocol for the use of steroids is included in this reference. Corticosteroids need to be given under medical supervision.

It can be reassuring to remember that steroids are commonly prescribed throughout pregnancy for a number of other conditions such as Rheumatoid Arthritis, Asthma and Ulcerative Colitis.

**Non pharmacological remedies**

**GINGER**

The conclusion from 6 randomised controlled trials with a total of 675 participants was that ginger extract at 1000 mgs per day may be effective treatment for NVP. However the small number of patients in these studies allocated to receive ginger (n=303) may have been insufficient to properly test the safety of ginger with regards to pregnancy outcome. Ginger is a non-regulated food product and most preparations available are of variable purity and composition, so dosing may be variable and uncertain.

**GINGER FOR HG:**

A survey conducted by PSS in 2015 of over 500 women who had suffered hyperemesis found a high level of knowledge about ginger as a remedy with 88% having tried ginger in at least one form. 99.8% said it did not help. Over 50% said it made their symptoms worse and had a negative emotional impact, particularly when suggested by a healthcare professional. Therefore we do not recommend ginger for hyperemesis gravidarum.

**ACUPUNCTURE AND ACUPRESSURE**

Stimulation of the P6 point, located three fingers breadth above the wrist, has been used for many years to treat nausea from a variety of causes. Trials of a non-blinded randomised nature have shown a decrease of persisting nausea by at least 50%. Bands worn at the wrist (e.g. Sea Bands) that apply pressure may be a simple way of stimulating the P6 point. There are no theoretical concerns about the safety of acupressure in pregnancy.

For more information and references, visit www.pregnancysicknesssupport.org.uk