



# Hyperemesis Gravidarum

## Nausea and vomiting in pregnancy

### What is Hyperemesis Gravidarum?

Hyperemesis Gravidarum (HG) is the medical term for severe nausea and vomiting in pregnancy. HG begins between the 4th and 6th week of pregnancy. It usually improves by the 15th to 20th week, although for some women it may continue on and off throughout pregnancy. Many women who are affected have frequent episodes of vomiting throughout the day.

### What causes Hyperemesis Gravidarum?

The exact cause of hyperemesis gravidarum is not completely understood but studies suggest that a **hormonal cause** is very likely. It is generally agreed however, that the condition is likely to be related to a number of different factors.

### Does anything increase the risk of Hyperemesis Gravidarum?

Yes, the following are known risk factors:

- Hyperemesis gravidarum during a previous pregnancy
- Having a family history of hyperemesis gravidarum
- Being overweight
- Being a first-time mother
- Having a multiple pregnancy (twins, triplets etc)
- The presence of trophoblastic disease (an extremely rare condition that involves abnormal growth of cells inside a woman's uterus)

### Will my baby be at risk?

Normal morning sickness won't threaten your baby's well-being as long as you're able to keep food down, eat a well-balanced diet, and drink plenty of fluids.

In more severe HG the developing baby is rarely affected by the mother's illness, although if prolonged there is some evidence that your baby is more likely to have a low birth weight but this is still not usually dangerously low.

There is **no** evidence that the effort of retching and vomiting harms your baby in any way.

### What are the signs and symptoms of Hyperemesis Gravidarum?

- Nausea
- Vomiting
- Excessive saliva and spitting
- Fatigue (excessive tiredness)
- Weight loss

- Dehydration and symptoms of dehydration including: low blood pressure, racing heartbeat, headache and confusion
- Ketosis

## What is ketosis and what are ketones?

Your body normally uses glucose to meet its energy needs. Glucose comes from the carbohydrate in your diet. A healthy, balanced diet provides you with all the glucose your body needs, so that ketosis does not take place. However, if your body does not have enough glucose, perhaps because you are sick and not eating enough, it will begin to obtain energy from its stored fats instead. This is the process of **ketosis**. As a result of this, the ketone levels in your blood will rise and will be passed out of the body in your urine.

## How will you know if I have ketones in my urine?

Ketones can be detected by a simple dipstick test of your urine. The test will show us if the levels of ketones are increasing or falling.

## How can ketosis be corrected?

The process of **ketosis** can be corrected by adding sugar and other minerals to your intravenous drip.

## Will I need hospital treatment for hyperemesis gravidarum?

Women with hyperemesis gravidarum can become quickly dehydrated and frequently need hospital treatment. When you come to hospital you will need to be assessed by the nursing and medical staff. The purpose of this assessment is to find out whether you fall into the small group of women suffering from hyperemesis gravidarum, to rule out other causes for your sickness and to determine if treatment is required.

## What does the hospital assessment involve?

The initial assessment will be made by a trained nurse. You will need to;

- Tell the nurse what you have had to eat and drink for the last 48 hours.
- Provide a urine sample to test for possible infection and look for ketones.
- Have your height and weight measured to assess any weight loss.
- Give a blood sample to examine the blood chemistry.
- Have an ultrasound scan to assess your pregnancy (in very early pregnancy it is sometimes difficult to get a good view of the developing baby so a vaginal (internal) scan might be carried out to overcome this problem.

The nurse will discuss this with you before any scan procedure is carried out.

If the diagnosis of hyperemesis gravidarum is made and the tests show that you are dehydrated then we will advise and recommend that you are admitted for treatment.

## What does the treatment involve?

The treatment will involve;

- Stopping or reducing your food and drink intake until your vomiting stops.
- Starting intravenous fluids (a drip which feeds fluid straight into your bloodstream).
- Collecting all urine and vomit to measure how much fluid you are losing.
- Testing your urine to check for ketones.

- Regularly checking your blood pressure and heart rate (because dehydration can lead to low blood pressure and a fast heart rate).
- Receiving medications either in tablet form or as an injection into your drip to help with
  - Nausea - feeling sick
  - Vomiting - actually being sick
  - Indigestion / Heartburn
- Receiving a vitamin supplement either in tablet form or as an injection into your drip.
- Wearing compression stockings to help blood circulation and prevent thrombosis (a blood clot in the vein) and a small daily injection of an anti - coagulant (a drug that helps prevent blood clots from forming - also called a blood thinner), to prevent the development of thrombosis.

It is anticipated that in most cases the treatment will take approximately 8 - 10 hours.

## What are the benefits of the treatment?

If left untreated hyperemesis gravidarum can lead to;

- dehydration
- weight loss
- disturbances of the blood chemistry
- malnutrition.

Therefore the treatment will improve your condition and prevent serious illness.

## How effective is the treatment?

Many women with HG improve rapidly during each admission simply by resting and receiving intravenous fluid replacement (a drip). This is possibly due to the fact that dehydration contributes to nausea and fatigue.

## Are there any side effects or risks?

As with any treatment in hospital there are some risks involved.

- There is a very small risk of infection from the cannula (a small flexible tube inserted into a blood vessel) which allows an intravenous drip to be connected and administered. Your nurse will check the cannula regularly but it is important that you tell your nurse if your cannula begins to hurt or become inflamed.

## Where will the treatment take place?

You will be admitted as a daycare patient and your treatment will take place on the **Hyperemesis Treatment Suite on Ward G1**.

## What are the advantages of daycare treatment on the HG Treatment Suite?

- Same day discharge with no overnight stay, in most cases
- No waiting for a ward bed, which means there is no delay in starting the treatment.
- Treatment in a quiet and comfortable unit with recliner chairs.
- Dedicated nursing staff who are able to reassure you and offer advice on how to cope with and control your symptoms
- Minimal disruption to your home life because your admission and treatment can be planned in advance. This will allow you to plan and organize work commitments, child care, transport etc which will reduce stress and anxiety.

## When will I be discharged from the HG Treatment Suite?

After the treatment your nurse will make a further assessment to determine if you are fit to be discharged. You will be fit to go home if you are able to,

- Drink and eat small amounts of food without vomiting
- If your temperature, blood pressure, heartbeat and respiratory (breathing) rate are within a normal range.
- The level of ketones in your urine is falling.

## Will I have to stay in hospital if my symptoms don't improve?

If your symptoms don't improve we will inform the doctor who may decide to continue your treatment overnight. If this happens you will be admitted to a hospital bed on the gynaecology ward and will be reviewed by the doctor the following day.

## Will I need to continue treatment at home?

Yes, you will be given anti sickness tablets to take home. It is important to follow the instructions that come with the tablets and take them as prescribed. You will also be given information and advice on how to manage and control your symptoms at home.

## What should I do if I become unwell again at home?

If you are:

- Unable to keep food and drink down for more than 24 hours
- Passing urine less frequently or your urine is unusually dark in colour.
- Losing or gaining little weight

## Please contact Ward G1 at the Royal Hallamshire Hospital on (0114) 226 8225

Monday to Friday, 7.00am to 9:30pm, Saturday and Sunday 7:00am to 9:00pm

At all other times the phones will be diverted to our other gynaecology ward G2.

It is advisable to contact the ward in the morning before 9.00am so that you can be seen the same day and given further intravenous treatment.

## How can I help to improve the Hyperemesis Gravidarum treatment service?

We welcome all comments, both good and bad, about the HG service. With your input we can make the necessary adjustments which will improve women's experiences of the HG Treatment Suite.

## Where can I find further information about HG?

- HER Foundation: [www.hyperemesis.org](http://www.hyperemesis.org)
- Morning Sickness Help: [www.morningsicknesshelp.com](http://www.morningsicknesshelp.com)
- NHS National Library for health: [www.prodigy.nhs.uk/patient\\_information/pils/pregnancy\\_and\\_sickness\\_and\\_vomiting](http://www.prodigy.nhs.uk/patient_information/pils/pregnancy_and_sickness_and_vomiting)
- About Pregnancy and Childbirth: [www.pregnancy.about.com](http://www.pregnancy.about.com)
- Baby Centre: [www.babycentre.co.uk](http://www.babycentre.co.uk)
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