

Information for patients using CMV positive donors in donor insemination

What is CMV?

Cytomegalovirus (CMV) is a common virus belonging to the herpes family of viruses, more than half the population are thought to have had exposure to it, resulting in a 'CMV positive' status. The symptoms in an adult may be mild like a cold and most of the time you would not know you had had it. It's spread through bodily fluids, such as saliva or urine, and can be passed on through sexual contact, or after receiving an infected organ during an organ transplant.

Why is it important in assisted conception

CMV can be more serious if contracted during pregnancy, as the infection could be passed to the baby. Around 13% of CMV positive babies born will have symptoms, these may be severe with long term complications such as: hearing loss, visual impairment or blindness, learning difficulties, dyspraxia (lack of physical co-ordination) or epilepsy.

What is the risk when using a 'CMV positive' donor?

The overall risk is low since we screen ALL our donors for sperm CMV. If a man is positive for IgG antibodies only (and not IgM), this means we still call him 'CMV positive' but he is no longer infective and instead this is an indication he has a past infection. We don't exclude men who have a past infection as this would mean that we could not recruit from at least 50% of the male population. If a man is positive for IgM antibodies, this means he has a current infection and we would not accept him as a donor until there is clear evidence that the infection has cleared.

What if the patient is CMV negative and donor CMV positive

Remember being CMV positive in a sperm donation context means that the donor has had a past infection but is no longer infective. Current guidelines suggest that as a precaution CMV positive donors should be restricted for use by CMV positive patients only as there is a theoretical risk of transmission. However when there is a limited choice of donors available we may sometimes suggest the use of a CMV positive donor to enable you to find the most suitable donor match, but we would ask you as the patient to consider the risks before we go ahead.

According to published literature, the risk of acquiring CMV via sexual contact with a healthy but CMV positive man is very low. The risk of transmitting a CMV infection is further lowered if washed sperm are used - which is what we do here at NUH. Not only do we prepare sperm before freezing which significantly reduces the presence of white blood cells (the cells that are most likely to harbour the virus), but we also wash the sperm once more when it is thawed. In addition, using a CMV negative donor does not guarantee that the female will not contract a CMV infection at some point during pregnancy, as CMV is a common infection that could be acquired at any time from numerous other sources. This is nevertheless a decision that you should make after some consideration and speaking to the nursing team and your gynaecologist.

Disclaimer

I(print name)_____ understand the risk associated with using a CMV positive donor and I'm prepared to accept the risk associated with my own treatment

Signed _____ Dated _____

Source material: NHS choices, <http://www.mayomedicallaboratories.com>, /www.cdc.gov/cmV/clinical/lab-tests.html, Bresson et al 2003 (Hum Reprod)