Article

Homepage

Children and young people with Juvenile Idiopathic Arthritis (JIA) can develop inflammation in their eyes as well as their joints. This is called uveitis (you-vee-eye-tis). It tends to affect the children's eyes over a long time (chronic) and mainly involves the front part of the eye. The number of children/young people with JIA who develop uveitis is 10-30%.

Print

What is uveitis and why is it important?

Children and young people with Juvenile Idiopathic Arthritis (JIA) can develop inflammation in their eyes as well as their joints. This is called uveitis (you-vee-eye-tis). It tends to affect the children's

eyes over a long time (chronic) and mainly involves the front part of the eye. The number of children/young people with JIA who develop uveitis is 10-30%

In the early stages there are often no symptoms. If symptoms do occur they include:

- eye pain,
- redness of the eye
- blurred vision.

If left untreated uveitis can lead to gradual loss of vision and sometimes blindness. This is why all children and young people with JIA should be referred for assessment by eye specialists (ophthalmologists).

Which children with JIA develop uveitis?

Currently we do not have a way of predicting which children with JIA will develop uveitis, therefore all children should be referred for review by an ophthalmologist from the time the diagnosis of JIA is suspected.

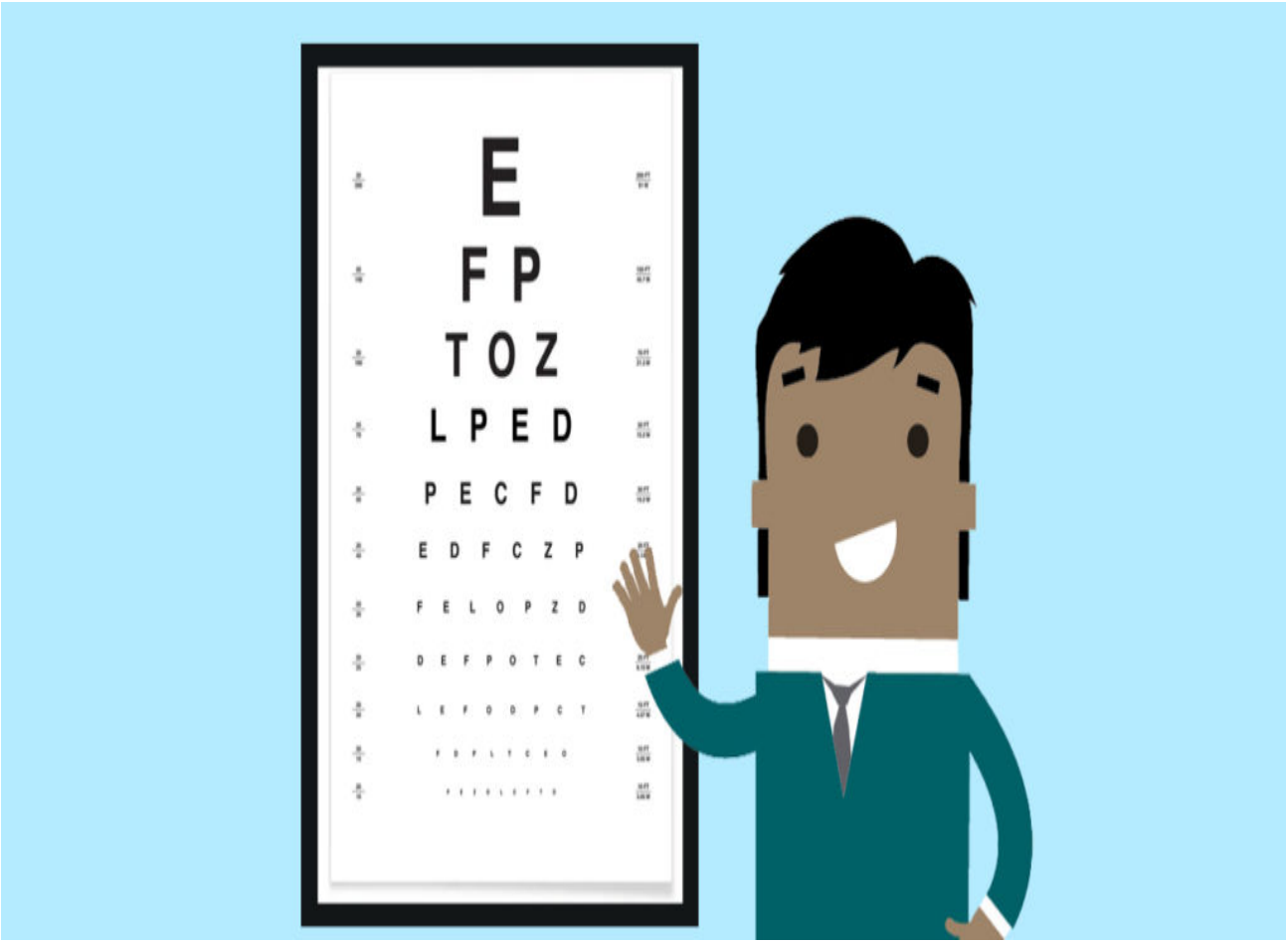
Uveitis is more common in the following groups:

- girls
- age under 7 years (especially under 4 years)
- oligoarticular (5 or fewer joints) subtype of JIA
- antinuclear antibody (ANA) positive on blood tests

Uveitis is very uncommon in:

- rheumatoid factor-positive polyarticular (5 or more joints) subtype of JIA
- systemic JIA (sJIA)

What happens at an eye check with an ophthalmologist?



You/your child will be asked about any problems with vision or any other symptoms related to their eyes. Your child's vision will be checked by asking him/her to read a chart with letters/pictures/shapes from a set distance. The exact method depends on your child's age and how cooperative they are. They may have eye drops given to enlarge (dilate) their pupils to allow the ophthalmologist to look inside for any signs of inflammation. This will be done using equipment called a slit lamp. Other tests may be undertaken depending on the findings and may include measurement of the pressure inside the eye (intraocular pressure) and photographs or retina scans (optical coherence tomography) of the back of the eye.

How often will my/my child's eyes be checked by an ophthalmologist?

The British Society for Paediatric and Adolescent Rheumatology (BSPAR) in its “Standards of Care for Children and Young People with Juvenile Idiopathic Arthritis” states that: “Children and young people with JIA should be screened and managed by an ophthalmologist with experience in paediatric uveitis, linked to the paediatric rheumatology clinical network, in accordance with the BSPAR and Royal College of Ophthalmology guidelines.” The target is that the screening starts within 6 weeks of diagnosis of JIA. The guidelines from BSPAR and the Royal College of Ophthalmology give details of how frequently your child should be seen for screening. In summary, they should be seen:

- every 2 months for the first 6 months after diagnosis of JIA
- checks should then be every 3-4 months up to age 12 years.

Uveitis can occur at any age but young people over 12 years are more able to notice and report problems with their vision.

Uveitis can be present without any symptoms so it is very important to have regular eye checks so that treatment can be started as early as possible if needed. If you/your child develops blurring or loss of vision, red eyes, abnormal pupils or intolerance to light, urgent review by an ophthalmologist should be arranged. Do not wait for the next follow-up appointment.

What are the complications of JIA-associated uveitis?

If uveitis is very severe or left untreated, it can lead to several complications which have long-term effects on vision and can lead to blindness. These include:

- cataracts – lens becomes cloudy
- glaucoma – increased pressure within the eye, causing damage at the back of the eye
- hypotony – reduced pressure within the eye
- macular oedema – swelling at the back of the eye
- band keratopathy – deposits of calcium within the cornea

What are the treatments for uveitis?

If you/your child requires treatment for uveitis it will be discussed in detail by your ophthalmologist. There are a range of effective treatments available and the choice depends on the severity of uveitis and any complications which may have occurred. Treatments include:

- eye drops (topical treatments)
    - steroid eye drops (e.g. prednisolone, dexamethasone): these are given to one or both eyes, one or more times per day to reduce inflammation in the eye
    - eye drops to dilate pupils (mydriatics): these are used to prevent scar tissue forming between the iris (the coloured part of the eye) and the lens
- immunosuppressive drugs – medications given by mouth, injection under the skin (subcutaneous) or infusion into a vein (intravenous). These treatments are used for uveitis which has not completely improved with steroid eye drops. They include:
    - steroids (e.g. prednisolone) – by mouth or intravenous infusion

- methotrexate – by mouth or subcutaneous injection
- mycophenolate mofetil (MMF) – by mouth
- adalimumab – by subcutaneous injection
- infliximab – by intravenous infusion

The decision to start systemic immunosuppression is usually made by your ophthalmologist and rheumatologist together. All treatments have potential side effects and these, together with the reasons for choosing a particular therapy, will be discussed on an individual basis by your doctor.

Not sure what some of the complex terms mean?

We have a dedicated Glossary section that provides definitions of complex terms like ‘intravenous’ or infusion’.

Go to Glossary

What research is currently underway in JIA-associated uveitis?

Several studies are taking place around the world looking for better treatments for uveitis. In the UK, the CLUSTER consortium aims to find and test new treatments for JIA-associated uveitis, to predict outcomes for childhood arthritis and to create a biomarker test to personalise treatment. There is a trial of baricitinib in children with active JIA-associated uveitis who have tried methotrexate and ing at the withdrawal of adalimumab in patients with

Article

Mycophenolate mofetil

Mycophenolate is used to control uveitis and often in addition to another medication such as methotrexate or a biologic drug. It is not used for control of arthritis.

Other Useful Links

Olivia's Vision

A charity which provides information, support and advice for anyone affected by uveitis

Updated: 20/09/2019