

# The effect of a lutein based nutritional supplement on non-exudative age-related macular degeneration (AMD): a double-masked randomised controlled trial

<b>Submission date</b> 20/06/2003	<b>Recruitment status</b> No longer recruiting	<input type="checkbox"/> Prospectively registered <input checked="" type="checkbox"/> Protocol
<b>Registration date</b> 11/09/2003	<b>Overall study status</b> Completed	<input type="checkbox"/> Statistical analysis plan <input checked="" type="checkbox"/> Results
<b>Last Edited</b> 11/01/2018	<b>Condition category</b> Eye Diseases	<input type="checkbox"/> Individual participant data

## Plain English summary of protocol

Not provided at time of registration

## Contact information

### Type(s)

Scientific

### Contact name

Miss Hannah Bartlett

### Contact details

Neuroscience Research Institute  
School of Life and Health Sciences  
Aston University  
Aston Triangle  
Birmingham  
United Kingdom  
B4 7ET

-

bartlehe@aston.ac.uk

## Additional identifiers

### Protocol serial number

N/A

# Study information

## Scientific Title

The effect of a lutein based nutritional supplement on non-exudative age-related macular degeneration (AMD): a double-masked randomised controlled trial

## Study objectives

Age-related macular degeneration is the leading cause of blind registration in the developed world. One aetiological hypothesis involves oxidation and the intrinsic vulnerability of the retina to damage via this process. This has prompted interest in the role of antioxidants in the prevention and treatment of this eye disease.

## Ethics approval required

Old ethics approval format

## Ethics approval(s)

Approved by the Aston University Human Sciences Ethical Committee.

## Study design

Randomised controlled trial

## Primary study design

Interventional

## Study type(s)

Treatment

## Health condition(s) or problem(s) studied

Age-related macular degeneration

## Interventions

The study formulation contains:

Lutein 10 mg

Vitamin C 250 mg

Vitamin E 34 mg

Vitamin A 750 µg

Zinc 10 mg

Copper 0.5 mg

## Intervention Type

Supplement

## Phase

Not Specified

## Drug/device/biological/vaccine name(s)

Lutein based nutritional supplement

## Primary outcome(s)

1. Distance and near Visual Acuity (VA) measured using Bailey-Lovie logMAR charts
2. Contrast sensitivity (CS) measured using a Pelli-Robson chart
3. Colour vision measured using the PV-16 quantitative colour vision test
4. Macular Mapping (MM) test
5. Eger Macular Stressometer (EMS) used to assess glare recovery
6. Fundus photographs of the macular will be assessed using colour and edge analysis software

Data collection will take place at baseline, nine, and 18 months.

**Key secondary outcome(s))**

Not provided at time of registration

**Completion date**

01/01/2005

## **Eligibility**

**Key inclusion criteria**

1. Have to provide written informed consent
2. Have to be available for three visits to Aston University
3. Have to present with no ocular pathology in one eye, or no ocular pathology other than dry AMD in one eye. A cataract grading system consisting of grades one, two and three for each of cortical, nuclear, and posterior subcapsular cataracts has been developed. Participants presenting with lens opacities precluding fundus photography are excluded. Throughout the trial period, progression of any type of cataract to the successive grade will require the participant to withdraw.

**Participant type(s)**

Patient

**Healthy volunteers allowed**

No

**Age group**

Not Specified

**Sex**

Not Specified

**Key exclusion criteria**

Exclusion criteria include type I and II diabetes because vitamin E has been shown to affect glucose tolerance and diabetic retinopathy may confound the results. Those taking Warfarin medication are excluded as zinc may decrease its absorption and activity, as are those who use nutritional supplements that potentially raise vitamin and mineral intake above safe limits. The most recent guidelines for upper limits of nutritional supplementation are set out in the UK Food Standards Agency report. Neovascular AMD and other ocular disease that could potentially interfere with the results are excluded.

**Date of first enrolment**

01/07/2003

**Date of final enrolment**

01/01/2005

## Locations

**Countries of recruitment**

United Kingdom

England

**Study participating centre**

**Neuroscience Research Institute**

Birmingham

United Kingdom

B4 7ET

## Sponsor information

**Organisation**

Aston University (UK)

**ROR**

<https://ror.org/05j0ve876>

## Funder(s)

**Funder type**

University/education

**Funder Name**

College of Optometrists (UK)

## Results and Publications

**Individual participant data (IPD) sharing plan****IPD sharing plan summary**

Not provided at time of registration

**Study outputs**

Output type	Details	Date created	Date added	Peer reviewed?	Patient-facing?
<a href="#">Results article</a>	results	01/04/2008		Yes	No
<a href="#">Protocol article</a>	protocol	10/10/2003		Yes	No
<a href="#">Study website</a>	Study website	11/11/2025	11/11/2025	No	Yes