

Development and randomised controlled trial of dipsticks and diagnostic algorithms for the management of urinary tract infection

Submission date

25/04/2003

Recruitment status

No longer recruiting

☐ Prospectively registered

☐ Protocol

Registration date

25/04/2003

Overall study status

Completed

☐ Statistical analysis plan

☒ Results

Last Edited

26/02/2010

Condition category

Urological and Genital Diseases

☐ Individual participant data

Plain English summary of protocol

Not provided at time of registration

Contact information

Type(s)

Scientific

Contact name

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Additional identifiers

Protocol serial number

HTA 97/14/06

Study information

Scientific Title

Study objectives

1. To develop and test the use of different algorithms/symptom scores in the diagnosis of urinary tract infection (UTI)
2. To develop and test the use of different dipstick strategies in the diagnosis of UTI
3. To assess the cost effectiveness of common management strategies in the diagnosis and treatment of UTI
4. To assess the effect of the different strategies on patient satisfaction, beliefs and behaviour

Two phases:

1. Dipstick and score validation
2. Block randomised open trial of management strategies

More details can be found at: <http://www.hta.ac.uk/1205>

Protocol can be found at: <http://www.hta.ac.uk/protocols/199700140006.pdf>

Ethics approval required

Old ethics approval format

Ethics approval(s)

Not provided at time of registration

Study design

Randomised controlled trial

Primary study design

Interventional

Study type(s)

Treatment

Health condition(s) or problem(s) studied

Urinary tract infection

Interventions

Phase 1. Different symptom scores (naive Bayesian, adjusted Bayesian, symptom counts) and combinations of dipstick results will be developed to predict 'standard' monosodium urate (MSU) diagnosis in half the subjects (randomly chosen). The optimal strategies will be determined - from sensitivity, specificity, predictive values, likelihood ratios, and workload implications from the R.O. curves and tested with previous scores in the other half of the data. Phase 2. This will be preceded by a development phase to determine the feasibility of trial procedures and exact strategy for each group derived from the results of phase 1. Patients will be block randomised to five groups:

1. Empiric antibiotic treatment (3 day course of trimethoprim)
2. Treatment based on algorithm/score (from phase 1)
3. Treatment based on dipstick (based on phase 1)
4. Treatment based on positive MSU examination and culture
5. Control group (symptomatic treatment based on alkalinization of urine and other symptomatic measures)

Intervention Type

Other

Phase

Not Specified

Primary outcome(s)

1. Symptom diary
2. Satisfaction
3. Belief in antibiotics
4. Notes review for
 - 4.1. reattendance
 - 4.2. complications
 - 4.3. referral
5. Costs
 - 5.1. manual timing for GP and other staff costs
 - 5.2. marginal costs in processing the MSUs

Key secondary outcome(s))

Not provided at time of registration

Completion date

09/09/2006

Eligibility**Key inclusion criteria**

Subjects presenting with suspected urinary tract infections (UTI)

Participant type(s)

Patient

Healthy volunteers allowed

No

Age group

Adult

Sex

Female

Key exclusion criteria

Pregnant women and women over the age of 75

Date of first enrolment

10/09/2001

Date of final enrolment

09/09/2006

Locations

Countries of recruitment

United Kingdom

England

Study participating centre

Primary Medical Care Group

Southampton

United Kingdom

SO16 5ST

Sponsor information

Organisation

Department of Health (UK)

ROR

<https://ror.org/03sbpja79>

Funder(s)

Funder type

Government

Funder Name

NIHR Health Technology Assessment Programme - HTA (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?
	results				

Results article		01/08/2006	Yes	No
Results article	results	05/02/2010	Yes	No
Other publications	cost effectiveness analysis	05/02/2010	Yes	No