Two-Yearly Diabetic Eye Screening in NHS Lothian: Patient Views and Experiences

A service evaluation of adults aged 20-50 years

Xilei Yan[1] | Suzy Cooke[2] | Dr Zhong Eric Chen[1,2*]

[1] Master of Public Health, The University of Edinburgh | [2] NHS Lothian | * Corresponding author: Eric.Chen@ed.ac.uk

THE UNIVERSITY of EDINBURGH

NHS Lothian

Why this evaluation was needed

Following clinical risk assessment, eligible low-risk patients may move from screening every 12 months to every 24 months.

Clinical evidence supports this change, but patients' views of the change and their perceptions of disease risk and severity remain unclear.

These perceptions may influence future screening attendance.

Methods

Cross-sectional online questionnaire distributed via SMS link.

Adults aged 20-50 on the NHS Lothian DES low-risk 24-month recall pathway.

Descriptive statistics and multivariable logistic regression.

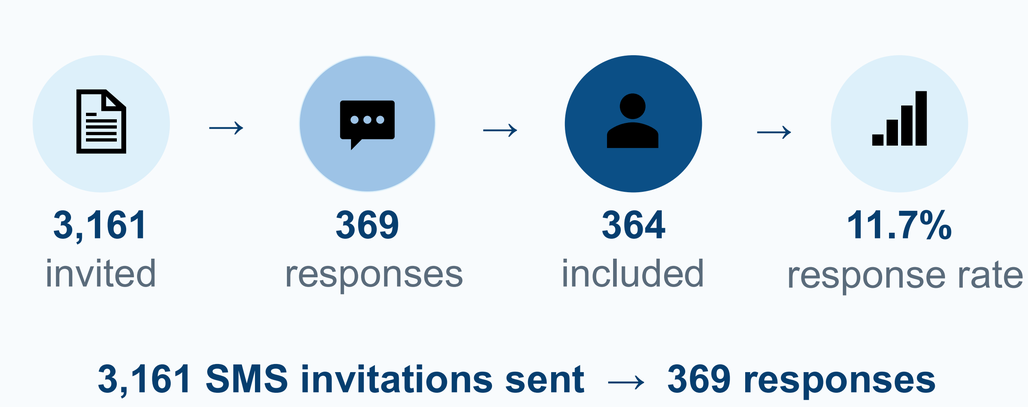
3,161 invited → **369** responses → **364** included → **11.7%** response rate

3,161 SMS invitations sent → 369 responses received → 364 included in final analysis

Response rate: 11.7%

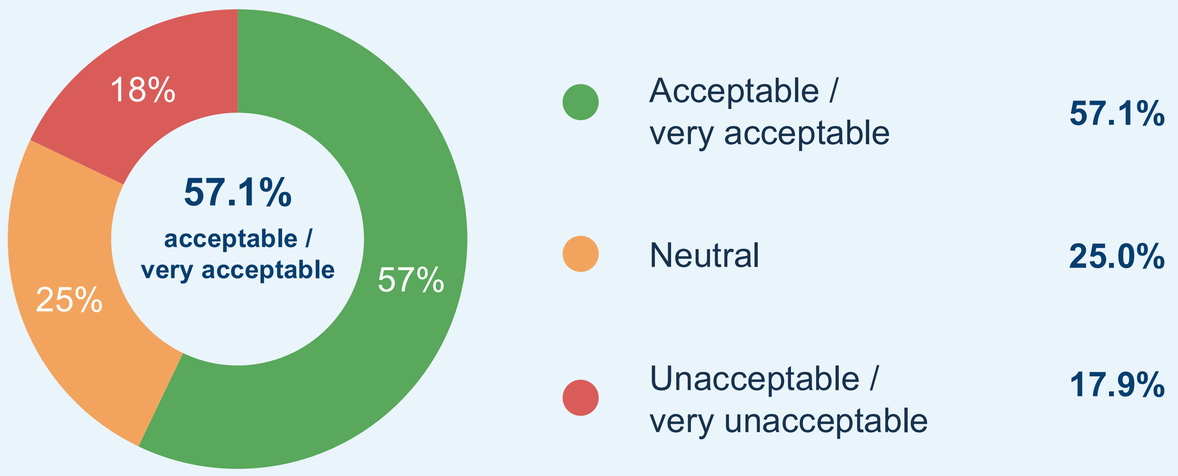
Service improvement needs

What would help patients feel more confident? (multiple responses)

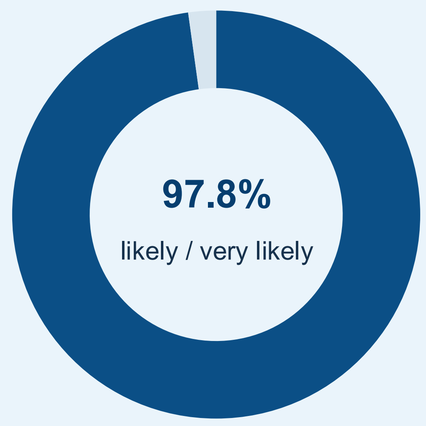


Results

Overall acceptability of 24-month screening

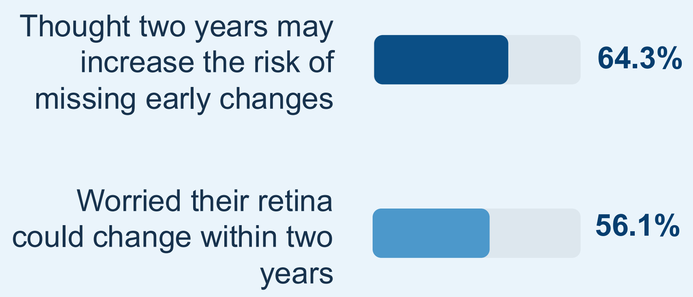


Intention to attend next screening



Most patients intended to continue attending DES.

Main concerns about 24-month interval



Views on the longer interval were mixed, but future attendance intention remained very high.

Adjusted analysis

Multivariable logistic regression adjusted for concern score, prior awareness, age and diabetes duration.

Higher concern score
aOR 0.240
(95% CI 0.168-0.341)

Prior unawareness
aOR 0.545
(95% CI 0.324-0.914)

Age
Not significant

Diabetes duration
Not significant

Acceptability was negatively associated with higher concern and prior unawareness.

Practice implications

Explain why 24-month recall is considered safe.

Use short, plain language explanations about why a patient is considered low risk.

Reassure patients while clarifying low risk ≠ no risk.

Acknowledge that low risk does not mean no risk and explain when to seek help.

Support engagement through SMS, digital information and easy rescheduling.

Use reminders and digital information to support continued attendance.

Conclusion

Most patients intended to continue attending diabetic eye screening, but better explanation and reassurance are needed to improve acceptability of the 24-month interval.

Acknowledgements: NHS Lothian Diabetic Eye Screening Service and all participants.