STROBE Statement—checklist of items that should be included in reports of observational studies

Section/item	Item No	Recommendation	Reported on Page Number/Line Number	Reported on Section/Paragraph
Title and abstract	1	(a) Indicate the study's design with a commonly used term in the title or the abstract	**page 1, lines 1-2**	**Title**
		(b) Provide in the abstract an informative and balanced summary of what was done and what was found	**page 2, lines 30-56**	**abstract**
Introduction				
Background/ rationale	2	Explain the scientific background and rationale for the investigation being reported	**page 3, lines 58-80**	**Introduction Paragraph 1-2**
Objectives	3	State specific objectives, including any prespecified hypotheses	**page 3-4, lines 86-90**	**Introduction Paragraph 3**
Methods				
Study design	4	Present key elements of study design early in the paper	**page 4, lines97-103**	**Methods Paragraph 1**
Setting	5	Describe the setting, locations, and relevant dates, including periods of recruitment, exposure, follow-up, and data collection	**page 4, lines 103-112**	**Methods Paragraph 1**
Participants	6	(a) ***Cohort study***—Give the eligibility criteria, and the sources and methods of selection of participants. Describe methods of follow-up ***Case-control study***—Give the eligibility criteria, and the sources and methods of case ascertainment and control selection. Give the rationale for the choice of cases and controls ***Cross-sectional study***—Give the eligibility criteria, and the sources and methods of selection of participants	**page 4, lines 97-112**	**Methods Paragraph 1**
		(b) ***Cohort study***—For matched studies, give matching criteria and number of exposed and unexposed ***Case-control study***—For matched studies, give matching criteria and the number of controls per case	**N/A Non-cohort studies**	
Variables	7	Clearly define all outcomes, exposures, predictors, potential confounders, and effect modifiers. Give diagnostic criteria, if applicable	**page 4, lines 106-112**	**Methods Paragraph 1**
Data sources/ measurement	8*	For each variable of interest, give sources of data and details of methods of assessment (measurement). Describe comparability of assessment methods if there is more than one group	**page 4-5, lines 114-140**	**Methods Paragraph 2 - 4**
Bias	9	Describe any efforts to address potential sources of bias	**page 5, lines 127-140**	**Methods Paragraph 3-4**
Study size	10	Explain how the study size was arrived at	**page 4, lines 97-103**	**Methods Paragraph 1**

Quantitative variables	11	Explain how quantitative variables were handled in the analyses. If applicable, describe which groupings were chosen and why	**page 5, lines 127-145**	**Methods Paragraph 3 Data Analysis Paragraph 1**

Statistical methods	12	(a) Describe all statistical methods, including those used to control for confounding	**page 5-6, lines 143-151**	**Data Analysis**
		(b) Describe any methods used to examine subgroups and interactions	**page 5, lines 143-145**	**Data Analysis**
		(c) Explain how missing data were addressed	**N/A** **no missing data**	
		(d) ***Cohort study***—If applicable, explain how loss to follow-up was addressed ***Case-control study***—If applicable, explain how matching of cases and controls was addressed ***Cross-sectional study***—If applicable, describe analytical methods taking account of sampling strategy	**page 4, lines 103-105**	**Methods** **Paragraph 1**
		(e) Describe any sensitivity analyses	**N/A** **no uncertain factor**	
Results				
Participants	13*	(a) Report numbers of individuals at each stage of study—eg numbers potentially eligible, examined for eligibility, confirmed eligible, included in the study, completing follow-up, and analysed	**Page14 , lines 382**	**Figure 1**
		(b) Give reasons for non-participation at each stage	**Page14 , lines 382**	**Figure 1**
		(c) Consider use of a flow diagram	**Page14 , lines 382**	**Figure 1**
Descriptive data	14*	(a) Give characteristics of study participants (eg demographic, clinical, social) and information on exposures and potential confounders	**Page 6 , lines 154-156**	**Results** **Paragraph 1**
		(b) Indicate number of participants with missing data for each variable of interest	**page 7, lines 185-190**	**Results** **Paragraph 5**
		(c) ***Cohort study***—Summarise follow-up time (eg, average and total amount)	**N/A** **Non-cohort studies**	
Outcome data	15*	***Cohort study***—Report numbers of outcome events or summary measures over time	**N/A** **Non-cohort studies**	
		Case-control study—Report numbers in each exposure category, or summary measures of exposure	**N/A** **Non-Cross-sectional study**	
		Cross-sectional study—Report numbers of outcome events or summary measures	**page 6-7, lines 154-190**	**Results** **Paragraph 1-5**

Main results	16	(a) Give unadjusted estimates and, if applicable, confounder-adjusted estimates and their precision (eg, 95% confidence interval). Make clear which confounders were adjusted for and why they were included	**page 6, lines 157-163**	**Results Paragraph 2**
		(b) Report category boundaries when continuous variables were categorized	**page 6, lines 157-172**	**Results Paragraph 2-3**
		(c) If relevant, consider translating estimates of relative risk into absolute risk for a meaningful time period	**N/A Relative risks were not the focus of this study**	
Other analyses	17	Report other analyses done—eg analyses of subgroups and interactions, and sensitivity analyses	**page 6-7, lines 173-190**	**Results Paragraph 4-5**
Discussion				
Key results	18	Summarise key results with reference to study objectives	**page 7, lines 193-201**	**Discussion Paragraph 1**
Limitations	19	Discuss limitations of the study, taking into account sources of potential bias or imprecision. Discuss both direction and magnitude of any potential bias	**page 9-10, lines 261-279**	**Discussion Paragraph 6**

Interpretation	20	Give a cautious overall interpretation of results considering objectives, limitations, multiplicity of analyses, results from similar studies, and other relevant evidence	**page 7-9, lines202-260**	**Discussion Paragraph 2-5**
Generalisability	21	Discuss the generalisability (external validity) of the study results	**page 10, lines 281-288**	**Conclusion**
Other information				
Funding	22	Give the source of funding and the role of the funders for the present study and, if applicable, for the original study on which the present article is based	**page 10, lines 290-291**	**Funding**

*Give information separately for cases and controls in case-control studies and, if applicable, for exposed and unexposed groups in cohort and cross-sectional studies.

Note: An Explanation and Elaboration article discusses each checklist item and gives methodological background and published examples of transparent reporting. The STROBE checklist is best used in conjunction with this article (freely available on the Web sites of PLoS Medicine at http://www.plosmedicine.org/, Annals of Internal Medicine at http://www.annals.org/, and Epidemiology at http://www.epidem.com/). Information on the STROBE Initiative is available at www.strobe-statement.org.

Article information: https://dx.doi.org/10.21037/qims-22-484.
*As the checklist was provided upon initial submission, the page number/line number reported may be changed due to copyediting and may not be referable in the published version. In this case, the section/paragraph may be used as an alternative reference.